























165

# Psychological Abstracts

nevaluative summaries of the world's literature in psychology and related disciplines

Volume 53

Number 1

January 1975

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*Psychological Abstracts* is published monthly, with two volumes per year. Each volume contains approximately 12,000 records. *Volume Cumulative Indexes* are published under separate cover. Total subscription price per year is \$190 (non-US, \$192).



# PSYCHOLOGICAL ABSTRACTS

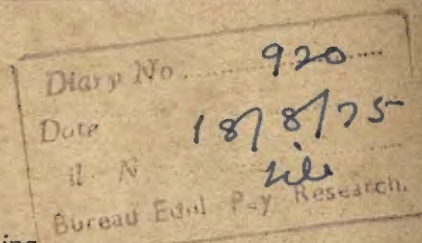
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## KEY TO THE TEXT

The examples of different types of *Psychological Abstracts* records presented here are number coded to provide definition of their elements.

### JOURNAL ARTICLE ABSTRACT

<sup>1</sup>8327. <sup>2</sup>Howard, R. Lee.; Glendenning, Robert L. & Meyer, Donald R. <sup>3</sup>(Ohio State U) <sup>4</sup>Motivational control of retrograde amnesia: Further explorations and effects. <sup>5</sup>*Journal of Comparative & Physiological Psychology*, 1974(Feb). Vol 86(2), 187-192. <sup>6</sup>Reports 5 investigations of variables related to the motivational control of retrograde amnesias for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer (see PA Vol 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. (8) <sup>9</sup>(15 ref) <sup>10</sup>*Journal abstract*.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author/editor only.
- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
- 5 - Primary publication title and bibliographic data.
- 6 - Text of abstract.
- 7 - Reference to a previous entry in *Psychological Abstracts*. If an abstract number is unavailable at time of publication, the issue number is given. Consult the Author Index of the PA issue noted in order to determine the record number for the article.
- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

### BOOK ANNOTATION

<sup>1</sup>8328. <sup>2</sup>Chase, William G. <sup>3</sup>(Ed). <sup>4</sup>(Carnegie-Mellon U) <sup>5</sup>Visual information processing. <sup>6</sup>New York, NY; <sup>7</sup>Academic, <sup>8</sup>1973. <sup>9</sup>xiv, <sup>10</sup>555 p. <sup>11</sup>\$17.50. <sup>12</sup>Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Designation of editor.
- 4 - Affiliation of first-named author/editor only.
- 5 - Book title: If the book is in a foreign language, the original title is given followed by a translated title and the language of the book is indicated in parentheses.
- 6 - Place of publication.
- 7 - Publisher.
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

### BOOK CHAPTER CITATION

<sup>1</sup>8329. <sup>2</sup>Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. <sup>3</sup>(Stanford U) <sup>4</sup>On the meeting of semantics and perception. <sup>5</sup>In W.G. Chase (Ed), *Visual information processing*, New York, NY: Academic, 1973. xiv, 555 p. \$17.50.

- 1 - Record number.
- 2 - Author(s) of cited chapter. As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

## ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH	= adrenocorticotrophic hormone	NREM	= nonrapid eye movement
DNA	= deoxyribonucleic acid	REM	= rapid eye movement
E	= experimenter	RNA	= ribonucleic acid
EEG	= electroencephalogram or -graph	S	= subject
ESP	= extrasensory perception	TV	= television
Exp	= experiment	US	= United States
IQ	= intelligence quotient	USSR	= Union of Soviet Socialist Republics
LSD	= lysergic acid diethylamide	WAIS	= Wechsler Adult Intelligence Scale
MMPI	= Minnesota Multiphasic Personality Inventory	WISC	= Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., ALGOL, COBOL, FORTRAN, IBM 360.

Language abbreviations used after translated titles are:

Afri = Afrikaans	Geor = Georgian	Port = Portuguese
Alba = Albanian	Germ = German	Romn = Romanian
Arab = Arabic	Grek = Greek	Russ = Russian
Bulg = Bulgarian	Hebr = Hebrew	Slov = Slovene
Chin = Chinese	Hung = Hungarian	Slov = Slovak
Czec = Czech	Iran = Iranian	Span = Spanish
Danh = Danish	Ital = Italian	Ser = Serbo-Croatian
Duth = Dutch	Japn = Japanese	Swed = Swedish
Finn = Finnish	Lith = Lithuanian	Turk = Turkish
Flem = Flemish	Norg = Norwegian	Ukrn = Ukrainian
Fren = French	Polh = Polish	Yugo = Yugoslavian

\*Consult Webster's New Collegiate Dictionary

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# PSYCHOLOGICAL ABSTRACTS

Volume 53

January 1975

Number 1

## GENERAL

1. ———. **Digests of papers: Fifty-first annual meeting: American Orthopsychiatry Association, San Francisco, California, April 8-12, 1974.** *American Journal of Orthopsychiatry*, 1974(Mar), Vol 44(2), 180-297.—Includes papers on such topics as rape, sterilization, female psychotherapy, drug abuse, therapy with the poor, family therapy, school psychology, day care, crisis intervention in the ghetto, and community mental health.

2. Altman, Fred & Miller, Suzanne P. (National Inst. on Drug Abuse, Rockville, Md.) **A matching-to-sample procedure for the study of visual perception and concept formation in infrahumans: A test in the pigeon.** *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 312-316.—Details an apparatus suitable for conducting simultaneous or delayed matching-to-sample experiments with as many as 8 comparison stimuli. Data are presented from an experiment with 4 male Carneaux pigeons which indicate that the Ss were capable of performing such a task. It is concluded that the simultaneous matching-to-sample procedure with more than 2 comparison stimuli is an efficient means of obtaining information about discrimination capacity and that this procedure may be suitable for studying visual perception in infrahuman Ss.—*Journal abstract*.

3. Attneave, Fred. (U Oregon) **How do you know?** *American Psychologist*, 1974(Jul), Vol 29(7), 493-511.—Discusses the problem of how humans acquire knowledge. 2 types of representation of the external world are considered—in digital representations (e.g., language), relations are represented by substitute things (words), whereas in analog representations (e.g., maps), items are represented by their spatial interrelationships. The basis for knowing how can be represented as a stimulus-response-stimulus linkage; it is only by doing things that change one situation into a more favorable one that the organism can affect his chances of survival. It is considered that many human psychological functions entail analog representations, particularly the system for representing physical space. The theoretical advantages of assuming assuming tridimensional analog model of physical space are discussed, and evidence for this model is presented. The question of whether images exist in memory as picturelike forms and/or languagelike descriptions is considered. (21 ref)—*A. Olson*.

4. Braginsky, Benjamin M. & Braginsky, Dorothea D. (Wesleyan U) **Mainstream psychology: A critique.** New York, NY: Holt, Rinehart & Winston, 1974. xv, 206 p.—Analyzes the predominant theories, research, and practice of contemporary American psychology. The roles of the psychologist as technician, moralist, and

scientist; the sociology of psychology; the methods and theory of behaviorism and of humanism; and psychological diagnosis and psychotherapy are examined. (9 p ref)

5. Brown, Phil. **Toward a Marxist psychology.** New York, NY: Harper Colphon, 1974. xix, 186 p. \$2.95.—Proposes that psychiatrists, psychologists, and allied professionals are engaged in subtle forms of brutality, integrally related to the brutalities of capitalism. The theory and practice of revolution is urged as a solution, choosing dialectics over scientism and discussing a medical model of mental illness, the failure of the Marx-Freud synthesis, W. Reich and sexual-political struggle, and the psychology and revolution of F. Fanan. (8 p ref)

6. Carpenter, Finley. (U Michigan) **The Skinner primer: Behind freedom and dignity.** New York, NY: Free Press, 1974. xvi, 224 p. \$7.95(cloth), \$2.45(paper).—Answers critics of Skinner's *Beyond Freedom and Dignity*, examining his position on freedom in clear, nontechnical terms, acknowledging the book's plausible parts, and identifying its shortcomings. The relationship between freedom and education is explored.

7. Carroll, John. (La Trobe U, Bundoora, Vic, Australia) **Break-out from the crystal palace: The anarcho-psychological critique: Stirner, Nietzsche, Dostoevsky.** Boston, MA: Routledge & Kegan Paul, 1974. 188 p. \$15.—Traces the development of the anarcho-psychological critique of economic man, of all codes of ideology or absolute morality, and of scientific thought from its roots in 19th-century philosophy to the works of Stirner, Nietzsche, and Dostoevsky. Their critiques of the other 2 major social philosophies—liberal-utilitarian-rationalist and Marxist-socialist—are discussed, and the roles of technology and the individual in these 3 philosophical traditions are examined. (7 p ref)

8. Chaplin, James P. & Krawiec, T. S. (St Michael's Coll) **Systems and theories of psychology.** (3rd ed). New York, NY: Holt, Rinehart & Winston, 1974. x, 739 p.—Discusses the evolution of the various schools of psychology and details concepts of sensation, perception, learning, thinking and language, motivation, feeling and emotion, behavior, and personality. (37 p ref)

9. deMause, Lloyd (Ed.). **The history of childhood.** New York, NY: Psychohistory Press, 1974. ii, 450 p. \$12.50.—Presents a survey by 10 psychohistorians concerning childhood from the late Roman and early medieval periods to middle-class nineteenth century in Europe and America.

10. Diamond, Solomon. (California State U, Los Angeles) **Four hundred years of instinct controversy.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 237-252.—Although most issues of the instinct controversy were defined in the 17th century, 18th-century French enlightenment vigorously rejected the concept. Natural



theology and Darwinism led to wide acceptance of instinct in the 19th century, but the 20th century witnessed a revival of anti-instinct attitudes. Extraneous influences still impede recognition of scientific evidence for the importance of innately determined behavior. (80 ref)

11. Ebel, Robert L. (Michigan State U, Coll of Education) **And still the dryads linger.** *American Psychologist*, 1974(Jul), Vol 29(7), 485-492.—Ancient ancestors invented dryads, or tree nymphs, to explain what they could not otherwise understand. It is argued that hypothetical constructs serve the same function for some contemporary behavioral scientists. Constructs such as intelligence, motivation, and creativity become modern dryads when used to explain behavior rather than simply to describe it. To be scientifically useful a hypothetical construct must be validated. This means that it must be shown to be functionally related to some behavioral variable(s) other than the one it was invoked to explain. It is concluded that few of the hypothetical constructs in the behavioral sciences have met this test and that those that cannot meet the test should be abandoned. (19 ref)—*Author abstract.*

12. Emiling, John F. (U Dayton) **In the beginning was the response.** *Religious Education*, 1974(Jan), Vol 69(1), 53-71.—Emphasizes J. Piaget's history, and the background of the times in which his genetic epistemology came into being, as a basis for understanding its influence. Piaget's position, enunciated, developed, and appraised, has important implications for the learning process today.—*E. Gavin.*

13. Eriksson, Carl-Gunnar . **On the ecological approach in social science.** *Goteborg Psychological Reports*, 1973, Vol 3(14), 36 p.—Considers that the ecological approach leads to basic consideration of epistemological principles and metatheoretical positions on changing units of analysis. The aggregation bias—the effects of grouping data instead of analysis of individual units—is discussed in bivariate models and briefly in more complex models. It is argued that both theories on the micro- and macrolevels are needed, together with cross-level theories. Fallacies in interpreting findings on different levels are discussed, and suggestions for future ecological studies are given in a discussion of input and output variables. A study of the effects of aggregation is outlined. (9 p ref)—*Journal abstract.*

14. Phaner, Stig & Sjöberg, Lennart. **Measurement in differential psychology: A symposium.** *Göteborg Psychological Reports*, 1973, Vol 3(6), 42 p.—Summarizes papers on (a) latent trait theory, including conditional estimation in the Rasch model and dimensionality in a latent trait model; (b) generalizability of behavioral data, including the construct validity of tests and empirical studies in differential psychology; and (c) measurement of change, including models and estimation methods and path models with latent variables.

15. Frank, Robert . **[Scientific value and the ideological role of psychology.]** (Fren) *Revue de Psychologie et des Sciences de l'Éducation*, 1973, Vol 8(3), 325-353.—Suggests that the unity in the diverse activities of psychology lies in its effort to make the human subject an object of knowledge. It is this epistemological ambiguity that permits psychology to fill its ideological

role, that of relating man to his institutions, and thus achieve a totality.

16. Gomes de Araújo, H. A. **Phenomenological perspectives in existential analysis.** *Foreign Psychiatry*, (Win), Vol 2(4), 22-49.—Distinguishes between "life," which moves forward of itself, and "existence," which implies experiment and decision and is linked to the concept of "essence." Of all organisms, man alone exists and knows that he exists. He also knows that his existence is finite, (i.e., that he will die). He can comprehend biological termination but cannot actually imagine an end to existence, to his internal dialogue with himself. His awareness of being finite drives him into action that would never be taken if he were immortal; human existence is a function of death, which limits man's horizon in time and gives meaning to what it limits. Man has devices to compensate for inescapable and intolerable realities: the drive for self-immortalization, which requires him to plan and follow a "program of existence"; compensatory illusions such as disbelief in his finiteness; neutralization through love; and transcendence, the establishment of links with the outside world. These concepts and their ramifications are expounded in detail.—*I. Davis.*

17. Green, T. R. & Guest, D. J. (MRC Social & Applied Psychology Unit, U Sheffield, England) **An easily-implemented language for computer control of complex experiments.** *International Journal of Man-Machine Studies*, 1974(May), Vol 6(3), 335-359.—Details the main features of GLUE, Generalized Languages for Universal Experimentation, a computer language which allows the implementation to proceed in 3 stages, of which only the 1st requires assembly-code programming. An example demonstrates the programming of an algorithm for parsing with respect to context-free phrase-structure grammars.

18. Greenfield, Jerome . (State U New York, New Paltz) **Wilhelm Reich vs the U.S.A.** New York, NY: W. W. Norton, 1974. 380 p. \$10.—Describes the legal conflict between W. Reich and the Food and Drug Administration (FDA) over Reich's attempt to distribute an experimental device for accumulating orgone energy. A brief review of Reich's theories is included, and the harassment of Reich by the FDA from the preliminary investigation to his appeal to the Supreme Court is described. Legal briefs and reports of FDA investigations of Reich's device are appended.

19. Hall, Elizabeth . **Why we do what we do: A look at psychology.** Boston, MA: Houghton Mifflin, 1973. 184 p. \$5.95.—Discusses modern psychology in terms of what it is, the techniques it uses, and the kinds of knowledge it has added to the understanding of human relationships. These discussions cover general areas of psychology—motivation, emotions, learning, personality, persuasion, and adjustment—and are related to experiences in everyday living.

20. Handy, Rollo & Harwood, E. C. (Behavioral Research Council, Great Barrington, MA) **A current appraisal of the behavioral sciences.** (Rev ed). Great Barrington, MA: Behavioral Research Council, 1973. xi, 148 p.—Presents an analysis of the state of modern scientific inquiry and procedures of research on human behavior in the field of psychology, anthropology,

sociology, political science, economics, law, game and decision theory, and cybernetics. An appendix on scientific naming is included.

21. Hühne, A. & Maurus, M. (Max-Planck-Inst for Psychiatry, Munich, W Germany) **Semiautomatic conversion of behavioral data from film to paper tape for computer analysis.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 317-319.—Describes a device which facilitates, in 1 step, the conversion of behavioral data. Time data is automatically read off the film by forward or backward replay at various speeds and any number of time-overlapping or multiple-occurring parallel behavioral events can be recorded.

22. Humphrey, Robert L. (American Inst for Research, Pittsburgh, PA) **Scientific ethic, dual life value: Theory & ramifications.** San Diego, CA: Grossmont Press, 1974. 64 p.—Presents a synthesis of R. L. Humphrey's philosophy and program for resolving difficult cross-cultural and human relationships: the dual-life-value theory. Such basic principles as man's nature and reason, economic and political equality, freedom and democracy, domestic and international aid, birth control, and the use of killing force and the military are discussed.

23. Illingworth, G. & Terman, M. (Northeastern U) **Phase locked loop: An application in temperature telemetry and a method for its evaluation.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 335-338.—Outlines the application of a phase locked loop (PLL) in the front end circuitry of a temperature telemetry system. Some of the features inherent in PLL operation are discussed which make them more powerful than a Schmitt trigger circuit and applicable to analysis of many types of frequency signals. A simple method is developed whereby PLL behavior can be optimized.

24. Ito, T. & Furuya, M. (JASDF Aeromedical Lab, Tokyo, Japan) **[A study of behavioral analysis of pilot during aircraft controlling: II. In-flight recording equipments and methods of installation for T-34, T-1A (B) and T-33A.]** (Japn) *Reports of Aeromedical Laboratory, JASDF*, 1973(Jun), Vol 14(1), 7-13.—Describes different types of inflight audiovisual recording equipment and methods of installation used to study pilot behavior. Specifications are presented for 8 mm cameras for filming outside scenes, flight instruments, and pilot actions; memo-motion timers for time control and synchronization; audio recorders for pilot oral presentation and air traffic controller responses; and the appropriate remote switch and cable assemblies. —English abstract.

25. Konijn, H. S. (Tel-Aviv U, Israel) **Statistical theory of sample survey design and analysis.** New York, NY: American Elsevier, 1973. xv, 429 p. \$32.50.—Presents a textbook for both students and professionals on procedures of sampling methodology and analysis. Topics include simple random sampling; ratio and related estimators in simple random sampling; stratified sampling; selection of sampling units; cluster sampling; nonsampling errors; and repeated surveys.

26. LeShan, Lawrence. **How to meditate: A guide to self-discovery.** Boston, MA: Little, Brown, 1974. 210 p. \$5.95.—Presents a practical guide to meditation, including specific exercises and programs drawn from the

practices of Zen, Sufi, Yoga, and Christian and Jewish mysticism. Other topics include the psychological and physiological effects of meditation, advice on choosing a teacher for meditation, the role of meditation in psychotherapy, and the social significance of the meditation and self-discovery movements. (4 p ref)

27. Maurer, Adah. (Committee to End Violence Against the Next Generation, Berkeley, CA) **Corporal punishment.** *American Psychologist*, 1974(Aug), Vol 29(8), 614-626.—Presents a 2-part examination of the literature on corporal punishment in which J. M. Johnston's analyses of the laboratory literature (see PA, Vol 50:231) are contrasted with field study literature. It is suggested that laboratory investigators have underemphasized the reality of educational and child-rearing customs while field study investigators have underemphasized the scientific aspects of their efforts. Part 1 presents an historical and psychological view of the development of the word "punishment." Special emphasis is given to the idea that punishment terms carry markedly different meanings depending on the context and the user. Part 2 concentrates on some of the theories of punishment. (151 ref)—M. Pounsel.

28. Mazur, Allan & Robertson, Leon S. (Syracuse U) **Biology and social behavior.** New York, NY: Free Press, 1974. vii, 200 p. \$2.45.—Presents a summary of the literature on the interaction of biological, psychological, and social factors in human behavior. Interspecies comparisons, intraspecies comparisons, and biological manipulations are discussed in the areas of language, genetics, hormone systems, socialization, brain alteration, and drugs. (25 p ref)

29. McMahon, Frank B. (Southern Illinois U, Edwardsville) **Psychology, the hybrid science.** (2nd ed.). Englewood Cliffs, NJ: Prentice-Hall, 1974. xv, 672 p.—Presents the 2nd edition of an introductory psychology textbook for undergraduates, emphasizing the interdisciplinary nature of psychological theory and research. Topics include the beginnings of psychology, the relationship of psychology, biology, and physiology, perception and psychology, measuring intelligence and personality, and the causes and treatment of mental illness. (41 p ref)

30. McNeil, Elton B. (U Michigan) **The psychology of being human.** San Francisco, CA: Canfield, 1974. xvi, 715 p. \$11.95.—Presents an introductory psychology textbook which incorporates a wide range of theoretical viewpoints and includes the work of all schools of psychology: behavioral, developmental, clinical, comparative, physiological, and humanist. Psychological jargon is minimized, and emphasis is placed on such topics as aging and death, sex, styles of living, consciousness, and the "world of work." (24 p ref)

31. Nagaraja, Jaya. **Evolution of psychiatry in India.** *Child Psychiatry Quarterly*, 1973(Jan), Vol 6(1), 18-19.—Traces the evolution of psychiatry from the folk-life of India. There is tangible evidence of its existence years prior to its practice in the West. There was social security and partnership, and milieu-conscious management operated at the communal level on the principles of what was "good" and "bad" for an individual. A rational social system existed, with different established stages and goals, and everyone worked completely within his



boundaries. Each home was itself a community mental health center organized along traditional lines, and there were experts to deal with more severe problems. Mental illness was believed to result from defective human transactions, and treatment was directed toward active socialization in group activities or toward change of environment.—R. S. Albin.

32. Ratner, Stanley C.; Katz, Leo & Denny, M. Ray. (Michigan State U) **Training a surrogate for evaluation of tobacco smoking of humans: Rationale and outcome.** *Psychological Record*, 1974(Sum), Vol 24(3), 365-372.—Argues that problems of statistics, ethics, and convenience interfere with drawing strong conclusions about relations between smoking tobacco and other processes when humans are Ss in the investigations. The present study established and tested a research preparation and procedure to study smoking behavior with a half-grown male weeper capuchin monkey (*Cebus apella*). Long-term habituation procedures to the testing situation and to tobacco smoke were necessary. Smoking then occurred reliably, using a procedure to fade-in smoke with a reward contingency for smoking a preferred substance. After smoking was discontinued for several months, reliable smoking performance was reinstated by reinstating the testing conditions.—*Journal abstract*.

33. Rubin, Zick. (Harvard U) **A new order of things: A case study in the reconstruction of an experimental procedure.** *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 81-87.—Presents a case study of the way in which the procedures of a psychological study may be reconstructed in subsequent accounts. The order of events of a well-known social-psychological experiment by E. Walster (see PA, Vol 39:15004) has been reversed—either directly or by implication—in subsequent accounts. The perceptual processes which may underlie such unintentional reconstructions are discussed. It is suggested that the sequence-reversal may be attributable in part to the assimilation of the actual procedure to psychologists' preconceived explanatory frameworks. The reconstruction of events may also be facilitated by the slippage which occurs when information about a study is transmitted from one source to another. Such reconstructions of research procedures are probably not confined to isolated cases nor indulged in only by social psychologists. Although they may illustrate theoretically interesting processes, they are also likely to bias scientific literature. (18 ref)—*Journal abstract*.

34. Sjöberg, Lennart. **On the homogeneity of psychological processes.** *Göteborg Psychological Reports*, 1973, Vol 3(15), 16 p.—Considers that a basic theme in psychological thinking is that of process. Overt behavioral variables are often seen as indicants of psychological processes. The problems arising in generalization from such indicants and from their interpretation across different populations, persons, and situations are discussed. Methods for measuring homogeneity of processes are outlined, and the relationship between similarity and correlation is emphasized as an important type of evidence as to homogeneity. Applications in the fields of attitude change and factorial studies of human intellect are briefly discussed. (34 ref)—*Journal abstract*.

35. Skinner, B. F. (Harvard U) **About behaviorism.** New York, NY: Alfred A. Knopf, 1974. 256 p. \$6.95.—Presents Skinner's explanation of the theories propounded in his book *Beyond Freedom and Dignity* defining, analyzing, and defending his highly controversial views on behaviorism. Among the topics discussed are the causes of behavior; innate, operant, and verbal behavior; thinking and knowing; and emotion and the sense of self.

36. Smith, Noel W. (State University Coll New York, Plattsburgh) **The ancient background to Greek psychology and some implications for today.** *Psychological Record*, 1974(Sum), Vol 24(3), 309-324.—Examines the belief system and psychological concepts of primitives and peoples of ancient civilizations together with the influences of the latter on the Greeks, showing the continuity in naturalistic modes of thought that led to the development of Greek scientific psychology. The psychologies of today that have incorporated dualism and reverted to animism are rooted in this post-Greek supernaturalism. The approach of the Greeks and their predecessors may offer insights toward overcoming contemporary conceptual impediments. (44 ref)

37. Taplin, Paul S. & Reid, John B. (Oregon Research Inst, Eugene) **Effects of instructional set and experimenter influence on observer reliability.** *Child Development*, 1973(Sep), Vol 44(3), 547-554.—Conducted a laboratory analog of naturalistic observation to examine the relationship of observer drift to instructional set and experimenter status. 3 instructional sets (no check, random check, and spot check) and 2 levels of experimenter status were studied with 18 female undergraduates serving as Os. Os were trained to use a behavior coding system to rate a videotape of mother-child interaction. Results indicate a highly significant decrease in O reliability coinciding with the shift from training to data collection. This performance decrement was observed in all 3 instructional set conditions. Within the spot-check condition, reliability on spot-check days was significantly greater than mean reliability immediately before and after spot checks. Further results reveal that Os trained by the high-status E performed less reliably than Os trained by the other 2 Es. Implications for future observational research and suggestions for minimizing observer drift are discussed. (21 ref)—*Journal abstract*.

38. Thompson, Elton N. (California State Coll., San Bernardino) **A plea for replication.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 79-86.—Argues that replication of research studies is a worthwhile activity for the beginning researcher, emphasizing the increased mentions of replications in textbooks dealing with research methodology. The author's own replication of an earlier study on factors affecting problem-solving in elementary school mathematics courses is presented to demonstrate that replications can be very instructive and not mere copywork. Findings which are repeatedly supported through subsequent replications of the original investigation can be used with greater confidence than results of only 1 study "significant at the .001 level." The search for reasons why findings from replications differ can also provide a



valuable learning experience for the investigator. (17 ref)  
—*Journal abstract.*

39. U Göteborg, Dept of Psychology . (Sweden)  
**Annual report: University of Göteborg Psychological Reports.** Göteborg Psychological Reports, 1973, Vol 3(16), 22 p.—Presents summaries of the work carried out by the Department of Psychology, including research in the fields of applied general psychology, psychobiology, and psychological gerontology. Among the works outlined are those in industrial and child psychology, psycholinguistics, psychometrics, and sexual behavior.

40. Wollheim, Richard (Ed.). (University Coll London, England) **Freud: A collection of critical essays.** New York, NY: Doubleday, 1974. xv, 416 p. \$4.95.—Presents 22 readings which interpret Freud's thought from the viewpoint of philosophy. Among the topics discussed are dream interpretation, emotions, the id and the thinking process, rational behavior and psychoanalytic explanation, and the psychology of language. (8 p ref)

## PSYCHOMETRICS AND STATISTICS

41. Campbell, David P.; Crichton, Leslie; Hansen, Jo L. & Webber, Patricia . (Ctr for Creative Leadership, Greensboro, NC) **A new edition of the SVIB: The Strong-Campbell Interest Inventory.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 92-95.—Made several changes in a new edition of the Strong Vocational Interest Blank to reflect more accurately the changing occupational roles of the sexes. 1 booklet and 1 profile form are used for both sexes, and profile scores are organized into J. L. Holland's theoretical system. All testing and interpretive materials have been screened to eliminate subtle sexism.

42. Fisher, Mary A. (U. Maryland, Baltimore County) **Estimating hypothesis strengths.** *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 309-311.—Demonstrates that violation of the exhaustiveness postulate of M. Levine's (1965) hypothesis model produces large errors in the estimation of the proportions of problems mediated by the various hypotheses. In 2 cases, when stat-subject simulations satisfied the postulates, estimates were reasonably close to actual values. One interpretation proposes that negative values of estimates are an indication that the exhaustiveness assumption is violated. An alternative computational method is described.—*Journal abstract.*

43. Harris, David R. & Fenker, Richard . (Texas Christian U) **INDSCAL for a small computer using basic FORTRAN IV.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 129-132.—INDSCAL is a computer program for testing individual differences in multidimensional scaling. The model underlying the procedure assumes that individuals weight differently the several dimensions of a common psychological space and that these weights, as well as stimulus projections on the common axis, can be determined as part of the scaling solution. A discussion of input and output specifications, and of the capabilities, limitations, and availability of the program is provided.—*R. W. Covert.*

44. Koehler, Roger A. (U Nebraska, Teachers Coll) **Overconfidence on probabilistic tests.** *Journal of Educa-*

*tional Measurement*, 1974(Sum), Vol 11(2), 101-108.—Evaluated a potentially useful measure of overconfidence on confidence response multiple-choice tests. The measure of overconfidence is based on probabilistic responses to 7 nonsense items embedded in a 33-item vocabulary test. The test was administered under both confidence response and conventional choice response directions to 208 undergraduate educational psychology students. Measures of vocabulary knowledge based on confidence and choice responses, overconfidence, and risk-taking propensity were obtained. Overconfidence was significantly related in a negative direction to confidence response vocabulary scores and essentially unrelated to choice response vocabulary scores. A moderate correlation was found between overconfidence and risk-taking propensity; however, the scatter plot for these measures showed that this relationship may have been spurious. (15 ref)—*Journal abstract.*

45. McPherson, J. Miller & Huang, Cliff J. (U Nebraska) **Hypothesis testing in path models.** *Social Science Research*, 1974(Jun), Vol 3(2), 127-139.—Demonstrates that the 3 prior criteria for linear recursive causal (path) model evaluation are equivalent to a more general technique. Hotelling's  $T^2$  is introduced as a means of evaluating general hypotheses for the entire model, and the "twice standard error" rule is shown to be misleading. (26 ref)

46. Nowakowska, Maria . (Polish Academy of Sciences, Inst of Praxiology, Warsaw, Poland) **Polish adaptation of the Sixteen Personality Factor Questionnaire (16 PF) of R. B. Cattell, as a source of cross-cultural comparisons.** *Polish Psychological Bulletin*, 1974, Vol 5(1), 25-33.

47. Nyborg, Helmuth & Isaksen, Bo . (U Aarhus, Inst of Psychology, Risskov, Denmark) **A method for analysing performance in the rod-and-frame test: II.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 124-126.—Cites the new method of scoring the rod-and-frame test which was proposed by H. Nyborg (see PA, Vol 53:Issue 1). The statistical model behind the new method is introduced, and results of 2 experiments which tested the model with a total of 74 undergraduates are presented.—*Journal abstract.*

48. Nyborg, Helmuth . (U Aarhus, Inst of Psychology, Risskov, Denmark) **A method for analysing performance in the rod-and-frame test: I.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 119-123.—Argues that scoring only the unsigned (absolute) errors in the rod-and-frame test (RFT) confounds a number of variables. Another way of scoring the RFT is proposed which differentiates between (a) the S's constant error, (b) the effect of the tilted frame, and (c) the rod starting position effect. The method also allows estimation of the response consistency of the S. The values for each S of the constant error, of the frame tilt effect, and of the rod starting position effect may be tested for significance on the basis of the degree of response consistency observed for that particular S, thus making the new method more person-oriented than the unsigned error method. Results from 3 experiments with a total of 54 university students are presented in support of the proposed method.—*Journal abstract.*

49. Rice, James A. (U Houston) **The psychodiagnostic profile.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 193-203.—Describes a psychodiagnostic profile form which is designed to do explicitly what most psychometricians and diagnosticians do implicitly—compare the results of a battery of tests for a single individual. The profile adjusts graphically the scaled scores of the more widely used psychoeducational instruments, provides for making similar transformations with other tests, and facilitates a readout of percentile ranks. Several case examples are presented.—*Journal abstract.*

50. Skvoretz, J.; Windell, P. & Fararo, T. J. (U Pittsburgh) **Luce's axiom and occupational prestige: Test of a measurement model.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 147-162.—Uses R. D. Luce's (1959) individual choice theory to provide a ratio-level measurement basis for an important sociological variable, occupational prestige. It is shown that earlier measurement procedures to scale this sociological variable are essentially arbitrary, although heuristically useful. Luce's axiom of choice and his ranking postulate were tested on choice sets of occupations where male undergraduate Ss pair-compared or ranked the occupations on the basis of their prestige. The axiom received qualified support, while the ranking postulate was not supported. It is concluded that Luce's choice theory can provide a ratio-level measurement basis for occupational prestige, although a procedure using rankings must be appropriately structured in order to be an adequate instrument of measurement. (27 ref)—*Journal abstract.*

### Test Construction & Validation

51. Baird, John S. (Bloomsburg State Coll) **An updated Rokeach Opinionation Scale.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1321-1322.—10 outdated items from Rokeach's Opinionation Scale were revised and presented with the 30 other items to 122 15-56 yr old males. Reliability and validity correlation coefficients suggest the updating of the instrument is useful.

52. Baumann, U. & Dittrich, A. (U Zurich, Psychiatric Clinic, Switzerland) **[Examination of the German version of a semantic differential designed for assessing emotional states.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 4(1), 335-350.—Administered the German version of H. Heimann's semantic differential to 261 German students (181 boys and 90 girls), and compared the German version with the original French version. Results were factor analyzed by several methods, and the obtained scales were analyzed according to the criteria of the classical theory of tests. The factorial structure of the French version was not confirmed by factor analysis. 3 of the 4 original scales showed relatively high intercorrelations. The 4 original scales satisfied the criteria of the classical theory of tests (clarity, separation, and distribution). (English summary)—*T. Fisher.*

53. Boldt, R. F. (Educational Testing Service, Princeton, NJ) **An approximately reproducing scoring scheme that aligns random response and omission.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 57-61.—One formulation of confidence scoring

requires the examinee to indicate as a number his personal probability of the correctness of each alternative in a multiple-choice test. For this formulation, a linear transformation of the logarithm of the personal probability of the correct response is maximized if the examinee reports accurately his personal probability. To equate the score assigned to omitted items with the score assigned to chance scores, the transformation can be chosen so that the score is zero if the examinee indicates complete uncertainty. If this is done, the scoring function depends on the number of alternatives. One could also align uncertainty and response omission by granting credit for omitting items, though it is felt this might be hard to explain to examinees.—*Journal abstract.*

54. Brandenburg, Dale C. & Forsyth, Robert A. (U Illinois) **Approximating standardized achievement test norms with a theoretical model.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 3-9.—Attempted to answer the question, can standardized achievement test norms be better estimated with a theoretical probability model other than the negative hypergeometric model? 90 norms distributions from 2 standardized achievement test batteries (Iowa Tests of Basic Skills and Iowa Tests of Educational Development) were fitted by 6 models. Results strongly supported the Pearson Type I model (4 moments) as the best-fitting curve. It is concluded that this Type I model could provide a viable alternative to the negative hypergeometric model for use in approximating distributions when moment estimates are obtained from multiple matrix sampling or item sampling procedures.—*Journal abstract.*

55. Carver, Ronald P. (American Inst for Research, Washington, DC) **Two dimensions of tests: Psychometric and edumetric.** *American Psychologist*, 1974(Jul), Vol 29(7), 512-518.—Notes that because of design and development techniques, most tests focus upon either between-individual differences or within-individual gain. These 2 primary dimensions of tests have been called psychometric and edumetric. The psychometric dimension has been focused upon traditionally, so that most of the standardized tests being used to measure gain or growth have not been developed or evaluated from an edumetric standpoint. The danger inherent in this practice is that a treatment effect may appear to be small or insignificant simply because the test was designed to be sensitive to individual differences rather than gain. The differences between psychometric and edumetric dimensions on the Sequential Tests of Educational Progress (Reading) are compared with respect to the purpose of the test, item selection, reliability, validity, and interpretation of scores. (15 ref)—*Author abstract.*

56. Evans, Richard M. & Misfeldt, Kathy. (Morning-side Coll) **Effect of self-scoring procedures on test reliability.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1248.—Describes the use of invisible ink answer sheets which allowed instant feedback on multiple-choice examination questions and enabled examinees to continue trying until a correct choice had been made, with self-scoring on a 3-2-1-0 point basis for a 4-choice question. On 3 tests this procedure produced greater split-half reliability estimates than the same



examination scored by the conventional right-wrong method.

57. Ferguson, Leonard W. (Ohio U) **Spearman-Brown reliability coefficients for Ferguson's 80-item pair-comparisons person-perception scale.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1161-1162.—Reports that with 1 possible exception, there is no relation between experimental condition (warm or cold set, interviewer or interviewee role) and reliability of person-perception score in the Sager-Ferguson person-perception studies which reported a personality assessment based on a warm-cold dimension.

58. Haladyna, Thomas M. (Southern Illinois U) **Effects of different samples on item and test characteristics of criterion-referenced tests.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 93-99.—Explores the possibility that classical procedures are both applicable and appropriate when samples of both mastery and nonmastery examinees are employed. A rationale for using these samples is given, and empirical evidence is presented which supports the practice of combining samples to increase the variance of test scores and thereby permit the proper estimate of reliability and item validities. It is concluded that, from a pedagogical viewpoint, the criterion-referenced (CR) discrimination index may be more conceptually satisfying when communicating the meaning of CR item discrimination; but the combined samples point biserial discrimination index appears to be the most efficient method for obtaining information about the adequacy of the CR test items.—*Journal abstract*.

59. Hebel, Richard . (U Maryland, Medical School, Baltimore) **The number of questions needed for discriminatory power on multiple choice examinations.** *Journal of Medical Education*, 1974(Aug), Vol 49(8), 787-789.—Presents a method of determining sensitivity (i.e., the probability of identifying students with deficient knowledge of the subject matter) and specificity (i.e., the probability that those students who have an acceptable minimum of knowledge will pass the examination) of multiple-choice tests at given passing marks.

60. Lushene, Robert E.; O'Neil, Harold F. & Dunn, Thomas . (VA Hosp, Bay Pines, FL) **Equivalent validity of a completely computerized MMPI.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 353-361.—Within the context of a counterbalanced design, 63 female undergraduates were tested with a computerized Minnesota Multiphasic Personality Inventory (MMPI) and a group booklet mode of administration. The State-Trait Anxiety Inventory was administered before and after each testing session. The computerbased MMPI scale scores correlated as high or higher with the booklet administration scores than correlations reported for comparisons between booklet and card form administrations or booklet-booklet administrations for a college population. When compared to the booklet version, the computer mode initially produced relatively high state anxiety levels. By the end of the test, however, no difference in state anxiety levels between the 2 modes of administration was found. (16 ref)—*Journal abstract*.

61. McGary, Barbara A. & Burns, John A. (Northwestern U) **ATSCALE: An evaluation of unidimensionality and internal consistency of responses to a series of**

**questions.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 177-178.—Describes a program which allows the researcher to test the single-factoredness of a scale as well as its internal consistency. The program computes Guttman's coefficient of reproducibility, chance expectancies of scale types, Green Index of Consistency, Loeringer Index of homogeneity, and other figures. A description of the program's use, limitation, and availability is provided.

62. Millman, Jason & Popham, W. James . (Cornell U) **The issue of item and test variance for criterion-referenced tests: A clarification.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 137-138.—Criticizes M. I. Woodson's paper, contending that the population of observations originally prescribed for criterion-referenced tests is a domain of items and the responses of a single individual to them. Thus, item or score variability is an unnecessary characteristic of criterion-referenced tests as they have been traditionally conceived, i.e., as measures of well-defined classes of examinee behaviors. The defining character of criterion-referenced tests is destroyed when the construction and selection of criterion-referenced test items are tampered with to maximize the test's validity to discriminate between groups, which is the case when variability is required.—*Journal summary*.

63. Ray, John J. (U New South Wales, Kensington, Australia) **Projective tests can be made reliable: Measuring need for achievement.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 303-307.—Suggests that with self-rating (or "Likert") scales, reliability is partly a function of number of items. It is therefore suggested that increasing the number of measurements (items) should also improve projective test reliabilities. Empirical examples of need achievement measurement are presented to support this contention. Evidence is also mentioned which suggests that reliability can further be improved by different scoring systems and stimulus materials. (20 ref)—*Journal abstract*.

64. Sixtl, Friedrich. (Coll. of Social & Economic Sciences, Linz, Austria) **[Statistical foundation for a fully automated examiner.]** (Germ) *Zeitschrift für Entwicklungspsychologie und Pädagogische Psychologie*, 1974, Vol. 6(1), 28-38.—Presents 2 kinds of objective attainment tests. One has a fixed number of items for examination in groups. The alpha error can be regulated by the number of items, while the beta error depends on the attainment parameter of the examinee. The other is a sequential test (i.e., the number of items becomes a random variable) so that the beta error can also be regulated. The sequential attainment test can be governed by computer.—*English summary*.

65. Valecha, Gopal K. & Ostrom, Thomas M. (Indian Inst of Management, Bangalore) **An abbreviated measure of internal-external locus of control.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 369-376.—Administered an abbreviated version of Rotter's Internal-External Control Scale (developed by eliminating all filler items and excluding items whose content themes were neither work related nor global in their referents) to a national probability sample of 4,330 16-26 yr old males. Psychometric properties (distributional characteristics, scale reliability, and item-test correla-

tions) of the abbreviated scale were similar to the full 29-item scale. Comparable factor structures were obtained for both black and white Ss. Blacks gave more external responses than whites.—*Journal abstract.*

66. Washington, William N. & Godfrey, R. Richard. (Lackland Air Force Base, Career Evaluation Branch, TX) **The effectiveness of illustrated items.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 121-124.—Examined 2 problems in test development which relate to the use of illustrations: (a) Do illustrated items perform better than written items, and (b) Does item performance vary as a function of the type and size of the illustration? A sample of 63 tests was drawn from all the Air Force Specialty Knowledge Tests containing illustrations. These 63 tests were previously administered to approximately 28,261 airmen under operational conditions. Item statistics between illustrated and written items drawn from the same content areas were compared, using *F* ratios. Illustrated items in general performed slightly better than matched written items. The best-performing illustrated items were tables.—*Journal abstract.*

67. Woodson, M. L. (U California, Inst of Human Learning, Berkeley) **The issue of item and test variance for criterion-referenced tests: A reply.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 139-140.—Replies to criticisms by J. Millman and W. J. Popham (see PA, 53:Issue 1), asserting that it is necessary for items and tests to have variance and discrimination in the range of interest (population of observations) for which they are calibrated and selected. The basis for selection of the calibration sample determines the kind of scale which will be developed. A random sample from a population of individuals leads to a norm-referenced scale, and a sample representative of abilities of a range of characteristics leads to a criterion-referenced scale. The essential problem is that the items be calibrated (and selected) for the type of scale for which they will be used.—*Journal abstract.*

### Mathematical Models & Statistics

68. Aiken, Lewis R. (Guilford Coll) **Procedures for computing scores and correlations on ordered multicategory test items.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 173-176.—Provides a group of procedures for scoring rearrangement tests, and discusses a computer program based on these procedures.

69. Anderson, R. Bruce. (U Texas, Arlington) **A Markov chains model of medical specialty choice.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 259-274.—Employed data from 118 male members of 3 consecutive cohorts of students at a private Southern medical school to develop a discrete-parameter, stationary Markov chains model of the medical specialty choice process. This model was then tested on independent subsamples from the same population, generating a series of predicted specialty choices which did not differ from observed choices by more than chance expectations. Results demonstrate the utility of a simple Markovian model of a choice process. (15 ref)—*Journal abstract.*

70. Barcikowski, Robert S. (Ohio U) **Selecting optimum sample size and number of levels in nested random-effects designs.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 141-144.—Describes a computer program which allows the researcher to select the optimum sample size in nested random-effects designs, given an appropriate level of significance, total sample size, estimate of the population effects, and the effects it is desired to detect. A description of the program and a discussion of its limitations and availability are provided.—*R. W. Covert.*

71. Berry, Kenneth J.; Martin, Thomas W. & Olson, Keith F. (Colorado State U) **A note on fourfold point correlation.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 53-56.—Presents formulas for a modification of Pearson's 4-fold point correlation possessing always-attainable limits of  $+/-1$  and intermediate values operationally interpretable in terms of proportionate reduction in error of estimation.

72. Bolding, James T. & Houston, Samuel R. (U Arkansas) **A FORTRAN computer program for computation of ridge regression coefficients.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 151-152.—Presents a computer program to compute ridge regression. Ridge regression is discussed. A description of the program's use, limitations, and availability is provided.

73. Brown, David L. (U Connecticut) **Computerized rules of thumb for factorial analysis of variance tables.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 145-146.—Presents a computer program to determine the correct formulas for entries in analysis of variance tables. A discussion of the program's use and availability is included.

74. Caldwell, Michel. (U Mississippi) **Within-cell vs over-all correlations in the analysis of factor variance.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1191-1201.—Discusses the advantage of using B. J. Winer's (1962) within-cell correlations in the analysis of factor variance, as well as the conservative bias that theoretically exists in such a procedure. A Monte Carlo study is also described which examined the extent of this bias for 1st, 2nd and 3rd component ratios. Suggestions for dealing with or avoiding the problem of the bias are outlined. (15 ref)—*Journal abstract.*

75. Church, Marjorie; Koslowsky, Meni & Bailit, Howard. (U Connecticut) **A program for determining profile similarity for purposes of classification.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 155-157.—Presents a computer program which compares the profile of an individual with some referent group profile. A chi-square value is calculated as a measure of similarity. A discussion of the program's use, limitation, and availability is provided.

76. Clopton, James R. (VA Hosp, Topeka, KS) **A computer program for MMPI scale development with contrasted groups.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 161-163.—Presents a computer program which tests the differences, using either a chi-square test or the Fisher exact probability test, between comparison and criterion groups. A description of the program's use, limitations, and availability is provided.



77. Conger, Anthony J. (Duke U) **A revised definition for suppressor variables: A guide to their identification and interpretation.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 35-46.

—Shows that in the 2-predictor situation traditional and negative suppressors increase the predictive value of a standard predictor beyond that suggested by the predictor's zero order validity. This effect of suppression is used to provide a revised definition of suppression and completely accounts for traditional and negative suppression. The revised definition, in conjunction with a 2-factor model, is shown to lead to a previously undetected type of suppression (reciprocal suppression) which occurs when predictors with positive zero order validities are negatively correlated with one another. In terms of the definition and parameters of the model, limits are determined in which the types of suppression can occur. It is shown how suppressors can be identified in multiple regression equations and a procedure is given for interpreting whether the variables are contributing directly (by predicting relevant variance in the criterion), or indirectly (by removing irrelevant variance in another predictor), or both.—*Journal abstract*.

78. Cowles, M. P. (York U, Atkinson Coll, Toronto, Ontario, Canada)  **$N = 35$ : A rule of thumb for psychological researchers.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1135-1138.—Discusses 4 aspects of statistical tests—alpha level, strength of relationship, power, and sample size—which must be considered in assessing outcomes. Since specifying any 3 of these parameters determines the 4th and since an alpha level of .05, a strength of relationship equivalent to 10% shared variance, and a power of .50 for common statistical tests are generally-used conventions, the use of  $N = 35$  is suggested as a convenient and economical rule of thumb.—*L. Gorsey*.

79. Cramer, Elliott M. (U North Carolina) **On Browne's solution for oblique Procrustes rotation.** *Psychometrika*, 1974(Jun), Vol 39(2), 159-163.—Discusses M. W. Browne's (see PA, Vol 41:11151) solution to the problem of finding a least squares fit to a specified factor structure. Browne's solution involves eigenvectors and values which lead to an iterative solution. A form of the solution which does not involve solution of an eigenvalue problem but which does require an iteration similar to Browne's is presented. The possible existence of a singularity is suggested, and a simple modification of Browne's computational procedure is proposed which deals with this case. A better starting value for the iteration is also proposed for which convergence is guaranteed using the ordinary Newton iteration.—*Journal abstract*.

80. Doreian, Patrick. (U Pittsburgh) **On the connectivity of social networks.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 245-258.—Presents binary matrix operations for valued graphs in the context of analyzing social structures through the use of graph theory. These operations are demonstrated in the analysis of social network data presented by B. Kapferer (1969). (15 ref)—*Journal abstract*.

81. Everitt, Brian. (Inst of Psychiatry, U London, England) **Cluster analysis.** New York, NY: John Wiley & Sons, 1974. 122 p.—Reviews the literature concerning

cluster-analysis techniques, discusses problems encountered in their application, presents an empirical investigation of some methods of cluster analysis, and details procedures for use with clustering techniques. (11 p ref)

82. Frederiksen, Carl H. (U California, Berkeley) **Models for the analysis of alternative sources of growth in correlated stochastic variables.** *Psychometrika*, 1974(Jun), Vol 39(2), 223-245.—Presents an approach to the analysis of multivariate time series in which linear structural relationships among multiple stochastic variables are investigated. A number of alternative symmetric and asymmetric structural models are considered for the case of 2 stochastic variables. Each model represents a possible hypothesis concerning the relationship of growth in 1 variable to growth in the 2nd. Extensions of 2 of the models to 3 variables are illustrated with a numerical example, and the problem of detecting change in multivariate time series is discussed. (15 ref)—*Journal abstract*.

83. Garlock, Jerry C. (El Camino Coll, CA) **A short multiple correlation program for predicting one dependent variable from six predictive variables.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 153.—Describes a short computer program to calculate all the possible multiple correlations using 6 predictive variables to predict a dependent variable.

84. Goodman, Leo A. & Kruskal, William. (U Chicago) **Empirical evaluation of formal theory.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 187-196.—Criticizes the index of D. K. Hildebrand et al (see PA, Vol 53:Issue 1) which measures the adequacy of a theory that asserts or predicts emptiness of some cells in a 2-way cross-classification. Some proposed major defects of this index (e.g., its connection with the notion of statistical independence and the parochialism and simplism of its motivation) are cited.

85. Goodman, Leo A. & Kruskal, William. (U Chicago) **More about empirical evaluation of formal theory.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 211-213.—Continues the authors' criticism of the paradigm of Hildebrand et al (see PA, Vol 53:Issue 1) for the evaluation of a class of propositions predicting specific relations between quantitative variables. It is argued that the prediction method is not appropriate in the theory-evaluation context.

86. Gordon, Robert A. & Gleser, Leon J. (Johns Hopkins U) **The estimation of the prevalence of delinquency: Two approaches and a correction of the literature.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 275-291.—Proposes that the index "the proportion of a cohort that have become delinquent by a given age," here called the prevalence of delinquency, is an important social indicator. Methods by which this index can be estimated from data are indicated, and errors in previous sex- and race-specific prevalence estimates published by T. P. Monahan (1960) for the city of Philadelphia are corrected. The differences between the sexes and between the races shown by these corrected prevalence estimates are of sufficient magnitude to render suspect any comparisons of prevalences of delinquency among cohorts which do not take account of the sex and race compositions of the cohorts to be compared.—*Journal abstract*.



87. Gray, Louis N. & von Broembsen, Maximilian H. (Washington State U) **On simple stochastic diffusion models.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 231-244.—Expands G. Funkhouser and M. McComb's information models (1972) to include situations involving simple interaction processes and more complicated situations involving both mass-mediated messages and interactively-mediated messages. Discrete time models of information diffusion are developed. (19 ref)
88. Gross, Alan L.; Costa, Norman D. & Steckler, Jane F. (City U New York) **A FORTRAN program for hypothesis testing in the general linear model.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 133-135.—Describes a program which allows the researcher to test a wide class of statistical hypotheses in terms of the full rank regression model. A brief description of the model is provided along with a description of its use, limitations, and availability.
89. Guilford, J. P. (U Southern California) **Rotation problems in factor analysis.** *Psychological Bulletin*, 1974(Aug), Vol 81(8), 498-501.—Replies to criticisms by J. L. Horn and J. R. Knapp (see PA, Vol 51:1085) regarding the methods of factor-analytic rotations that were used in deriving the empirical basis for development of the structure-of-intellect model and for testing its validity. Their arguments were not convincing because (a) they selected 3 biased cases out of more than 30 for their illustration, (b) the gaps between hits and errors in rotating to random hypotheses vs structure-of-intellect hypotheses were quite large, and (c) they failed to extend their test to include aims at invariance in terms of fit to a general theory. (15 ref)—*Journal abstract*.
90. Harris, David R. & Woodward, J. Arthur. (Texas Christian U) **Kaiser's Little Jiffy, Mark IV for a small computer using basic FORTRAN IV.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 119-120.—Presents a computer program to do exploratory factor analysis, using the Little Jiffy Mark IV method. A description of the program's limitations and availability is provided.
91. Havlicek, Larry L. & Peterson, Nancy L. (U Kansas) **Robustness of the *t* test: A guide for researchers on effect of violations of assumptions.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1095-1114.—Attempted to determine empirically the effects of quantified violations of assumptions underlying the *t* test. Using computer simulations, the effects of heterogeneity of variance, non-normality, and nonlinear transformations of scales were studied separately and in all combinations. Monte Carlo procedures were used to generate populations of scores for which distributions were normal, positively skewed, negatively skewed, and leptokurtic. Samples of varying sizes were then randomly selected from specific populations and *t* tests were run to identify where discrepancies between obtained and expected *t* distributions would occur. Results indicate that certain violations or combinations produced little distortion in resulting *t* distributions, while other violations produced significant discrepancies. Specific guidelines and reference tables, developed to assist the researcher in assessing the severity of certain violations or degrees of violation, are presented. (27 ref)—*Journal abstract*.
92. Henschke, C. I. & Chen, M. M. (Georgetown U) **Variable selection technique for classification problems.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 11-18.—Illustrates the usefulness of a variable selection technique when the linear discriminant function is used to develop a classification rule. A stepwise technique is given together with an illustration of how the expected loss can be reduced using fewer variables.
93. Hildebrand, David K.; Laing, James D. & Rosenthal, Howard. (U Pennsylvania) **Prediction logic and quasi-independence in empirical evaluation of formal theory.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 197-209.—Refutes L. A. Goodman and W. Kruskal's (see PA, Vol 53:Issue 1) criticism of the authors' proposed paradigm for an interpretable model that yields a distinct measure of prediction success for each logically distinct, a priori scientific proposition stated in the prediction logic. It is argued that Goodman and Kruskal's alternative procedures based on quasi-independence are not viable solutions to the problem. (15 ref)
94. Hildebrand, David K.; Laing, James D. & Rosenthal, Howard L. (U Pennsylvania) **Prediction logic: A method for empirical evaluation of formal theory.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 163-185.—Proposes an approach to data analysis that assists the investigator in discriminating among specific relations corresponding to alternative scientific predictions about qualitative variates. (31 ref)
95. Horn, John L. & Knapp, John R. (U Denver) **Thirty wrongs do not make a right: Reply to Guilford.** *Psychological Bulletin*, 1974(Aug), Vol 81(8), 502-504.—Considers that J. P. Guilford's (see PA, Vol 53:Issue 1) reply to the authors' criticisms of his factor analysis of his structure-of-intellect model has failed to come to grips with evidence indicating that if the number of targeted variables for each factor is 3 or fewer, Procrustes factoring provides no better evidence for structure-of-intellect theory than for any of an infinity of other arbitrarily determined theories. Under these conditions factors can be rotated in such a way as to suggest support for almost any desired solution, and one such solution can be that labeled a replication. Hence the factorial invariance claimed under such conditions can indicate only consistency in the researcher and his methods, not in the phenomena studied. (16 ref)—*Journal abstract*.
96. Horrell, James F. & Lessig, V. Parker. (Washington State U, Coll of Economics & Business) **A note on a nonparametric test of independence between two vectors.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 106-108.—Describes a nonparametric technique for examining the dependence structure between 2 multivariate sets of measurements. An application of the procedure to consumer attitudes is described, possible modifications of the technique for more than 2 tests of measurements are noted, and differences between this technique and canonical analysis are discussed.
97. Kaiser, Henry F. & Rice, John. (U California, Berkeley) **Little Jiffy, Mark IV.** *Educational & Psychologi-*

*cal Measurement*, 1974(Spr), Vol 34(1), 111-117.—Describes 3 changes and 1 new development for the 2nd generation Little Jiffy method of exploratory factor analysis. A computer algorithm based on the addition and revision is presented.

98. Kruskal, Joseph B. & Shepard, Roger N. **A nonmetric variety of linear factor analysis.** *Psychometrika*, 1974(Jun), Vol 39(2), 123-157.—Presents a model in which the numbers in each column of an  $n \times m$  matrix of multivariate data are interpreted as giving the measured values of all  $n$  of the objects studied on one of  $m$  different variables. The rank order of the numbers in such a column is determined by a linear rule of combination of latent quantities characterizing each row object with respect to a small number of underlying factors. An approximation to the linear structure assumed to underlie the ordinal properties of the data is obtained by iterative adjustment to minimize an index of overall departure from monotonicity. The method is nonmetric in that the obtained structure is invariant under monotone transformations of the data within each column. Tests show (a) that, when the assumed monotone relationships are strictly linear, the recovered structure closely approximates that obtained by standard (metric) factor analysis but (b) that, when these relationships are severely nonlinear, the nonmetric method avoids the inherent tendency of the metric method to yield additional, spurious factors. (34 ref)—*Journal abstract*.

99. Lewis-Beck, Michael S. (U Michigan) **Determining the importance of an independent variable: A path analytic solution.** *Social Science Research*, 1974(Jun), Vol 3(2), 95-107.—Suggests that the analysis of direct and indirect effects in a recursive causal model can provide a more satisfactory evaluation than the ordinary correlation and regression techniques commonly used in evaluating the importance of an independent variable. The interpretation of an independent variable's impact derived from a path model is generally more adequate, because it is able to take into account the operation of indirect effects and spuriousness. (18 ref)

100. Lienert, G. A. **[Configuration frequency analysis: IV. The association structure of clinical scales and symptoms.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(3), 231-248.—In Part 4 of a series of articles explaining the theory and methods of configuration frequency analysis, association structure analysis is presented as a technique to determine the complexity of the relations between binary variables by using the hierarchic version of the configuration frequency analysis. The method of finding configurational types is described and illustrated by graphs. Analysis of more specific and complex associations leads to a more differentiated examination and consideration of syndromes than would be possible by a correlation analysis of simple associations. 5 aphasia-specific test scales applied to the syndromes of 162 aphasics demonstrated the appearance of a higher order association between median-dichotomized scales in addition to first-order associations. (English summary)—*T. Fisher*.

101. Lingoes, James C. (U Michigan) **A FORTRAN IV program generalizing the Schönemann-Carroll matrix fitting algorithm to monotone and linear fitting of**

**configurations.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 121-124.—Presents a general computer program that allows the researcher to "test" the similarity of pairs of matrices, using both monotonic and linear fitting criteria. The procedure is based on a generalization of the Schönemann-Carroll Matrix Fitting Algorithm. The capacity and availability of the program are discussed.

102. Lord, Frederic M. (Educational Testing Service, Princeton, NJ) **Estimation of latent ability and item parameters when there are omitted responses.** *Psychometrika*, 1974(Jun), Vol 39(2), 247-264.—Considers that omitted items cannot properly be treated as wrong when estimating ability and item parameters. The item characteristic curve model is discussed, and a convenient method for utilizing the information provided by omissions is presented. Theoretical justifications and empirical data (using samples of 2,926, 994, and 2,946 examinees, respectively) are used for the estimates obtained by the new method. (18 ref)—*Journal abstract*.

103. Lutz, J. Gary. (Lehigh U, Div of Measurements & Research) **On the rejection of Hotelling's single sample T.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 19-23.—Multivariate hypotheses regarding the centroid of a single population can be tested using Hotelling's  $T^2$ . Upon rejection of such a hypothesis, there seems to be no available technique by which the relative contribution of each variable to the rejection can be gauged. An examination of the derivation of the  $T^2$  statistic, however, shows that while  $T^2$  is the only nonzero eigenvalue of the matrix, the elements of its associated eigenvector define the weighting scheme used in combining the original variables for the purposes of the test. When adjusted to provide dimensionless numbers, these elements reflect the relative contribution of each variable to the rejection of the original hypothesis.—*Journal abstract*.

104. MacCallum, Robert C. (Ohio State U) **Relations between factor analysis and multidimensional scaling.** *Psychological Bulletin*, 1974(Aug), Vol 81(8), 505-516.—Describes the fundamental relations between multidimensional scaling and factor analysis. Metric and nonmetric versions of both models are described in terms of type of data analyzed, assumptions made, objectives, computational procedures, geometric representations of data and solutions, and psychological meaning of results. What is commonly taken to be a fundamental identity between the metric versions of the 2 models is shown to be merely the employment of the same theorems. The strongest relations between the techniques lie in the realm of individual differences models for multidimensional scaling. Several such models are presented and are shown to represent the application of the logic of factor analysis to the substance of multidimensional scaling. (17 ref)—*Journal abstract*.

105. Martin, Warren S. (U. Georgia) **The effects of scaling on the correlation coefficient: A test of validity.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 316-318.—Studied the consequences of varying the number of scaling intervals on the validity of the correlation coefficient, using the formula for a bivariate normal distribution. Data show that the correlation coefficient decreased as the number of response categor-



ies grew smaller and suggest that the correlation coefficient may not be as robust as is generally assumed.

106. McCall, Robert B. & Appelbaum, Mark I. (Fels Research Inst, Yellow Springs, OH) **Bias in the analysis of repeated-measures designs: Some alternative approaches.** *Child Development*, 1973(Sep); Vol 44(3), 401-415.—Considers that the conventional analysis of variance applied to designs in which each S is measured repeatedly requires stringent assumptions regarding the variance-covariance (i.e., correlations among repeated measures) structure of the data. Violation of these assumptions results in too many rejections of the null hypothesis for the stated significance level. Several alternatives when heterogeneity of covariance exists, including nonparametric tests, randomization and matching procedures, Box and Greenhouse-Geisser corrections, and multivariate analysis, are described from an applied rather than theoretical standpoint. Multivariate techniques that make no covariance assumptions and provide exact probability statements represent the most versatile solution. (37 ref)—*Journal abstract*.

107. McDonald, R. P. (Ontario Inst for Studies in Education, Toronto, Canada) **Testing pattern hypotheses for covariance matrices.** *Psychometrika*, 1974(Jun), Vol 39(2), 189-201.—Presents an asymptotic likelihood-ratio test and maximum likelihood estimates of the free parameters for the hypothesis that 1 or more elements of a covariance matrix are zero, and/or that 2 or more of its elements are equal. The theory applies immediately to a transformation of the covariance matrix by a known nonsingular matrix. Estimation is by Newton's method, starting conveniently from a closed-form least-squares solution. Numerical illustrations include a test for equality of diagonal blocks of a covariance matrix, and estimation of quasisimplex structures.—*Journal abstract*.

108. McDonald, Roderick P. (Ontario Inst for Studies in Education, Toronto, Canada) **The measurement of factor indeterminacy.** *Psychometrika*, 1974(Jun), Vol 39(2), 203-222.—Argues that common factors must be thought of as unobservable and as uniquely defined but numerically indeterminate. It follows that L. Guttman's (1955) measure of indeterminacy is inconsistent with the foundations of the factor model in probability theory, and that the traditional measures of factor indeterminacy used by earlier writers should be reinstated. (21 ref)

109. Overall, John E. & Free, Spencer M. (U Texas, Medical Branch, Galveston) **Subset scaling (SUBSCL): Multidimensional scaling based on a subset of objects or variables.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 125-127.—Describes a program designed to accomplish multidimensional scaling of objects in terms of similarities on 1 set of measurements, and then to project into the resulting scale model a 2nd set of measurement vectors to provide meaning for directions in the reduced space. A description of the model is included along with input and output specifications.

110. Ramsey, Philip H.; Schmid, Bruce C. & Sorgie, Charles D. (Hofstra U) **A FORTRAN IV program for the Welch-Aspin solution of the Behrens-Fisher problem.** *Educational & Psychological Measurement*, 1974(Spr), Vol

34(1), 147-149.—Presents a program to calculate an unpooled error term and subsequently determined statistical significance in testing the difference between the means of 2 or more groups. A description of the program's use, limitations, and availability is provided.

111. Särndal, Carl E. (U British Columbia, Vancouver, Canada) **A comparative study of association measures.** *Psychometrika*, 1974(Jun), Vol 39(2), 165-187.—Discusses the general problem of measuring the association between an independent nominal-scaled variable  $X$  and a dependent variable  $Y$  whose scale of measurement may be interval, ordinal, or nominal. The theoretical foundations of a wide range of asymmetric association measures are discussed, and new measures are suggested. 15 of these association measures are singled out for a computer-assisted numerical study in which the value actually taken by each measure under a wide variety of conditions is computed. (28 ref)—*Journal abstract*.

112. Sheehan, Daniel S. & Hambleton, Ronald K. (U Massachusetts, Amherst) **A general FORTRAN IV test scoring program.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 169-171.—Presents a computer program which scores nearly all items of the single-response type. These include differential weighting schemes, selection of items to particular subscales, individual response patterns, correction for guessing, and formation of additional scores based on subscales. A description of the program's use, restrictions, and availability is provided.

113. Shine, Lester C. (U Dayton) **An extension of the Shine Combined Analysis of Variance.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 47-52.—Extends the basic ideas for the Shine Combined Analysis of Variance to the case where some factors do not have repeated measures. Schematic calculation procedures are presented for the 2-way case with repeated measures on 1 experimental factor. Some useful modifications of the basic Shine-Bower error term, which is used to test subject sources of variation, are presented.—*Journal abstract*.

114. Smith, Robert A.; James, Mark & Michael, William B. (U Southern California) **FORTRAN IV program to compute post hoc comparisons for multi-level chi square tests.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 159-160.—Presents a computer program which allows the researcher to test the difference between several response groups on various sets of items. A description of the program's use, limitation, and availability is provided.

115. Spence, Ian . (U Western Ontario, London, Canada) **On random rankings studies in nonmetric scaling.** *Psychometrika*, 1974(Jun), Vol 39(2), 267-268.—Disputes the conclusions of P. Arabie (1973) which suggest that the use of D. Klahr's and of H. H. Stenson and R. L. Knoll's (both 1969) results is not sensible. It is argued, however, that although there may be some justification for suspecting that a few of Klahr's and of Stenson and Knoll's values have been slightly inflated due to the presence of suboptimal solutions, there are reasons to believe that this is not the case in general. These reasons are briefly discussed, and F. Tschudi's

(1972) approach is suggested as a viable alternative.—*B. McLean.*

116. Werts, C. E.; Linn, R. L. & Jöreskog, K. G. **Intraclass reliability estimates: Testing structural assumptions.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 25-33.—Intraclass correlation reliability estimates are based on the assumption that the various measures are equivalent. A general model by Jöreskog for the analysis of covariance structures can be used to test the validity of this assumption.

117. Wike, Edward L. (U Kansas) **Some nonparametric multiple-comparison tests.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1055-1058.—Describes some nonparametric multiple-comparison tests for making both pairwise comparisons and a limited number of comparisons with  $k$  independent and  $k$  matched groups when the data consist of "bad" numbers and ranks or frequencies. The usefulness of T. A. Ryan's test for multiple comparisons of proportions and variances and the Dunn test of multiple comparisons using rank sums is noted.—*Journal abstract.*

## PERCEPTION AND MOTOR PERFORMANCE

118. Biersner, R. J.; Edwards, D. & Bailey, L. W. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Effects of N<sub>2</sub> O on responses of divers to personality tests.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1091-1097.—Studied 30 20-50 yr old Navy divers in a repeated measures design to assess the effects on Hand Test performance of breathing N<sub>2</sub> O or air to approximately 210 ft below sea level. The number of interpersonal responses made while breathing N<sub>2</sub> O was initially high and remained stable. Concern about the environment decreased during N<sub>2</sub> O conditions. Response latency on N<sub>2</sub> O was significantly greater than that on air. Occupational implications are discussed. (20 ref)—*Journal abstract.*

119. Cohen, Malcolm M. **Changes in auditory localization following prismatic exposure under continuous and terminal visual feedback.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1202.—Because data from 16 right-handed male Ss show intermanual transfer of prism aftereffects was obtained with unseen auditory targets following exposure under terminal visual feedback, it is suggested that the transfer is not due to a change in the sensed position of the eyes, but rather to a change in the sensed position of the head relative to the trunk, since head position, and not eye position, subserves auditory localization.

120. Felfoldy, Gary L. (Yale U) **Repetition effects in choice reaction time to multidimensional stimuli.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 453-459.—4 paid adults classified as quickly as possible stimuli back-projected one at a time on a small screen by pressing 1 of 2 levers in response to stimuli—rectangles varying in height alone, in width alone, or in both dimensions, in either a correlated or an orthogonal fashion. Stimuli followed responses by a fixed interval of 82, 580, or 1,080 msec. Response time was longer when both dimensions varied orthogonally, indicating that Ss were unable to avoid perceiving the figures as wholes.

Repeated stimuli were responded to more quickly than stimuli which were different from the immediately preceding stimulus in all conditions. With orthogonally combined dimensions, response time to stimulus repetitions was lowest, increased when the stimulus changed while the response was repeated, and increased still further when both stimulus and response changed. Increasing the time interval between stimuli decreased response time for nonrepetitions, while response time for repetitions was relatively unaffected. Results are discussed in terms of 2 models of serial choice reaction time. (17 ref)—*Journal abstract.*

121. Green, David M. & Swets, John A. (U California, San Diego) **Signal detection theory and psychophysics.** Huntington, NY: Robert E. Krieger, 1974. xiii, 479 p.—Presents a reprint of the 1966 edition, containing introductions to probability theory, statistical decision theory, and waveform analysis and reviewing the basic experiments which support the application of detection theory to psychophysics and to a variety of substantive psychological problems. (11 p ref)

122. Harley, J. P.; Kalish, D. I. & Silverman, A. J. (U Wisconsin Hosp, Neuropsychology Lab, Madison) **Eye movements and sex differences in field articulation.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 615-622.—Examined the eye movements of 10 male and 10 female undergraduates during the rod-and-frame (RFT) and size-estimation tests. Males were significantly more field-independent than females on the RFT. No sex differences were observed on size-estimation, embedded-figures test, or in the number of vertical and horizontal eye movements recorded during the 2 tasks. Eye movements did not correlate with performance on either test. The latter finding questions the utilization of size-estimation to infer visual scanning. (27 ref)—*Journal abstract.*

123. Huddleston, Jo H. (Royal Aircraft Establishment, Human Factors Group, Farnborough, England) **Personality and apparent operator capacity.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1189-1190.—24 young adults performed a pursuit tracking task and were given the opportunity to accept a concurrent 2nd one as soon as they felt themselves capable of doing so. Personality tests (Eysenck Personality Inventory and Raven's Advanced Progressive Matrices) showed that the more anxious individuals delayed acceptance of this secondary task. No relationships were found between personality and tracking skill.

124. McCutcheon, Lynn E. (Catholic U of America) **Personality and speed of handwriting.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1154.—Administered the 16 Personality Factor Questionnaire (16 PF) to 63 undergraduates and obtained 2 measures of their handwriting speed. There were no significant correlations between handwriting speed and 16 PF scores ( $p < .01$ ).

125. Montgomery, Henry & Eisler, Hannes. (U Göteborg, Sweden) **Is an equal interval scale an equal discriminability scale?** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 441-448.—Used S. S. Stevens and E. H. Galanter's (see PA, Vol 33:2792) iterative procedure for minimizing bias in category scaling for the scaling of loudness of white noise, using 130 undergraduates.



ates as Ss. The spacing obtained deviated systematically from a spacing constructed in accordance with an equal discriminability scale from H. Eisler and H. Montgomery's (see PA, Vol 51:4100) study. For the stimulus spacing yielding a "pure" category scale, a magnitude scale was constructed. Since the category scale could be predicted accurately by Fechnerian integration of this magnitude scale, it is concluded that the pure category scale is a pure discrimination scale. The discrepancy between the equal discriminability scale and the pure category scale is interpreted as a bias in the former scale due to greater recognizability of stimuli located at the extremes of the stimulus range. (23 ref)—*Journal abstract*.

126. Ono, Horoshi & Angus, Robert G. (York U, Downsview, Ontario, Canada) **Adaptation to sensory-motor conflict produced by the visual direction of the hand specified from the cyclopean eye.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 1-9. —The experiment on which H. V. Helmholtz based his argument against R. Hering's principle of cyclopean projection was repeated with slight modification. The hypothesis tested was that the role of the cyclopean eye can be demonstrated by measuring sensorimotor adaptation. In 2 experiments with a total of 36 college students, each S aligned his finger to 1 of his eyes and a fixation stimulus on the median plane. In Exp I, results show a change of felt position toward the median plane. In Exp II, results show a shift of apparent visual straight ahead toward the location of the finger and a change in felt position. Results indicate that Helmholtz's argument is unjustified.—*Journal abstract*.

127. Peterson, John M. & Lansky, Leonard M. (U Cincinnati) **Left-handedness among architects: Some facts and speculation.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 547-550. —Conducted 2 studies of left-handedness among 487 male architecture students and 17 male architecture faculty members. Results show that (a) both groups tended to be more left-handed than would be normally expected; (b) all the left-handed students followed complex directions about drawing a spatial maze perfectly, whereas over 50% of right-handed students erred. Findings are discussed in relation to recent speculations about right-hemisphere dominance being associated with both left-handedness and greater spatial competence.—*Journal abstract*.

128. Radeau, Monique. (Free U Brussels, Lab of Experimental Psychology, Belgium) **[Differences in visual and auditory adaptation to prismatic displacement.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 23-33. —Studied adaptation after a pointing task where the target was defined simultaneously by a light whose true position was displaced 15% laterally by prisms, and by a nondisplaced sound. In 1 condition, the S was asked to point to the position of the target as indicated by the visual cues, in the other to its position as indicated by the auditory cues. After this task, eye-hand coordination shifted in the direction of adaptation to the prismatic deviation, and ear-hand coordination shifted in the opposite direction. The modality of the pointing task affected the size of the auditory aftereffect. An interpretation is proposed which combines the "cue-discrepancy" hypothesis and the nature of spatial information

needed for performance of the "exposure" task.—G. Rubin-Rabson.

129. Wilson, Roger V. (U Aircraft Establishment, Human Factors Group, Farnborough, England) **Display collimation under whole-body vibration.** *Human Factors*, 1974(Apr), Vol 16(2), 186-195. —Evaluated the presence and absence of a collimating lens over a display face at 2-, 4-, 6-, 8-, and 10-Hz whole-body vibration with a compensatory tracking task. The collimating lens significantly improved tracking performance of the 8 Ss at 4 and 6 Hz. Results are discussed in terms of body resonance phenomena and compensatory eye movements. (25 ref)

### Perceptual Processes

130. Adams, R. C. (California State U, Fresno) **Perceptual correlates of the Rod-and-Frame Test: A critical response.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1044-1046. —Critiques the use of factor analysis by G. Adevai et al (see PA, Vol 42:18160) in their bifactorial explanation of field independence-dependence. A more traditional and conservative use of the statistic supports the original definition and suggests mirror-tracing speed as an additional assessment tool.

131. Aitken, P. P. (U Strathclyde, Glasgow, Scotland) **Judgments of pleasingness and interestingness as functions of visual complexity.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 240-244. —30 17-50 yr olds ranked random polygons in terms of complexity, pleasingness, and interestingness. Group judgments of pleasingness and interestingness increased with complexity, with the former reaching an asymptote at a lower level than the latter. However, most of the individual pleasingness functions were unimodal—some decreased with complexity, some increased, and others increased to a peak and then decreased. Although most of the interestingness functions increased to peaks over the higher levels of complexity, Ss who judged the low-middle levels as most interesting tended to judge the higher levels as progressively less interesting. There was also a positive correlation between the levels of complexity found most pleasing and the levels found most interesting. Results are discussed with reference to theories of preference behavior proposed by W. N. Dember and R. W. Earl and by D. E. Berlyne. (19 ref) —*Journal abstract*.

132. Auerbach, Stephen M. (Virginia Commonwealth U) **Anxiety and time estimation: A failure to replicate Felix.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 187-196. —Used M. Felix's (see PA, Vol 40:4869) procedure to induce different levels of state-anxiety (A-State), and the A-State scale of the State-Trait Anxiety Inventory to measure actual degree of A-State arousal in 60 male undergraduates. Findings do not confirm Felix's assumption that Orienting Instructions would interact with Feedback Conditions to produce a specified continuum of arousal for his 6 experimental conditions. Felix's finding of a U-shaped relationship between conditions as he ordered them and time estimation was also not confirmed. No significant relationship was found between A-State and time estimates. Time estimation data suggest that perhaps time estimation is a function of individual constitutional or learning factors

and is relatively insensitive to immediate environmental fluctuations. (25 ref)—*Journal abstract*.

133. Bartol, Curt R. & Martin, Randall B. (Castleton State Coll) **Preference of complexity as a function of neuroticism, extraversion, and amplitude of orienting response.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1155-1160.—80 undergraduates scoring 1 standard deviation above and below the mean on the Neuroticism and Extraversion scales of the Eysenck Personality Inventory (EPI) were asked to rank order their preferences for 12 randomly generated polygons differing in complexity. Skin conductance response to a 7.5 watt orange light was used as a measure of S's orienting response. Extraverts preferred more complexity than introverts, and there was a trend for low orienters to prefer more complexity than high orienters. Neuroticism was not a significant factor.—*L. Gorsey*.

134. Bartoshuk, Linda M. (John B. Pierce Foundation Lab, New Haven, CT) **NaCl thresholds in man: Thresholds for water taste or NaCl taste?** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 310-325.—Notes that water is not tasteless to humans, but rather can produce any of the 4 basic taste qualities if it is preceded by adaptation to an appropriate substance. After adaptation to the NaCl in saliva, water tastes predominantly bitter. Results of detection threshold experiments with 9 male undergraduates and the author as Ss demonstrate that this bitter water taste can be confused with solute tastes so that some detection thresholds for NaCl may actually represent water thresholds instead. Water also appears to have a taste after adaptation to saliva in the rat. Just as with humans, some apparently low thresholds for NaCl detection in rat may be water-taste thresholds. The apparently high preference threshold for NaCl in rat may be a true NaCl threshold based on adaptation to saliva. (116 ref)—*Journal abstract*.

135. Berry, Gene A.; Prather, Dirk C. & Bermudez, John M. (US Air Force Academy) **Differential effects of verbal mediation on learning and transfer of a complex perceptual skill.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1239-1242.—Gave a range estimation task to 4 groups of 60 male undergraduates. One group learned the task by trial-and-error methods using performance feedback, and a 2nd group learned by trial-and-error but were required to verbalize their perceptions of target size. A 3rd group was given a strong prompt on training trials but no feedback, and a 4th group were given the prompt and required to verbalize their perceptions of target size. Verbalization caused a significant decrement in performance on transfer of the skill. The trial-and-error group's performance was significantly better than that of the other 3 groups.—*Journal abstract*.

136. Berthoud, Miriam & Morenza, Liliana. (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[Acquisition of the spatial concept and its use in two types of tasks: Reproduction and perceptive differentiation.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 67-78.—Compared the way in which children 4 and 5 yrs old reproduce the order in which several wooden dolls are arranged on a boat, and how they differentiate 2 boats carrying the same dolls

arranged in different order. These 2 performances develop together. Several reproductions were symmetrically organized. In the task of localization, perceptive analysis evolves genetically toward a multiplication and enlargement of references, together with their coordination.—*G. Rubin-Rabson*.

137. Bowd, Alan D. (U Manitoba, Winnipeg, Canada) **Factorial independence of perceptual egocentrism.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 453-454.—Factorial analysis of several measures of perceptual egocentrism and field dependence together with age, sex, socioeconomic status, and inductive reasoning indicated the comparative independence of perceptual egocentrism with regard to the other variables for 53 kindergarten children.—*Journal abstract*.

138. Chaves, John F. & Barber, Theodore X. (Medfield Foundation, MA) **Cognitive strategies, experimenter modeling, and expectation in the attenuation of pain.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 356-363.—Obtained verbal reports of pain from 120 female undergraduates during a base-level pretest and also during a posttest conducted under 1 of several experimental treatments. The pain stimulus was a heavy weight applied to a finger for 2 min. During the posttest, Ss who had been asked to utilize cognitive strategies for reducing pain (i.e., to imagine pleasant events or to imagine the finger as insensitive) showed a reduction in pain as compared to uninstructed control Ss. Ss led to expect a reduction in pain, but not provided with cognitive strategies, also showed reduced pain during the posttest compared to controls, but the reduction was smaller than for Ss using cognitive strategies. An E modeling procedure, used with half of the Ss under each experimental treatment, was effective in reducing verbal reports of pain only for Ss with high pretest levels who were asked to imagine pleasant events. (29 ref)—*Journal abstract*.

139. Clark, W. Crawford & Goodman, Janet S. (American Telephone & Telegraph Co, New York, NY) **Effects of suggestion on  $d'$  and  $C$ , for pain detection and pain tolerance.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 364-372.—Results of a study with 20 male and 20 female college students demonstrated that suggestion directed toward eliciting fewer reports of detection of minimal pain and suggestion directed toward greater pain tolerance (fewer withdrawals) altered the response probabilities in the expected direction and in addition raised both the pain detection and pain tolerance thresholds to thermal stimulation. However, sensory decision theory analysis of the same response data revealed that the sole effect of the suggestions was to raise the detection criterion for very faint pain and the withdrawal criterion for pain tolerance. Suggestion was absolutely without effect on the S's ability to discriminate noxious stimulation ( $d'$ ), indicating that suggestion had failed to produce an analgesic effect. Males set a higher criterion than females, but  $d'$  did not differ. It is concluded that many of the pain threshold changes produced by "cognitive control," hypnosis, counter-irritant stimulation, etc., are not due to decreased pain sensitivity but merely reflect changes in the criterion for reporting pain. (25 ref)—*Journal abstract*.



140. Davidson, Philip W.; Abbott, Sally & Gershenfeld, Jean . (U North Carolina, Chapel Hill) **Influence of exploration time on haptic and visual matching of complex shape.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 539-543.—2 experiments varied the time in which a total of 113 undergraduate Ss were allowed to explore stimuli during intra- and cross-model equivalence matching involving vision and touch. Increasing time to explore either each standard, each comparison, or both standard and comparison from 4 to 16 sec significantly improved haptic intramodel matching. However, cross-modal matching, from either vision to touch or touch to vision, improved significantly only when time to explore each standard was increased. Videotape recordings of Ss' hand movements revealed use of a greater variety of haptic scanning strategies by Ss in groups where increased exploration time enhanced accuracy. The difference in effects of exploration time on intra- compared to cross-model shape matching is discussed in terms of possible differences in requirements between the 2 tasks. (19 ref)—*Journal abstract*.
141. Devane, J. R. (State University Coll New York, Cortland) **Word characteristics and judged duration for two response sequences.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 525-526.—Followed up a previous study in which Ss read each of a series of 24 tachistoscopically presented words, wrote each down, and then judged the duration; judgments were apparently related to word length and word frequency. The present study employed 2 groups of 24 undergraduates each. Group Word-Time first wrote the word and then judged its duration, while Group Time-Word judged the duration first and then wrote the word. Word length did not significantly affect the judgments. Words of higher frequency produced significantly greater judgments of duration than did lower; however, the frequency effect was significantly larger for Group Word-Time than for Group Time-Word, indicating that judged duration occurred at least partly as a response to the act of writing the word.—*Journal abstract*.
142. Ehri, Linnea C. & Muzio, Irene M. (U California, Davis) **Cognitive style and reasoning about speed.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 569-571.—Administered a test for field dependence to undergraduates who were then asked to reason about the relative speeds of horses turning on a merry-go-round platform. Results reveal that unlike field-independent Ss who reasoned correctly from the outset, field-dependent Ss failed to think analytically.
143. Hayes, R. W. & Venables, P. H. (North East London Polytechnic, England) **Sex differences in undershoot with extended exposure time in the Rod-and-Frame Test.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 543-546.—Administered the rod-and-frame test (RFT) to 11 male and 11 female undergraduates. Increased exposure time gave a significant impairment in performance, as measured in absolute mean error ( $p < .001$ ), establishing that the exposure-time effect reported by the same authors in 26 female Ss also applies to males. When sign of error was taken into account, undershoot in the long exposure time condition was significantly greater than overshoot ( $p < .001$ ) and a significant interaction between sex and undershoot-overshoot was demonstrated ( $p < .05$ ). Use of long exposures may give a more sensitive measure of sex differences in premature reporting of upright in the RFT.—*Journal abstract*.
144. Honorton, C. ; Tierney, L. & Torres, D. (Maimonides Medical Ctr) **The role of mental imagery in psi-mediation.** *Journal of the American Society for Psychical Research*, 1974, Vol 68(4), 385-394.—Examined the function of mental imagery in mediating ESP information into consciousness in a clairvoyance card-guessing experiment involving 50 Ss. Each S completed 3 runs with instructions to respond to visual images of the target symbols and 3 runs with instructions to guess "the first thing that comes to mind." Ss were instructed to make confidence calls on trials they felt most likely to be correct. Individual differences in mental imagery were assessed by Sheehan's short form of the Betts Vividness of Imagery Scale. "Strong" imagers obtained consistent overall psi-hitting ( $p < .005$ ) and "weak" imagers obtained equally consistent overall psi-missing ( $p < .004$ ). The difference between "strong" and "weak" imagers was also significant ( $p < .004$ ). The difference between imagery and guessing conditions was not significant, suggesting that Ss employed consistent response strategies across conditions. Ss who were "strong" imagers obtained significantly more correct confidence calls than "weak" imagers ( $p < .05$ ). These findings support the hypothesis that internal cues to ESP targets are available and may be utilized to advantage in making psi responses.—*Journal abstract*.
145. Kreidler, Hans & Kreidler, Shulamith . (Tel-Aviv U, Israel) **Implications of ESP experiments for anthropological ESP research.** *Parapsychology Review*, 1974(May), Vol 5(3), 1-3.—Discusses perceptual experiments in which Ss were unknowingly influenced by a sender transmitting information extrasensorily. An effect was produced when extrasensory information was in contrast to that coming from normal channels and the sender actively tried to transmit his message instead of merely thinking about it. Information from ESP is viewed as a weak signal which is only detectable against a background of low input or noise from sensory channels, and in a situation which does not depend on guessing. It is suggested that anthropologists seeking to understand ESP should study cultures differing in their emphasis on cognitive functioning rather than those differing in relative primitiveness.—P. F. Grim.
146. Leon, Barry N. (Smith Coll) **Pain perception and extraversion.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 510.—Examined the relationships between extraversion and the initial perception of pain and between sex and the initial perception of pain, using a series of discrete electric shocks as the pain-inducing stimulus. Ss were 20 male and 20 female undergraduates. No systematic relationship was found between extraversion and pain perception, but sex and pain perception were significantly related. Females interpreted lower levels of stimulation as more painful than did male Ss.—*Author abstract*.
147. Melnick, Murray . (Fairfield U) **Need achievement, need affiliation, and perception of laterality in other people.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 467-470.—Proposes a new variable, strategies in

judging laterality of others. 50 female undergraduates who visualized their own body turns ("rotators") in judging which hand was elevated by the facing E scored higher on Edwards Personal Preference Schedule need Achievement than females using an "opposite-hand" strategy ( $n = 65$ ). Rotator's relative ego-centeredness was suggested. Need affiliation was associated with insignificant results but in the predicted direction. Time metaphor and color preferences, although related to need Achievement in the literature, were unrelated to perception of laterality. The responses of 83 males showed no significant differences on any of the measures.—*Journal abstract*.

148. Mikaelian, H. H. (U. Georgia) **Adaptation to displaced hearing: A nonproprioceptive change.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 326-330.—Measured changes in ear-hand and eye-hand coordination following 2 conditions of exposure to sensory rearrangement: (a) auditory rearrangement with pseudophones and (b) visual rearrangement with wedge prisms. A total of 27 undergraduate and graduate students participated in 2 experiments. Results show that listening through pseudophones that rotated the interaural axis by  $30^\circ$  produced systematic changes only in ear-hand coordination. Following visual rearrangement that displaced the field laterally by  $10^\circ$ , both eye-hand and ear-hand coordination manifested response alterations. Results are discussed in arguing against the generality of the proprioceptive change hypothesis of adaptation to sensorimotor rearrangement.—*Journal abstract*.

149. Mo, Suchoon S. (Southern Colorado State Coll) **Comparative judgment of temporal duration in conjunction with contextual variability: A test of a memory-storage model of temporal judgment.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1031-1036.—Conducted 2 experiments with a total of 40 undergraduates to determine applicability of a memory-storage model of temporal judgment to the discrimination of durations. A single dark dot was tachistoscopically presented twice in each trial for judging whether the 2nd duration was longer or shorter than the 1st duration. The tendency to judge the 2nd duration to be longer than the 1st increased as a function of the interval separating the durations only when the interval varied from trial to trial. The overall proportion of "longer" responses was not appreciably greater than the proportion of "shorter" responses.—*Journal abstract*.

150. Moskowitz, Howard R.; Dravnieks, Andrew & Gerbers, Clifford. (U.S. Army Natick Lab., Pioneering Research Lab., Mass.) **Odor intensity and pleasantness of butanol.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 216-223.—A total of 33 students and technicians scaled the odor intensity and the odor pleasantness (or unpleasantness) of *n*-butyl alcohol (butanol) diluted by air in vapor phase. Results were fitted by power functions when the estimates were obtained from ratio scaling procedures. The results of category scaling, from the same Ss, were fitted by logarithmic functions. Although pleasantness and intensity appeared to grow approximately equally rapidly (but in opposite directions) with concentration, the inverse relation held only for the group data, not for the

individual functions. The pleasantness functions were also subject to severe curvature, in contrast to the intensity functions. A level of 300-ppm butanol appears to be hedonically neutral to Ss, being judged neither pleasant nor unpleasant according to the functions obtained from the average estimates. (15 ref)—*Journal abstract*.

151. Murakami, Takashi. (Tokyo U Education, Japan) **[Sensory scaling of weight and the psychophysical function based on ordinal information.]** (Japn) *Japanese Journal of Psychology*, 1974(Apr), Vol 45(1), 1-8.—Determined whether psychophysical confusion, ratio, and partition scales can be considered as a single common scale and, if so, the nature of the appropriate psychophysical function. 3 scales of weight, based on confusion probabilities, direct ratio estimates, and interval estimates were constructed using ordinal information. Data were obtained from a weight-lifting experiment with 42 students and research staff members. Ratio estimates and interval estimates were obtained from 6 Ss for 13 pairs of stimuli. All 42 Ss made paired comparisons for 49 stimuli to obtain confusion probabilities. Results show that all scales could be combined into a single scale through transformation, and that the form of the psychophysical function was a modified power function with one parameter reflecting the time order error. (24 ref)—*English abstract*.

152. Nadelman, M. S. (Albert Einstein Coll of Medicine, Yeshiva U) **On the possible preconscious awareness of impending death.** *Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 250-256.—Cites instances when individuals seem to have foretold their impending death. A dynamic interpretation is attempted which compares dreams generated by physical stimuli disturbing sleep with the disease process which disturbs life.

153. Nealls, Perry M. (U Wisconsin, Madison) **Reversal of Stroop test: Interference in word reading.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 379-382.—Since previous research indicates that a component of verbal reaction time, response-choice latency, exists for encoded words as well as color, it was hypothesized that color stimuli could exert a disruptive influence on the processes of this latency to encoded word stimuli, in contrast to the reverse effect which has often been found in the standard Stroop test. 10 undergraduates served as Ss. Stroop-like interference in word reading was produced by pre-exposure of color names printed in colored ink, followed by the presentation of a 2nd stimulus which reinforced the color information of the 1st stimulus. The experimental results do not appear to be an artifact of mere distraction of attention.—*Journal abstract*.

154. Noble, William G. & Lundie, Robert E. (U New England, Armidale, NSW, Australia) **Temporal discrimination of short intervals of dreamless sleep.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 445-446.—Wakened 6 male Ss prior to dream on 3 successive nights and obtained their estimates of sleep duration. Intervals were 60, 30, and 90 min after sleep onset on the 1st, 2nd, and 3rd nights respectively. While daytime estimation was considerably more accurate, Ss showed systematic differences in sleep time estimation. This suggests that temporal discrimination is still possible even in the absence of stored mentation.—*Journal abstract*.



155. O'Donnell, Sean . (Holy Cross Coll, Hamilton, Scotland) **The theory of repressed pre-call: A new approach to personal time.** *Parapsychology Review*, 1974(May), Vol 5(3), 5-8.—Reasons that memory operates in both a forward and backward direction; i.e., future events can be recalled as well as past events but training from infancy causes those in the future to be repressed. Experiments are discussed which show that with considerable training precall accuracy can be developed to a highly significant degree. Initial practice requires 10 hrs or 1,000 single attempts at precall using binary choices. Thereafter, improvement follows at the rate of .5%/hr of practice. In a precall study using 3-digit numbers, after some 20,000 practice attempts competence reached a level where 2 digits out of 3 could be precalled with over 90% consistency. Final *p*-values for all described experiments were in excess of 10<sup>-6</sup>. It is noted that the slightest change in psychological or environmental conditions causes a sharp drop in performance, as do fatigue and stress. Reinstating competence after a loss, however, does not take as much training as was necessary initially.—*P. F. Grim*.

156. Pratt, J. G.; Martin, D. R. & Stribic, F. P. (U Virginia) **Computer studies of the ESP process in card guessing: III. Displacement effects in the C. J. records from the Colorado series.** *Journal of the American Society for Psychical Research*, 1974, Vol 68(4), 357-384.—Examined the comprehensive report by Martin and Stribic (1940) on an extensive series of ESP tests at the University of Colorado, and selected C. J., 1 S of those tests, for further study. In a variety of conditions, with the cards screened from C. J., he averaged 6.8 correct responses on 3,659 runs where 5 would be expected by chance. Using a computerized method of analysis, C. J.'s records were examined for displacement, or hits on targets directly before and after the actual target. Significant displacement effects were found, but their pattern differed from series to series.—*R. A. White*.

157. Schiffman, H. R. & Bobko, Douglas J. (Rutgers State U, New Brunswick) **Effects of stimulus complexity on the perception of brief temporal intervals.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 156-159.—Investigated the influence of stimulus complexity on the perception of brief time intervals with 63 college students as Ss. The stimuli were 6 brief time intervals, ranging in duration from 3 to 23 sec. Each stimulus interval was presented by a display panel of lights whose pattern of lighting varied along 3 levels of complexity: low, intermediate, and high. Results indicate that for all intervals the level of complexity, as defined by the lighting pattern, directly and positively affected time estimations—the greater the level of stimulus complexity within a given time interval, the longer the estimation of the time interval.—*Journal abstract*.

158. Schroth, Marvin L. & Cook, Joseph A. (U Santa Clara) **The influence of type of coin on perception of area, value, and numerosity.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 139-143.—Compared the stability of the 3 perceptual constancies of area, value, and numerosity, using 90 undergraduates as Ss. Different groupings of quarters, dimes, and nickels served as the comparison stimuli in each constancy task. A group of pennies was the standard, and a counterbalanced design

was used. The area and value constancies were significantly affected by the type of coin used in comparison groups, and results were insignificant for numerosity. Overall results support the "new-look" school of perception.—*Journal abstract*.

159. Shiffman, Susan S. (Duke U, Center for the Study of Aging & Human Development) **Physicochemical correlates of olfactory quality.** *Science*, 1974(Jul), Vol 185(4146), 112-117.—Describes a multidimensional scaling procedure which, when extended to a wide range of stimuli, can be used to predict olfactory quality from physicochemical parameters. Recent psychophysical studies which used multidimensional scaling techniques are reviewed to show that a 2-dimensional space adequately describes the relationships among a wide variety of olfactory stimuli. Attempts to determine which psychological and physicochemical parameters describe these spaces are reported, including examination of smell qualities, the molecular formulas of olfactory stimuli, relationships among the functional groups of various compounds, and the characteristics of the Raman spectra of the molecules. Equations for the procedure are presented, and its application to 39 stimuli suggests that the methodology may be of considerable use in finding appropriate physicochemical variables for olfaction since it strictly relates quantitative measures of olfactory quality with quantitative physicochemical measures. (24 ref)—*L. Gorsey*.

160. Smith, Gudmund J. & Sjöholm, Lena . **Can our theory of reality influence our perception of it?** *Psychological Research Bulletin, Lund University*, 1974, Mono Series No 1, 27 p.—Reviews the literature on the situational characteristics of visual afterimage perception and how they are modified by the nature of S's self-other perceptual system. Data from 5 recent experiments by the authors which assessed afterimage perceptual processes in children, normal adults, and psychiatric inpatients are detailed in terms of Piaget's developmental stages, the effects of defense mechanisms (e.g., projection) on marginal perceptual experiences, and aesthetic experience. (18 ref)

161. Spanos, Nicholas P. & Barber, Theodore X. (Medfield State Hosp, MA) **Toward a convergence in hypnosis research.** *American Psychologist*, 1974(Jul), Vol 29(7), 500-511.—Theory construction and research in the area of hypnosis centers around 2 alternative paradigms. One paradigm employs hypothetical constructs such as "hypnotic state" and "trance" to organize the data, while the alternative paradigm rejects these constructs and employs others more closely tied to contemporary social psychology. Recent theoretical formulations proffered by major proponents of both paradigms are reviewed. It is concluded that the 2 paradigms appear to be moving toward a rapprochement on 2 broad generalizations: (a) A willingness to cooperate with the hypnotist constitutes an important but not sufficient condition for hypnotic performance. (b) Ss respond overtly and experientially to hypnotic suggestions when they become involved in suggestion-related imaginings. The empirical evidence supporting both generalizations is summarized, and future research directions are indicated. (96 ref)—*Author abstract*.

162. Stanford, Rex . (St John's U) **An experimentally testable model for spontaneous psi events: II. Psychokinetic events.** *Journal of the American Society for Psychical Research*, 1974, Vol 68(4), 321-356.—Extends the psi-mediated instrumental response (PMIR) model to include PK as a response mode for PMIR. Both laboratory and nonlaboratory observations are reviewed to develop testable assumptions about the psychology and parapsychology of PK function. It is concluded that PK phenomena subserve the organism's needs and are generally nonintentional or unconscious events implicitly guided by ESP. Specific proposals are made as to psychological conditions which facilitate or inhibit PK both as nonintentional PMIR and in intentional or self-conscious contexts. The concept "telepathy" is analyzed, and it is proposed that this term has been used to label 2 distinct classes of events: (a) active ESP scanning by 1 organism of the internal states of another organism, and (b) mental or behavioral influence of an agent upon a target person via PK. 2 distinct constructs are thus required to subsume "telepathic events." Evidence is discussed which supports this schema and empirically testable consequences are considered in detail along with certain methodological requirements.—*Journal abstract.*

163. Starker, Steven . (VA Hosp, West Haven, CT) **Two modes of visual imagery.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 649-650.—Examined, in terms of the vividness factor, the relationship between active thought imagery and a passive, spontaneous mode of mental imagery. Data were derived from a sample of 36 college-age females. Results show a significant consistency within the 2 modes but the relationship between modes remains unclear. Distinction between modes may be important in the design of research on imagery.—*Journal abstract.*

164. Tyler, Dolores M. & Halcomb, Charles G. (Texas Tech U) **Monitoring performance with a time-shared encoding task.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 383-386.—Required 52 college students to perform a task calling for the detection of a critical signal and subsequent differential serial recall. The effects of auditory vs visual mode and independent vs time-shared presentation were investigated. Detection was significantly enhanced under the time-shared presentation mode while serial recall was unaffected. For detection, visual presentation yielded significantly better performance. Effects of time-sharing seem differentially related to the characteristics of the task.—*Journal abstract.*

165. Ward, Lawrence M. (Rutgers State U) **Power functions for category judgments of duration and line length.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1182.—Demonstrates that category judgments of duration and line length are well fit by power functions of the form  $R = aS^n$ . The exponents of the best-fitting power functions ( $n$ ) are .66 for duration and .69 for line length, both smaller than the corresponding average exponents for magnitude estimations (about 1.1 for both continua).

166. Williams, William N.; LaPointe, Leonard L. & Riski, John E. (U Florida) **Lingual discrimination of angular changes of a grooved line by normal subjects.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 579-582.

—Explored the perceptual characteristics of the oral region by requiring 20 17-32 yr old male and female Ss to trace lingually a groove scored in a plastic disc and report its horizontal or vertical orientation. Performance was significantly better in perceiving orientation around the horizontal plane than around the vertical. An angular deviation of 30° was required before all Ss could detect that the groove was not in the horizontal or vertical plane. No significant difference was found in performance by males and females.—*Journal abstract.*

### Auditory Preception

167. Aiken, Edwin G.; Shennum, William A. & Thomas, Gary S. (US Navy Personnel Research & Development Ctr, San Diego, CA) **Memory processes in the identification of pitch.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 449-452.—Conducted a pitch identification study with 30 undergraduates, using 3 interstimulus intervals, a pretest, 3 drills, and a posttest. Results include (a) superior performance on stimuli requiring only a simple discrimination judgment, (b) inferior performance at longer interstimulus intervals, (c) a greater tendency to repeat correct rather than incorrect responses to adjacent tones at the same pitch level, and (d) a modest and reliable improvement in pitch identification accuracy from the pre- to the posttest. Relevance of the results for an interpretation of pitch identification as dependent on memory processes is discussed.—*Journal abstract.*

168. Atal, B. S. (Bell Lab, Murray Hill, NJ) **Effectiveness of linear prediction characteristics of the speech wave for automatic speaker identification and verification.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1304-1312.—Determined 12 predictor coefficients approximately once every 50 msec from the speech of 10 female speakers sampled at 10 kHz. The predictor coefficients and impulse, response, autocorrelation, area, and cepstrum functions were used as input to an automatic speaker-recognition system. The identification decision was based on the distance of the test-sample vector from the reference vector; the speaker corresponding to the reference vector with the smallest distance was judged to be the unknown speaker. In verification, the speaker was verified if the distance between the test sample vector and the reference vector for the claimed speaker was less than a fixed threshold. Among all the parameters investigated, the cepstrum was the most effective. In a separate study to determine the feasibility of text-independent speaker identification, accuracy of 93% was achieved for speech 2 sec in duration even though the texts of the test and reference samples were different. (17 ref)—*Journal abstract.*

169. Bever, Thomas G. & Chiarello, Robert J. (Columbia U) **Cerebral dominance in musicians and nonmusicians.** *Science*, 1974(Aug), Vol 185(4150), 537-539.—14 musically naive and 22 musically experienced right-handed 15-30 yr old Ss performed a 2-note excerpt recognition task to determine whether they could analyze the internal structure of a melody. Musically experienced Ss discriminated the presence of the 2-note excerpts in both ears. No significant differences occurred according to whether the sequence was melodic or rearranged. Musically naive Ss did not discriminate the



excerpts in either ear. All Ss could discriminate instances when a sequence was a repetition from instances when it was not; however this discrimination was better in the right ear for experienced listeners and better in the left ear for inexperienced listeners. These differences were consistent for both melodic and rearranged sequences. In contrast to previous reports, music perception supports the hypothesis that the left hemisphere is dominant for analytic processing and the right for holistic processing.—*L. Gorsey.*

170. Brown, W. S. & Brandt, John F. (U Florida) **The effect of masking on vocal intensity during vocal and whispered speech.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 157-161.—Investigated the ability of normal speakers to control their speech utterances in the absence of acoustic cues. 5 normal Ss were asked to read 10 short colloquial sentences into a tape recorder 5 times in quiet, 5 times under binaural masking at 87 db sound pressure level (SPL), and 5 times at 107 db SPL. In the 1st session they were given no instructions except to read the sentences. Increase in vocal output in even the higher noise ("Lombard Reflex") was only 4.2 db. During a 2nd session Ss were instructed to ignore the noise and read the sentences as before in exactly the same manner each time. The Lombard Reflex was only 2.9 db at maximum. During a 3rd session Ss were instructed to ignore the noise but to whisper the sentence in the same manner each time. Here again, with no acoustic feedback available, vocal output was increased only slightly. Vocal output as measured in SPL and in intra-oral pressure was highly correlated. It is concluded that speakers are able to maintain good control over their vocal intensity during the absence of acoustic feedback, but the present data do not distinguish between 2 possible physiological mechanisms discussed.—*Journal summary.*

171. Chamberlain, Philip J. (Wayne State U) **Pitch and duration in recognition of music-like structures.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 419-428.—Attempted to determine whether patterning of pitch or duration contributes most to the recognition of melodic structures. Tone sequences resembling musical patterns or melodies were used in a recognition memory task performed by 90 male and female undergraduates. 9 categories of pattern complexity were produced by using 3 different levels of average information per tone in each of the 2 dimensions. These categories of tone sequences were presented to groups of Ss and their recognition performance measured. Only patterning of pitch was a significant factor in recognition. Performance was better with larger values of average information per tone, but behavior at maximum values of pitch information suggested that the relationship between performance and pattern information is nonmonotonic.—*Journal abstract.*

172. Cooper, William E. & Blumstein, Sheila E. (Massachusetts Inst of Technology) **A "labial" feature analyzer in speech perception.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 591-600.—Conducted a selective adaptation experiment with 8 paid Ss to determine the ability of various adapting stimuli to alter the perception of a series of 13 synthetic speech syllables. Results indicate that perception of place distinctions among the stop consonants can be altered even by

repetitive listening to certain speech sounds not belonging to the stop-consonant class. (29 ref)

173. Dooling, D. James. (Kent State U) **Rhythm and syntax in sentence perception.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 255-264.—Conducted 2 experiments with a total of 176 undergraduate Ss in which they were required to perceive sentences in noise. A set was induced by presenting a series of sentences that had the same syntax and rhythm. On a final test sentence, either the rhythm alone or rhythm plus surface structure was changed. Changes in rhythm led to major disruptions in performance, while the effect of syntax alone was not significant. Results point out the fundamental importance of rhythm in speech perception and suggest caution in attributing speech perception effects to syntax without controlling for rhythm.—*Journal abstract.*

174. Efron, Robert & Yund, E. William. (VA Hosp, Neurophysiology-Biophysics Research Lab, Martinez, CA) **Dichotic competition of simultaneous tone bursts of different frequency: I. Dissociation of pitch from lateralization and loudness.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 249-256.—Presented 5 right-handed Ss with 2 50-msec tone bursts of 1,500 Hz and 1,900 Hz separated by 1 sec. One ear received the 1,500-1,900 sequence at 1 intensity level while the other ear simultaneously received the reversed (1,900-1,500 Hz) sequence at another intensity level. Ss, who were experienced in psychoacoustic research, were required to report which sequence they heard and its lateralization. A strong ear dominance effect was demonstrated in all 5 Ss for pitch information. A similar dominance for loudness and lateralization was absent. The existence of an ear dominance for pitch but not for lateralization and loudness indicates a striking dissociation in the neural processing of these 2 types of acoustic information. (French & German summaries)—*Journal abstract.*

175. Harbert, Fred; Paris, Deanne & Wenner, Claude. (Thomas Jefferson U., Medical Coll.) **Factors affecting the loudness discrimination of suprathreshold signals increasing or decreasing in intensity.** *Journal of Auditory Research*, 1972(Apr), Vol. 12(2), 149-153.—Employed a monaural suprathreshold test, utilizing steadily increasing or decreasing stimuli, to measure loudness discrimination ( $\Delta I$ ) in 8 normal-hearing Ss. Pure tones of .8-10 sec duration and 1, 2, 4, and 8 db/sec attenuation rates were presented at fixed, increasing, or decreasing intensity levels. Judgments were made for test tones of .25, .5, 1, 2, and 4 kHz presented at 80 and 100 db sound pressure level. The smallest  $\Delta I$ s occurred at the slowest attenuation rate, at the highest frequency, and for the increasing signal direction.—*Journal summary.*

176. Hartley, L. R. & Carpenter, A. (Medical Research Council, Applied Psychology Unit, Cambridge, England) **Comparison of performance with headphone and free-field noise.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 377-380.—Previous studies have found that continuous loud noise presented in the free field causes impairment in a variety of tasks. In the present study with 2 housewives and 14 US Navy enlisted men, performance on the 5-choice serial reaction test in continuous loud noise presented over headphones and in the free field was compared. Sound pressure level

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was the same in both conditions. Impairment of performance occurred in both noise conditions. The obtained 3-way interaction indicates a tendency for headphone noise to have a larger effect on gaps and for free-field noise to have a larger effect on errors. Differences between the 2 modes of presentation may be related to perceptual deprivation and to annoyance effects of noise.—*Journal abstract*.

177. Henning, G. Bruce . (U Oxford, England) **Lateralization and the binaural masking-level difference.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1259-1262.—Conducted 2 experiments in which 3 Os could readily detect interaural delays in certain complex waveforms even when the energy in the waveform was confined to high-frequency regions. However, the detectability of such complex waveforms was not measurably dependent on interaural phase—there was no masking-level difference with high-frequency signals in spite of the fact that interaural phase effects were readily observed as changes in the apparent location of the source of the signal. (15 ref)—*Journal abstract*.

178. Hines, David & Satz, Paul . **Cross-modal asymmetries in perception related to asymmetry in cerebral function.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 239-247.—Obtained cross-modal correlations between left-right asymmetry on the dichotic listening (DL) test and a visual half-field (VHF) test for 3 groups of 30 undergraduates: right-handed Ss with no family history of left-handedness, right-handed Ss with a positive family history of left-handedness, and left-handed Ss. Both groups of right-handed Ss demonstrated significant cross-modal correlations between DL (auditory) asymmetry and VHF (visual) asymmetry. The left-handed Ss displayed no correlation between DL and VHF asymmetries. This suggests a dissociation between auditory and visual laterality in left-handers. Differences between this finding and 2 previous studies which found no cross-modal asymmetry for right- or left-handers are discussed. The VHF test utilized in this experiment controlled fixation by presenting digits sequentially at fixation, while simultaneously presenting other digits to either the right or left VHF. This procedure minimized the effect of directional scanning on VHF asymmetry. The reliability of the DL and VHF asymmetries was also computed. The DL asymmetry proved to be highly reliable ( $r = .86$ ), while the VHF asymmetry was somewhat less reliable. The asymmetry on both tests is attributed to asymmetry of cerebral function. (French & German summaries)—*Journal abstract*.

179. Jesteadt, Walt & Bilger, Robert C. (Harvard U) **Intensity and frequency discrimination in one- and two-interval paradigms.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1266-1276.—Collected intensity- and frequency-discrimination data for the same 4 undergraduate Ss, using several psychophysical paradigms. No differences were observed that would indicate that frequency discrimination involves fundamentally different decision-making processes than intensity discrimination. Performance in a 2-interval forced-choice task exceeded performance in a yes-no task by a factor greater than that generally predicted. Consistent individual differences were observed in frequency

discrimination but not in intensity discrimination. (34 ref)—*Journal abstract*.

180. Lackner, James R. (Massachusetts Inst of Technology) **Influence of visual rearrangement and visual motion on sound localization.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 291-293.—In an experiment with 12 human Ss, abnormal changes in sound localization occurred during rearrangement of the visual environment and during exposure to optokinetic stimulation. In both of these situations the errors of auditory localization resulted from nonveridical changes in the registration of body posture. (French & German summaries) (19 ref)

181. Lewis, Frederick C. & Kelly, Lynn . (East Carolina U) **Oral stereognosis and auditory discrimination by adults: Summary.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1218.—Studied whether normally articulating adults, who perform inadequately on a standardized auditory discrimination test of sounds removed by place of articulation, also experience difficulty on a standardized measure of oral stereognosis. Data show a significant but relatively low correlation of .39 between errors on the auditory discrimination task and the oral stereognostic measure.

182. Liebman, Jerome . (State U. New York, Albany) **Lateralization of BC sound as studied with EEA techniques: Preliminary note.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 121-123.—Investigated lateralization of bone-conducted sound using electroencephalic averaging audiometry (EEA). A 1-sec tone pulse at 1 kHz was transmitted at 30 db sensation level through a bone conduction transducer centered on the forehead in 6 normal Ss. 4 Ss reported no lateralization, 1 S reported lateralization to the left and 1 S to the right. Amplitudes of evoked potentials (EP) measured at right and left paravertex were larger for Ss reporting lateralization to the contralateral ear. These data are consistent with earlier reports showing maximal representation of auditory EPs contralateral to the stimulated ear. It is suggested that the Weber test may be usefully applied to EEA evaluation.—*M. B. Meikle*.

183. Mitchell, Lilian M. & Singh, Sadanand . (Ohio U) **Perceptual structure of 16 prevocalic English consonants sententially embedded.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1355-1357.—Investigated the use of distinctive features in judging phonemic similarity in connected speech in varying noise and quiet conditions. 16 initial consonants were presented to 5 paid students in monosyllables embedded within a declarative sentence in a position of relative unstress. Ss judged 1680 triads in +6 db, +12 db, and no-noise conditions each. The features stop-fricative, sibilance, voicing, back-front, and velarity were retrieved in the quiet condition, and stop-fricative, sibilance, voicing, and velarity were retrieved in the +12 db and +6 db conditions. When masking interfered, the weighting of the features changed: sibilance and voicing became more prominent in noise while front-back place disappeared. 3 Ss weighted dimensions stop-fricative, sibilant, back-front, voicing, and velarity in descending order, while 1 of the remaining 2 subjects weighted voicing maximally and the other weighted velar place maximally. It is concluded that (a) initial consonants, in sentential

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contexts judged for similarity, produced results similar to those found from initial consonants in the context of nonsense syllables and (b) the pattern of variance accounted for by similar dimensions varied with signal-to-noise ratio.—*Journal abstract.*

184. Molino, John A. (National Bureau of Standards, Inst for Basic Standards, Washington, DC) **Equal aversion levels for pure tones and 1/3-octave bands of noise.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1285-1289.—14 paid college students tapped rapidly on a telegraph key to reduce the intensity of a continuous acoustic stimulus presented through earphones. Failure to respond resulted in an intensity increase of 1 db every 4 sec. Ss responded during 10-min sessions to 8 pure tones and 8 1/3-octave bands of noise at octave frequencies from 63 Hz to 8 kHz. The average sound-pressure level maintained by the Ss became stable after about 5 min. Different asymptotic levels observed from 5-10 min were taken as a measure of equal aversion levels for the stimuli. Equal aversion levels were compared with other subjective weighting contours and were closest to a weighted sound level of 80-85 db. (17 ref)—*Journal abstract.*

185. Penner, M. J.; Leshowitz, B.; Cudahy, E. & Richard, G. (Bell Telephone Lab, Holmdel, NJ) **Intensity discrimination for pulsed sinusoids of various frequencies.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 568-570.—Results of a study of pulsed sinusoids ranging in frequency from .15 to 12 kHz, employing as Ss 4 paid university students and 1 of the Es, show that, for each tone in this region, Weber's law failed. Theoretical implications of the results are discussed.

186. Perrott, David R. & Baars, Bernard J. (California State U, Los Angeles) **Detection of interaural onset and offset disparities.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1290-1292.—Examined interaural time difference thresholds for transient differences in signal onset and offset in 4 normal, experienced listeners. Lateralization of the acoustic image to either onset or offset transients was observed with signal pulse 1 and 10 msec in duration but not with longer pulses. Interaural difference thresholds for signal onset were observed with smaller time disparities than those obtained with signal offset transients. Both onset and offset transient thresholds were inversely related to signal duration and directly related to signal correlation.—*Journal abstract.*

187. Pohlmann, Lawrence D. & Sorkin, Robert D. (Purdue U) **Binaural masking level differences for pulse train signals of differing interaural correlation.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1293-1298.—Measured binaural masking level differences for 3 normal female undergraduates in a task in which the noise level was controlled by a computer program. The signal in 1 channel was a random polarity train composed of 60 100-μsec pulses with an interpulse period of 2 msec. Signal correlation was varied by (a) randomly inverting some of the pulses, (b) randomly deleting some of the pulses, (c) deleting or inverting some of the pulses contingent on their polarity, or (d) delaying the pulses by an integral number of pulse periods. Data were compared to predictions generated from E. Osman's (see PA, Vol 48:4118) correlation model. Perform-

ance was accurately predicted by the model for conditions (a), (b), and (d). Differences between the model and the data for condition (c) are explained in terms of changes in the monaural detectability of the contralateral signal. (15 ref)—*Journal abstract.*

188. Russell, G. & Noble, W. G. (Macquarie U, North Ryde, NSW, Australia) **Effect of signal frequency on auditory autokinesis.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 173-174.—Reports a study in which the magnitude of auditory autokinetic movement varied systematically with change in signal frequency from .5 to 10 kHz. Other response measures showed no such systematic trend. Data explain the phenomenon more in terms of interaural differences in adaptation than in terms of minimum audible angle.

189. Ryder, Paul; Pike, Ray & Dalglish, Len. (U Queensland, St Lucia, Australia) **What is the signal in signal detection?** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 479-482.—Examined the nature of the stimulus represented along the decision axis in the yes-no auditory detection task. 2 contrasting interpretations, absolute and difference representation of the stimulus, were tested in 2 experiments with 3 and 5 paid Os, respectively, by raising the carrier tone embedded within the background noise to the level of the signal on occasional "catch" trials. Results indicate that difference detection may be the preferred mode of operation when a carrier tone is present and the task is a difficult one. Implications for the theory of signal detectability model are discussed in terms of the relative efficiency of the 2 detection mechanisms.—*Journal abstract.*

190. Stark, Earl W. & Hagness, Don E. (U Illinois, Hearing Clinic) **The Modified Rhyme Test as a test of speech discrimination.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 154-156.—Investigated use of the Modified Rhyme Test (MRT) for assessing speech discrimination. Commercially-available tapes of 3 MRTs of E. J. Kreul et al (see PA, Vol 45:3365) and a W-22 record (List 4) from the Central Institution for the Deaf (CID) were compared in 10 normal-hearing young adults at 10, 20, 30, 40, and 50 db sensation level (SL) for speech reception threshold. MRT Tests B, F, and D were used representing 1 male talker, with noise added designed to yield discrimination scores (DS) of 96, 83, and 75% respectively. DS differences between test-retest means for all 4 tests were negligible (commonly less than 2%), and Pearson test-retest  $r$ 's were all high (.90 or better for MRT lists). Maximum DS was achieved for all tests at about 40 db SL. It is concluded that the MRT tests are equivalent to the CID W-22 tests and have format advantages for many clinic populations.—*Journal summary.*

191. Tolkmitt, Frank J. (U. Melbourne, Parkville, Victoria, Australia) **Latency of sound localization as a function of azimuth and frequency.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 310-316.—Conducted 2 experiments to investigate by means of backward auditory masking the individual localization times of 8 loudspeakers arranged equidistantly on a horizontal azimuth around S. In Exp I 10 20-25 yr olds with balanced hearing had to localize a 20-msec tone of 1,000 Hz, followed by a 500-msec mask of white noise at 1 of 10 delay intervals. Localization accuracy improved

with increasing delay. The notion of differential processing time was supported by the finding that rate of improvement depended on speaker position. To meet the argument that these results could have been caused by the tonal quality of individual speakers, the study was repeated with 18 undergraduates who were rotated by 90°. Frequency of tone was varied so that binaural time differences as well as intensity differences were mediating the localization decision. Despite rotation of S, the same effects as in Exp I were obtained. In addition, localization patterns differed with mediating binaural cues.—*Journal abstract.*

192. Tracy, Russel L. & Tracy, Linda N. (Johns Hopkins U) **Reports of mental activity from sleep stages 2 and 4.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 647-648.—Sought data regarding possible differences in preawakening mentation in sleep Stages 2-4 by comparing reports at the extremes of this range. Ss were 11 males and 10 females, each of whom spent 3 nonconsecutive nights in the laboratory. Stage 2 vs 4 differences in recall, length, and dreamlike quality were not significant; only 1 content comparison was significant. Preliminary data suggest that time in Stage 4 may be negatively associated with intensity of mentation. Findings question the view that intensity of nocturnal mentation is a simple, monotonic increasing function of EEG-defined arousal as reflected in conventional stages of sleep.—*Journal abstract.*

193. Warren, Richard M. (U Wisconsin, Milwaukee) **Auditory pattern recognition by untrained listeners.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 495-500.—Earlier work with unpracticed Ss has indicated that identification (naming) of the temporal order of components within repeated sequences consisting of 3 or 4 unrelated sounds cannot be accomplished when the item durations are 200 msec or less. In the present experiment, 12 groups of 30 unpracticed undergraduates each were required to tell whether alternated sequences, consisting of reiterated presentations of the same 3 or 4 successive items, were in identical or permuted order. Accuracy of same-different judgments was significantly better than chance when all items lasted 200 msec. Changing the duration of each item in 1 of the 2 sequences above or below 200 msec made the task more difficult. Results suggest that (a) identification of order and recognition of auditory temporal patterns may represent fundamentally different processes and (b) recognition may involve matching of "temporal templates."—*Journal abstract.*

194. Wood, Charles C. (Walter Reed Army Inst of Research, Washington, DC) **Parallel processing of auditory and phonetic information in speech discrimination.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 501-508.—Conducted an experiment with 5 adults and the E as Ss to distinguish between 2 models of auditory and phonetic processing: (a) a strict serial model in which auditory information would be processed at one level, followed by the processing of phonetic information at a subsequent level; and (b) a parallel model in which auditory and phonetic processing could proceed simultaneously. Ss identified either an auditory (fundamental frequency) or a phonetic dimension (place of articulation of the consonant) of synthetic consonant-vowel syllables.

When the 2 dimensions varied in a correlated manner, reaction times were significantly shorter than when either dimension varied alone. This "redundancy gain" could not be attributed to speed-accuracy trades, selective serial processing, or differential transfer between conditions. Results allow rejection of a completely serial model, suggesting instead that at least some portion of auditory and phonetic processing can occur in parallel. (50 ref)—*Journal abstract.*

195. Yost, William A. (U Florida, Communication Sciences Lab) **Discriminations of interaural phase differences.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1299-1303.—Asked 3 Os to discriminate between 2 pulsed sinusoids, one presented with an interaural phase delay  $\theta$  and the other presented with a longer delay  $\theta + \Delta\theta$ . Frequency of the sinusoids ranged from 250 to 4000 Hz. The difference threshold for  $\Delta\theta$  increased as  $\theta$  increased from zero degrees to  $\frac{1}{2}$  of the period of the sinusoid, then decreased as  $\theta$  was further increased to a full period of the sinusoid. As  $\theta$  was increased to  $\frac{1}{2}$  of the period of the sinusoid, the lateral image appeared to shift away from midline toward the ear leading in time; but as  $\theta$  was increased beyond  $\frac{1}{2}$  of a period of the sinusoid, the lateral image appeared to shift toward the midline from the ear lagging in time. Results imply that (a) for frequencies less than 2000 Hz, lateral discriminations based on interaural phase differences were more acute toward midline than at either side and (b) for frequencies greater than 2000 Hz, changes in interaural phase were unable to shift the lateral image.—*Journal abstract.*

196. Yost, William A.; Turner, Robert & Bergert, Byron. (U Florida) **Comparison among four psychophysical procedures used in lateralization.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 483-487.—Obtained psychometric functions from 2 normally hearing female university students in 4 lateralization procedures in which Os made discriminations of interaural temporal differences of a 250-Hz tone. The 4 tasks were a single-interval yes-no task, a single-interval left-right task, a 2-alternative forced-choice task, and a 2-interval same-different task. The theory of signal detection provides predictions relating the performances obtained in these 4 procedures. These predictions could not be verified in this experiment when it was assumed that the Os were listening to changes in lateral position produced by the interaural temporal difference. The data are consistent, however, with the assumption that Os used lateral motion as a cue for detection in 2-interval tasks and lateral position as a cue in single-interval tasks.—*Journal abstract.*

197. Young, I. M. (Thomas Jefferson U, Medical Coll) **Descending Bekesy threshold for frequency modulated tones.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 173-178.—Investigated the role of various modulation rates and frequency deviations in threshold determinations, using frequency-modulated (FM) tones. 5 trained Ss listened to a 1,000-Hz fundamental tone modulated so as to produce frequency deviations of  $\pm 10$ -250 Hz. Modulation rate was varied from 1 to 25/sec. Responses were recorded using Békésy audiometric methods. Parametric evaluation of the 2 modulation variables of interest indicated that, for



a given modulation rate, threshold improved with increasing frequency deviation. For a given frequency deviation, as modulation rate increased the threshold became worse. The modulation index (ratio of frequency deviation to modulation rate) was calculated and proved to be directly, but not linearly, proportional to acuity.—*M. B. Meikle.*

### Visual Perception

198. Alexander, Kenneth R. (Illinois Coll of Optometry, Chicago) **Sensitization by annular surroundings: Sensitization and the contrast-flash effect.** *Vision Research*, 1974(Aug), Vol 14, 623-631.—Notes that, in spatial sensitization, the onset of a sensitizing annulus lowers the threshold for a test probe presented concentric with a continuously illuminated disk which fills the center of the annulus. In the contrast-flash effect, the onset of an annulus elevates the threshold for a test stimulus which fills the center of the annulus. In a series of 6 experiments with 2 experienced Ss, stimulus parameters which differ between the 2 paradigms were systematically altered in order to converge on a stimulus configuration in which the annulus would either elevate or lower the threshold for a test stimulus with a change in only 1 or 2 of the stimulus values. Results show that the variables critical in determining the effect of an annulus on the threshold were the presence or absence of a steady disk at the center of the annulus, and for 1 S the size of the test stimulus. (French, German, & Russian summaries) (17 ref)—*Journal abstract.*

199. Allan, Lorraine G. & Kristofferson, A. B. (McMaster U, Hamilton, Ontario, Canada) **Judgments about the duration of brief stimuli.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 434-440.—Presents visual duration discrimination data for 5 Os for stimulus durations between 70 and 1,020 msec. A model for duration discrimination proposed by L. G. Allan et al (see PA, Vol 47:55) is elaborated, and the data are discussed in terms of the model. Data are in agreement with the basic assumptions of the model. Differences between the present data and duration discrimination data presented by others are discussed.—*Journal abstract.*

200. Allen, Jerry C. (U Georgia) **Relationships between visual perception and oral language production of young children.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1319-1327.—Examined the role of visual perception in the oral language production of young children to identify and specify the extent of relationships between certain visual perceptual processes and selected oral language skills. 48 4-8 yr olds were given the Marianne Frostig Developmental Test of Visual Perception. Raw scores on each of the 5 subtests served as measures of the visual perception processes. Measures of selected skills of oral language (syntactical, morphological, and associative skills) were dependent variables. Step-wise regression techniques showed that the visual perceptual processes contributed significantly to explaining the variance of some skills in all aspects of language sampled. Spatial relationships contributed consistently to the morphological and associative skills while constancy of shape contributed to the syntactical skills. (17 ref)—*Journal abstract.*

201. Ambler, Bruce A. (U Texas, Arlington) **Hue discrimination in peripheral vision under conditions of dark and light adaptation.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 586-590.—Results of an experiment with 3 paid undergraduates show that light adaptation lowered peripheral chromatic thresholds, interpreted as due to the lowering of rod sensitivity. It was also found that light in the photochromatic interval appeared blue, indicating that rods may add a blue component to peripheral color vision. (17 ref)

202. Antes, James R. (U North Dakota) **The time course of picture viewing.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 62-70.—Recorded the eye movements of 20 undergraduates as they viewed each of 10 pictures for 20 sec. The informativeness of regions within the pictures was determined independently by subjective ratings from 20 different Ss. Mean informativeness of locations fixated decreased over time and reached an asymptote after about 10 sec of viewing time. Mean duration of fixation showed a steady increase and mean extent of saccadic eye movements showed a steady decrease as viewing time progressed. A pattern of visual exploration was found in which Ss initially made many long saccades to fixate informative elements for short fixations; this behavior gradually evolved to fixating informative features less frequently and with longer examination of less informative details.—*Journal abstract.*

203. Blake, Randolph & Fox, Robert. (Baylor Coll of Medicine, Houston; TX) **Binocular rivalry suppression: Insensitive to spatial frequency and orientation change.** *Vision Research*, 1974(Aug), Vol 14(8), 687-692.—Measured the selectivity of rivalry suppression—defined as sensitivity to new information presented during suppression—by determining the detectability of changes in the suppressed-rivalry stimulus presented to 3 experienced and 2 inexperienced Ss. The stimulus was a vertical grating whose spatial frequency or orientation could be changed without altering contrast or mean luminance. Large changes in frequency and orientation were not detectable. Increments in contrast were detectable, but not decrements. It is concluded that suppression is fundamentally nonselective, remaining insensitive to all classes of stimulus change except those constituting an energy increment. (French, German, & Russian summaries)—*Journal abstract.*

204. Braddick, Oliver. (U Cambridge, Psychological Lab, England) **A short-range process in apparent motion.** *Vision Research*, 1974(Jul), Vol 14(7), 519-527.—Conducted experiments with experienced Os in which a region in an alternated pair of random-dot patterns was uniformly displaced. It was perceived as a segregated, coherently moving shape only if the displacement was small. The limit on the displacement was its absolute size rather than the number of elements' widths. Segregation due to apparent motion did not occur if the 2 patterns were exposed to different eyes. It is suggested that perceptual segregation may be due to the activity of low-level motion detectors of limited spatial range, while classical apparent motion with larger displacements involves a different process. The problem of selection among alternative possible interactions of stimulus elements in apparent motion is discussed. (French,

German, & Russian summaries) (25 ref)—*Journal abstract*.

205. Brigner, Willard L. & Gallagher, M. Brooks. (Appalachian State U) **Subjective contour: Apparent depth or simultaneous brightness contrast?** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1047-1053. —Conducted 3 experiments with a total of 45 undergraduates to test the notion that simultaneous brightness contrast is the basis for subjective contour and that the size of inducing area affects the perceptibility of subjective contour. Data from Ss' rankings of stimuli with the most vivid and readily seen sectors show that the most perceptible sector was the one with the largest inducing area and that the most perceptible subjective contour (sector) occurred when the angle between the radii of a circular figure was 45°; the least perceptible sector occurred at 135°, and there was intermediate perceptibility at 90°. Data from Exp III show that a stimulus configuration lacking differences in brightness was less successful in evoking the perception of subjective contour than a stimulus containing differences in brightness. Depth cues failed to sustain the perception of subjective contour with a reduction in simultaneous brightness contrast. (15 ref)—*L. Gorsey*.

206. Ciardullo, Robert C. & Gallon, Robert L. (Vassar Coll) **Magnitude estimations of brightness for lights of different wavelengths.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 21-27. —Employed a magnitude estimation procedure to obtain brightness estimations for 16 college students with normal color vision, using lights of different wavelengths. Color filters were combined to produce wavelength bands of 460-470, 520-540, 590-610, and 680-700 nm. Light intensity was varied over a wide range by neutral density filters. The results were 4 power functions whose exponents decreased monotonically from .37 for the short wavelength band to .28 for the long wavelength band. These exponents were compared to the exponent of .33 typically obtained for white light. Treating the exponents as linearly related to wavelength yielded an equation predicting the exponent for any wavelength within the range tested.—*Journal abstract*.

207. Collins, James F.; Newman, Patrick A. & Hutson, Stanley P. (U Missouri, Kansas City) **Personality correlates of visual perceptual responses.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1183-1187. —Measured 28 undergraduates' responses to word recognition tasks as a function of certain personality characteristics assessed by Rotter's Internal-External Control Scale and the Paranoia, Social Introversion, and Lie scales of the MMPI. 14 Ss saw a list of 20 neutral words and 14 saw a list with 4 taboo words interspersed. Recognition accuracy was independent of personality characteristics; however, the recognition confidence ratings of Ss differed significantly as a function of each of the personality variables. It is concluded that personality should be considered in assessing responses in certain types of perceptual experimentation. (15 ref)—*Journal abstract*.

208. de Weert, Ch. M. & Levelt, W. J. (U Nijmegen, Netherlands) **Binocular brightness combinations: Additive and nonadditive aspects.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 551-562. —Used a conjoint

measurement procedure with 2 trained male Ss to measure binocular brightness as a function of left and right luminance inputs. For nonzero stimulation, the data confirm earlier findings: the system can be described as additive with a scale exponent of 1. If zero stimulation was included, however, no additive solution was found (due to Fechner's paradox). A model is proposed which takes account of Fechner's paradox, and incorporates "realistic" exponents without requiring a multistage processing mechanism where different levels are characterized by different sensory scales. The model makes the weighting coefficients for the 2 eyes dependent in a continuous way on the strength of stimulation in the 2 eyes, especially on the amount of contrast of the monocular stimuli. For zero background stimulation, contrast can be expressed in terms of luminance of the stimulus. In this way, the model is reduced to a simple testable form. (24 ref)—*Journal abstract*.

209. Dember, William N.; Steffl, Mary & Kao, Kathy C. (U Cincinnati) **Backward masking of gratings varying in spatial frequency.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 439-441. —In a previous study using disk-shaped targets with varying numbers of internal pie-shaped segments, some targets were unmaskable and the detectability of others was enhanced by the masking stimulus. The present study with college students, using disks with gratings varying in spatial frequency, replicated previous findings except that there was little backward enhancement. (18 ref)

210. Engel, F. L. (Inst for Perception Research, Eindhoven, Netherlands) **Visual conspicuity and selective background interference in eccentric vision.** *Vision Research*, 1974(Jul), Vol 14(7), 459-471. —Describes experiments on the influence of test-object background factors on the size of the retinal field in which the relevant object can be discovered from its background during a brief presentation. There was size- and luminance-selective interference by background stimuli on the perceptibility of the test stimulus in eccentric vision. The size of the conspicuity area was a summation of the separate influences of diameter and luminance contrast relative to the background. (French, German, & Russian summaries) (46 ref)

211. Erwin, Donald E. & Hershenson, Maurice. (Brandeis U.) **Functional characteristics of visual persistence predicted by a two-factor theory of backward masking.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 249-254. —Conducted 2 experiments with a total of 13 psychology graduate students. In Exp I backward masking was obtained for 50-msec targets of 7 consonants using a visual noise mask. Masking was equally effective in monoptic, dichoptic, and binocular viewing of target and mask separated by interstimulus intervals of 0, 50, or 100 msec but not at 150 msec. In Exp II postoffset persistence was measured for a blank field, a dark field, and a field containing 7 letters using a subtractive reaction time (RT) procedure. When only RT was required, persistences were the same for the 3 fields; when report of the contents of the visual representation was required in addition to the motor response, the persistence of the field containing the letters was about 35 msec longer. Results are discussed



within the framework of a 2-factor theory of backward masking.—*Journal abstract.*

212. Findlay, J. M. (U Durham, England) **Direction perception and human fixation eye movements.** *Vision Research*, 1974(Aug), Vol 14(8), 703-711.—Investigated involuntary movements of the eye during fixation which give rise to a problem concerning location in visual space. A psychophysical task was used in Exp I in which 3 normally seeing Ss judged the relative positions of 2 stimuli briefly flashed on a screen and separated by a temporal interval. S's ability to compare 2 directions in space decreased with time in a manner which suggests that the judgment was achieved on the basis of retinal position only and that correspondence with external direction changed as the eye drifted. Microsaccadic eye movements made by 4 Ss in Exp II were recorded while the same task was carried out. When S made a microsaccade, errors in location showed that a shift in perceived direction occurred toward the direction of the microsaccade. A model to explain the results based on a form of corollary discharge is postulated. (French, German, & Russian summaries) (27 ref)—*Journal abstract.*

213. Franken, R. E. & Rowland, G. L. (U Calgary, Alberta, Canada) **Visual memory: Accuracy of decisions of familiar-novel for tachistoscopically presented stimuli.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1039-1043.—Showed 150 novel and familiar color slides successively for 5 sec each to 92 undergraduates. A recognition test was then given consisting of 15 new and 15 previously-shown slides. 8 conditions of exposure were used in recognition: 20, 200, 350, 500, 750, 1,000, 2,500, and 5,000 msec; each S had only a single duration of exposure for each test stimuli. Results show that as the duration of exposure increased, the accuracy of recognition rapidly increased, becoming asymptotic before 500 msec. Decisions of novelty were more accurate than decisions of familiarity at all durations of exposure. Lower overall accuracies for familiar decisions resulted from the high error rates for certain familiar stimuli.—*L. Gorsev.*

214. Glezer, V. D.; Leushina, L. I.; Nevskaya, A. A. & Prazdnikova, N. V. (USSR Academy of Sciences, I. P. Pavlov Inst of Physiology, Leningrad) **Studies on visual pattern recognition in man and animals.** *Vision Research*, 1974(Jul), Vol 14(7), 555-583.—Discusses 3 types of recognition performance, using data from experiments with both animal and human Ss. The 1st and 3rd recognition types are characterized by independence of the amount of information received about the time of its processing; the 2nd type involves the linear relationship between these quantities. It has been demonstrated in regions of the animal cortex that mechanisms responsible for different types of recognition have different sites in the cortex. Visual images in man are invariant under size transformation and rotation around the vertical axis. Invariant recognition of visual images in man is determined by the existence of separate channels to process the information concerning the shape of an object and its spatial characteristics. Progressive development of the capability of invariant recognition of visual images in the course of evolution has been demonstrated.

(French, German, & Russian summaries) (77 ref)—*Journal abstract.*

215. Hagen, Margaret A. (Boston U) **Picture perception: Toward a theoretical model.** *Psychological Bulletin*, 1974(Aug), Vol 81(8), 471-497.—Describes J. J. Gibson's new theory of picture perception and a program of research within his framework. An analysis of pictorial information is proposed in which a systematic investigation of the structural components of pictures and their varying effects on perception is seen as preliminary to the postulation of hypothetical pick-up mechanisms. The basic components of pictures are described, and literature is reviewed in the problem areas of distorted and impoverished information, observation from the wrong station point, coexisting flatness and depth information, and the ambiguity of the source of a single projection. The feasibility of the Gibsonian enterprise is demonstrated, and further avenues for research into a structural analysis of pictorial information are noted. (48 ref)—*Journal abstract.*

216. Harris, Lauren J.; Ellen, Ellen A. & Marshall, Suzanne P. (Michigan State U) **What is the "front" of a simple geometric form?** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 571-580.—Tested a total of 670 undergraduate Ss in 3 studies in an attempt to define a set of cues that minimally specify perceived "frontness" and "backness" of objects. In Exp I Ss were instructed to identify the "front" and "back" of printed squares to which no, 1, or 2 circles were attached. In Exp II different Ss made the same kind of judgment to a wider range of geometric forms. In Exp III different Ss judged the direction of "imagined" movement of forms from Exp I. Results indicate that the "front" and "back" are asymmetric opposite sides, with "front" the side most different from the rest and the side toward which the form is imagined to be moving.—*Journal abstract.*

217. Harvey, Lewis O. & Michon, John A. (U. Colorado) **Detectability of relative motion as a function of exposure duration, angular separation, and background.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 317-325.—Used a signal detection design to measure detection thresholds for the motion of 1 spot of light relative to a stationary spot. Ss were 30 college students. Angular separations from 7.5 sec to 2°, exposure durations from .5 to 4 sec, and inward and outward motion were used with and without a textured background. An increase in angular separation lowered thresholds measured in minutes of arc/sec. Increases in exposure duration lowered motion thresholds, but raised the total angular distance moved during exposure. Textured background had no effect. Results are related to previous findings and to following another automobile at night. (26 ref)—*Journal abstract.*

218. Hirsch, Joy; Schneider, Bruce & Vitiello, Michael. (Columbia U) **The effects of adaptation to square-wave gratings as a function of grating orientation.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 475-478.—Used an adaptation technique to measure the selectivity or tuning for grating orientation in the visual system for different orientations of the inspection stimulus. Duration thresholds for grating patterns of constant luminance were determined for 13 test gratings oriented from  $\pm 5$  to  $90^\circ$  away from each of 5

adaptation gratings: 0, 22, 45, 67, and 90°. Threshold data for the Os (2 of the authors) obtained for test gratings without prior adaptation indicated higher sensitivity for gratings oriented along the horizontal and vertical axes than along the oblique axis. After adaptation, thresholds increased for gratings having similar orientations as the test gratings. However, the functions relating sensitivity reduction to degree of angular disparity between test and adaptation grating did not vary across the 5 inspection orientations.—*Journal abstract*.

219. Holmgren, John E. (U Maryland) **The effect of a visual indicator on rate of visual search: Evidence for processing control.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 544-550.—Conducted 2 experiments with a total of 18 paid university students in which search rates were estimated from response latencies in a visual search task of the type used by R. C. Atkinson et al (see PA, Vol 44:4392) in which an S searches a small set of letters to determine the presence or absence of a predesignated target. Half of the visual displays contained a marker above one of the letters. The marked letter was the only one that had to be checked to determine whether or not the display contained the target. The presence of a marker in a display significantly increased the estimated rate of search, but the data indicate that Ss did not restrict processing to the marked item. Results demonstrate that Ss are able to exercise some degree of control over the search process in this type of task.—*Journal abstract*.

220. Holt-Hansen, Kristian. (Copenhagen U, Psychological Lab, Denmark) **Experienced rings around the intersection point in the Hering illusion.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 639-646.—Exposed 19 Ss, most of them university students, to the Hering illusion. Besides oscillation of the parallel lines, Ss experienced different kinds of rings around the intersection point of the rays. These rings were most frequently a number of circles and less frequently ellipses. The colors of the rings contrasted with the colors of the Hering illusion. The fact that straight lines may condition the experience of rings (circles or ellipses) is juxtaposed with the results of another experiment, which demonstrated that a circle as stimulus conditioned the experience of straight lines as radii in the circle.—*Journal abstract*.

221. Isseroff, Ami; Carmon, Amiram & Nachshon, Israel. (Hadassah-Hebrew U, Medical School, Aranne's Lab of Human Psychophysiology, Jerusalem, Israel) **Dissociation of hemifield reaction time differences from verbal stimulus directionality.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 145-149.—Examined 2 hypotheses explaining visual hemifield reaction time (RT) differences in 2 experiments with a total of 16 right-handed college students. The RTs to normally oriented and to mirror-image English words were compared in the right and left fields in order to decide whether cerebral dominance or scanning tendencies account for field superiority. Both types of words yielded faster verbal and manual RTs in the right visual field. This finding, as well as a supplementary finding of more accurate recognition for mirror-image words in the right visual field, support the cerebral dominance hypothesis. (19 ref)—*Journal abstract*.

222. Johnson, Richard M. & Uhlarik, John J. (Kansas State U) **Fragmentation and identifiability of repeatedly presented brief visual stimuli.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 533-538.—Gave 60 undergraduates repeated brief presentations of geometric forms and required them to draw what they thought they saw. Stimulus patterns were presented tachistoscopically for as many repetitions as necessary for correct identification. The nature and sequential properties of pattern fragments reported prior to correct identification were examined. The 1st fragments to be reported were generally straight line elements of the stimulus patterns. With repeated presentations, more features were reported until the complete figure was correctly identified. The pattern of construction appeared similar to patterns of fragmentation found in research on stabilized retinal images, prolonged afterimages, and conditions of steady fixation. Implications for theories of pattern information processing are discussed. (17 ref)—*Journal abstract*.

223. Kelly, D. H. (Stanford Research Inst., Menlo Park, Calif.) **Spatio-temporal frequency characteristics of color-vision mechanisms.** *Journal of the Optical Society of America*, 1974(Jul), Vol. 64(7), 983-990.—Inferred spatio-temporal sine-wave response functions for the red-, green-, and blue-sensitive receptor mechanisms of the visual process, by selective chromatic-adaptation experiments with 3 Os and by Weber-law calculations. The complete spatio-temporal threshold surface for each cone mechanism was abbreviated to 4 critical profiles: 2 contrast-sensitivity curves measured at the temporal frequencies of minimum and maximum sensitivity and 2 flicker-sensitivity curves measured at the spatial frequencies of minimum and maximum sensitivity. Throughout most of the spatio-temporal frequency domain, the green sensitivity was greatest, the red less, and the blue least of all. The curve shapes can be qualitatively explained in terms of antagonistic interactions in the early visual pathways. (20 ref)—*Journal abstract*.

224. Kjellberg, Anders. (U Uppsala, Psychological Inst, Sweden) **Effects of sleep deprivation on voluntarily controlled reversal rate of ambiguous figures.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 149-153.—Studied the effects of sleep deprivation (SD) on the reversal rate of the Necker cube and Rubin's vase-faces figure with instructions to 16 paid undergraduate Ss both to maximize and to minimize the rate. 3 viewing conditions were used: free eye movements, eyes on a fixation point, and reversals of an afterimage of the figure. SD increased the rate under minimizing instructions and decreased the rate under maximizing instructions. Results are interpreted in terms of an accelerated satiation process and an impairment of attentional control. (17 ref)—*Journal abstract*.

225. Koenderink, J. J. & Van Doorn, A. J. (State U Groningen, Biological Ctr, Netherlands) **Detectability of two-dimensional band limited noise.** *Vision Research*, 1974(Jul), Vol 14(7), 515-518.—Compares measurements of limited 2-dimensional gaussian noise with measurements of the thresholds for detection of spatial sine waves. At low spatial frequencies the sensitivity of the visual system for sine waves increases with frequency, while that for the noise bands decreases with spatial



frequency. (French, German, & Russian summaries) (21 ref)

226. Lackner, James R. (Brandeis U) **Adaptation to displaced vision: Role of proprioception.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1251-1256. —Conducted 2 experiments with a total of 24 undergraduates to determine (a) whether Ss could adapt to visual rearrangement if they were permitted tactile and proprioceptive feedback, but not visual feedback, from their pointing movements toward visual targets; and (b) whether veridical proprioceptive feedback about the visual target location has to be available if adaptation is to occur when S cannot see his hand during the exposure to the visual rearrangement. It is concluded that adaptation to visual rearrangement requires neither the sight of the moving hand during exposure or visual error information about the discrepancy between the seen locations of the hand and another object in the visual field to which S has attempted to point, and that visual-proprioceptive discordance is a necessary as well as a sufficient condition for adaptation to occur. (17 ref)—L. Gorsey.

227. Lajoy, Ronald J. & Seethoff, Patrick M. (U Connecticut) **Effects of familiarity, verbal response, and practice on a visual search task.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1311-1314. —Studied the effects of familiarity, type of verbal response by the E (positive or negative), and practice on a visual search task by randomly assigning 42 undergraduates to bivariate conditions in a discrete search task of 20 trials. Search time for familiar English letters was significantly faster than for unfamiliar Greek letters; there was a significant decrease in search time over trials; and type of verbal response, as well as interactions, produced no significant effects.—*Journal abstract*.

228. Levy-Schoen, Ariane. (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[The field of visual fixation: Experimental data.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 43-65. —Conducted a series of experiments to determine which of several equivalent objects appearing at different places in the visual field would attract the eye first. The "attraction value" of a visual target depended on its location relative to the previous fixation point. The attraction lessened as the target was more off center, and was lowest in the bottom part of the field. There was a strong tendency to fixate the closest objects first. It was easier to induce the eyes to respond first to targets appearing in a certain direction in the field than to those appearing at a certain distance from the center. These rules were apparently related to the field of activity rather than to the field of stimulation: the left-right balance of the effect remained when the stimulated hemi-retinas were dissociated and the strength of nearby stimuli was only partly related to the higher intensity of the retinal excitation. These data are consistent with the idea of a basic regulation of ocular exploration such that foveal vision complements the gathering of information already located and partially organized by peripheral vision.—G. Rubin-Rabson.

229. Locher, Paul J. (Montclair State Coll) **Eye-movement parameters and total figure complexity of simple geometric shapes.** *Perceptual & Motor Skills*,

1974(Apr), Vol 38(2), 485-486. —Describes an experiment with 12 undergraduates which provides support for the value of the measure, total figure complexity, of the model of perception of simple geometric figures developed by P. C. Vitz and T. C. Todd in predicting eye-movement parameters of Ss performing a learning task.

230. Loiseau, Lucien. **[Experimental study of H. Jasper's method for determining visual dominance.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 35-42. —In Jasper's experiment, the S looks at the farther or nearer of 2 lights which go on and off alternately. The fixation point was adjusted to appear exactly in the center between the double images of the other light. The speed of alternation was modified until a phi phenomenon appeared. Ss were classified according to the type of dominance indicated by their response. Exp I indicated the presence of experimental artifacts (incorrect adjustments) and in Exp II no consistency was demonstrated when the S passed from one adjustment to another. It is concluded that Jasper's method cannot be used to determine dominance.—G. Rubin-Rabson.

231. Magnussen, Svein & Torjussen, Tore. (U Oslo, Inst of Psychology, Norway) **Sustained visual afterimages.** *Vision Research*, 1974(Aug), Vol 14(8), 743-744. —Investigated the mechanism of prolonged afterimages induced by brief, high-intensity flashes presented to 2 Ss against intermittent background illumination. Results show that duration and visibility of the afterimages increased steadily as background frequency was reduced from 8 to .5 Hz. It is suggested that neural adaptation of border and contrast subserving mechanisms, as well as regeneration of bleached pigments, are involved in the final decay of the afterimage.

232. Marks, Lawrence E. & Bornstein, Marc H. (Yale U) **Spectral sensitivity of the modulation-sensitive mechanism of vision.** *Vision Research*, 1974(Aug), Vol 14(8), 665-669. —Employed a procedure of critical flicker threshold to measure the spectral sensitivities of 2 Ss (the authors). The shape of the spectral sensitivity curve depended systematically on the frequency and percentage of temporal modulation. The variations in spectral sensitivity were consistent with 2 different sets of deLange characteristics. (French, German, & Russian summaries)

233. McCarthy, S. Viterbo. (Regis Coll) **Visual serial search for letters, Roman and Arabic numbers.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1077-1078. —Data from visual search performances for letters and Roman and Arabic numbers of 30 female undergraduates and 21 secondary school teachers show that across 30-sec trials with a 30-sec rest interval between target displays, visual serial search for Arabic numbers was significantly superior to search for letters and search for letters was significantly superior to search for Roman numerals.

234. McGlynn, F. Dudley; Hofius, David & Watulak, Gary. (Bryce Hosp, Tuscaloosa, AL) **Further evaluation of image latency and reported clarity as functions of image-complexity.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 559-565. —Conducted 2 experiments, each with 20 undergraduates, in which Ss imagined single common animals, animal pairs, and animal triads on separate trials. As the number of to-be-imagined animals

was increased, Ss took longer to form the image and rated the image as less clear. Results support the view that imaginal behavior is a proper domain of psychological study.—*Journal abstract.*

235. Metzger, Kurt R.; Warm, Joel S. & Senter, Roderick J. (U Cincinnati) **Effects of background event rate and critical signal amplitude on vigilance performance.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1175-1181.—80 undergraduates monitored a display consisting of the repetitive presentation of pairs of movements of a bar of light. A neutral background event, for which no overt response was required, was a double deflection of 24 mm. The critical signal for detection was a longer deflection in the 2nd movement within an event. Detection probability was greater for incremental excursions of 33% relative to 8.3% of the base movement. This effect was doubled when the event rate in which the signals were embedded was 21 as compared to 6 events/min. Results are considered in terms of the elicited observing rate hypothesis proposed by H. J. Jerison (1970).—*Journal abstract.*

236. Metzger, Erica & Rosenberg, Steven. (Bernard W. Schlesinger Foundation, New York, NY) **Right and left orientation in pictures.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 471-478.—In Exp I, 13 male and 13 female undergraduates rendered aesthetic preferences for left vs right views of each of 12 pictures which offered a prediction of preference for 6 views toward the left, 6 toward the right. The criterion of view preference was within-picture unification. 2 predictions were confirmed, while no differences in the nonpredicted direction reached significance. Exp II used the same stimulus materials with 8 male and 9 female Ss, each of whom received minimal training in left-right discrimination. 3 predictions were confirmed, with no differences at all in the nonpredicted direction. Training in Exp II, though not completely ineffective, was not perceived to have a significant effect. The correlation between the performances of the naive and trained groups on the 12 pictures was significant. Results justify further exploration.—*Journal abstract.*

237. Moorhouse, C. E. (Ed.). (U Melbourne, Vic, Australia) **Visual education.** Carlton, Australia: Pitman Australia, 1974. 187 p.—Presents a collection of 12 descriptive and discussion papers on the theory and function of visual language and perceptual processes. Topics include the human information processing of visual images, visual language in the fine arts, technology and science, engineering, and everyday life, and education and visual experience. (9 p ref)

238. Norren, Dirk V. & Padmos, Pieter. (Inst for Perception TNO, Soesterberg, Netherlands) **Dark adaptation of separate cone systems studied with psychophysics and electroretinography.** *Vision Research*, 1974(Aug), Vol 14 (8), 677-686.—Measured dark-adaptation curves using psychophysical and electroretinographic (ERG) methods with 3 human Ss and the ERG method with 2 rhesus monkeys. The time constant for the blue-cone system dark-adaptation curve was measured on a strong yellow background to suppress the red- and green-sensitive systems. Dark adaptation developed more slowly in the fovea than in the periphery. The time constant of the foveal red-green system dark adaptation

was 90 sec and that of the blue system was 140 sec. A good correspondence was noted between the human psychophysical and ERG data, and between human and monkey ERG data. It is hypothesized that the simultaneous regeneration of the red and green cones explains the slow blue-cone dark adaptation. (French, German, & Russian summaries) (26 ref)—*Journal abstract.*

239. Ornitz, E. M.; Brown, M. B.; Mason, Anne & Putnam, N. H. (U California, Medical School, Los Angeles) **The effect of visual input on post-rotatory nystagmus in normal children.** *Acta Oto-Laryngologica*, 1974(Jun), Vol 77(6), 418-425.—Measured the duration, total number of beats, and frequency of postrotatory nystagmus in 25 normal 3-7 yr olds under different conditions of visual input. After rotation in darkness, the effects of fixation without light, fixation in light, and light without fixation on the nystagmus evoked by an abrupt braking deceleration were studied. The postrotatory nystagmus duration and the total number of beats were significantly reduced both by fixation without light and by light without fixation. Findings are discussed in relation to mechanisms by which vestibular nystagmus may be suppressed. (German summary)—*Journal abstract.*

240. Posey, Thomas B. & Runyon, John C. (Murray State U) **Intercorrelations of numerosity recognition, IQ, and anxiety in college students.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1054.—Administered a visual numerosity recognition task, the Institute for Personality and Ability Testing Anxiety Scale Questionnaire, and the Quick Word Test to 100 undergraduates. Data show (a) no significant correlations between IQ and 2 out of the 3 numerosity scores, (b) a significant negative correlation between IQ and anxiety, and (c) small significant negative correlations between IQ and the 3 numerosity scores.

241. Pressey, A. W. & Wilson, A. E. (U Manitoba, Winnipeg, Canada) **The Poggendorff illusion in imagination.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 447-449.—Tested undergraduates on the Poggendorff illusion with the angle of the oblique line varying from 20 to 30°. Ss were asked to project either an objective oblique line or an imagined oblique. Imagining the oblique line did not produce a smaller illusion, contradicting theories that distortions are retinal in origin and supporting judgmental theories.

242. Remole, Arnulf. (U Waterloo, Optometry School, Ontario, Canada) **Luminance thresholds for perceived movement in a flickering field.** *Journal of the Optical Society of America*, 1974(Aug), Vol 64(8), 1133-1135.—In a test with 7 humans with normal vision, a uniform flickering field was perceived as containing spatial and temporal articulations quite unlike the stimulus. Among these was an apparent oscillatory rotation of perceived patterns. The stimulus luminance required for the perception of such movement was determined for various stimulus frequencies. This threshold lay consistently higher than the luminance threshold for 1 broad category of perceived patterns—those exhibiting geometrical features. It is concluded that the oscillatory movement depends on such patterns exposed at a certain luminance increment above their threshold.—*Journal abstract.*



243. Richards, Whitman & Dichgans, Johannes. (Massachusetts Inst of Technology) **Effect of directional-flow patterns upon motion thresholds.** *Journal of the Optical Society of America*, 1974(Aug), Vol 64(8), 1148-1149.—Results of a demonstration of directional motion selectivity in 7 human Ss indicate a selective inhibitory interaction between background and target motion only if the 2 were moving in the same direction and were seen in the same depth plane.
244. Rogers, Robert A. & Sanders, Raymond E. (U Minnesota, Minneapolis) **Effects of order presentation and length of viewing time on size estimation.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 511-517.—Describes an experiment, based on the interpretation by R. W. Gardner et al, of the leveling-sharpening dimension, which manipulated the order of presentation and length of viewing time on a size-estimation task presented to 48 undergraduate Ss. Contrary to expectation, neither variable significantly affected performance, and 4 different subject-estimation patterns were isolated rather than the 2 patterns (leveling and sharpening) expected. Both magnitude and directional properties of the 4 estimation patterns are explained by a modified version of A. Parducci's range-frequency model.—*Journal abstract.*
245. Schindler, Robert M.; Well, Arnold D. & Pollatsek, Alexander. (U Massachusetts, Amherst) **Effects of segmentation and expectancy on matching time for words and nonwords.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 107-111.—Previous studies indicate that Ss can perceive words more rapidly than nonwords. It may be, however, that this word superiority effect (WSE) is considerably reduced when Ss are not expecting wordlike stimuli, as reported by D. Aderman and E. E. Smith (1971). The present study used segmentation (the insertion of spaces after the 2nd and 4th letters of 6-letter strings) to assess the effect of a configurational change on matching times for words and nonwords under different expectancy conditions. Ss were 94 undergraduates. When Ss expected both words and nonwords, segmentation lengthened the matching latencies equally for words and nonwords. However, when instructions led Ss to expect only nonwords, the segmentation manipulation resulted in a reduced WSE. Data suggest that although segmentation lengthens matching time, it affects the WSE through its influence on expectancies rather than by more direct perceptual influence. Results are discussed in terms of K. T. Spoehr and E. E. Smith's 1973 model of word perception.—*Journal abstract.*
246. Seaman, Anna C. (Texas A&M U) **Responses of lower- and middle-class 5-yr.-old children to achromatic and chromatic color and form stimuli.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1257-1258.—Reports that form and color sorting by 80 5-yr-olds was unaffected by sex or race, but middle-class children showed a significant preference for form and lower-class children for color, regardless of whether stimuli were chromatic or achromatic.
247. Sherman, Julia A. (Women's Research Inst of Wisconsin, Wisconsin Psychiatric Inst, Madison) **Field articulation, sex, spatial visualization, dependency, practice, laterality of the brain and birth order.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1223-1235.—Among 25 female and 25 male undergraduates, 3 measures of field articulation (rod-and-frame test—RFT, Group Embedded Figures Test, and the Draw-A-Person Test) were correlated with a measure of spatial visualization (Space Relations subtest of the Differential Aptitude Test), but not consistently with each other or with a measure of dependency (the Succorance scale of the Edwards Personal Preference Schedule). Practice significantly affected RFT performance for both sexes, but no sex differences were found on the other field articulation and dependency measures. Males had significantly higher mean spatial visualization scores and were more confident than females on RFT performance although they were no more accurate. Among Ss who were the oldest of their siblings, females were less field articulated, and males were more. Males had more RFT errors when the frame top was tilted to the left of S, but females had more errors when it was tilted to the right, a finding which is consistent with the hypothesis that, for females, control of spatial function is located in the left hemisphere of the brain more frequently than it is in males. (38 ref)—*Journal abstract.*
248. Somers, William W. & Fry, Glenn A. (Ohio State U., Coll. of Optometry) **Relation of macular pigment and photoreceptor distribution to the perception of a brightness difference.** *American Journal of Optometry & Physiological Optics*, 1974(Apr), Vol. 51(4), 241-251.—Studied the effects of using the criterion of minimum border and brightness equality in making matches between white and monochromatic half-disks. 4 males with normal acuity and color vision served as Ss. As long as the S fixated a point at the center of the bipartite pattern and the effects of blur and overlap or separation were reduced to a minimum, the 2 criteria yielded essentially the same results. Differences in matching could be found when bipartite fields of different size were used. These appear to be attributable to macular pigment and the distribution of photoreceptors.—*Journal abstract.*
249. Stabell, Ulf & Stabell, Bjorn. (U Oslo, Psychological Inst, Norway) **Scotopic contrast hues displaced toward blue.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 146-148.—Prestimulation with a neutral white light in a dark-adapted state produced a disposition in 2 human Ss for a scotopic hue of violet of about 463 nm. The observation may be explained on the basis of H. Helmholtz's 1896 theory of complementary negative afterimages, providing that certain qualifying assumptions are made. (15 ref)
250. Thomas, James P. & Shimamura, Keiko K. (U California, Los Angeles) **Perception of size at the detection threshold: Its accuracy and possible mechanisms.** *Vision Research*, 1974(Jul), Vol 14(7), 535-543.—Conducted 3 experiments in which 5 experienced Os judged the sizes of foveal stimuli, 10-50 min of arc diameter, presented at luminances bracketing the detection threshold. Each stimulus was perceived as having a definite size which covaried with physical size. If the diameters of 2 stimuli differed by more than a factor of 2, the Os discriminated the 2 stimuli from each other better than they discriminated either from random fluctuations in the background. 3 possible models of

such size perception were evaluated using uniformly illuminated disks, clusters of small dots, and annuli as stimuli. Results support the multiple, size-tuned channel model. (French, German, & Russian summaries) —*Journal abstract.*

251. **Thorn, Frank & Boynton, Robert M.** (Pacific U, Coll of Optometry) **Human binocular summation at absolute threshold.** *Vision Research*, 1974(Jul), Vol 14(7), 445-458.—Demonstrates that the neural inputs of 2 stimuli presented simultaneously to corresponding retinal areas summate physiologically to lower the binocular absolute threshold. A model allowing one to calculate the minimum amount of physiological summation or inhibition that occurs under different conditions is presented. (French, German, & Russian summaries) (67 ref)

252. **Tomie, Arthur & Thomas, David R.** (U Colorado) **Adaptation level as a factor in human wavelength generalization.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 29-36.—According to an adaptation level interpretation, central tendency effects in stimulus generalization should occur within but not across conceptual categories. This interpretation was examined in 2 experiments with a total of 120 female undergraduates. In Exp I, 2 groups of Ss viewed a 505-nm (green) light and were tested for generalization with only shorter (bluer) or only longer (greener) wavelengths. Only the latter groups showed a central tendency shift. Additional groups indicated that a test series that is nominally symmetrical at about 505 nm may be functionally asymmetrical, yielding a central tendency shift toward longer (greener) values. In Exp II, 2 groups of Ss viewed a 495-nm light and were tested with values of 465-505 nm in 5-nm steps. For 1 group, for which E labeled the training stimulus *blue*, a central tendency shift toward shorter wavelengths was observed. The 2nd group, given a *green* label, showed no such shift. —*Journal abstract.*

253. **Tyler, C. William.** (U. Bristol, England) **Induced stereomovement.** *Vision Research*, 1974(Aug), Vol 14(8), 609-613.—Investigated temporal limitations of 3-dimensional shape constancy in 2 Ss by measurement of the perception of movement in an oscillating random-dot stereogram. The departure from shape constancy produced by this stimulus induced apparent movement in the stereoscopic figure. This induced stereomovement was best perceived at low oscillation frequencies. Perception of induced stereomovement differed from perception of monocular movement or previously observed types of stereomovement. (French, German, & Russian summaries) —*Journal abstract.*

254. **Umiltà, C., et al.** (U Bologna, Inst of Psychology, Italy) **Hemispheric differences in the discrimination of line orientation.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 165-174.—Reports results of 3 experiments with a total of 42 normal right-handed male college students. Ss who were trained to discriminate between rectangles oriented with their major axis along the vertical, the horizontal, and the 2 intermediate directions, and presented to the right or left side of a fixation point, exhibited faster discriminative reactions (pressing of a key) to stimuli appearing in the right visual field. In contrast, 2 other groups of Ss performing a similar reaction-time task with

stimuli oriented along other directions (30 and 45° from the vertical to the right and the left; 15, 30, 45, and 60° from the vertical) were faster in discriminating stimuli presented in the left visual field. These differences in performance for the 2 halves of the visual field are attributed to hemispheric differences in the discrimination of line orientation. The opposite hemispheric superiorities found with the different discriminations are attributed to the use of verbal mediators in the discrimination preferred by the left hemisphere, and by the use of a nonverbal strategy in the discriminations preferred by the right hemisphere. (French & German summaries) (30 ref) —*Journal abstract.*

255. **von Hofsten, Claes.** (U Uppsala, Sweden) **Proximal velocity change as a determinant of space perception.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 488-494.—Investigated how and to what degree proximal velocity change determines perceived translatory motion in depth. 2 experiments with a total of 33 Ss used a stimulus consisting of a single dot, moving in a straight horizontal path in a frontoparallel plane. Its motion corresponded to distal depth motion with constant speed. Ss reported verbally what they perceived. Results show that proximal velocity changes of this kind were utilized by the visual system for the perception of the translatory motion in depth. The limits were determined by the absolute rate of change in proximal velocity. Further, it was found that the perceived motion track was usually bent, although all stimuli simulated depth motions along straight paths. —*Journal abstract.*

256. **Vurpillot, Eliane & Taranne, Pierre.** (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **Judging the identity or nonidentity of drawings, and oculomotor exploration in children 5-7 yrs old.** (Fren) *Année Psychologique*, 1974, Vol 74(1), 79-100.—Recorded in scanpaths children's oculomotor activity in judging the similarity of 2 drawings of houses. When the houses were identical, groups of Ss did not differ and 2/3 of the eye movements were horizontal. When houses differed, the proportion of horizontal movements was significantly lower in the 2nd group. Visual scanning and rules of judgment seem to be related; however, no strategy of paired comparisons (eye movements relating corresponding windows on both houses) appeared in either group. The interaction of several factors is discussed: dominance of the horizontal axis, direction of comparison, arrangement of windows along orthogonal axes, distribution of identical contents between homologous and nonhomologous windows, and rules of judgment.—*G. Rubin-Rabson.*

257. **Wallace, Benjamin & Anstadt, Scott P.** (Western Illinois U) **Target location aftereffects for various age groups.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 175-177.—Reports a study in which no significant difference was found in visual adaptation of prismatic viewing as a function of Ss' age (6-, 11-, and 18 yrs). However, magnitude of adaptation for peripherally located targets during prism exposure was significantly greater compared to more centrally located targets.

258. **Whittle, Paul & Swanston, M. T.** (Psychological Lab, Cambridge, England) **Luminance discrimination of separated flashes: The effect of background luminance and the shapes of T.V.I. curves.** *Vision Research*,



1974(Aug), Vol 14(8), 713-723.—Measured luminance difference thresholds between 2 simultaneous spatially separated monocular 40-msec flashes presented to 2 Ss both in the dark and on a bright background. Weber's Law held approximately from detection threshold to the highest luminances used. The difference threshold was almost unaffected (in fact, slightly lowered) by the background, showing that Weber's Law applied to the incremental luminance, not to the total luminance of flash plus background. It is argued that the shapes of threshold vs intensity curves for detection of a stimulus transient and for discrimination between 2 transients are systematically different. (French, German, & Russian summaries) (19 ref)—*Journal abstract*.

259. Willemssen, Eleanor W. (U Santa Clara) **Judgment of the vertical as a function of stimulus characteristics, age, and sex.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1344.—Presented 5 stimulus displays, which varied in the degree to which straight-line characteristics were present and inconsistent with the correct representation of the vertical, to 24 1st and 24 3rd graders. Most Ss were able to represent the vertical accurately; there were no significant effects due to sex, age, or stimulus characteristics.

260. Woo, G. C. (U Waterloo, School of Optometry, Ontario, Canada) **Temporal tolerance of the foveal size of Panum's area.** *Vision Research*, 1974(Aug), Vol 14(8), 633-636.—Determined that the critical delay time between 2 stimuli of 10-msec exposure time without affecting the size of Panum's area was between 30 and 40 msec for 1 S. It is suggested that the reduction in size beyond the critical delay time may be due to the detection of a misalignment of the test targets based on temporal factors, and that it may indicate a temporal, as well as spatial, tolerance. (French, German, & Russian summaries)

261. Young, Rockefeller S.; Cole, Robert E. & Diamond, A. Leonard. (U Hawaii) **Effects of steady inducer and test duration on threshold.** *Journal of the Optical Society of America*, 1974(Aug), Vol 64(8), 1145-1147.—Determined the threshold energy of 3 experienced adults for a test flash in the presence of an adjacent steady inducer. The effects of different test durations on the inducer's ability to raise threshold was investigated. Changes of test duration from 12.5 to 1,000 msec accounted for a 60% increase of inducer effectiveness at the closest test-inducer separation (8.6'). Increases of separation to 190' produced decrements of this test-duration effect. Results are discussed in terms of test duration as a variable of perceived contrast and possible underlying mechanisms. (21 ref)—*Journal abstract*.

### Motor Processes & Performance

262. Appelle, Stuart & Oswald, Lawrence E. (State University Coll New York, Brockport) **Simple reaction time as a function of alertness and prior mental activity.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1263-1268.—Measured simple reaction time to light onset before and after 20-min periods of differing mental activity. The Ss, who were 30 undergraduates (15 of whom were experienced in transcendental meditation), either "rested" during this period, sorted 9-digit printed

figures into numerical order, or practiced a previously learned meditation technique. Mean reaction times were significantly different following the rest condition and sorting task, but meditators showed no change in reaction time after meditation. However, their scores were significantly faster than those of the other groups, and within-S variance decreased significantly after meditation. Results are discussed in terms of the relationship between reaction time and alertness. (17 ref)—*Journal abstract*.

263. Ariel, Gideon. (U Massachusetts, School of Physical Education, Amherst) **Method for biomechanical analysis of human performance.** *Research Quarterly*, 1974(Mar), Vol 45(1), 72-79.—Describes a quantitative method of analyzing human motion through the use of slow-motion cinematography, special tracing equipment to convert the data, and a high-speed computer. Programing results in a segmental breakdown of information about the whole motion including total body center of gravity, segment velocities and accelerations, horizontal, vertical, and resultant forces, moments of force, and the timing between body segments.

264. Babkoff, Harvey; Bergman, Yehuda & Brandeis, Rachel. (Bar-Ilan U, Ramat-Gan, Israel) **Response probability and response latency to threshold electrocutaneous stimuli.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 417-424.—Conducted 2 experiments to compare 2 measures of somatosensory sensitivity, response probability and reaction time (RT) to electrocutaneous constant current pulses of 350-microsec duration. The psychometric functions were steeper than those obtained for other sensory modalities. Similarly, the RT-intensity functions were also steeper than those obtained in other modalities (i.e., larger decreases in RT as a function of small increases in stimulus intensity). 6 Ss exposed to a broad stimulus range, including high intensities, yielded psychometric and RT functions displaced into a higher intensity region than when they were exposed to a narrow low-intensity range of stimuli. Data are discussed in terms of a decision-theory model of RT. (32 ref)—*Journal abstract*.

265. Berent, Stanley. (U Virginia, Medical Ctr, Perceptual Studies Lab) **Field-dependence and performance on a writing task.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 651-658.—Obtained timed writing samples from 50 female psychiatric inpatients. Patients were assigned, on the basis of their scores on the rod-and-frame test, to extreme field-dependent and field-independent groups. Field-dependent Ss took significantly longer than field-independent Ss to complete the writing task, the field-dependent writing was judged by 3 independent writers to be less legible, less well oriented on the page, less neat, and generally poorer in overall quality than the field-independent writing. Findings are discussed in terms of possible dominant (left) cerebral hemisphere involvement in field-dependence.—*Journal abstract*.

266. Foster, Larry E. & Ellis, Michael J. (Howard U) **Strategies of children during performance of a self-paced activity.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1211-1217.—Studied whether children, when performing self-paced work, would stop to rest rather than slow the work rate, as has been demonstrated in

adults. 6 9-10 yr old boys were tested individually for 4 testing periods during a self-paced bicycle ergometer ride. 8 characteristics of self-paced activity were computed and analyzed for each testing period to determine the stability of their strategies for accomplishing a fixed quality of work. Results show that the total ride time and rate were held relatively constant with an increase or decrease in the number of stops and/or the total stopping time.—*Journal abstract.*

267. Gutin, Bernard; Fogle, R. Keith; Meyer, James & Jaeger, Margaret. (Teachers Coll, Columbia U) **Steadiness as a function of prior exercise.** *Journal of Motor Behavior*, 1974(Jun), Vol 6(2), 69-76.—Studied the effect of exercise on arm and hand steadiness in 2 experiments with male college students. Steadiness was markedly affected by preliminary exercise which raised the activation level, with unsteadiness being greatest at the highest levels of activation.

268. Hines, Dwight; Martindale, Colin & Schulze, Sharon. (U Maine) **Lateral body sensitivity and lateral eye-movements.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1293-1294.—Data from 22 male undergraduates show that lateral eye movements elicited by reflective questions were correlated with a paper-and-pencil measure of lateral body sensitivity and that induced heightened awareness of one side of the body was associated with more eye movements toward that side.

269. Howard, Ian P. & Anstis, Tania. (York U, Toronto, Ontario, Canada) **Muscular and joint-receptor components in postural persistence.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 167-170.—Notes that if a blindfolded person maintains a limb in an asymmetrical posture for some time, he typically misplaces it in the direction of previous asymmetry when he attempts to restore it to a symmetrical position. This effect has been called "postural persistence," and may be due to adaptation in joint receptors or to muscular factors such as those involved in postcontraction. Previous attempts to resolve this issue are considered to be inadequate. In the present study with 12 undergraduates, the aftereffects of holding the head to 1 side were compared with the aftereffects of holding it straight while straining against a torque. Aftereffects in the felt position of the head were evident in only the former condition and were reduced when the head was in the opposite direction to that in which it was adapted. It is concluded that postural persistence is a function of adaptation in joint receptors, at least for moderate loads.—*Journal abstract.*

270. Kantowitz, Barry H. & Knight, James L. (Purdue U.) **Testing tapping time-sharing.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 331-336.—Combined a Fitts's law tapping-task with a serial digit-naming task having 4 levels of stimulus-response complexity in a study with 14 undergraduates. Baseline data were also established for tapping and naming tasks performed singly. In simultaneous-task performance, an increase from 3.9 to 10 bits/sec required by the tapping task was accompanied by a decrease in performance on the naming task. When single- and simultaneous-task performance were both analyzed, an interaction between tapping and naming was obtained, supporting a limited-

capacity channel. However, when only simultaneous-task performance was evaluated, effects of tapping and naming were additive, supporting a stage model of information processing. Results stress the processing demands of a response execution and control stage. (19 ref)—*Journal abstract.*

271. Monty, Richard A. **An interdisciplinary directory of scientists engaged in the study of eye movements.** *US Army Human Engineering Laboratory Report*, 1974(May), 13 p.—Includes names, addresses, phone numbers, educational background, and interests of approximately 100 scientists involved or interested in the study of eye movements and related processes. Entries were made on a voluntary basis, and a form is enclosed for those who wish to be included in subsequent editions.

272. Newell, K. M. & Wade, M. G. (U Illinois, Children's Research Ctr, Motor Performance & Play Research Lab) **Stabilometer trial length as a function of performance.** *Research Quarterly*, 1974(Mar), Vol 45(1), 16-20.—Reduced the response strategies available for stabilometer performance by modifying the trial length to a direct function of S's (each of 24 undergraduates) time in balance. Trials consisted of the amount of time that S could maintain the board in a state of balance; 60 trials were performed by each S. Results show that all Ss improved their performance up to about the 45th trial and there were no significant sex differences in performance. It is concluded that the stabilometer, with trial length as a function of performance, has useful applications to the study of gross motor learning.—*L. Gorsey.*

273. Paulus, Paul B. & Cornelius, William L. (U Texas, Arlington) **An analysis of gymnastic performance under conditions of practice and spectator observation.** *Research Quarterly*, 1974(Mar), Vol 45(1), 56-63.—After initially practicing a gymnastic routine in the presence of 17 coactors and casual spectators, 45 students in a gymnastic class were asked to perform the routine either alone or in the presence of 17 spectators from another class. One group of Ss who performed in front of spectators was given a prior warning of the impending spectator observation, while another group was given no warning. Although Ss in all 3 conditions tended to perform more poorly during the 2nd session, in the 2 spectator conditions the more highly skilled Ss showed greater decrements in performance than the relatively less skilled Ss. This effect was greater in the warning condition than in the no-warning condition. (16 ref)—*Journal abstract.*

274. Rummel, Rose M. (Madison Coll) **Electromyographic analysis of patterns used to reproduce muscular tension.** *Research Quarterly*, 1974(Mar), Vol 45(1), 64-71.—Determined whether individuals who are more accurate in muscular force reproduction have certain electromyographic pattern characteristics which would distinguish them from individuals who are less accurate reproducers. Ss were 90 17-34 yr old males. Pattern characteristics measured included rate of muscle action potential production, variability in rate of muscle action potential production, and amount of intertrial muscle action potential activity. Results show that (a) more accurate individuals produce a significantly lower rate of muscle action potential production; (b) more accurate



individuals are significantly more variable in rate of muscle action potential production; (c) the degree of relaxation between trials is not related to success in reproducing the standard task; and (d) as accuracy increases, muscle action potential characteristics of rate and variability in rate of production follow different trends.—*Journal abstract.*

275. Walters, Clarence P. & Walk, Richard D. (George Mason U) **Visual placing by human infants.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 34-40.—Prior research has not agreed that extension of the arms by the human infant on approach to a surface is a visual response. In this research, 15 8-11 mo old infants extended their arms on approach to a patterned surface covered with glass. The arms did not extend to a patterned surface 14 in below the glass. Thus, the response was a visual, not a vestibular, proprioceptive one. Ambiguity of the visual stimulus that elicits the response is shown by the finding that the infants also extended their arms almost as much to a gray surface just beneath the glass as they did to the patterned one. (25 ref)—*Journal abstract.*

276. Weiten, Wayne & Etaugh, Claire. (Lincoln Land Community Coll) **Lateral eye-movement as a function of cognitive mode, question sequence, and sex of subject.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 439-444.—Verbal and numerical questions elicited significantly more lateral eye-movements to the right than did spatial and musical questions for 48 college students. These results are consistent with the hypothesis that lateral eye-movement is related to the functional organization of the cerebral hemispheres. Contrary to expectations, asking the questions in homogeneous sets as opposed to a mixed list did not produce more eye-movements in the predicted direction for each cognitive mode. Males tended to make more right-movements than females on all 4 types of questions. (15 ref)—*Journal abstract.*

277. Zenhausern, Robert; Pompo, Claude & Cialola, Michael. (St John's U, Jamaica, NY) **Simple and complex reaction time as a function of subliminal and supraliminal accessory stimulation.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 417-418.—Tested simple and complex reaction time to visual stimuli of 24 Ss under 7 levels of accessory stimulation (white noise). Only the highest level of stimulation (70 db above threshold) lowered reaction time. The other levels had no effect.—*Journal abstract.*

## COGNITIVE PROCESSES AND MOTIVATION

278. Anderson, Eugene D. (East Tennessee State U) **The differential use of suggestions with children: A comparative analysis.** *Journal of the American Institute of Hypnosis*, 1973(Jul), Vol 14(4), 169-171, 182.—Investigated the differential affects of positive suggestions (e.g., "do stay in the yard") and counternegative suggestions which stimulate the receiver to react in an inappropriate manner (e.g., "don't leave the yard"), with 27 2nd graders as Ss. All Ss closed their eyes and heard 4 nonaction-oriented suggestions (e.g., "think of an elephant") and 6 action-oriented suggestions (e.g., "spill the

milk"). Each suggestion was prefaced by the word "don't" for experimental Ss and by the word "do" for controls. Ss then drew the visual image evoked by the nonaction-oriented suggestions and pointed to pictures representing the behavior in the action-oriented suggestions. Results reveal that in 5 of the 10 suggestions Ss reflected the key concept or behavior regardless of whether the suggestion was preceded by "do" or "don't," partially supporting the hypothesis that the counternegative suggestion of "don't" may have the same effect as "do" to a child. Implications for hypnotic research and child therapy are briefly discussed.—*A. Olson.*

279. Fitch, Stanley K. (El Camino Coll) **Insights into human behavior.** (2nd ed). Boston, MA: Holbrook, 1974. xvi, 528 p.—Stresses the importance of the unconscious in human behavior and the correlation between the behavior of lower animals and that of man. Discussions on perception, alternate marriage styles, the family of the future, and deviant behavior have been added to the material in the 1st edition.

280. Glass, Arnold L.; Holyoak, Keith J. & O'Dell, Carla. (Stanford U) **Production frequency and the verification of quantified statements.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 237-254.—In Exp I 50 undergraduates were required to generate nouns and adjectives which formed true completions of sentences of the form (Quantifier) S are . . . . The quantifiers used were *All, Many, Some, Few,* and *No*. 3 further experiments with an additional 50 Ss examined the effect of production frequency of the predicate on verification reaction time (RT) for quantified statements. True sentences lower-class category (Exp II) or property (Exp III and IV) predicates were verified more quickly than those with low-frequency predicates when the quantifier was *All, Many, Some,* or *Few*; this difference reversed for *No*-statements. False RT Corps fastest in all cases when the false sentence was semantically anomalous; but in Exp IV, when degree of relatedness of subject and predicate words was varied within false but meaningful sentences, statements with high-related predicates were rejected more quickly. In general, the effect of semantic relatedness reversed for negative (*Few* and *No*) as opposed to positive quantifiers. An ordered attribute-search model is proposed to account for Ss' performance during both predicate production and sentence verification. (22 ref)—*Journal abstract.*

281. Hintzman, Douglas L. (U Oregon) **Theoretical implications of the spacing effect.** In R. L. Solso (Ed). *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Discusses various theories of the spacing effect (i.e., the spacing of learning trials or repetitions facilitates performance), including consolidation, rehearsal, voluntary attention, habituation, and encoding variability hypotheses. The habituation hypothesis appears to be most promising and is in need of further study, although modifications of the other theories also should be investigated. (50 ref)

282. Kinsbourne, Marcel. (Duke U) **Direction of gaze and distribution of cerebral thought processes.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 279-281.—A review of the literature indicates that during verbal thought Ss look

to the right, and during spatial thought they look up and to the left. This effect is weakened or abolished if Ss are asked to hold central fixation, if they are confronted by an E or by the sound of his voice, or if they are set to respond other than straight ahead. If precautions are taken in these respects, the phenomenon is a useful index of cerebral lateralization of cognitive function. (French & German summaries) (33 ref)—*Journal abstract*.

283. **Leuner, Hanscarl**. (U Gottingen, Psychiatric Clinic, W Germany) [**Creativity and "modification of the consciousness."**] (Germ) *Confinia Psychiatrica*, 1973, Vol 16(3-4), 141-158.—Proposes that methods which modify the state of consciousness (e.g., hypnagogic, meditative, or psychotoxic methods) in order to encourage creativity have shown promise. In certain phases of the creative process, stimulation through artificial alteration of consciousness is possible. Broad systematic research is considered essential to confirm and clarify the data. It is suggested that the creative process in the plastic arts occupies a special place. The phenomena of regression, which make it possible to draw upon the vast reservoir of the unconscious, precede very closely the work of artistic-stylistic and epicritic elaboration which characterizes the communication phase of the creative act. States of altered consciousness, therefore, can do no more than facilitate the gathering of new material.—*Journal abstract*.

284. **Masters, Robert**. (Foundation for Mind Research, Pomona, NY) **Consciousness and extra-ordinary phenomena**. *Journal of Altered States of Consciousness*, 1974(Spr), Vol 1(2), 153-167.—Describes 2 cases in which extra-ordinary phenomena appear to have been elicited within the context of altered states of consciousness (trance) in a laboratory setting. In the 1st case, the S was given prolonged and elaborate training as a trance S, including experiencing of trances of several days' duration. The S then was able to repeatedly demonstrate telepathic functioning, as have a few other Ss who were participants in a similar training program. In the 2nd case the S, over a period of more than 6 mo, experienced herself as receiving training in "magic" from an Egyptian deity, the goddess Sekhmet. Her experiences related in terms of the possible activation of an archetype, and it is suggested that those experiences are analogous to ones described by such historical visionary mystics as Swedenborg and Ibn 'Arabi.—*Journal abstract*.

285. **Metzler, Jacqueline & Shepard, Roger N.** (Harvard U) **Transformational studies of the internal representation of three-dimensional objects**. In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Presents a report of 2 experiments, a review of the literature, and a discussion of the theoretical implications of the theory of mental rotation. Data from graduate students who determined whether 2 perspective drawings had the same 3-dimensional shape indicate that the time required to complete the mental rotation process (a) increases linearly with the angle of rotation, (b) is bimodally distributed for angles over 180°, and (c) can be completed in advance of the presentation of the 2nd stimulus, assuming that S already knows the axis and direction of the required rotation. (65 ref)

286. **Nosal, Czeslaw S.** (Technical U, Wroclaw, Poland) **Dynamics of problem solving and cognitive abilities**. *Polish Psychological Bulletin*, 1974, Vol. 5(1), 11-15.—Attempted to demonstrate the interdependence of problem-solving dynamics and cognitive abilities. 70 18-28 yr old Ss were administered tasks assessing the cognitive dimensions of flexibility of perceptual set, speed of coding, and formation of classes, and measuring perceptual, symbolic, and semantic problem-solving abilities. Results show that (a) the perceptual problem-solving rate depended on efficiency in information manipulation (i.e., speed of coding) and information reduction, suggesting that the reduction of information caused the manipulation efficiency to decrease, and that there was a critical rate at which reduction was feasible; (b) only efficiency in information reduction (i.e., formation of classes) was significantly correlated with the rate of symbolic problem solving; and (c) semantic problem solving required a greater flexibility of set rather than a speed of information manipulation.—*L. Gorsev*.

287. **Nystedt, Lars**. (U Stockholm, Psychological Lab, Sweden) **Consensus among judges as a function of amount of information**. *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 91-101.—Attempted to determine whether the amount and kind of information available affect the consensus among judges. 2 experiments were performed, where the consensus was analyzed by the lens model equation, which has been related to the noncriterion situation by Naylor and Schenck (1966). The amount of information available (2, 4, and 6 tests) affected the consensus, but the type of information available (access to the validities of the tests and their intercorrelations) did not have a significant effect. Results imply that consensus among pairs of judges decreases when the number of tests increases. However, in one experiment the difference between 4 and 6 tests was not significant. The change in consensus as the number of tests increased was mainly a function of a decreased matching between a pair of judges with respect to the linear aspects of their judgment processes. Further analysis of the linear aspects of the judges' judgment processes indicated that policy similarity contributed more to consensus than policy consistency. The contribution of the nonlinear aspects of the judgment process to consensus was negligible.—*Journal abstract*.

288. **Richard, Jean F.** (U Paris VIII, Lab of Psychology, France) [**Mediation phenomena and mediational interpretations: I. Problems under discussion**]. (Fren) *Année Psychologique*, 1974, Vol 74(1), 239-268.—Offers 2 interpretations of the term "mediation": (a) a class of phenomena characterized by experimental designs in which an element, stimulus, or response has an intermediary position and can be considered responsible for the transfer of a reaction from 1 stimulus to another; and (b) a certain type of interpretation of these phenomena. Mediation in the learning process assumes 2 relationships: one between the stimulus and the mediator, one between the mediator and the response. A number of problems currently under discussion are reviewed. These include questions as to the conditions favorable to the appearance of mediation phenomena, the factors influencing the phenomena, at what phases of



learning and experiment does the mediation effect intervene, the influence of associative relationships and semantic similarity on mediation, and the role of the mediating response in the equivalence schema. (96 ref)—G. Rubin-Rabson.

289. Savin, Harris B. (U Pennsylvania) **Meanings and concepts: A review of Jerold J. Katz's semantic theory.** *Cognition*, 1973, Vol 2(2), 213-238.—Examines the relationship between the semantics of J. J. Katz and cognitive psychology. The area of semantic concern, semantic theory, selection restrictions and syncategorematicity, semantic theory and language usage, meaning and reference, psychological verbs and the reification of meaning, and meaning and concepts are discussed. While the incompleteness of Katz's theory is acknowledged, it is suggested that it constitutes the only systematic attempt to order the large variety of concepts confronting the cognitive psychologist. (15 ref)—S. Knapp.

290. Slak, Stefan & Hirsch, Kenneth A. (U. Toledo) **Human ability to randomize sequences as a function of information per item.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 29-30.—Asked 16 randomly selected undergraduates to produce a random sequence of binary and ternary numbers in a counterbalanced within-S design. For each S and each condition, relative redundancy up to the 5th order was determined. Relative redundancy increased as a function of order of redundancy estimate significantly faster in the ternary-digit condition. It is concluded that it is more difficult to randomize items containing greater amounts of information.—*Journal abstract.*

291. Solso, Robert L. (Ed.). (Loyola U, Chicago) **Theories in cognitive psychology: The Loyola Symposium.** Potomac, MD: Lawrence Erlbaum, 1974. xi, 386 p. \$14.95.

292. Stachowski, Ryszard. (Mickiewicz U, Inst of Psychology, Poznań, Poland) **Effect of predecisional information integration strategy on cognitive conservatism.** *Polish Psychological Bulletin*, 1974, Vol 5(1), 17-23.—Tested the hypothesis that cognitive conservatism results from S's consistent modification of the prior subjective probability of a hypothesis by the same increment of subjective probability, regardless of the value of received information (i.e., the strategy of additive probabilities). 10 undergraduates participated in a probability estimation task which contained 5 levels of information value and 3 levels of prior probability of the hypothesis. Results show that 7 of the 10 Ss used the additive (equal increments) strategy. A quantitative analysis of the responses of the other 3 Ss revealed that only the responses of 1 S could be psychologically substantiated. A comparison of the theoretical and subjective probabilities yielded data to confirm the hypothesis.—*Journal abstract.*

293. Taub, John M. & Berger, Ralph J. (U California, Ctr for Health Services, Neuropsychiatric Inst, Los Angeles) **Acute shifts in the sleep-wakefulness cycle: Effects on performance and mood.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 164-173.—Studied the behavioral and psychological effects of shifting the time when 10 habitual 12-8 AM sleepers (male college students) took their usual 7-8 hrs of sleep. A 5-min E-

paced calculation task, a 30-min auditory vigilance task, and an adjective checklist (ACL) were administered following each of 5 electrophysiologically monitored nights of sleep: a 12-8 AM habitual sleep condition, and 8 PM-4 AM, 10 PM-6 AM, 2-10 AM, and 4 AM-12 PM conditions of shifted sleep. After the conditions of shifted sleep, performance on the vigilance and calculation tasks was significantly impaired, and there was significantly greater negative affect as measured by scores on the ACL scales of Activity, Anxiety, Fatigue, and Friendliness. Total hours spent asleep did not significantly differ between the habitual and shifted sleep conditions and averaged above 7 hrs. There were no consistent patterns of correlation between parameters of sleep physiology and the performance and mood variables. Results indicate that altering the time in the circadian rhythm of habitual sleep is detrimental to performance on perceptual and cognitive tasks and mood. (32 ref)—*Journal abstract.*

294. Warren, Robert E. (Columbia U.) **Norms of restricted color association.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 37-38.—Notes that increasing use of the Stroop Color-Word Test to assess the activation of words in memory requires a pool of words whose color associations are known. To provide such a pool, 100 graduate and undergraduate psychology students were asked to indicate which of 4 common colors (red, blue, yellow, or green) was most closely associated with each of 72 words. Normative response tables of the obtained associations are provided.—*Journal abstract.*

295. White, John. (Inst of Noetic Sciences, Palo Alto, CA) **Considerations for a science of consciousness.** *Journal of Altered States of Consciousness*, 1974(Spring), Vol 1(2), 169-173.—Discusses the importance of constructing a metamodel of consciousness from the various existing models. The problems of terminology and of defining major states of consciousness are considered, and a bibliography representing current theories is presented.

296. Zaleska, Maryla. (National Ctr for Scientific Research, Lab of Social Psychology, U Paris VII, France) **[Influence of the method of presenting chance series on the choice of strategy: I. Hypothetical situations.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 125-144.—Conducted 3 experiments to examine beliefs concerning the best mode of response when predicting random events, and describes the strategy useful in several hypothetical situations, each a variation of the same basic problem: What strategy maximizes the number of X elements drawn with replacement from 2 sets A and B, knowing that A contains  $\frac{1}{2}$  of X elements and  $\frac{1}{2}$  of Y elements while B contains  $\frac{1}{2}$  of X and  $\frac{1}{2}$  of Y? The "rational" strategy, the safest, consists in drawing systematically from set A, since it always contains more X elements. The choice of this strategy depends on several factors, among others, on the extent to which the situation is artificial and unfamiliar. The main obstacle to its use seems to be the difficulty of comprehending the independence of random events. Most people did not consider that the best strategy was to systematically predict the same event, knowing that  $\frac{1}{2}$  of their predictions would be incorrect. Rational strategy seemed

justifiable in choice situations where lack of accuracy appeared more acceptable.—*G. Rubin-Rabson.*

### Learning & Thinking & Conditioning

297. Alevizos, Peter N.; Malloy, Thomas E. & Proctor, Stewart. (Camarillo-UCLA Neuropsychiatric Inst. Research Program, Camarillo, Calif.) **Feedback variables in strategy acquisition: Some implications for behavior therapy.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 514-522.—Using a laboratory analog situation, an experiment was conducted which required 60 undergraduates to (a) identify positive instances of a concept, (b) respond to positive instances in a strategic rather than stereotyped manner, and (c) relate their strategic responses to a conceptual parameter of the identified concept. Independent variables were the locus (pattern) of feedback for correct and/or incorrect responding, and whether the feedback given was of neutral or aversive intensity. The major dependent variable was the number of trials to strategy acquisition. Results show aversive and neutral levels of feedback yield different patterns of acquisition rate across locus of feedback conditions. It is urged that behavior therapists attend to the patient's strategic style of coping with conceptually interpreted events in the environment and that the informational properties of aversive events be carefully considered. (15 ref)—*Journal abstract.*

298. Alworth, Robert M. (Los Angeles Community Coll District, Office of Educational Research & Analysis, CA) **Audiovisual equivalence of stimuli in acquisition of associations at two reading levels.** *Perceptual & Motor Skills*, 1974(Jun), Vol. 38(3, Pt 2), 1271-1274.—Studied the difficulty experienced by retarded readers in acquiring associations between auditory and visual information. 41 above- and 42 below-average 1st- and 2nd-grade readers were presented paired-associate tasks involving (a) simultaneous and delayed stimulus presentation, (b) visual-visual and visual-auditory stimuli, and (c) stimuli in which within-stimulus element sequence was and was not relevant in determining the associated response. Inferior paired-associate learning was noted in below-average readers, delayed-presentation tasks, and sequence-relevant tasks. No significant interactions were noted.—*Journal abstract.*

299. Arbuckle, Tannis Y. (Sir George Williams U, Montreal, Quebec, Canada) **Cue-dependent forgetting in paired-associate learning.** *Journal of Experimental Psychology*, 1974(Jul), Vol. 103(1), 124-130.—Conducted 2 experiments with a total of 124 college students to compare concrete nouns and numbers as retrieval cues for paired associates across 3 recall tests. Ss were given instructions to form unbiased mnemonics, mnemonics biased toward the noun, mnemonics biased toward the number, or control instructions. Forgetting and recovery across tests were cue-dependent in that noun-to-number cue shifts yielded substantial forgetting while number-to-noun shifts yielded substantial recovery. Instructional biases modified appropriately the superiority of noun cues over numbers, although the effect was relatively weak. Factors determining the effectiveness of retrieval cues are discussed.—*Journal abstract.*

300. Bartram, D. J. (U. Hull, England) **The role of visual and semantic codes in object naming.** *Cognitive*

*Psychology*, 1974(Jul), Vol. 6(3), 325-356.—Conducted 3 experiments with a total of 66 undergraduates to investigate the effects of familiarity, practice, and stimulus variability on naming latencies for photographs of objects. Latencies for pictures of objects having the same name decreased most with practice when the same picture was always used to represent a given object (Condition Ps-Ns), less if different views of the same object were used (Condition Pv-Ns), and least if pictures of different objects having the same name were used (Condition Pd-Ns). In all cases, however, the effect of practice was significant. The savings in naming latency associated with practice on Conditions Ps-Ns and Pv-Ns showed almost no transfer to Condition Pd-Ns, even though the same responses were being given before and after transfer. However, practice on Condition Ps-Ns transferred completely to Condition Pv-Ns. Name frequency affected latency in all conditions. The frequency effect decreased slightly with practice. Results are related to several alternative models of the coding processes involved in naming objects. It is concluded that at least 3 types of representation may be necessary: visual codes, nonverbal semantic codes, and name codes. A distinction is made between visual codes that characterize 2-dimensional stimuli and those that characterize 3-dimensional objects. (28 ref)—*Journal abstract.*

301. Beck, Robert C. & Davis, John V. (Wake Forest U.) **Effects of real vs pretend shock on semantic differential judgments and the GSR in some classical conditioning paradigms.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 33-44.—Reports 2 experiments in which a total of 200 undergraduates were shown different color 1-sec lights, one just before the end of a 4-sec unconditioned stimulus (UCS) and the other 10 sec after UCS termination and 25 sec before the next UCS. For some groups the UCS was strong electric shock; for others it was a tone which Ss were instructed to imagine was a strong shock. The primary data were changes in semantic differential ratings of the lights before and after 12 "conditioning" trials. There were no differences among the groups. In a 3rd experiment with 72 male undergraduates, a 6-sec delay conditioned stimulus was used for galvanic skin response conditioning, some Ss receiving actual shock and others pretend shock. Only the former showed conditioning. Results are discussed in terms of a model of experimental demand.—*Journal abstract.*

302. Becker, Reinhold. (U Heidelberg, Psychiatric Clinic, W Germany) **[Magical residues in everyday life? A study on the theory of layers in thinking.]** (Germ) *Confinia Psychiatrica*, 1973, Vol. 16(3-4), 177-200.—Investigates the validity of genetical layer-theories. Starting with everyday language, different degrees of development can be defined which determine the descriptive vocabulary. The thinking-models tested are concluded to be largely prescientific.—*Journal abstract.*

303. Bourne, L. E. (U Colorado) **An inference model for conceptual rule learning.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Attempts to describe the cognitive events and processes which occur when human Ss solve rule-learning problems by characterizing S's behavior in



terms of a system of operations performed on information provided by both the problem context and by memory. The classification system for these operations is outlined in terms of perceptual, coding, and inferential processes. Data from 3 recent experiments and suggested lines of empirical study of the theory are presented. (20 ref)

304. Brown, Barbara B. (VA Hosp, Sepulveda, CA) **New mind, new body: Bio-feedback: New directions for the mind.** New York, NY: Harper & Row, 1974. xiii, 464 p. \$9.95.—Discusses research into the phenomenon by which man can learn to control his own biological and mental functioning. Among the studies included are those showing the skin's ability to reveal the mind's unconscious reactions to reality; the control of muscles, heartbeat, bloodpressure, and brainwaves; and the altering of states of consciousness. (30 p ref)

305. Bugelski, B. R. (State U. New York, Buffalo) **The image of mediator in one-trial paired-associate learning: III. Sequential functions in serial lists.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 298-303.—College seniors and 8th graders attempted to learn in 1 trial a serial list of 20 words under imagery and standard instructions. Each word was to be learned as a response to the prior word and a stimulus for the succeeding word. Imagery was greatly superior to nonimagery. 8th graders learned as well as college seniors. In both cases, errors and reports suggest that the images came first and labeling second. Incidental learners with an imagery rating orienting task learned better than verbal learning control Ss. The conception of images as parallel rather than sequential processes is not supported; images appear to operate in both modes. —*Journal abstract.*

306. Cartwright, Rosalind D. (U Illinois, Chicago Circle) **Problem solving: Waking and dreaming.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 451-455.—Investigated whether problem-solving ability is either quantitatively or qualitatively superior following an interval of sleep including dreaming than it is following an equal interval of waking time. 24 college students were tested on matched problems before and after these 2 conditions on 3 problem types: crossword puzzles, Remote Associates Test, and Thematic Apperception Test story completions. These were predicted to show the effects of dreaming in increasing order. Only the story endings changed more following sleep than following an awake period. The direction of the change following waking was toward more successful solutions, and after sleep toward more unsuccessful solutions from the point of view of meeting the heroes' needs. Several interpretations of these findings are considered.—*Journal abstract.*

307. Chapanis, Alphonse & Overbey, Charles M. (Johns Hopkins U) **Studies in interactive communication: III. Effects of similar and dissimilar communication channels and two interchange options on team problem solving.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 343-374.—16 teams of 2 college students each solved 4 credible "real world" problems for which computer systems have been or could be useful. Each of the 4 problems was solved on 4 successive days. A team member sent messages either by voice or by typewriter, and every team was tested with all 4 combinations of the

2 message channels assigned to individual team members. Communication by voice was much more rapid and wordy than communication by typewriter. Giving Ss the freedom to interrupt had no effect on the time required to solve problems, on the number of words used in the solution of problems, or on the rate at which words were communicated. When Ss had the freedom to interrupt, they "packaged" their words differently: they exchanged more messages, messages were shorter, and messages were exchanged with greater frequency per unit time. Practice effects were almost entirely absent. A number of significant differences were attributable to the problems and the jobs assigned to the 2 communicators.—*Journal abstract.*

308. Ciccone, Donald S. & Paul, Hadassah. (Rice U) **An analysis of recognition performance in verbal discrimination learning.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 180-182.—Attempted to generalize A. M. Buchwald's (see PA, Vol 43:11244) explanation of S's performance on a multiple-alternative task to include the 2-alternative verbal discrimination (VD) task. (14 reminder was found to facilitate performance on the VD task when compared to either a response reminder or an informationless test trial.

309. Clifton, Rachel K. (U Massachusetts, Amherst) **Heart rate conditioning in the newborn infant.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 9-21.—Assigned 21 infants to conditioning, random control, and backward conditioning groups. During training trials, the conditioning group received an 8-sec tone as a conditioned stimulus (CS), a 6-sec interstimulus interval, and a 10-sec presentation of glucose via nipple as an unconditioned stimulus (UCS) that overlapped the last 2 sec of tone. The random control group received tones at the same intertrial intervals as the conditioning group, but glucose varied randomly. The backward conditioning group received glucose during the 10 sec immediately preceding tone onset. The response to both CS and UCS during base trials was heart rate (HR) acceleration. The response to tone habituated in all groups, but the acceleration to glucose was maintained throughout conditioning. Although no conditioned response to the tone developed over trials, a large HR deceleration appeared during extinction to the absence of the UCS in the conditioning group only. This deceleration was interpreted as an orienting response to the absence of an expected event. (39 ref)—*Journal abstract.*

310. Davidson, Robert E.; Perry, Sherry A. & Baker, Phoebe K. (U Wisconsin) **Unfamiliar stimulus terms in children's paired-associate learning.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 580-583.—64 3rd-grade pupils learned 10 paired associates with nonsense words serving as stimuli and familiar nouns serving as responses (e.g., *latuk-boat*). 32 Ss looked at concretizing pictures of the paired items and heard sentences or labels only. Sentences without pictured stimuli impaired learning, while sentences with pictures facilitated learning significantly. It is suggested that a sentence serves to assure the triggering of a compound image that unitizes the terms.—*Journal abstract.*

311. Dominowski, Roger L. (U Illinois, Chicago Circle) **How do people discover concepts?** In R. L. Solso

(Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Discusses theories of attribute identification and reports 3 experiments which attempted to obtain information about the solution process by requiring Ss to form hypotheses, give post-task reports, and think aloud within a reception of information paradigm. Data suggest that attention should be focused on S's confidence in his decisions and the influence of positive and negative, correct and error trials on the solution process. (41 ref)

312. Duttry, David K. & McManis, Donald L. (Tacoma Public Schools, WA) **Social reinforcement with adult and peer models in shaping responses by first-grade girls to Piagetian intentionality stories.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1087-1094. —24 1st-grade girls making immature responses to Piagetian intentionality stories were given social reinforcement for matching the mature responses of peer or adult models. 24 matched controls performed with peer or adult partners but received neither social reinforcement nor modeling. Group results show both significant short-term and delayed gains in judgments of intentionality ( $p < .05$ ) for Ss given modeling. Individual results, however, show that 9 of the 24 Ss in the modeling groups failed to make lasting gains, indicating great individual differences in susceptibility to such training effects. —*Journal abstract.*

313. Erickson, James R. (Ohio State U) **A set analysis theory of behavior in formal syllogistic reasoning tasks.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Presents a theory of syllogistic reasoning, derived from data from college students, which suggests that Ss draw conclusions from a pair of syllogisms according to a 3-stage process—interpretation of a verbal premise in terms of one of the possible set relations, combination of the set relations to determine the set relationships in the conclusion, and interpretation of this new relationship in a verbal statement. 3 models of the theory were examined; data support the notion that Ss do not examine all possible combinations but choose a particular combination according to certain biases.

314. Farley, Frank H.; Peterson, James M. & Whalen, Thomas J. (U Wisconsin, Madison) **The stimulation-seeking motive: Relationship to conceptual category breadth.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 449-451.—Results of an experiment with undergraduates indicate that there is no reliable relationship between stimulation-seeking motive (as measured by the Sensation-Seeking Scale) and conceptual category breadth, contrary to previous findings. (18 ref)

315. Frederiksen, Lee W. & Peterson, Gerald L. (Ohio U) **Schedule-induced aggression in nursery school children.** *Psychological Record*, 1974(Sum), Vol 24(3), 343-351.—Continuously recorded the frequency and intensity of hitting an automated Bobo doll for 8 female and 8 male 5-yr-old nursery school children receiving pennies for barpressing on a continuous reinforcement-extinction schedule. Hitting was distributed throughout extinction and baseline periods but did not occur during continuous reinforcement. No sex

differences were found. Results parallel data obtained from infrahuman organisms and suggest that schedule-elicited aggression in humans may be viewed as an adjunctive behavior. (15 ref)—*Journal abstract.*

316. Gatchel, Robert J. (U. Texas, Arlington) **Frequency of feedback and learned heart rate control.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 274-283.—Investigated the effects of varying frequency of feedback information on learning to accelerate and decelerate heart rate in 2 experiments with a total of 72 male undergraduates. In Exp I 3 feedback frequencies were assessed: information after every heart beat, every 5 beats, and every 10 beats. All feedback groups were compared with a tracking task control group. Results indicate that for speeding sessions, the feedback groups generated faster rates than the tracking group. In addition, there was a significant linear trend across feedback group performance, with Ss receiving continuous feedback (every beat) showing the fastest rates. During slowing sessions, the feedback groups performed better than tracking controls, again supporting a general feedback effect. However, there were no significant trends across feedback groups, suggesting that, unlike speeding, slowing performance is not finely tuned to information input. Exp II replicated the speeding results, again demonstrating that success at this task varies systematically with frequency of information feedback. (16 ref)—*Journal abstract.*

317. Geis, Mary F. & Winograd, Eugene. (Emory U) **Norms of semantic encoding variability for fifty homographs.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 429-431.—Ss gave word associations to the same set of 50 homographs on 2 occasions separated by either 5 min or 48 hrs. For each homograph, the probability of S's giving, at both tests, word associations that represented the same semantic sense was determined. Values are presented for each homograph.

318. Gholson, Barry & McConville, Kathleen. (Hunter Coll, City U New York) **Effects of stimulus differentiation training upon hypotheses, strategies, and stereotypes in discrimination learning among kindergarten children.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 81-97.—2 groups of 50 kindergarten children received stimulus differentiation training either with feedback (experimental Ss) or without (controls), prior to presentation of a series of discrimination-learning problems using blank-trial probes. Performance of both groups was virtually perfect during differentiation training (less than 1 error/1,000 trials). In transfer, however, experimental Ss solved more problems, generated more consistent hypotheses ( $H$ ) during blank-trial probes, manifested fewer response sets, were more likely to abandon a disconfirmed  $H$ , sampled more locally consistent  $H$ s following errors, and retained a confirmed  $H$  more frequently than control Ss. Experimental Ss also manifested strategy Sys (hypothesis sampling systems), while controls generated only stereotypes. (45 ref)—*Journal abstract.*

319. Gorfain, David S. (New Coll.) **Time release from proactive inhibition as a function of amount of proactive inhibition present.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 201-203.—Explored release from proactive interference (PI) produced by a long



intertrial interval (ITI) to determine whether such release is a function of the level of PI at the time of interpolation of the long ITI. The central question was whether such release can be explained purely on the basis of time tagging or whether additional mechanisms for dissipation of interference are necessary. In an experiment with 36 college students, the Brown-Peterson short-term memory paradigm was used with recognition latency as the dependent variable. Results clearly support the conclusion that the greater the amount of PI present at time of ITI interpolation, the less release obtained. A pure time-tagging notion is not sufficient to account for release from PI over long ITIs.—*Journal abstract.*

320. Greenway, A. P. (U Aberdeen, Scotland) **The ambiguous cue problem and the interfering cue theory.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 35-41.—Examined the modified interfering cue theory by H. J. Fletcher et al (see PA, Vol 43:530) to explain performance in the ambiguous cue problem. 96 8-9 yr old children were trained to acquire response tendencies to the individual cues of this problem. When presented subsequently with the problem, Ss showed marked differences in the number and type of errors made. Results are interpreted as supporting the theory of Fletcher et al. It is suggested that the cues with clear positive or negative values were employed by the Ss to limit or neutralize the interference caused by the ambiguous cue.—*Journal abstract.*

321. Hekmat, Hamid. (U. Wisconsin, Stevens Point) **Three techniques of reinforcement modification: A comparison.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 541-548.—Compared 3 techniques for altering the reinforcement potential of the verbal reinforcer "mmmm-hmmm" using 50 undergraduates. Group I, reinforcement potency attribution, involved pairing semantically induced pleasant images to the verbal reinforcer "mmmm-hmmm"; Group II, reinforcement potency attenuation, involved conditioning negative meaning to "mmmm-hmmm"; Group III received reinforcement potency satiation by repeated exposure to "mmmm-hmmm." Groups IV and V were exposed to a buffer task. Immediately after reinforcement modification, affective self-references were reinforced in a quasi-therapeutic interview with "mmmm-hmmm" serving as a verbal reinforcer for the experimental groups and control Group IV. Control Group V received no reinforcement in verbal conditioning. Reinforcement potency attribution enhanced the pleasant evaluative meaning of "mmmm-hmmm" and subsequently induced the greatest verbal conditioning effect. The attenuation and satiation treatments both reduced the pleasant connotation of "mmmm-hmmm" significantly, resulted in no verbal conditioning effect, and were not significantly different from each other in terms of inducing negative connotations or in promoting verbal conditioning.—*Journal abstract.*

322. Jahnke, John C. (Miami U) **Restrictions on the Ranschburg effect.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 183-185.—Obtained the Ranschburg effect (RE) only when word strings were composed of items drawn from a small stimulus vocabulary (8-10 words); with a slightly larger vocabulary (14 words), marked facilitation of the recall of repeated elements was

observed. This result restricts the generality of the RE and is consistent with the view that concurrent intra- and interserial repetition is necessary to the RE.

323. Johnson, Peder J. & Toppino, Thomas C. (U New Mexico) **Effects of category attention, relative frequency of relevant values, and practice on attribute identification performance.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 160-166.—Presented 51 undergraduates with 4 successive attribute identification problems involving either the conditional rule or its complement—the exclusion rule—under either of 2 levels of relative frequency of relevant values. In all conditions, Ss were allowed to select on each trial whether they would be presented an instance from the positive or negative category, but the particular instance from the selected category was determined by E. Results indicate that Ss initially selected positive instances, regardless of the class of stimuli composing the positive category. This positive focus resulted in inferior performance in the low-frequency conditional group. With practice on successive problems, both high- and low-frequency conditional groups switched to a negative focus, which was accompanied by improved performance in the low-frequency conditional group.—*Journal abstract.*

324. Kanak, N. Jack & Knight, John M. (U. Oklahoma) **The re-pairing decrement in verbal discrimination transfer: Further evidence favoring associative mechanisms.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 304-309.—In a previous study, W. P. Wallace and G. W. Nappe (see PA, Vol 46:261) suggested that the re-pairing decrement in a verbal discrimination (VD) transfer task obtained in 1969 by N. J. Kanak and M. F. Dean could be accounted for by an extension of the counting postulate of frequency theory without involving associative mechanisms. This extension was based on the assumption that the Kanak and Dean re-pairing manipulation produced some pairs in which wrong items were actually higher in situational frequency than right (R) items. The present transfer experiment with 64 undergraduates attempted to rule out this possibility by the use of a familiarization task involving free recall of R items prior to VD learning, thereby increasing the situational frequency of R items prior to List 1 learning and List 2 re-pairing. Relevant familiarization significantly facilitated List 1 learning relative to irrelevant familiarization. Compared to transfer conditions involving corresponding List 1-List 2 pairings, a substantial re-pairing decrement attributed to incidental associative interference was observed in List 2 errors under conditions of both relevant and irrelevant familiarization.—*Journal abstract.*

325. Kee, Daniel W. & Rohwer, William D. (U Southern California) **Response and associative phase components of elaborative prompt effects in children's noun-pair learning.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 62-71.—Separately estimated the effects of aural and pictorial elaborative prompts for response and associative phase components of children's noun-pair learning. A 20-item list of noun pairs was administered individually to 200 2nd- and 3rd-grade children by the method of paired-associates. Indices of response learning (free verbal recall and

pictorial identification) revealed equivalent effects among prompt conditions whereas measures of associative learning (multiple-choice pictorial-recognition tests) demonstrated substantial performance facilitation as a function of both aural and pictorial elaborative prompts. This outcome was regarded as an unequivocal identification of the locus of elaborative prompt effects in children's noun-pair learning.—*Journal abstract.*

326. King, David J. (State University Coll. New York, Oswego) **Total presentation time and trials to criterion in connected discourse learning.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 27-28.—Presents 7 sets of data which summarize the relationship between trials to criterion and total presentation time for a 25-word-long passage of connected discourse. The resultant relationship shows a sharp negative deceleration with trials to criterion becoming quickly asymptotic between 2 and 2½ trials. Implications of this relationship to the total-time hypothesis for connected discourse learning are briefly presented.—*Journal abstract.*

327. Kirkland, John. (U. Missouri) **On boosting divergent thinking scores: The context effect.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 69-72.—Administered to 40 female undergraduates either (a) a test booklet containing convergent thinking items from the Lorge-Thorndike Intelligence Test with instructions emphasizing intelligence or (b) a booklet containing divergent thinking items from the Torrance Tests of Creative Thinking with instructions emphasizing creativity. Scores from Torrance's repeated figures circles test constituted the dependent variables. Results show that the divergent (creativity) Ss produced significantly fewer pictures and integrated them less frequently than did the convergent (intelligence test) Ss, and support the existence of both a context effect and variations in the degree of motivation.—*L. Gorsey.*

328. Klinger, Eric. (U. Minnesota, Div. of Social Sciences, Morris) **Utterances to evaluate steps and control attention distinguish operant from respondent thought while thinking out loud.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 44-45.—Conducted 2 experiments with 24 paid and 6 volunteer male college students, respectively, in which Ss were instructed to think out loud while engaged in solving manual puzzles, solving logic problems, revery, and quasihypnagogic thought. During the manual puzzle and logic problem activity, Ss produced significantly more utterances in which they evaluated their previous problem-solving thoughts or acts and in which they indicated that they were controlling their attention than during revery and hypnagogic thought. Findings are interpreted to support the distinction between operant and respondent thought, and they help to characterize the former. Results carry implications for theory of thinking, response organization, cognitive development, self-regulation, and thinking dysfunctions as in mental fatigue and psychosis.—*Journal abstract.*

329. Lemineur, R. & Meurice, E. **[Is cognitive mediation possible in operant conditioning of spontaneous electrodermal reaction?]** (Fren) *Revue de Psychologie et des Sciences de l'Éducation*, 1973, Vol 8(3), 271-285.—Conducted a 2-part study to investigate operant conditioning of the palmar galvanic skin

response (GSR) of 5 Ss. In each part there were 5 sessions, each having a 10-min learning period and a 10-min detection period. In Part 1, during the learning period, S was given a light signal whenever a GSR occurred. The response was presumably associated with some ideation. During the detection period S pressed a button whenever he believed a GSR had occurred. In Part 2 the learning period was the same as before but in the detection period S was given a signal whenever his belief that a GSR had occurred was correct. It is concluded that Ss can learn to detect GSR activity.—*S. Marzolf.*

330. Lester, David & Miller, Nancy H. (Richard Stockton State Coll) **Sex differences in inhibition on cognitive tasks.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 502.—Conducted 2 experiments, each with 20 male and 20 female undergraduates. Female Ss were superior at tasks involving simple rote memory. No differences were found between the sexes in their ability to inhibit interference responses.—*Author abstract.*

331. Levine, Marvin. (State U New York, Stony Brook) **A transfer hypothesis, whereby learning-to-learn, Einstellung, the PREE, reversal-nonreversal shifts, and other curiosities are elucidated.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Proposes a theoretical transfer hypothesis that can be used to explain learning-to-learn, Einstellung, the partial reinforcement extinction effect, and reversal-nonreversal shift effects. The hypothesis stresses that the solution experienced by S during the criterion state of the learning process (i.e., when S holds only the solution) determines the extent of transfer. (24 ref)

332. Martin, Edwin & Norren, David L. (Human Performance Ctr, Ann Arbor, MI) **Serial learning: Identification of subjective subsequences.** *Cognitive Psychology*, 1974(Jul), Vol 6(3), 421-435.—Results of a study with 48 undergraduates demonstrate that learning of fixed arbitrary sequences was accomplished by idiosyncratic subsequencing and assembly of the resulting subsequences. An error item that just preceded a subjective subsequence was a closely constrained member of that subsequence. Identification and characterization of subjective subsequences were accomplished by analyses of forward serial learning, free recall, and backward serial learning. It is concluded that ordinary serial learning cannot be represented by traditional continuous-process theories, but instead must be treated by an organizational model. (17 ref)—*Journal abstract.*

333. McFarland, Carl E. & Kellas, George. (U. Kansas) **Mode of input effects on subject-controlled processes.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 343-350.—72 undergraduates paced themselves through either auditory or visual presentation of 15-item lists. Ss were instructed to either (a) rehearse cumulatively, (b) actively rehearse primacy items while passively attending to recency items (active-passive), or (c) rehearse by choosing their own strategy (free). Study times showed that when no restraints were placed on rehearsal, Ss receiving auditory presentation required longer processing time than did Ss receiving visual presentation. Modality had no effect on correct



responding but did influence the order of recall in the free and active-passive conditions. Results are discussed in terms of a proposed hypothesis concerning interference arising from the similarity between acoustic trace information and the articulatory-acoustic mode for subvocal rehearsal. (18 ref)—*Journal abstract*.

334. Mueller, John H.; Gault, Prentice & Evans, James H. (U Missouri, Columbia) **Stimulus encoding in A-Br transfer.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 54-61.—Studied A-Br transfer in 3 experiments with a total of 120 undergraduates, using groups which differed in their inducements to change functional stimuli. The nominal stimuli were double-solution 5-letter anagrams. In Exp I, Group 1 received 1 solution in parentheses during List 1 and the other solution in parentheses during List 2. Group 2 had either the 1st or last letter of the anagram stimulus highlighted in color, with that switched between Lists 1 and 2. Relative to an A-Br group with no inducement to change encodings, only Group 1 showed reduced negative transfer. However, the presence of cues throughout both lists does not constitute a good test of the encoding variability hypothesis, and Exp II and III indicated no such reduction when the transformational cues were not continuously present. These results do not support the recoding corollary of the encoding variability hypothesis. (19 ref)—*Journal abstract*.

335. Mueller, John H.; Pavur, Edward J. & Yadrick, Robert M. (U. Missouri) **Verbal-discrimination learning as a function of encoding variability.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 41-43.—Manipulated the encoding variability of the right (R) and wrong (W) terms in a verbal-discrimination task repeated in 2 experiments. When the number of different associates defined variability, pairs with low-encoding variability for both R and W terms were learned fastest, followed by pairs with high-encoding variability in both R and W terms. When the number of dictionary meanings defined variability, pairs with high-encoding variability R terms and W terms were learned slower than all other combinations. The outcomes do not correspond to expectations involving only the number of encodings in each component of a pair; it is suggested that the number of nonoverlapping encodings is more important.—*Journal abstract*.

336. Nelson, Douglas L.; Brooks, David H. & Borden, Richard C. (U South Florida) **Effects of formal similarity: Phonetic, graphic, or both?** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 91-96.—Notes that when words are formally similar in a paired-associate list they share graphic as well as phonetic features. 5 experiments were conducted with a total of 400 college students to separate the effects of each type of similarity as a function of both ordinal position of similarity and modality of presentation. When presentation was within the visual mode the results suggested that both graphic and phonetic features were processed at both the initial and terminal positions of the stimulus words. When presented in the auditory mode, only phonetic features were apparently processed.—*Journal abstract*.

337. Nielsen, Gary E. (Community Mental Health Services, Marin County, CA) **Helping children behave: A**

**handbook of applied learning principles.** Chicago, IL: Nelson-Hall, 1974. xi, 170 p. \$8.95.—Presents a simplified handbook for parents and teachers on the use of applied learning principles with normal, retarded, or developmentally disabled children. Basic learning models are described in terms of behavior and consequences, along with the applications of these models to different objectives, case illustrations of behavioral principles, and techniques of facilitating child-parent communication. (25 ref)

338. Nowaczyk, Ronald H.; Shaughnessy, John J. & Zimmerman, Joel. (Miami U) **Proactive interference in short-term retention and the measurement of degree of learning: A new technique.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 45-53.—In 3 experiments, a total of 308 undergraduates were presented with successive free-recall lists to examine proactive interference effects and changes in degree of learning in a short-term retention task. Recall was relatively constant across lists for the immediate recall groups. For the delayed recall groups, recall decreased from 1st to the 2nd list and was relatively constant thereafter. It is suggested that with the technique used it is possible to obtain estimates of the degree of learning of a short-term retention task that are not confounded by ceiling effects. Applications of this technique are discussed with regard to determination of the locus of D. D. Wickens's release from proactive interference effect.—*Journal abstract*.

339. Oziel, L. Jerome & Berwick, Peter T. (U South Carolina) **Effects of feedback on self-reinforcing behavior in relation to self-acceptance.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1039-1044.—A total of 96 high and low self-accepting undergraduates (as measured by the California Personality Inventory—CPI) were divided into 8 treatment groups: (a) a low self-accepting group that received facilitating feedback for self-reinforcing responses, (b) a group comparable to the previous one but which was also given positive feedback on social comparisons, (c) a low group that received inhibiting feedback for negative self-reinforcement responses, and (d) a low self-accepting control group. The remaining 4 groups were Ss high in self-acceptance; they were treated in a comparable fashion to the 1st 4 groups but instead were given feedback designed to decrease their self-reinforcement rate. In addition to the CPI, Ss were given E. M. Berger's measure of self-acceptance and self-ratings of creativity and intelligence before and after treatment. There were few significant changes for the postmeasures following the conditioning treatment. Some hypotheses from past research concerning the relationship between self-reinforcement and self-acceptance are questioned.—*Journal abstract*.

340. Reed, Stephen K.; Ernst, George W. & Banerji, Ranan. (Case Western Reserve U) **The role of analogy in transfer between similar problem states.** *Cognitive Psychology*, 1974(Jul), Vol 6(3), 436-450.—Investigated the effect of transfer between 2 problems having similar (homomorphic) problem states in 3 experiments with a total of 226 undergraduates. Results reveal that although transfer occurred between repetition of the same problems, transfer occurred between the Jealous Husbands problem and the Missionary-Cannibal problem only when (a) Ss were told the relationship between the 2

problems and (b) the Jealous Husbands problem was given first. Results are related to the formal structure of the problem space and to alternative explanations of the use of analogy in problem solving. These include memory for individual moves, memory for general strategies, and practice in applying operators.—*Journal abstract.*

341. Robbins, Donald; Bray, James F. & Irvin, James R. (Emory U) **Intralist contrast effects in cued recall.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 150-155.—Reports on 4 experiments with a total of 145 undergraduates in intralist inhibition effects were investigated in a cued-recall or paired-associate study-test procedure. The inhibition effect occurs when a list of unrelated words contains some words that occur once and some words that occur twice; the recall of words that occur only once is less than that from a comparable list in which all words occur only once. Exp I revealed that this intralist inhibition effect, previously reported in free recall studies, also occurs in a cued-recall task. Exp IV revealed that the effect is not the result of output interference, while Exp II and Exp III revealed that a necessary condition to obtain inhibition is to require Ss to retain frequency information as well as the item itself.—*Journal abstract.*

342. Ross, Bruce M.; Locker, Roger & De Lisi, Richard. (Catholic U of America, Ctr for Research in Thinking & Language) **Deductive problem solving with limited information.** *Center for Research in Thinking & Language Report*, 1974(Mar), No CRTL-TR-1, 36 p.—Used a previously formulated model of deductive reasoning as a basis for designing and analyzing a series of 4 experiments conducted with 151 college students. The formulated problems dealt with both conjunctive and disjunctive concepts and concept instances and with different degrees of concept and instance complexity, generally possessed more than one logically correct solution. 2 experiments required Ss to deduce concepts from lists of instances, while 2 other experiments listed concepts from which Ss deduced instances. In spite of wide individual differences a high level of success (75-80%) was found in 3 of the 4 experiments with a mixture of problems varying in difficulty level. Findings included a greater difficulty for disjunctive vs conjunctive solutions and increased error with a lengthening of the list of instances or concepts. The pertinence of using deductive techniques in relation to decision making and cases of information reduction where deductive processes can assist in solving part of a larger problem are discussed.—*Journal abstract.*

343. Runquist, Peggy A. & Aronson, Gerrit O. (U. Alberta, Edmonton, Canada) **Facilitative and interference effects of response grouping in paired-associate learning.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 363-365.—Conducted 2 experiments with a total of 148 college students to investigate the effect of grouping unrelated response terms on the learning of paired-associate items. In Exp I Ss learned response groupings in a pretask that were either the same as or different from response groupings acquired in the paired-associate task. Results clearly indicate that prior learning of the same response groupings interfered with the learning of specific associations. Exp II manipulated

order of presentation (blocked or nonblocked) of categorizable or noncategorizable items. There was some evidence that response grouping facilitated acquisition performance under blocked presentation but not under nonblocked presentation. The facilitation was attributed to factors that would increase guessing efficiency.—*Journal abstract.*

344. Skinner, Nicholas F. (King's Coll, U Western Ontario, London, Canada) **Comment on Sachs and May's paper on the conditioned emotional response with humans.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1069-1070.—Attempts to explain D. A. Sachs and J. G. May's (see PA, Vol 44:4477) inconsistent finding that the effects of the conditioned emotional response (CER) range from response facilitation to response suppression. It is suggested that to some extent personality characteristics may account for inter-S variability in reactions to the CER contingency.

345. Smallwood, Robert A. & Arnoult, Malcolm D. (Texas Christian U) **A comparison of simple correction and functional feedback in schema learning.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 581-585.—Clarified the role of knowledge of results (KR) in a schematic concept formation task by manipulating the specificity of information provided during feedback. 224 undergraduates learned to discriminate between pairs of random forms from 2 schema families. Verbal correction was compared with a functional KR procedure in which the schema prototypes were superimposed over test stimuli. In no case did verbal correction improve learning in comparison with functional KR. Differences in acquisition persisted in a retention test.—*Journal abstract.*

346. Tondo, Thomas R. & Cautela, Joseph R. (U Mississippi) **Assessment of imagery in covert reinforcement.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1271-1280.—Assigned 28 undergraduates with high or low imagery (as measured by an imagery survey schedule) to high-imagery experimental, low-imagery experimental, high-imagery control, and low-imagery control groups. First, each S was given practice trials in which to imagine and rate the latency, clarity, and pleasantness of a self-selected "pleasant" scene. Next, during a circle size-estimation task, a verbal cue to imagine the scene (covert reinforcement) was made contingent on each overestimate for experimental Ss but not for control Ss. Results indicate that high-imagery experimental Ss showed significantly greater positive change in size-estimation than either low-imagery experimental or high-imagery control Ss. Also, high-imagery Ss rated the scenes significantly lower in latency and higher in clarity and pleasantness of imagery than did the low-imagery Ss. Significant correlations were found for experimental Ss between ratings of pleasantness of scenes and change in size estimation ( $r = .75$ ) and between frequency of scene presentation and change in ratings of pleasantness of scenes ( $r = -.58$ ). Although the findings are interpreted as supporting the need for imagery assessment in covert reinforcement, alternative explanations are also discussed.—*Journal abstract.*

347. Van Duyne, P. C. (State U Groningen, Netherlands) **A short note on Evans' criticism of reasoning experiments and his matching response**



**hypothesis.** *Cognition*, 1973, Vol 2(2), 239-242.—Attempts to reformulate some of the problems in the psychology of reasoning with reference to J. St. B. Evans and J. S. Lynch's (see PA, Vol 51:8371) distinction between logical, illogical, and nonlogical behavior in matching bias in selection tasks. It is argued that their matching hypothesis does not offer any explanation of underlying operational variables. (19 ref)

348. Wilder, Larry; Levin, Joel R.; Kuskowski, Michael & Ghatala, Elizabeth S. (U. Wisconsin, Research & Development Center for Cognitive Learning, Madison) **Pronunciation effects in verbal discrimination learning.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 366-367.—Previous research has found that spoken rehearsal is superior to silent rehearsal during verbal discrimination (VD) learning. Frequency theory can account for this finding if it is assumed that pronunciation leads to an even greater frequency differential between the correct and incorrect item in each pair than occurs in silent performance. Support was found for this assumption in 2 experiments in which an incidental recognition memory task was administered to a total of 80 college students after verbal discrimination learning. Further, in contrast with earlier research, it was found that the increased frequency differential was due at least as much to increased recognition of the previously correct VD items as to decreased recognition of the previously incorrect items.—*Journal abstract.*

349. Wilson, Marian M. (Harvard U, Medical School, Boston) **Novelty as a reinforcer for position learning in children.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 51-61.—Modified the stimulus-familiarization-effect (SFE) paradigm, a reaction-time (RT) task based on a response to novelty procedure, to assess response for novelty (i.e., a response-reinforcement sequence). 96 kindergarten children were familiarized on 1 of 2 colored lights. Ss were confronted with a simple position discrimination task in which they could choose between 2 response buttons which produced either the previously familiarized light or a new (i.e., novel) light. Results show that the choice response for the novel stimulus (NS) was facilitated by 3 variables: number of exposures to and duration of each exposure of the familiar stimulus (FS), and degree of change provided by the NS relative to the FS. The parallel between the effective variables of this study and those which produce the SFE was noted, implicating an attention interpretation of the function of novelty as a reinforcer.—*Journal abstract.*

350. Wolford, George & Hollingsworth, Samuel. (Dartmouth Coll) **Redundancy in the full-report procedure.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 457-458.—Varied redundancy in the tachistoscopic full-report procedure with undergraduates. Unlike previous experiments using the detection paradigm, redundancy led to a detriment in performance. Evidence is presented that response bias was not the cause of the detriment.

351. Woods, Paul J. (Hollins Coll) **A taxonomy of instrumental conditioning.** *American Psychologist*, 1974(Aug), Vol 29(8), 584-597.—Proposes a classification scheme for instrumental conditioning paradigms based on 4 dichotomies: (a) whether the organism is

required to "emit" or "omit" a response, (b) whether a "desirable" or "aversive" stimulus event is made contingent upon the response, (c) whether the operation performed upon this stimulus event is one which "increases" or "decreases" its magnitude or intensity, and (d) whether or not the organism is given any "signal" prior to the response as to the consequent stimulus event. The resulting classification scheme includes 16 distinct paradigms, each of which is illustrated with research examples (when they are known to exist) and with examples from "real-life" situations. The relationship between the present scheme and previous classification attempts is indicated, and a meaningful and consistent nomenclature is proposed.—*Author abstract.*

352. Yuille, John C. (U British Columbia, Vancouver, Canada) **Syntactic facilitation of children's associative learning: An instructional effect.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 41-50.—Reports an experiment with 90 5th graders in which connective recall, as well as noun recall, was obtained in a pair-associate learning, syntactic facilitation paradigm. Differences in the pattern of noun and connective recall, and a partial independence in the 2 types of recall, were obtained. Results are consistent with the hypothesis that E-supplied verb links facilitate noun pair learning by serving an instructional role, indicating to the S how a pair might be coded. (25 ref)—*Journal abstract.*

353. Zenhausern, Robert & Hansen, Karen. (St John's U, Jamaica, NY) **Differential effect of subliminal and supraliminal accessory stimulation on task components in problem-solving.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 375-378.—Studied the effect of subliminal and supraliminal accessory stimulation on the Stencil Design Test, using 35 male graduates and undergraduates as Ss. 30 db below threshold and 35 db above threshold resulted in performance decrement, while 10 db below threshold and 60 db above threshold led to facilitation. Comparison with past research provides evidence that accessory stimulation differentially affects various components of the task.—*Journal abstract.*

### Attention & Memory

354. Arthur, Louise M. & Daniel, Terry C. (U. Arizona) **Effect of picture-word transfer on accuracy and latency of recognition memory.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 211-215.—Investigated temporal parameters of recognition memory for pictures and words in a reaction time experiment with 26 undergraduates. Dark-adapted Ss self-initiated 250-msec exposures of arrays containing 8 different stimuli—either pictorial silhouettes or corresponding block-lettered verbal labels—in the peripheral cells of a 3 × 3 grid. Following every array and a subsequent 3-sec delay interval, a test item—either a 4-letter word or a picture—appeared in the center grid square for 250 msec. By quickly pressing a yes or no button, Ss indicated whether the test item had been present or absent in the preceding array. Each S served under all of the following conditions: word array-word test, picture-picture, picture-word, and word-picture. Order of presentation was completely randomized for each S. Analyses of both accuracy and reaction time data revealed interactions

between mode of presentation, mode of test, and decision strategy. Such results may be partially dependent on ability to form a visual memory image of the array, though further active encoding processes may be responsible for subsequent disruption of that image.—*Journal abstract.*

355. Atkinson, Richard C.; Hermann, Douglas J. & Wescourt, Keith T. (Stanford U) **Search processes in recognition memory.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Based on data from experiments on memory scanning with small, large, and duplex target sets and the effects of semantic variables on response time, a mathematical model and a theoretical division of the memory system into a memory storage network and various control processes are proposed. The memory storage network is composed of a sensory register, short-term store, and long-term store, and control processes include selective attention, rehearsal, choice of retrieval cues, and all types of decision strategies. (48 ref)

356. Bartlett, James C. & Tulving, Endel. (Yale U) **Effects of temporal and semantic encoding in immediate recall upon subsequent retrieval.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 297-309.—Conducted 2 experiments with 72 paid college students in each in which Ss heard lists of 6 digit-word pairs. After each list they attempted to recall 1 of the words in response to either a temporal or a semantic cue; after a block of lists recall and recognition of all words were tested. Initially untested words showed a strong negative recency effect in delayed recall and recognition, suggesting that the effect results from encoding processes terminating with the presentation of each list. Delayed recall and recognition of initially tested words was influenced by the mode of initial retrieval only for words from input positions 5 and 6, initial semantic cuing being more effective than temporal cuing. This latter finding is consistent with the view that terminal list items in typical immediate recall tests are retrieved in terms of short-lived nonsemantic information. (20 ref)—*Journal abstract.*

357. Brewer, William F. & Harris, Richard J. (U Illinois) **Memory for deictic elements in sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 321-327.—The deictic elements of a language are the linguistic forms relating the utterance to a particular time, place, speaker, or discourse context. In the present 2 experiments a total of 65 undergraduates memorized sentences containing words from 1 of 5 deictic categories (deictic place adverbs, demonstrative adjectives, articles, deictic verbs, and temporal adverbs). When the sentences were presented in the usual experimental setting in which they are isolated from the actual time, place, person, and discourse context, the deictic words were much more difficult to remember than the nondeictic words. In sentences with appropriate context the deictic words were little different from the nondeictic words. Results support the hypothesis that deictic elements have limited meaning in sentences without deictic context and are therefore hard to remember.—*Journal abstract.*

358. Davenport, William G. (U British Columbia, Vancouver, Canada) **Arousal theory and vigilance: Schedules for background stimulation.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 51-59.—Assessed the effect on an O's monitoring efficiency in a visual vigilance task of having 1 of 4 irrelevant background music schedules (continuous music, music under a fixed interval temporal schedule, music under a variable interval temporal schedule, or music under a random interval temporal schedule) present during the watch. Ss were 48 college students. Results show significantly different correct detection rates and response latencies for signals presented under the different background schedules. The random interval background was superior, followed closely by the variable interval background; the other 2 schedules were similar and much less effective. Some differential results were obtained for males and females. Results are interpreted as generally favoring the arousal theory of vigilance. (18 ref)—*Journal abstract.*

359. Ehri, Linnea C. & Muzio, Irene M. (U California, Davis) **The influence of verb meanings on memory for adjectives.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 265-271.—College students were told either to form images (Exp I, 46 Ss) or to learn sentences (Exp II, 63 Ss). A noun-prompted sentence recall task exposed Ss' memory for adjectives modifying either subject or object nouns. Results reveal that subject modifiers were better remembered than object modifiers. Also, adjectives semantically unrelated to verbs were recalled better than adjectives related to verbs. For object modifiers, this appeared to occur because Ss tended to omit adjectives from their productions when verbs imposed these attributes upon the nouns modified. Constructive, interpretative, and associative theories of semantic memory are applied to the results. (19 ref)—*Journal abstract.*

360. Eysenck, Michael W. (Birkbeck Coll, U London, England) **Extraversion, arousal, and retrieval from semantic memory.** *Journal of Personality*, 1974(Jun), Vol 42(2), 319-331.—Assigned 51 18-30 yr old undergraduates to 1 of 4 groups based on scores on the Extraversion scale of the Eysenck Personality Inventory and on the General Activation factor of Thayer's Activation-Deactivation Adjective Check List. Ss were required to name items from 5 conceptually unrelated categories for 12 min. Extraverts produced significantly more items than introverts, but this was qualified by a significant Extraversion  $\times$  General Activation interaction, indicating that high General Activation enhanced performance for extraverts but reduced it for introverts. Organization of output was a relevant factor in explaining some intergroup differences. Intergroup differences were greater for the interword response times (IRT) occurring within a conceptual category than for IRTs occurring at the transition between categories. A continuity between semantic memory and categorized free recall is suggested. (32 ref)—*Journal summary.*

361. Fischhoff, Baruch & Beyth, Ruth. "I knew it would happen"—Remembered probabilities of once-future things. Eugene, OR: Oregon Research Inst, Research Bulletin Vol 14(4), 1974. 22 p.—Ss who were



asked to recall, some time after the events, the predictions they had made of the likelihood of possible outcomes of presidential trips abroad before they had occurred, demonstrated remembered-reconstructed probabilities which were higher than those originally assigned for events believed to have occurred. Cognitive "anchoring" and possible detrimental effects of feedback are discussed.

362. Foos, Paul W. & Smith, Kirk H. (Bowling Green State U) **Effects of spacing and spacing patterns in free recall.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 112-116.—Examined the effects on free recall of presenting words twice with different numbers of intervening items (spacings) and 3 times with different amounts and patterns of spacing. Ss were 120 undergraduates. Over all conditions and with position of last occurrence held constant, the beneficial effect of spacing increased with spacing (defined for each pair of repetitions rather than averaged) up to at most 8 intervening items, and then declined. The results are therefore consistent with R. C. Atkinson and R. M. Shiffrin's 1968 explanation of the spacing effect in terms of overlap in short-term storage. Recall of items presented 3 times also suggested that use of mean spacing values for items presented more than twice tends to obscure spacing effects.—*Journal abstract*.

363. Forsyth, G. Alfred & Shor, Ronald E. (U New Hampshire) **An individual differences analysis of interdimensional additivity in multidimensional scaling.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 563-567.—Obtained comparative judgments of the dissimilarity between schematic faces varying on 1, 4, 7, or 10 binary attributes. Using L. R. Tucker and S. Messick's (see PA, Vol 38:4865) procedure, 3 subgroups of 10 like-perceiving undergraduates each were isolated, and the nature of cue-utilization by each was described. Perceptual independence of attributes was demonstrated both within and between instructional sets for Subgroup 1 and within instructional sets for Subgroup 2. The Subgroup-3 results indicate an interaction of the attributes. Data from the Shor Cognitive Elements Test differentially characterized Subgroups 1 and 2, but did not uniquely characterize Ss requiring more complex models for the combination of attributes. The study illustrates the possible usefulness of an individual differences approach to the study of selective attention and information processing. (21 ref)—*Journal abstract*.

364. Fraisse, Paul. (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[The influence of length of presentation on recall of drawings and sentences.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 145-156.—Tested the hypothesis that the superiority of memory for drawings over memory for sentences is due to double (visual and verbal) coding of concrete material. A series of drawings with 2 related elements and a series of sentences describing the drawings constituted the material. To hinder or facilitate verbalization of drawing content, the interval between stimuli was varied from  $\frac{1}{2}$  sec to  $1\frac{1}{2}$  sec. After a single presentation, S evoked the items in free recall. When the interstimulus interval was too brief (less than 500 msec) for a verbal coding to be possible, memory for drawings was no better than memory for sentences. There was a

100% increase in memory for drawings when the interstimulus interval was increased, while the corresponding increase of memory for sentences was only 20%. Results are comparable when recall is delayed. The hypothesis is sustained, even when verbalization of drawings is complex.—G. Rubin-Rabson.

365. Gardiner, John M.; Thompson, Charles P. & Maskarinec, Ann S. (City U, London, England) **Negative recency in initial free recall.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 71-78.—Conducted 3 experiments with a total of 139 college students to test the prediction of 2-memory theories that it should be possible to produce negative recency in initial recall. Exp I provided a demonstration of this negative recency effect, contrary to previous findings. 2 additional experiments were performed to resolve the contradiction between previous and present results. At the procedural level, the data show an interaction between (*Ma*) and Psychasthenia (*Pt*) scales of the to-be-remembered items and the type of interpolated task. At the theoretical level, the data suggest modality-specific storage in primary memory. (16 ref)—*Journal abstract*.

366. Glidden, Laraine M. & Roemer, Joan M. (Teachers Coll. Columbia U) **Meaningfulness, formal similarity and subjective organization.** *Psychological Record*, 1974(Sum), Vol 24(3), 399-408.—Conducted 2 experiments with 44 and 72 undergraduates, respectively, which manipulated meaningfulness (M) and formal similarity (FS) in a multitrial free-recall task. Both accuracy and unidirectional and bidirectional subjective organization (SO) were measured. M facilitated both recall and SO but had a greater effect on bidirectional than unidirectional SO. Low FS lists resulted in higher recall and SO scores than did high FS lists, probably because of greater item discriminability. Data are discussed in terms of current research on organizational processes. (24 ref)—*Journal abstract*.

367. Goldberg, Susan; Perlmuter, Marion & Myers, Nancy. (U Massachusetts, Amherst) **Recall of related and unrelated lists by 2-yr-olds.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 1-8.—Individually tested 10 boys and 10 girls aged 29-35 mo on a memory task requiring free recall of 2-item lists. Each of the 3 trials consisted of the randomly ordered presentation of 6 boxes each containing a pair of objects selected from 3 categories (food, animals, and utensils). For 3 of these pairs, the objects belonged to the same conceptual category. The remaining 3 pairs were formed of unrelated items from the same categories. No sex differences in response were noted nor did performance change systematically over trials. The mean number of correct responses and the mean number of correct pairs was higher for related items. Ss frequently reported the last object they saw first. (16 ref)—*Journal abstract*.

368. Groninger, Lowell D. (U Maryland, Baltimore County) **The role of images within the memory system: Storage or retrieval?** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 178-180.—Presented high- and low-imagery words to undergraduates by tape recorder at a 5-sec rate. Stimulus words and distractors were presented in a subsequent recognition memory test. Results support the effect of imagery instructions occurring at storage rather than at retrieval.

369. Hollan, James D. (Clarkson Coll of Technology) **Clarification of some effects of hierarchical organization upon free recall.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1227-1231.—Compared free recall for hierarchically presented conceptual hierarchies and list-presented hierarchies with either correct, random-within, or random-across organization. Ss were 60 undergraduates. Results indicate (a) greater recall for hierarchical than list presentation; and (b) greater recall for correct than for either random-within or random-across organization, with no difference between the random organizations.—*Journal abstract*.

370. Homa, Donald & Spieker, Susan. (New Coll, Div of Natural Sciences) **Assessment of selective search as an explanation for intentional forgetting.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 10-15.—Investigated an assessment of selective search as an explanation for intentional forgetting by measuring reaction time (RT) in paired-associate lists of varying length. Ss were 44 college students. On half of the trials, a postinput cue was provided which instructed S to forget either the 1st or 2nd half of the list, and a single-stimulus probe was presented from the remaining pairs. For 1 group of Ss, the response items within a list were unrelated nouns; for another group, the response items within each list were half from the same category, but the categories within a list were different. For both random and categorized lists, it was found that (a) RT increased with list length and (b) RT was significantly reduced by a forget cue, with some indication that this reduction was greater for categorized lists. It is concluded that the criteria for a selective-search interpretation for intentional forgetting were satisfied, and that, for the most recently presented items, a serial and self-terminating search may be involved.—*Journal abstract*.

371. Huang, I-Ning; Ballering, Lawrence & Nikl, Larry D. (U Wisconsin, Whitewater) **Isolation effect in immediate and delayed free recall.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 81-85.—Tested the von Restorff (isolation) effect under immediate and delayed single-trial free-recall situations with 70 college students. The isolate noun was placed on the 19th position in a list of 20 unrelated nouns for 2 experimental groups which were tested for immediate recall or 60-sec delayed recall. 2 equivalent control groups received no isolation. It was hypothesized that the isolated item is selectively rehearsed, and therefore the item is transferred from short-term memory into long-term memory. Consequently, the isolate should not be affected by factors affecting recall from the short-term memory. Results indicate that the delay interval did eliminate the recency effect, but the isolate remained unaffected. This lends support to the assumption that isolation effect is a long-term memory phenomenon.—*Journal abstract*.

372. Jenkins, James J. (U Minnesota) **Can we have a theory of meaningful memory?** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Discusses problems in current models of memory, and suggests that remembering may be no more than a highly abstract description of a process which changes from one instance to another depending on the materials and circumstances involved. Data on forget-

ting, the interaction of tasks and free recall, and the effects of comprehension of meaning on what is remembered are examined. (16 ref)

373. Johnson, James H. (U. Utah, Medical Center) **Memory and personality: An information processing approach.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 1-32.—Presents a consensual model of memory based on information processing theory. The experimental literature on the interaction between memory and personality is reviewed in terms of this model. It is suggested that past research in this area failed to utilize the knowledge and techniques of information processing theory, and as a result, has confounded experimental variables. Suggestions for more appropriate research are offered. (6 p ref)—*Journal abstract*.

374. Johnson, Marcia K.; Doll, Theodore J.; Bransford, John D. & Lapinski, Robert H. (State U. New York, Stony Brook) **Context effects in sentence memory.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 358-360.—Studied the effects on recall of unrelated sentences of both appropriate and inappropriate contextual information relative to no contextual information with 159 undergraduates as Ss. Materials were presented at either fast or slow rates on study trials. Inappropriate contexts retarded performance under the fast presentation rate and, contrary to expectation, the beneficial effects of appropriate contexts did not diminish under the lower presentation rate. Overall, results provide further evidence of the importance for recall of the semantic context active during sentence processing.—*Journal abstract*.

375. Kail, Michèle & Segui, Juan. (National Ctr for Scientific Research, U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[Mnemonic integration of linguistic sequences.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 157-170.

376. Karchmer, Michael A. (Kansas U., Medical Center, Child Research Lab., Kansas City) **Proportion of unitization as an index of cued recall level.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 351-357.—In 2 experiments on the cued and noncued recall of noun pairs, pairs were factorially varied as high (H) or low (L) in rated imagery-concreteness (I-C). Ss were a total of 192 college students. A measure of pair unitization, based on L. M. Horowitz and L. S. Prytulak's 1969 index, predicted relative levels of cued recall for a given set of comparisons. Whether cuing facilitated recall relative to noncued recall depended on I-C pairing, test delay, and instructed strategy. With imagery or associative strategy instructions, cuing facilitated recall for H-H pairs tested immediately or after a 24-hr delay, but not for L-L pairs. Cuing facilitated recall of mixed I-C pairs tested immediately, but not at a delay. With repetition strategy instructions, cued recall did not exceed noncued recall for H-H or L-L pairs.—*Journal abstract*.

377. Kausler, Donald H. (U Missouri) **Continuity of processes across variants of recognition learning.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Discusses the need for a general theory of recognition learning which accounts for both single-



and multiple-item discrimination. 2 kinds of evidence for process continuity are reviewed, and a new theory of recognition learning is presented, a modification of frequency theory, which argues that there are featural components (vs words) that act as recipients of response tags and that the sharing of these tagged features is the mechanism underlying false alarms. (81 ref)

378. Kelly, Richard T. & Martin, David W. (New Mexico State U.) **Memory for random shapes: A dual-task analysis.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 224-229.—Examined the role of rehearsal in the storage of visual information in 2 experiments with a total of 38 undergraduates. Both experiments involved recognition of random shapes which varied factorially along 5 levels of complexity and 2 levels of codability. In Exp I an interpolated activity was performed during 4-sec intervals following stimulus presentation. The interpolated task degraded recognition accuracy. Verbal codability facilitated recognition performance, but no main effect of stimulus complexity on recognition was found. Results of Exp II, which used simple reaction time probes rather than an interpolated activity, replicate these effects. Results suggest that retention of visual information requires processing capacity. Stimulus characteristics (e.g., codability) affect the extent of this processing.—*Journal abstract.*

379. Kroll, Neal E.; Kellicutt, M. H.; Berrian, Raymond W. & Kreisler, Alan F. (U California, Davis) **Effects of irrelevant color changes on speed of visual recognition following short retention intervals.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 97-106.—Describes 3 experiments in which a total of 80 undergraduates judged whether a pair of test letters had the same names as a memory pair presented either 1 or 8 sec earlier. 2 other (irrelevant) changes were possible: case (upper and lower) and color changes (red and green). Half of the Ss recalled the color of the memory pair following their same- vs different-name decision. As predicted under the visual memory hypothesis, same-name decisions were faster when the cases of memory and test pairs were the same. This reaction time difference (different case minus same case) was greater at 1 than at 8 sec and greater for Ss recalling color; however, it was unaffected by color change. Color change slowed decisions following both 1 and 8 sec for Ss recalling color, but only at 1 sec for Ss not recalling color. Neither case nor color effects were reduced when the distractor task (shadowing) was no longer required. This was interpreted as favoring the "alternative generation" rather than the "verbalization" explanation of why the case effect is often lost over longer retention intervals. (20 ref)—*Journal abstract.*

380. Kvale, Steinar. (U Aarhus, Psychological Inst, Risskov, Denmark) **Permanence and change in memory: II. Reproduction of words in sentences.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 139-145.—Employed a retroactive interference paradigm for studying qualitative memory changes, using 2 groups of 20 German high school students as Ss. Sentences containing an ambiguous word that was defined differently by succeeding words were used as stimulus material. Such retroactive definitions of meaning led to qualitative changes in reproduction. It is suggested that the issue of

permanence and change in memory may be related to the choice of lists of independent items or contextual units as stimulus material. A contextual theory of memory, implying the conception of memory in a stream, is advocated.—*Journal abstract.*

381. Langhorne, John E. (Adrian Coll) **Analysis of multitrial free recall.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 9-19.—Reanalyzed constant and variable input effects in multitrial free recall, using a new method of measuring organization—intertrial organization variance (ITOV)—and a mathematical model of retention-forgetting. Ss were 40 female undergraduates. Results indicate that ITOV apparently measures a different type of organization than traditional measures. The trial-to-trial model of retention-forgetting quantitatively reveals results about free recall not apparent from traditional analysis.—*Journal abstract.*

382. LaPorte, Ronald & Voss, James F. (U Pittsburgh) **Paired-associate acquisition as a function of number of initial nontest trials.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 117-123.—To study the role of testing in paired-associate learning, the testing phase of paired-associate recall trials was replaced by a series of computational tasks. Following 0, 5, 10, 20, or 40 nontest pairing trials, 80 undergraduates received a recall trial and subsequently learned the list to a criterion of 1 errorless trial. Results indicate that although it took an average of 7.5 trials to learn the 12-pair list in the standard condition (Condition 0), mean recall was approximately 10 correct responses following 20 and 40 nontest trials and approximately 7 correct responses following 5 and 10 nontest trials. Mean trials to criterion, not including the nontest trials, was not significantly different among Conditions 0, 5, and 10, although Conditions 20 and 40 yielded significantly fewer trials to criterion than the other 3 conditions. Results support the view that testing facilitates the development of retrieval processes; an additional interpretation is that the test trial provides feedback which influences selective attention and/or rehearsal on the subsequent list presentations, thereby also influencing the acquisition of the associations.—*Journal abstract.*

383. Lishman, W. A. (U London, Inst of Psychiatry, England) **The speed of recall of pleasant and unpleasant experiences.** *Psychological Medicine*, 1974(May), Vol 4(2), 212-218.—Describes a method for comparing the speed of recall of pleasant and unpleasant experiences. Pleasant experiences were recalled significantly more quickly than unpleasant experiences by 20 healthy volunteers on a hospital social work or medical staff, especially by those scoring low on Neuroticism or high on Extraversion as measured by the Eysenck Personality Inventory. The overall pleasant-unpleasant differential persisted on retesting some months later with an alternative form of the test. The technique appears to be a valid and simple means for exploring hedonic selectivity in memory.—*Journal abstract.*

384. Lowry, Douglas H. (Michigan Technological U) **The effects of mnemonic learning strategies on transfer, interference, and 48-hour retention.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 16-20.—Compared the effects of instructions to use imagery, sentence, or repetition strategies on original learning,

negative transfer, retroactive interference (RI), and 48-hr retention. After reaching a common criterion in learning A-B pairs, 144 college students were either given 10 study-test trials on a list of A-D or C-D pairs or engaged in a filler task. During acquisition, mnemonic strategies did not affect negative transfer, RI, or 48-hr retention. It is concluded that mnemonics only affect the rate of acquisition in paired-associate learning. The basis for mnemonic effects may be centered on the associative process as opposed to modification of stimulus attributes.—*Journal abstract*.

385. López, Mike; Hicks, Robert E. & Young, Robert K. (U Texas, Austin) **Retroactive inhibition in a bilingual A-B, A-B' paradigm.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 85-90.—Investigated the effects of giving no cues to indicate the language of a specific response on the learning of paired-associate lists by 32 Mexican-American college students who were bilingual in English and Spanish. A retroactive inhibition design was used with 4 conditions of transfer. Results support an interdependence hypothesis of bilingual organization of memory.—*Journal abstract*.

386. Lutz, William J. & Scheirer, C. James. (State U New York, Binghamton) **Coding processes for pictures and words.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 316-320.—Presented 288 undergraduates, in groups of 12, with either pictures or with the verbal names of the pictures in a recognition paradigm. Items were presented for either .25, .50, 1.00, or 2.00 sec with either .25, 1.00, or 2.00 sec between successive items. A recognition test followed where Ss gave confidence judgments on a 6-point rating scale as to whether they had seen the items before. Analysis of both correct responses and O sensitivity (estimated by signal detection theory methods) indicated that the processing rate for words was greater than the processing rate for pictures during the presentation interval, while these rates did not differ as a function of the interslide interval. Results are interpreted in terms of continuous processing models.—*Journal abstract*.

387. Marken, Richard S. & Sandusky, Arthur J. (U. California, Santa Barbara) **Stimulus probability and sequential effect in recognition memory.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 49-51.—Conducted an experiment with 12 undergraduates in which the bias for reporting "old" in a recognition-memory task varied inversely with the probability of presenting a previously studied item. The bias for an "old" response was also greater when the stimulus on the preceding trial was a new item. Results invalidate the assumptions of the theory of signal detection for recognition memory and indicate a need for sequential analysis of recognition memory data to obtain unambiguous measures of bias and retention.—*Journal abstract*.

388. Maskarinec, Ann S. & Brown, Sam C. (Kansas State U) **Positive and negative recency effects in free recall learning.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 328-334.—Examined the relationship between the magnitude of the positive recency effect in immediate free recall (IFR) and the magnitude of the negative recency effect in final free recall (FFR). 140 undergraduates learned 10 lists, followed by a FFR test. Across Lists 1-8 (each 21 words

in length) there was an increase in positive recency in IFR and a concomitant increase in negative recency in FFR. There was no negative recency in FFR for List 9 which was a short list (12 words), and List 10 (21 words). These results, plus order of recall data, support the hypothesis that negative recency is the product of a strategy wherein Ss learn to superficially encode end items in IFR because this is sufficient to guarantee their immediate recall.—*Journal abstract*.

389. McCormack, P. D. (Carleton U, Ottawa, Ontario, Canada) **Recognition memory for common words as a function of target/distractor ratio.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 445-446.—Gave adults 3 recognition-memory lists having different target to distractor (T-D) ratios. The obtained hit probabilities were invariant across successive fifths of a list under all conditions and were inversely related to T-D ratio. False alarms increased as a function of fifths of a list, the rate being inversely related to T-D ratio. Data are interpreted within an interference framework.

390. Miscik, John G. & Deffenbacher, Kenneth A. (Aberdeen Proving Ground, Human Engineering Lab, MD) **Short-term retention of visual sequences as a function of stimulus duration and encoding technique.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 188-190.—An earlier study concluded that (a) facilitation of short-term recall for auditory digit sequences by increases in digit duration were due to increased rehearsal time available and (b) efficient encoding techniques improved recall regardless of retention interval length. The present study confirmed these conclusions when digit sequences received both a visual and an auditory encoding.

391. Morris, P. E. & Stevens, R. (Open U, Bletchley, England) **Linking images and free recall.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 310-315.—An examination of the literature on free recall with instructions to form mental images suggests that recall is facilitated only when the images which are formed link items together. In Exp I and II 30 and 12 undergraduates, respectively, were instructed to form images which linked together 3 items in 1 image, or to form separate images to each item. Recall was facilitated for the linking imagery Ss, but the separate imagery Ss had no better recall than the controls. Exp III with 18 additional Ss demonstrated that there was no interference with subjective organization in the single image condition. Apparently, mental imagery improves free recall through strengthening of the association between items, and not by improving the distinctiveness, availability, or form of storage of the individual items. (20 ref) —*Journal abstract*.

392. Nace, Edgar P.; Orne, Martin T. & Hammer, A. Gordon. (Inst of the Pennsylvania Hosp, Philadelphia) **Posthypnotic amnesia as an active psychic process: The reversibility of amnesia.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 257-260.—Administered the Stanford Hypnotic Susceptibility Scales to 60 male undergraduates. Following suggested posthypnotic amnesia, highly hypnotizable Ss differed from less hypnotizable Ss not only in the small number of items recalled after hypnosis was terminated, but also in the high proportion of forgotten items subsequently remembered at an



appropriate signal. The joint effect of these processes is the absence of differences in total recall once amnesia is removed. Recovery of amnesic items after amnesia is lifted may serve as a criterion to distinguish ordinary forgetting from hypnotic amnesia and the ability to recover this transiently forgotten material may be used to predict future hypnotic performance. Reversibility is as effective a predictor as amnesia itself. Hypnotic amnesia can best be understood as an active process involving a reversible disturbance of memory retrieval. (16 ref) —*Journal abstract.*

393. Nelson, Thomas O. & Hill, Charles C. (U Washington) **Multiple retrieval paths and long-term retention.** *Journal of Experimental Psychology*, 1974(Jul), Vol. 103(1), 185-187.—Compared long-term free recall for Ss who learned either multiple retrieval paths (MPs) or a single retrieval path (SP). Although the 2 conditions had the same number of exposures to the items during acquisition, 7 wks later MP Ss had 23% higher free recall than SP Ss. Findings demonstrate that multiple retrieval paths facilitate long-term retention.

394. Okada, Ronald & Burrows, David. (Atkinson Coll., York U., Downsview, Ontario, Canada) **Divided attention and high-speed memory search.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 191-195.—Conducted a memory search experiment with 4 undergraduates using a fixed-set procedure. In the control condition, each item in the memory set was tested equally often. In the experimental condition, 1 item in the memory set was tested more often than the remaining items. Reaction time for positive and negative responses increased linearly with set size in both conditions and the 4 slope values did not differ. This result suggests that the overall rate of memory search was equivalent for the 2 conditions. However, in the experimental condition the frequently tested item was retrieved more quickly than the remaining items. This finding is inconsistent with an exhaustive search model. An alternative model involving a parallel search process is outlined. (16 ref) —*Journal abstract.*

395. Pellegrino, James W. (U. Pittsburgh) **Organizational attributes in list acquisition and retention.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 230-239.—Investigated acquisition and delayed retention in 200 undergraduates for a list that could be hierarchically structured according to taxonomic, orthographic, and relative size attributes. Experimental conditions varied the number of instructed attributes (3, 2, or 1) and the main attribute in the hierarchy (taxonomic or orthographic). Cued recall acquisition was facilitated by both instructions about additional attributes and the presence of the taxonomic attribute as the primary basis of recall organization. Free-recall retention was also facilitated when the taxonomic attribute was the primary list attribute, but there was no effect for number of instructed retrieval attributes. Organization data show that the latter result was not due to the loss of any attributes in multiple attribute conditions. Results are explained in terms of levels of processing, the relative contribution of the various attributes to the retrieval and recognition components of recall, and the importance of each component in list acquisition and retention. (15 ref) —*Journal abstract.*

396. Reardon, Eugene; Da Polito, Frank & Polzella, Donald. (U Dayton) **Associative organization in recognition memory.** *Perceptual & Motor Skills*, 1974(Jun), Vol. 38(3, Pt 2), 1123-1126.—Studied the effect of organization in word recognition. 40 undergraduates learned lists of 30 words, 15 presented in associatively related triplets and 15 presented in associatively unrelated triplets. No difference was found between lists when  $d'$  values were used as a measure of recognition performance. However, Ss gave higher confidence judgments for hits and false alarms from associatively related triplets. Results suggest that the familiarity distributions of old and new items may have shifted upward under the organized condition. —*Journal abstract.*

397. Restle, Frank. (Indiana U) **Critique of pure memory.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—Presents a theoretical analysis of the memory structure and organization and the relationship between the commonly recognized levels of memory (e.g., sensory buffer and short- and long-term memory). The process of information flow is examined in terms of expectancy and analysis functions. It is suggested that encoding is the process of incorporating information into a cognitive structure and that the depth of processing depends on the size and generality of the structure involved; storage is the maintenance of this organization. (20 ref)

398. Roenker, Daniel L. (Iowa State U.) **Role of rehearsal in long-term retention.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 368-371.—Investigated the role of rehearsal in long-term storage and retention within the negative recency paradigm, using 75 college students as Ss. For 1 group of Ss an unfilled interval was interpolated between presentation and test of each list in initial recall. For a 2nd group initial recall was also delayed, but only the 1st 1/2 of the interval was unfilled. Following several such lists a final free recall (FFR) of all items was required. Analysis of overt rehearsal patterns exhibited during the unfilled intervals showed that the number of rehearsals an item received was not related to FFR performance. Results are viewed as consistent with the position that there are 2 types of rehearsal—1 which facilitates long-term retention and 1 which does not. —*Journal abstract.*

399. Rosenberg, Sheldon; Schiller, William J. & Smith, Joan A. (U. Illinois, Chicago Circle) **Semantic factors in intentional and incidental sentence recall.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 19-21.—Exposed 6 independent groups of 20 undergraduate Ss each to normal or anomalous sentences under an incidental-nonsemantic (letter estimation), incidental-semantic (familiarity rating), or intentional-only orientation. Written recall followed 1 presentation of the sentences in each group. None of the differences between intentional and incidental-semantic Ss was significant, and semantic coding facilitated recall performance for both normal and anomalous sentences but to a greater extent for normal sentences. —*Journal abstract.*

400. Rosenthal, Ted L.; White, Glenn M. & Alford, Geary S. (U Arizona) **Some memory effects with sequential impoverished visual stimuli.** *Perceptual &*

*Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1115-1120.

—Studied retention of visual paths in 2 experiments using homogeneous circles presented graphically or by lights to minimize irrelevant cues that might support covert labeling. Ss were 90 undergraduates in Exp I and 60 in Exp II. Path lengths of 3, 5, 7, and 9 nodes, and memory loads of 1, 2, and 4 paths in depth were included. In both studies, simultaneous exposure led to better recall than serial presentation, and memory proved robust with little loss between 2- and 4-path memory loads. Providing letter props greatly improved retention. The effects of constant vs on-then-off light exposure depended on the length of paths.—*Journal abstract*.

401. Rosner, Sue R. & Lindsley, Diane T. (U Iowa) **The effects of retention interval on preschool children's short-term memory of verbal items.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 72-80.

—Tested the short-term recall of word triads by comparing retention over 3 types of intervals within 24 preschoolers. Retention was significantly lower in the 16 sec unfilled interval condition than in the immediate test condition. This result, predicted from preschoolers' rehearsal deficiency, differs from those obtained in previous adult and child studies. A filled interval condition, requiring irrelevant verbal activity during the 16-sec period, significantly reduced recall from that of the unfilled interval condition. Recognition of the word items on a subsequent recognition test was greater than chance and was not affected by interval condition. This suggests that the condition effects in short-term recall did not disrupt the long-term storage of the items. (15 ref)—*Journal abstract*.

402. Salzberg, Philip M. & Pellegrino, James W. (U Colorado) **The generation and recognition components of encoding specificity.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 9-11.—Used E. Tulving and D. M. Thompson's (see PA, Vol 80:10409) generation-recognition-recall paradigm using 6 groups of 18 undergraduate Ss each. The critical comparison involved the relative effectiveness of category cues which were either the same as or different from the input encoding of an item. Additionally, an attempt was made to gain control over any bias in responding to the cues by the manipulation of instructional information about the relevance of each cue. Results show that the probability of generating target items was slightly superior for same cues. Encoding specificity (defined as the same-different cuing effect) was demonstrated both in the recognition of generated items and in cued recall. Instructional manipulation generally tended to attenuate the same-different effect in recognition, thus suggesting a response bias component of the effect.—*Journal abstract*.

403. Segal, Bernard & Feger, Gary. (Murray State U) **Drug use and fantasy processes in college students.** *Journal of Altered States of Consciousness*, 1973(Fal), Vol 1(1), 5-14.—Used a drug-use questionnaire and Singer's Imaginal Process Inventory to study imagery and daydreaming correlates in 68 college marijuana users. A relationship between imagery processes and marijuana use was indicated. Marijuana users were more receptive of fantasy and were oriented toward seeking new experiences. It is concluded that marijuana may be used

to stimulate specific kinds of fantasies, and these may be related to basic personality characteristics. (25 ref)—*Journal abstract*.

404. Segui, Juan. (National Ctr for Scientific Research, U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[Differential retention of sentence components: Functional role or syntactic category?]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 171-178.—Attempted to determine whether the grammatical function of a word determines the probability that it will be retained. The nouns studied had the relation modifier-modified: one a nuclear noun (subject or object), the other its complement. Retention was better for the modified than for the modifier and recall of the modifier strongly related to recall of the modified. While recall of the modifier seemed to imply a preliminary recall of the modified, the converse was not true.—G. Rubin-Rabson.

405. Shiffrin, Richard M. & Grantham, D. Wesley. (Indiana U) **Can attention be allocated to sensory modalities?** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 460-474.—Examined the effects of attention allocation to the modalities of vision, audition, and touch in 3 experiments with a total of 14 paid undergraduates. Exp I and II simultaneously monitored all 3 sensory modalities for the presence of a near-threshold stimulus. A successive condition allowed S to give his full attention to each sensory modality in turn. There was no advantage for the successive condition, whether the task consisted of detection of a single stimulus (Exp I) or detection of the absence of one of many stimuli (Exp II). Exp III used a different paradigm to extend these results and bridge the gap between these results and those of others. It is concluded that selective allocation of attention to sensory modalities does not affect the early stages of perceptual processing. (39 ref)—*Journal abstract*.

406. Siegel, Jane A. (U Western Ontario, London, Canada) **Sensory and verbal coding strategies in subjects with absolute pitch.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 37-44.—Examined the performance of 6 university music students with absolute pitch and 6 without absolute pitch (controls) in 3 studies involving recognition memory for tone frequency. When the standard and comparison were 1/10 of a semitone apart, absolute-pitch Ss reported using a sensory coding strategy and did not differ from the controls in overall performance or rate of forgetting. When the stimulus difference was 3/4 of a semitone, absolute-pitch Ss shifted to a verbal coding strategy, and their memory for pitch was significantly better than the controls. With a 1-semitone difference, the absolute-pitch group showed no significant forgetting over a 15-sec retention interval filled with interference tones. These findings support the hypothesis that possessors of absolute pitch show superior pitch memory only when they can differentially label the stimuli with musical note names. (22 ref)—*Journal abstract*.

407. Skinner, Nicholas F.; Willems, Elizabeth & Stretch, Roger. (King's Coll, U Western Ontario, London, Canada) **Chunking vs associative chaining in paired associate recall.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 109-116.—Investigated paired-asso-



ciate (PA) recall under a retroactive inhibition paradigm with 64 college students. During original learning (OL), Ss learned PA response trigrams composed of either consonants, digits, or letter-digit combinations. Each interpolated learning (IL) response was identical to an OL response with the exception of the middle element. Although experimental Ss made significantly more complete errors (failure to recall entire IL trigrams under modified-modified-free-recall) than control Ss (who were not required to learn the IL list) on all types of verbal response content, overall results are consistent with both chunking and associative-chaining hypotheses of recall.

—*Journal abstract.*

408. Snodgrass, Joan G. & Antone, George. (New York U) **Parallel versus sequential processing of pictures and words.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 139-144.—A total of 40 undergraduates in 2 separate groups were shown picture and word pairs presented either in a spatial or a temporal relationship. The recognition test consisted of the same pairs with half in a reversed and half in the same order. Ss indicated on a 4-point rating scale which pairs were reversed and which were in the same order. Spatial memory was superior to temporal memory, and picture memory was superior to word memory, with no interaction between type of relationship and type of material. Thus no evidence was obtained for A. Paivio's hypothesis that verbal codes are specialized for sequential processing and pictorial codes for parallel processing. (23 ref)—*Journal abstract.*

409. Solso, Robert L. (Loyola U, Chicago) **Memory and the efficacy of cues or "yes, I know!" vs "why didn't I think of that?"** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974. ix, 386 p. \$14.95.—A review of the literature suggests that information on stimulus selection may also clarify variables affecting cue saliency, the nature of the structure of memory, decoding processes, and how stored information is synthesized. 2 factors which have paradoxical effects on cue efficacy are examined, and the process of multiple encoding and the application of the interstructural associative paradox to a variety of cognitive functions are discussed. (41 ref)

410. Sulin, Rebecca A. & Dooling, D. James. (Kent State U.) **Intrusion of a thematic idea in retention of prose.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 255-262.—Tested 2 implications of F. C. Bartlett's (1932) theory of memory: (a) that prose passages are stored in schematic form and (b) that thematic assimilation increases with the passage of time. In 2 experiments a total of 336 college students read brief biographical passages about either a famous or a fictitious person (e.g., Adolph Hitler vs Gerald Martin). Recognition memory for individual sentences was tested after intervals of either 5 min or 1 wk. As expected, passages with a famous main character yielded more false positive errors. In addition, the errors in this condition depended on the thematic relatedness of the recognition foil. The further prediction on thematic assimilation was also upheld—thematic effects were relatively greater at the longer retention interval. —*Journal abstract.*

411. Timmons, Beverly A. (U Victoria, British Columbia, Canada) **Delayed auditory feedback as a factor influencing retention.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 399-402.—Measured retention of difficult prose by 4 groups of 20 undergraduates, each, using a multiple-choice test. Group 1 read under normal conditions and was tested immediately. Group 2 read under normal conditions and was tested after 24 hrs. Group 3 read under .2-sec delayed auditory feedback with immediate testing, while Group 4 also read under delay but was tested after 24 hrs. All Ss reading under normal conditions obtained significantly higher scores than did the delayed groups. It is speculated that delayed auditory feedback may affect acquisition rather than retention. (18 ref)—*Journal abstract.*

412. Tunnell, Gilbert B. & Falkenberg, Philippe R. (Wake Forest U) **Effect of context on transfer of information from short- to long-term memory.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 495-501.—Conducted an experiment with 48 undergraduates, in which manipulation of the context in a short-term memory paradigm produced changes in the ability to recognize the same material from long-term memory 24 hrs later. If immediate recall was accurate, later recognition was improved if this recall was conducted with the same context as occurred at learning. If immediate recall was completely inaccurate, later recognition was improved if this recall was conducted with different context than was present at learning. Short-term recall did not need to be accurate to transfer learned nonsense trigrams to long-term memory. Manipulation of context 24 hrs after learning had no effect on recognition. Results are discussed in terms of the N. C. Waugh and D. A. Norman memory model, E. Tulving's encoding specificity hypothesis, and interference theory. —*Journal abstract.*

413. Wade, Terry C. (U. Utah) **Relative effects on performance and motivation of self-monitoring correct and incorrect responses.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 245-248.—Conducted a laboratory analog study with 32 college students to investigate the relative effects on responding and self-rated motivation when differently evaluated performance feedback components are self-monitored. A linear teaching machine programed with 10 sets of match-to-sample items was employed. Those Ss monitoring their correct or incorrect responses were compared to Ss receiving simple performance feedback and a control group which received neither self-monitoring instructions nor performance feedback. Specific analysis of the number and the proportion of correct responses indicated an overall superiority of self-monitoring compared to the other conditions. Analyses of the self-monitoring groups revealed a decline in performance over time for Ss recording their correct responses relative to Ss recording their incorrect responses. Additionally, repeated motivational self-ratings were highly correlated with correct response rates over time. —*Journal abstract.*

414. Walter, Donald A. & Hellebusch, Stephen. (U Notre Dame) **The role of associative elaboration in word recognition: Evidence for a two-stage test elaboration sequence.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 79-84.—Previous studies demonstrate that word associates presented for recognition in a

list are often misrecognized as their earlier root word; however, if the root word follows its associate, root word misrecognition does not occur. Results in the former situation have been explained by positing that early-activated implicit associative responses (IARs) are mistaken for later-activated representational response (RRs). In the present study it is argued that this explanation requires 1 of 2 modifications to explain lack of misrecognition in the latter situation. The 1st posits that IARs show greater memory persistence than RRs and predicts that false positive rates of the 2nd members of forward and backward associated list word pairs have different retention interval functions. The 2nd predicts no such difference because S discriminates PRs from IARs at the time of encoding and uses only RRs for "memory matches." No differences occurred over 5 retention intervals with 40 undergraduates. The 1st hypothesis was discarded; a 2-stage test elaboration sequence in word recognition is suggested.—*Journal abstract.*

415. Ward, L. Charles; Bennett, Jean H. & Bradford, C. (Murray State U) **The effects of postresponse stimulus duration upon the short-term retention of verbal discrimination pairs.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 87-92.—Tested 60 undergraduates for short-term retention of verbal discrimination pairs consisting of 3-place consonant syllables with high intrapair formal similarity. Each pair was shown twice with successive presentations separated by either 0, 1, 2, or 3 interpolated pairs. Different groups received either a 0-, 1-, or 3-sec postresponse stimulus duration (PSD)—duration of exposure of the stimulus pair following a button-pressing response. Increasing PSD from 0 to 1 sec led to improved retention, but the increase from 1 to 3 sec resulted in no further improvement. Retention decreased with increasing numbers of interpolated items, and the rate of decrease was not dependent upon PSD. Contingent probability analyses showed that the probability of a correct response on the 2nd occurrence of a pair was higher following a correct guess to its 1st occurrence than following an incorrect guess.—*Journal abstract.*

416. Warren, Linda . (Williams Coll) **An analysis of proactive inhibition in a cued recall task.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 131-138.—In a study with a total of 216 college students, control (C) groups learned a test list of initial letter-cued adjectives, while experimental (E) groups learned 2 prior lists and then the test list. One C and 1 E group were tested under each of 3 recall conditions either 15 min or 48 hr after learning. Analysis of the recall results focused on assessing the role of loss of response availability, loss of list differentiation and response competition in producing proactive inhibition. The underlying source of interference appeared to be loss of list differentiation. It is suggested that competition and loss of availability might be consequences of this loss, rather than reflecting independent interference mechanisms. (16 ref)—*Journal abstract.*

417. Weiss, Ethel & Warshak, Richard . (City Coll, City U New York) **Three studies of retroactive-inhibition during free-recall from a disinhibition perspective.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2),

1151-1157.—Studied the effect of a whistle (hypothesized to be disinhibiting) on retroactive inhibition in 3 experiments with a total of 288 undergraduates. Each experiment used a 2 (whistle vs no whistle)  $\times$  3 (retroactive inhibition, unrelated list, or unrelated task conditions) factorial design. In Exp I an unexpected blast (whistle condition) was presented as Ss began terminal List-1 recall. In Exp II the whistle was presented as Ss began the 1st test trial of List-2 acquisition. In Exp III the whistle was presented as Ss began the 3rd (and terminal) test trial of List-2 acquisition. The disinhibition hypothesis was not supported. The whistle impeded the organization of List 1 in Exp I, reduced the amount of transfer in List 2 in Exp II, and had no effect on relatively well-learned material in Exp III. It is concluded that a novel stimulus tends to disrupt labile learning, and that the effects are specific and transitory.—*Journal abstract.*

418. Winnick, Wilma A.; Kooper, Fae & Sprafkin, Joyce. (Queens Coll., City U. New York) **Free recall as a function of type of evoking stimulus.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 269-273.—Conducted 2 experiments with a total of 96 undergraduates. In Exp I, recall for words whose definitions were presented was contrasted with recall following presentations of pictures of the objects denoted by the words and of the words themselves. Highest recall scores were produced by the definitions in comparisons both across 3 groups given different materials and within a 4th group given the 3 kinds of materials. Exp II compared recall following presentation of the same definitions with recall for the same words in 2 other verbal context—sentences ending in these words and the same sentences in incomplete form that required the word to be supplied. The superior recall found for both incomplete sentences and definitions appeared to be caused by a combination of imagery arousal and problem-solving activity.—*Journal abstract.*

### Motivation & Emotion

419. Badia, Pietro; Culbertson, Stuart A. & Harsh, John . (Bowling Green State U) **Relative aversiveness of signaled vs. unsignaled avoidable and escapable shock situations in humans.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 338-346.—Conducted 2 experiments dealing with signaled and unsignaled shock, using a total of 18 male college students. In Exp I 6 Ss avoided shock, and in Exp II 12 Ss escaped shock by pressing one button under an unsignaled shock condition. By pressing on a separate button, Ss could change to signaled avoidance (Exp I) or signaled escape (Exp II). All Ss changed from the unsignaled to signaled condition whether shock was avoidable or escapable. 6 Ss were also given a chance to change from signaled to unsignaled escapable shock. Changeover responding remained at or near operant levels for these Ss. Comparing results of this study with studies using the rat revealed much similarity but some differences. Differences depended upon whether an escapable or avoidable procedure was used.—*Journal abstract.*

420. Cupchik, Gerald C. & Leventhal, Howard . (U Toronto, Ontario, Canada) **Consistency between expressive behavior and the elevation of humorous stimuli:**



**The role of sex and self-observation.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 429-442.—2 studies investigated the relationship between the expressive behaviors of smiling and laughing (mirth) and the evaluations of the funniness of cartoon stimuli. Study 1 replicated past findings that suggest that feedback from mirth reactions directly influences funniness ratings in female Ss but does not directly influence funniness ratings in male Ss. Study 2 provided evidence of a sex difference in the link between mirth and evaluation. It was hypothesized that making Ss aware of their mirth, by asking them to self-observe and rate their own smiling and laughing, isolates the mirth reactions and reduces their influence upon evaluations of funniness. The elimination of the influence of mirth should lower funniness ratings of female Ss and eliminate any increase in rated funniness produced by canned laughter. No such effects were predicted for males. The data support the hypotheses. A wider range of possible causes for self-observation effects is given than is mentioned in most recent theories of self-observation. (31 ref)—*Journal abstract*.

421. Davis, John & Lamberth, John. (U. Oklahoma) **Affective arousal and energization properties of positive and negative stimuli.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 196-200.—Investigated affect-arousing and energizing properties of positive and negative reinforcing stimuli with 75 undergraduates. Ss received positive evaluations (PE), similar attitudes (SA), neutral statements (NS), dissimilar attitudes (DA), or negative evaluations (NE) presented on slides. Pre- and postslide semantic differentials were filled out by each S as a measure of affect. All Ss then learned a paired-associate (PA) list composed of both noncompetitive and competitive pairs as a measure of energization level. The Taylor-Spence drive theory predictions for performance on noncompetitive and competitive tasks provided a sensitive measure of relative drive re-energization levels induced by the reinforcing stimuli. Consistent with past research, semantic differential scores showed NE more powerful than DA in arousing negative affect and PE more powerful than SA in arousing positive affect. Performance on the PA learning task showed a higher energization level for the NE condition than for the DA condition. The PE and SA conditions were hypothesized to be energizing rather than drive reducing. In support of the hypothesis, the PE condition showed a higher energization level than the SA condition. (16 ref)—*Journal abstract*.

422. Day, David A. & Rourke, Byron P. (St Michael's Hosp, Toronto, Ontario, Canada) **The role of attention in "lie-detection."** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 270-276.—Randomly assigned 80 male college students to 1 of 4 groups. Tape-recorded instructions directed Ss in Groups 1 and 2 to evaluate a psychological case history or a newspaper story, respectively. Group 3 read about a kidnapping after being told they were participating in a lie-detection experiment and would be questioned on the material later. Group 4 was given the same information as Group 3, but was told that they should not reveal the information when questioned. Galvanic skin responses (GSRs) were measured as Ss listened to tape-recorded

questions on the material read; no verbal responses were made. The E then attempted to determine "blindly" which target information S had received by examining the GSRs. The number of Ss whose given information was successfully detected was significant in Groups 2, 3, and 4. Results suggest that simply attending to or focusing upon relevant information is a sufficient condition for detectability in a lie-detection situation. (French summary)—A. Olson.

423. Ekehammar, Bo. (U Stockholm, Psychological Lab, Sweden) **Sex differences in self-reported anxiety for different situations and modes of response.** *Scandinavian Journal of Psychology*, Vol 15(2), 154-160.—Citing the need for studies of sex differences for inventories where both situations and modes of response are selected separately, an analysis was made with regard to sex differences in both level and variability of self-reported anxiety for total scores, factor scores, and single situation and response scales. Ss were 58 male and 58 female 9th graders. The inventory comprised 17 situations and 18 modes of response. With a few minor exceptions the analyses showed consistent sex differences throughout, with females scoring higher than males and showing greater interindividual variability in reported anxiety. Results are discussed in relation to sex differences reported for physiological variables. (43 ref)—*Journal abstract*.

424. Haley, Graham A. (York U., Toronto, Ontario, Canada) **Eye movement responses of repressors and sensitizers to a stressful film.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 88-94.—A total of 24 undergraduates scoring high, intermediate, or low on the Byrne Repression-Sensitization Scale viewed an industrial accident film while horizontal eye movements were assessed by means of infrared corneal reflection. Neutral and stressful film segments were scored in terms of deviations from the center of the perceptual field (point-of-looking scores), and the standard deviations of these scores were calculated as an index of perceptual scanning. A stressful segment was also dichotically scored to determine whether the point of looking was on or off dominant elements of the scene. Results indicate that repressors and sensitizers had equivalent levels of perceptual scanning (which were significantly higher than intermediates' level) and were independent of film segment content. However, repressors and sensitizers differed in on-off and average point of looking for the stressful segment such that repressors were avoiding stressful content. Data suggest that relatively high perceptual scanning can be an avoidant defensive style of attending to dynamic stimulus displays. The issue of adaptiveness of responding is considered. (18 ref)—*Journal abstract*.

425. Haney, Jack N. (Memphis State U) **Repressors' and sensitizers' affective change during free association.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1172-1174.—30 undergraduates identified as either repressors, sensitizers, or controls by Byrne's Repression-Sensitization scale free associated to threatening and nonthreatening stimuli for 1-40 sec, giving ratings of affective states after each response period. In spite of the fact that sensitizers showed greater "approach" responding, they did not reduce their anxiety levels. Data suggest

the need to reevaluate the presumed anxiety-reducing function of sensitizing behaviors.

426. Jernyrd, Elisabeth. (U Malmö, School of Education, Sweden) **Optimal resistance to authority and propaganda: Measuring instruments, age developments, and educational influences.** *Didakmetry & Sociometry*, 1973, Vol 5(2), 27-53.—Investigated the ability of students to differentiate between different types of information, to make independent decisions, and to resist nonobjective attempts to influence them. Experimental test batteries and measuring instruments included (a) methods intended to give information as to how far the students choose, pass on, or are influenced by nonobjective information; (b) perception experiments with group pressures; (c) ratings; and (d) personality tests (related to anxiety, rigidity, authoritarianism, dogmatism, self-esteem, and field dependence). The test data from a total of 630 1st, 3rd, 5th, 7th, and 9th graders were subjected to factor analyses, and detailed analyses of age and sex differences were made. A preliminary teaching-material unit (intended to increase students' ability to protect themselves when exposed to nonobjective influence) was constructed and tested. Recommendations for continued research and practical application are outlined. (26 ref)—*Journal abstract*.

427. Madsen, K. B. (Royal Danish School of Educational Studies, Copenhagen) **Modern theories of motivation: A comparative metascientific study.** New York, NY: John Wiley & Sons, 1974. 472 p. \$27.50.—Presents an analysis of the important theories of motivation in an attempt to establish a new scientific discipline—the comparative study of theories of "systematology." The concept of this new metascience is outlined, and an historical introduction to motivational psychology and the metastrata, hypothetical strata, and descriptive strata of over 30 theories of motivation are presented. (8 p ref)

428. Neufeld, Richard W. & Davidson, Park O. (U Western Ontario, London, Canada) **Dimensionality of subjective response to a selection of complex aversive stimuli.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 258-269.—Investigated the dimensionality of subjective responses to a variety of stressor stimuli using a multidimensional scaling procedure with 30 undergraduates as Ss. Results indicate that the subjective perception of these stimuli was multidimensionally determined but with only 1 inter-S viewpoint about the obtained dimensionality. Stimulus projections on 2 dimensions were significantly correlated with scaled values of a unidimensional stress scale and were found not to be independent of a subjective attention scale. Speculations about the nature of the obtained dimensional structure, along with possible implications for assessing mechanisms of coping with stress, are discussed briefly. (French summary) (41 ref)—*Journal abstract*.

429. Oliver, Steven D.; West, Robert C. & Sloane, Howard N. (U Utah) **Some effects on human behavior of aversive events.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 481-493.—Examined aggressive behavior in humans in 2 studies. In Exp I 10 37-52 yr old males working on a plunger-pulling task could receive a 3.5 mA

shock at 75% probability every 2 min. The shock was unrelated to their plunger pulling behavior. Ss could press a toggle switch to deliver electric shock to E, who was visible to the Ss as an alleged O. 3 sessions in which no shock was delivered alternated with 2 sessions in which shock was delivered. In shock sessions Ss pressed the toggle switch and shocked the O at an average rate more than 9 times higher than in the nonshock sessions. In Exp II baselines of aggressive behavior were collected for 3 consecutive 120 or 90 min segments daily. Ss were 2 7-8 yr old boys. Noncontingent time-out seemed to control an above-baseline rate of aggressive behavior in the segments in which it was programed, as well as in the segment adjacent to that in which it was programed, and in which time-out was not programed at all. Results replicate animal laboratory findings relating noncontingent aversive stimulation to aggressive behavior. (24 ref)—*Journal abstract*.

430. Weaver, Donald & Brickman, Philip. (Northwestern U) **Expectancy, feedback, and disconfirmation as independent factors in outcome satisfaction.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 420-428.—Contends that previous research on the expectancy disconfirmation problem has been unjustified in concluding that no disconfirmation effect exists because (a) proper tests for the effect were conducted only for low expectancy Ss and (b) cumulative effects of expectancy disconfirmation comparable to the cumulative effects of winning or losing were never assessed. The present study achieved these ends by unconfounding overall performance expectancy and expectancies, outcomes, and disconfirmations on individual trials. 96 college students were given either high or low overall expectancies and then played a series of 20 games. On each game, Ss made outcome predictions that were confirmed either 25, 50, or 75% of the time, independently of overall expectancies, trial outcomes, and overall feedback. Results show that a loss on a particular trial was less satisfying when unexpected and a win on a particular trial was more satisfying when expected only for Ss with high overall expectancies; cumulative expectancy disconfirmation had a negative effect on all of the Ss. (34 ref)—*Journal abstract*.

431. Zajonc, R. B.; Crandall, Rick; Kail, Robert V. & Swap, Walter. (U Michigan) **Effect of extreme exposure frequencies on different affective ratings of stimuli.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 667-678.—Conducted 2 experiments with female undergraduates ( $N = 152$ ) to examine the effects of extreme number of exposures on reactions to stimuli rated on several dimensions. Exp I gave a positive monotone relationship between affective ratings on the Good-Bad scale and the frequency of stimulus exposure, with frequencies as high as 243. Exp II obtained ratings for the same exposure frequencies on 4 scales, some of which measured affiliative approach while others measured exploratory approach reactions. The former tended to show an increase with frequency of exposure and the latter a decrease. Theoretical analysis attempted to reconcile experimental evidence which indicates increasing affect with increasing exposure and evidence for an inverted-U relationship. (36 ref)—*Journal abstract*.



## NEUROLOGY AND PHYSIOLOGY

432. Borkovec, Thomas D.; Stone, Norman M.; O'Brien, Gerald T. & Kaloupek, D. G. (U. Iowa) **Evaluation of a clinically relevant target behavior for analog outcome research.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 503-513.—Exposed 23 socially anxious and 23 nonanxious male undergraduates (determined by Fear Survey Schedule scores) to 2 brief interactions, 3 wks apart, with a female confederate. Half of each anxiety group were given low-demand-for-improvement posttest instructions, while half were presented high-demand instructions. The procedure validly discriminated the 2 anxiety groups on several self-report, behavioral, and heart-rate measures. Demand manipulations had no positive effect on any measure. Physiological arousal was substantial and showed no evidence of habituation from pre- to posttest exposures. (19 ref)—*Journal abstract*.

433. Krausman, David T. & Lenox, John R. (Johns Hopkins U., Medical School) **An on-line integrator for alpha quantification.** *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 317-320.—Presents details of an integrator which permits an alternate mode of operation where time-synchronized resets, in lieu of voltage-dependent resets, produce variable height voltage ramps whose amplitude is a direct function of the accumulated alpha activity per unit time. This method of preprocessing and signal conditioning the alpha components of the EEG waveform provides a simple analog registry of on-line real-time correlation of alpha activity with various physiological and behavioral activity.

434. Leon, Arthur S.; Thomas, Paul E.; Sernatinger, Eda & Canlas, Aida. (U Minnesota, Medical School, Div of Clinical Pharmacology) **Serum dopamine beta-hydroxylase activity as an index of sympathetic activity.** *Journal of Clinical Pharmacology*, 1974(Jul), Vol 14(7), 354-362.—Evaluated the sensitivity serum dopamine  $\beta$ -hydroxylase (DBH) as an index of sympathetic-adrenal function. Groups of male rats and 3 adult hospital patients served as Ss. Determinations on the rats were made following swimming stress; in the humans they were made with postural changes, cold pressor testing, and handgrip isometric exercises, and following coffee drinking, cigarette smoking, and ketamine anesthesia. Results indicate that rat serum DBH activity increased after swimming stress. In the human Ss there was inter-S but little intra-S variation. S's activity was not influenced by blood pressure levels or postural changes. Stimulation by cold pressor stress, handgrip isometric exercise, cigarette smoking, and ketamine administration inconsistently resulted in a small increase in serum DBH activity. It is concluded that as an index of sympathetic activity this approach is less sensitive than measuring circulating catecholamines in the rat, and is of limited value in humans. (23 ref)—*P. Federman*.

435. Smith, Jamie. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Regeneration in the mammalian central nervous system: A re-evaluation.** *Biological Psychology Bulletin*, 1973(Dec), Vol 3(2), 57-67.—Discusses recent findings in support of earlier conclusions that regeneration can achieve functional reconnections in the mammalian brain and spinal cord. Data contradicting the earlier conclusions are reviewed in the light of

new evidence. Some of the implications of neural regeneration for recovery of function after damage to the CNS are discussed. (38 ref)—*Journal abstract*.

436. Weiskrantz, Lawrence. (U Oxford, England) **Brain research and parallel processing.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 53-54.—Comments upon and counterviews an article by W. G. Webster (1973) on brain functions. The importance of both serial-processing and parallel-processing aspects of nervous system function is stressed.

437. Wittles, Ilene & Bornstein, Philipp E. (Washington U) **A note on stress and sex determination.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 333-334.—Examined D. H. and L. Schuster's hypothesis that relative stress of the mother and father is a determinant of the sex of the newborn (i.e., the less stressed parent reproduces its own gender). Studies of children born to women who were rape victims show that more of the newborns were male than female, and it is suggested that the hypothesis deserves further research.

## Neuroanatomy &amp; Electrophysiology

438. Arnauld, E.; Vincent, J. D. & Dreifuss, J. J. (U Bordeaux II, Faculty of Medicine, Lab of Neurophysiology, France) **Firing patterns of hypothalamic supraoptic neurons during water deprivation in monkeys.** *Science*, 1974(Aug), Vol 185(4150), 535-537.—Water deprivation in 5 adult female rhesus monkeys caused an acceleration of action potential firing of supraoptic neurons, but not of neurons located 2-3 mm above the hypothalamic supraoptic nucleus. Whereas in the normally hydrated animal only 12% of the neuroendocrine cells discharged periodically, the proportion of these periodic bursters increased markedly with increasing plasma osmolarity. This finding suggests that such periodically firing supraoptic neurons are those engaged in active neurohypophyseal hormone secretion.—*Journal abstract*.

439. Bartus, Raymond T. & Ferris, Stephen H. (Park-Davis & Co, Research Div, Ann Arbor, MI) **Neural correlates of habituation and dark adaptation in the visual cortex of the rat.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 55-59.—Implanted 16 albino rats with monopolar electrodes over primary visual cortex. Averaged evoked responses (AERs) to repetitive flashes of light were evaluated during habituation and dark adaptation at 2 stimulus intensity levels. No consistent changes occurred in the early AER components if Ss were dark adapted prior to testing. However, increases in amplitude of early components occurred over trials in non-dark-adapted Ss, with greatest increase occurring with the lower stimulus intensity. Changes occurred over repeated stimulus presentations, a finding easily explained by concepts of habituation. Increases and decreases in amplitude were observed depending upon the particular component, with the greatest effects resulting from stimulation with the less intense light. These changes support the notion that early and late components represent different classes of neural events. (24 ref)—*Journal abstract*.

440. Bliwise, D. et al. (U Chicago) **Facial muscle tonus during REM and NREM sleep.** *Psychophysiology*, 1974(Jul), Vol 11(4), 497-508.—Devised equipment and procedures for quantifying relatively noise-free record-

ings of low-amplitude chin and lip electromyograms (EMGs) during sleep. A total of 28 rapid-eye-movement (REM) periods were recorded from 5 paid female graduate and undergraduate students. Tonic EMG levels declined toward their lowest level of the night beginning 5 min in advance of REM periods. With very rare exceptions, the lowest EMG levels of the night were maintained throughout REM sleep. During the 20 min of non-REM (NREM) sleep which followed REM periods, mean EMG levels increased over the REM levels but were lower than those recorded during the 20 min of NREM sleep which preceded the REM periods. This pattern of tonic EMG variation obtained for each of the 1st 3 REM periods of the night.—*Journal abstract.*

441. Booth, C. S. & Hahn, J. F. (U Virginia) **Thermal and mechanical stimulation of type II receptors and field receptors in cat.** *Experimental Neurology*, 1974(Jul), Vol 44(1), 49-59.—Obtained single-unit responses from type II receptors and field receptors in 27 anesthetized cats in response to mechanical stimuli, thermal stimuli, and combinations of the stimuli. Coding of the 2 kinds of stimulus information was such that information about each kind of stimulus could be recovered from a population of field receptors but not from a population of type II receptors. The behavioral data available do not suffice to determine whether or not the thermal information is put to behavioral use.—*Journal abstract.*

442. Bothe, G. G.; Zahn, D. A. & Elfner, L. F. (Florida State U) **The effects of physical stimulus complexity on the auditory-evoked response.** *Biological Psychology*, 1974, Vol 1(4), 261-275.—Investigated whether the degree of stimulus-oriented attention as inferred from the cortical-evoked response varies systematically with the physical stimulus complexity. The 760-msec auditory stimulus consisted of 10 bursts of pure tone. 4 levels of complexity in 2 arrangements were employed, with 8 normally hearing undergraduates in each of the 8 conditions receiving 500 stimulus presentations/S. Evoked responses were detected through electrodes placed at the vertex and mastoid with a forehead ground. Direct observation of the data and the results of stepwise discriminant analyses show that  $N_1$ - $P_2$  amplitudes decreased over time in all conditions, although the effect was most prominent in the least complex stimulus conditions.  $P_2$ - $N_2$  amplitudes, however, showed an increase over time, with the increase most prominent in highly complex conditions. Results are discussed in terms of the repeated stimulation of specific neural units and neural recovery times. (19 ref)—*Journal abstract.*

443. Brask, T. & Falbe-Hansen, J. (Gentofte U Clinic, Copenhagen, Denmark) **Electronystagmography on normal persons.** *Acta Oto-Laryngologica*, 1974(Jun), Vol 77(6), 412-417.—Used electronystagmography to study spontaneous, positional, and caloric nystagmus in 20 normal persons. A pendulum test was also performed. 3 Ss exhibited spontaneous nystagmus and another 6 Ss had positional nystagmus in 1-4 positions. The pendulum test appeared well-suited for distinguishing between centrally and peripherally conditioned nystagmus. (German summary)

444. Burton, Charles E.; David, Robert M.; Portnoy, William M. & Akers, Lex A. (Texas Tech U, Biomedical Systems Lab) **The application of Bode analysis to skin**

**impedance.** *Psychophysiology*, 1974(Jul), Vol 11(4), 517-525.—Describes a method for analyzing skin impedance data and applies the procedure—Bode analysis—to the determination of a steady-state electrical model for intact human skin. Bode plots are employed to synthesize a passive equivalent circuit from sample measurements of "black box" skin impedance magnitude and phase angle, and representative values for the circuit elements are presented. (19 ref)

445. Cazard, P. (Langley Porter Neuropsychiatric Inst, San Francisco, CA) **[Interhemispheric synchrony of parietal-occipital alpha rhythms, attention, and conscious experience.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 7-22.—Recorded the EEGs of 6 Ss from 2 pairs of symmetrically positioned electrodes and determined the interhemispheric synchrony of the filtered alpha rhythms by a correlation coefficient. Positive values of  $r$  were used to determine the loudness of a tone fed back to the S. Sustained maximum loudness appeared when Ss succeeded in voluntarily maintaining a stabilized field of awareness and allowed themselves to be deeply absorbed in this cognitive act. When they made intense efforts to focus attention on activities like performing mental arithmetic or clenching the fist, the sound disappeared. A tone of medium and variable intensity corresponded to the usual fluctuations of the alpha rhythm of an S with eyes closed and mentally relaxed. Results suggest a distinction, from the EEG viewpoint as well as from the subjective one, between the effort of attention to an object and the effortless cognitive experience which results from it. (47 ref)—G. Rubin-Rabson.

446. Gruberg, Edward R. & Ambros, Victor R. (Massachusetts Inst of Technology, Research Lab of Electronics) **A forebrain visual projection in the frog (*Rana pipiens*).** *Experimental Neurology*, 1974(Aug), Vol 44(2), 187-197.—Traced a projection in leopard frogs from the lateral anterior thalamus via the lateral forebrain bundle to the ipsilateral striatum in the ventrolateral area of the forebrain. Single-unit recording revealed that this area contained visual units that responded to the on and off of light. (18 ref)

447. Hume, Ann L. (U Auckland, New Zealand) **Auditory detection and optimal response biases.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 425-433.—Trained 12 male albino rats to detect a signal consisting of an increment in the intensity of a random noise. One response was defined as correct and reinforced with brain stimulation if the signal was presented, and another was correct and reinforced if the noise alone was presented. In Exp I the probability of presenting the signal was varied over 4 values between .4 and .6. In Exp II the number of brain stimulations consequent upon a correct response in the presence of the signal was varied over 4 values between 3:1 and 1:2. Differences of .10 and .05 in the signal probability, and unit differences in the ratio of brain stimulations, resulted in distinctly different bias functions. Accuracy of detection increased with signal intensity and was independent of Ss' response biases. When the signal probability was varied, Ss optimized the number of correct trials and hence the number of brain stimulations obtained. When the ratio of brain stimulations was varied, Ss compromised



between optimizing the number of correct trials and optimizing the number of brain stimulations obtained. (31 ref)—*Journal abstract*.

448. Lidsky, T. I.; Levine, M. S. & MacGregor, S. (U Rochester) **Hippocampal units during orienting and arousal in rabbits.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 171-186.—Recorded unit responses in CA1 of the hippocampus of 22 awake, restrained male New Zealand white rabbits concurrently with cortical EEG, nuchal electromyogram, and electrocardiogram. Changes in rate of unit activity were nonlinearly related to changes in arousal level, whether the latter occurred spontaneously or were evoked by novel stimuli. Data are discussed in relation to models proposing hippocampal roles in orienting and modulation of arousal. (24 ref)—*Journal abstract*.

449. Lidsky, T. I.; Levine, M. S. & MacGregor, S. (U Rochester) **Tonic and phasic effects evoked concurrently by sensory stimuli in hippocampal units.** *Experimental Neurology*, 1974(Jul), Vol 44(1), 130-134.—Phasic and tonic unit responses recorded from the anterior dorsal hippocampus of awake New Zealand white rabbits suggest that these responses represent separable response types because they varied in stability, presence, and magnitude. Data indicate that both auditory and visual stimuli evoke phasic excitatory responses in the hippocampus and should be investigated in paradigms similar to those employed with tonic responses.

450. Loveless, N. E. & Sanford, A. J. (U Dundee, Scotland) **Slow potential correlates of preparatory set.** *Biological Psychology*, 1974, Vol 1(4), 303-314.—11 experienced undergraduate Ss performed a simple reaction time task under the classical normal, sensory, and motor set instructions. Computer averaging of the EEG confirmed that slow potential changes during the foreperiod could be analyzed into 2 components: an orienting response following the warning signal, and an expectancy wave anticipating the reaction signal. The orienting response was not affected by instructions, but the amplitude of the expectancy wave was proportional to changes in the level of preparatory set as inferred from reaction time. Interaction between this effect and the intensity of the reaction signal suggests that the expectancy wave reflects shifts of the criterion governing the intensity required to initiate a response. Some methods of investigating this possibility are suggested. (30 ref)—*Journal abstract*.

451. Martindale, Colin & Armstrong, James. (U Maine, Orono) **The relationship of creativity to cortical activation and its operant control.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 311-320.—On the basis of theories and research on cognitive and perceptual processes, several hypotheses concerning psychophysiological differences between high- and low-creative Ss were made. 30 male undergraduates were divided into high- and low-creative groups on the basis of the Remote Associates Test and a version of the Uses test. Basal alpha index, alpha blocking in response to stimulus onset, and performance on alpha enhancement and suppression in a feedback situation were measured. High-creative Ss exhibited a lower alpha index and a greater decrement in alpha due to stimulus onset. High creatives showed immediate acquisition of control in

alpha enhancement trials but no improvement across trials, while low-creative Ss showed continual improvements and quickly reached the level of control of high-creative Ss. High creatives were much better at alpha suppression than at alpha enhancement. (43 ref)—*Journal abstract*.

452. Morris, Peter E. & Gale, Anthony. (Open U, Bletchley, England) **A correlational study of variables related to imagery.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 659-665.—Reports on an exploratory correlation study of a number of variables relating to imagery. The EEG of each of 32 undergraduate Ss was monitored during postobservation imaging to words varying in imagery. Ss then recalled the words and completed several questionnaires. The following significant correlations were obtained: (a) A. Paivio's I-rating of words and experienced imaging; (b) experienced imaging during the task and alpha abundance (EEG); (c) the Betts Test of Vividness of Imagery (QMI) and the Gordon Test of Visual Imagery Control; (d) the Betts QMI and incidental recall of words; (e) the Gordon test score and incidental recall; (f) the Betts QMI and extraversion; and (g) extraversion and alpha abundance. 2 interesting correlations which failed to reach significance were (a) Paivio's I-rating of words and alpha suppression, and (b) Paivio's I-rating of words and incidental recall. Both findings may be attributed to the effects of differential instruction to image. (18 ref)—*Journal abstract*.

453. Motokizawa, Fumiaki. (Gunma U, School of Medicine, Maebashi, Japan) **Electrophysiological studies of olfactory projection to the mesencephalic reticular formation.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 135-144.—Analyzed single unit responses and field potentials of the mesencephalic reticular formation following olfactory stimulation in trigeminally deafferented, unanesthetized, and immobilized cats. Out of 167 units isolated, 97 units (58%) responded to odor stimulation. 2 major types of response—prolonged acceleration or reduction of the firing rate—were identified in these units. Both responsive and unresponsive units were distributed widely in the mesencephalic reticular formation and in the central gray matter. Reticular units could also be activated by electrical stimulation of the olfactory bulb. By applying single shocks to the olfactory bulb, field potentials were evoked from the prepyriform cortex, preoptic and posterior hypothalamic regions of the medial forebrain bundle ipsilateral to the stimulation, and bilaterally in the mesencephalic reticular formation. Following lesions of the medial forebrain bundle, the potentials induced from the olfactory bulb ipsilateral to the lesion were completely abolished. It is concluded that olfactory impulses project to the mesencephalic reticular formation through the medial forebrain bundle. (17 ref)—*Journal abstract*.

454. Murphy, J. T.; Kwan, H.; Mackay, W. A. & Wong, Y. C. (U Toronto, Ontario, Canada) **Evaluation of neuronal spike trains in neurophysiological experiments.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 313-315.—Describes a simple method of analysis of spike train data from single neurons which avoids loss of relevant information. Examples of its usefulness in

describing stochastic properties and in detecting nonstationarities are presented.

455. Nääätänen, Risto & Gaillard, Anthony W. (U Helsinki, Inst of Psychology, Finland) **The relationship between the contingent negative variation and the reaction time under prolonged experimental conditions.** *Biological Psychology*, 1974, Vol 1(4), 277-291.—Recorded vertex, frontal, and temporal contingent negative variations (CNVs) from 3 highly experienced Ss during the S<sub>1</sub>-S<sub>2</sub> interval of a prolonged simple reaction time (RT) task and correlated them with RTs obtained. Data were measured in 2 ways: objectively, by measuring the CNV by means of a computer; and less objectively, by measuring the CNV by means of a ruler from the computer-averaged graphs in the traditional manner. Several amplitudes, as well as the vertex, frontal, and temporal evoked potentials to S<sub>1</sub> and S<sub>2</sub>, were measured. No systematic relationship between different CNV measures and the RT could be observed. Whereas the amplitudes of the evoked potentials clearly habituated during the experimental session, the amplitudes of the CNV remained at their original values. (29 ref)—*Journal abstract*.

456. Perkel, Donald H. & Mulloney, Brian. (Stanford U) **Motor pattern production in reciprocally inhibitory neurons exhibiting postinhibitory rebound.** *Science*, 1974(Jul), Vol 185(4146), 181-183.—Suggests that pairs of neurons which inhibit each other can produce regular alternating bursts of impulses if they also exhibit postinhibitory rebound (PIR). Computer studies were conducted which show that stable patterns occur spontaneously in systems of pacemaker neurons with PIR, and can be triggered in systems of nonpacemakers without requiring tonic excitation. The repetition rates of these patterns were determined largely by the PIR parameters. The patterns resisted perturbation by phasic synaptic inputs, but could be modulated or turned off by tonic inputs. One pair of PIR neurons may be entrained by another pair with a different repetition rate to produce more complex firing patterns.—*Journal abstract*.

457. Shephard, Peter. **Chemoreception in the antennule of the lobster, *Homarus americanus*.** *Marine Behaviour & Physiology*, 1974, Vol 2(3), 261-273.—Results of recording responses by hook electrode from small nerve fibre bundles in the lobster antennular nerve show striking differences in response spectrum between the single and multiunit responses. Findings suggest the presence of 2 major classes of antennular chemoreceptor and suggest the idea that the antennules are the site of sensitive chemoreceptors mediating such distance chemoreception responses as are seen in trapping behavior. (15 ref)

458. Shucard, David W. & Callaway, Enoch. (National Jewish Hosp & Research Ctr, Psychophysiology Research Lab, Denver, CO) **Auditory evoked potential amplitude and variability: Effects of task and intellectual ability.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 284-294.—Studied the effect of stimulus uncertainty, attention, interstimulus interval, and amount of time in the experimental situation on the average auditory evoked potential in 2 groups of 8 19-29 yr old males separated according to differences in intellectual ability. Results indicate that in general,

evoked potential amplitude was greater (a) for the 1st part of the experimental test session compared with the later part, (b) for conditions requiring attention compared with nonattending conditions, (c) for the stimulus following the long (rather than short) interstimulus interval, and (d) for conditions of greatest stimulus uncertainty. Also, evoked potential variability was found to increase as amplitude increased. Evoked potential differences between experimental groups suggested divergence both in strategies employed and in effects of experimental conditions on these groups. (26 ref)—*Journal abstract*.

459. Spyer, K. M.; Ghelarducci, B. & Pompeiano, O. (U Pisa, Inst of Human Physiology, Italy) **Gravity responses of neurons in main reticular formation.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 705-721.—Studied the electrical activity of 810 units located in the bulbopontine reticular formation in decerebrate cats with or without the cerebellum, or in cats anesthetized with pentobarbital, and their responses to changes in the position of the head with respect to gravity. Data suggest that neurons in the bulbopontine reticular formation represent an important relay station through which the macular input may influence postural mechanisms and interact with both somatosensory and visual systems to compensate for the deviation of the head from the horizontal position. (63 ref)

460. Suzuki, Hisao & Takahashi, Masatsuga. (Hiro-saki U, Japan) **A method for single unit recording from the free-moving cat.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 331-334.—Describes a technique using chronically implanted microelectrodes, socket, and plug in the operantly behaving cat which greatly reduces the artifacts due to S movement. The device can be selectively connected with any of 8 leads to predetermined regions of the brain.

461. Torebjörk, H. Erik & Hallin, Rolf G. (U Uppsala Hosp, Sweden) **Responses in human A and C fibres to repeated electrical intradermal stimulation.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jun), Vol 37(6), 653-664.—Recorded the responses of A and C fibers to electrical intradermal stimulation with microelectrodes inserted percutaneously into intact human skin nerves. Results suggest that not only central factors but also excitation failure in peripheral thin nerve fibers might be responsible for the decrease in pain perception experienced during local intense electrical intradermal stimulation at high frequencies. (23 ref)

462. Travis, T. A.; Kondo, C. Y. & Knott, J. R. (Southern Illinois U, School of Medicine, Springfield) **Personality variables and alpha enhancement: A correlative study.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 542-544.—Eysenck Personality Inventory (EPI) scores and EEG data from 45 students and university employees show that there was no consistent relationship between personality characteristics and amount of spontaneous alpha between trials and that Ss who scored high on the Neuroticism scale of the EPI showed more eyes-open alpha in the feedback setting than Ss with low scores. There were no differences on the Extraversion scale. (16 ref)

463. Walsh, David H. (VA Hosp, Psychophysiology Lab, Bedford, MA) **Interactive effects of alpha feed-**



**back and instructional set on subjective state.** *Psychophysiology*, 1974(Jul), Vol 11(4), 428-435.—Examined the reported subjective experiences of 40 undergraduate volunteers during EEG alpha feedback in a factorial "drug-drug set" design. Alpha and no-alpha feedback were each paired with alpha and neutral instructions, in order to observe the individual and combined effects of alpha activity and instructional set. Results show that for an "alpha experience" to occur, both alpha activity and alpha set are necessary; neither alone is sufficient. Theoretical considerations based on S. Schachter and J. E. Singer's (see PA, Vol 37:6064) drug model, and some implications for alpha feedback research are discussed. (24 ref)—*Journal abstract*.

464. Wyler, Allen R.; Fetz, Eberhard E. & Ward, Arthur A. (U Washington, Medical School) **Effects of operantly conditioning epileptic unit activity on seizure frequencies and electrophysiology of neocortical experimental foci.** *Experimental Neurology*, 1974(Jul), Vol 44(1), 113-125.—Rendered 5 male rhesus monkeys chronically epileptic by subpial injection of aluminum hydroxide in sensorimotor cortex. After stable seizure frequencies were documented, a recording mount was placed surgically; this operation caused a dramatic, but transient, decrease in seizures in all Ss. Subsequent periods of operant conditioning of interictal unit activity were associated with initially low levels of weekly seizure rates in 3 Ss. Even more consistent than the decrease in clinically apparent seizures was a steady decline in the number of abnormal neurons encountered. It is concluded that single cell operant conditioning was associated with a decrease in the proportion of single units exhibiting interictal burst activity but not consistently associated with a reduction of seizure frequency. (18 ref)—*Journal abstract*.

465. Yinon, U. & Auerbach, E. (Hadassah U Hosp, Vision Research Lab, Jerusalem, Israel) **Bursting patterns of neurons in the cat's visual cortex.** *Experimental Neurology*, 1974(Jul), Vol 44(1), 71-81.—Found, in 19 anesthetized adult cats, a distinct group of simple and complex cells in visual cortex which responded to a moving stimulus in a rhythmic or nonrhythmic series of spike bursts. Each burst consisted of 2-12 spikes, and 5-40 bursts were produced at each sweep. The regularity of the interburst intervals of rhythmic neurons depended on the velocity direction and orientation of the stimulus movement. From the single sweeps obtained for these neurons and their average response histograms, a further subdivision of the excitatory area of the receptive field is suggested. (21 ref)—*Journal abstract*.

### Physiological Processes

466. Ainslie, George W. & Engel, Bernard T. (Massachusetts Mental Health Ctr, Boston) **Alteration of classically conditioned heart rate by operant reinforcement in monkeys.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 373-382.—Ran 6 adolescent male rhesus monkeys alternately on classical conditioning and on operant heart rate training schedules. The classical unconditioned stimulus (UCS) was identical to the operant negative reinforcement. After operant training, some Ss changed their heart rate responses to the classical conditioned stimulus (CS).

When both the operant and the classical schedules were in force simultaneously, all Ss changed their previous heart rate responses to the classical CS without significantly changing their blood pressure responses to this stimulus. The changes in heart rate response to the CS sometimes persisted long after the operant schedules were no longer in force. These results show that a classically conditioned response can be altered by operant reinforcement, and they suggest that the classical UCS actually may be an operant reinforcer. (29 ref)—*Journal abstract*.

467. Beary, John F. & Benson, Herbert. (Boston City Hosp, Harvard Medical Unit, Thorndike Memorial & Channing Lab, MA) **A simple psychophysiological technique which elicits the hypometabolic changes of the relaxation response.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 115-120.—Found that oxygen consumption, carbon dioxide production, and respiratory rate were significantly decreased in 7 male and 10 female 18-37 yr olds during the practice of a new, easily learned relaxation technique. The elements of the technique were a mental device to prevent distracting thoughts, a passive attitude, decreased muscle tonus, and a quiet environment which was as free of visual and auditory stimuli as possible. Sitting quietly with the eyes either open or closed failed to produce the same changes. These physiologic changes are consistent with an integrated hypothalamic response resulting in hypothesized decreased sympathetic activity. This response has recently been termed the "relaxation response." (28 ref)—*Journal abstract*.

468. Boismier, James D.; Chappell, Patricia F. & Meier, Gilbert W. (U. Nebraska, Medical Center, Omaha) **Wakefulness and REM sleep in human neonates.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 304.—Recorded wake-sleep behaviors in white and black newborns on the 1st 3 days of life. The obtained relationship between alert inactivity and rapid eye-movement (REM) sleep was inverse, quadratic, strong, and homogenous across Sex, Age, and Race. REM sleep in neonates may be controlled in part by peripheral vision stimulation during wakefulness.

469. Booth, D. A. & Toates, F. M. (U Birmingham, England) **A physiological control theory of food intake in the rat: Mark 1.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 442-444.—Incorporated the theory that current supply of readily used energy is the primary control in feeding into a computer model of energy flows from the gut and to or from storage as fat. Values for all parameters were derived from physiological data. Meal patterns and cumulative food intakes were realistically predicted for normal and ventromedial hypothalamic-lesioned rats. (17 ref)

470. Boyce, P. R. (Electricity Council Research Ctr, Capenhurst, England) **Sinus arrhythmia as a measure of mental load.** *Ergonomics*, 1974(Mar), Vol 17(2), 177-183.—Conducted an experiment with 10 male graduate researchers involving a subtraction task in which the physical and mental loads could be varied independently. Results indicate that sinus arrhythmia decreased with an increase in mental load. However, heart rate could also be used to differentiate between the mental loads. In addition it was found that both heart rate and sinus

arrhythmia increased for an increase in physical load. This increase in sinus arrhythmia can be explained by the static work component of the physical load and of the scoring system used. It is concluded that changes in heart rate and sinus arrhythmia are best regarded as generalized responses to the imposition of a load.—*Journal abstract.*

471. Clausen, J.; Sersen, E. A. & Lidsky, A. (New York State Inst for Research in Mental Retardation, Staten Island) **Variability of sleep measures in normal subjects.** *Psychophysiology*, 1974(Jul), Vol 11(4), 509-516.—Examined the variability of sleep-stage percentages; sleep time; latency, duration, and cycle time of rapid-eye-movement (REM) sleep; number of REM periods; and number of eye movements (EM) in 10 17-30 yr old normal adults. During 4 nights of testing, no first night effect was found, except that EM showed significant increases across nights. Considerable inter- and intraindividual variability was apparent, with Stage 2 and REM yielding lowest variability coefficients. Between nights, consistent positive correlations were found for awake, REM, REM latency, and particularly for Stage 4 and EM. Consistency of the relationship between nights for the sleep stages was not generally improved by equating sleep time either within or between Ss. Within nights the 1st REM duration was the shortest, and the 1st non-REM duration the longest. In 25% of the records, Stage 3 terminated before Stage 4. Variability is discussed in terms of procedural aspects, trait characteristics, and situational factors. (25 ref)—*Journal abstract.*

472. Crowley, D. E. (Washington, U, Medical School) **Comments on otitis media in rats.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 125-128.—Summarizes observations of otitis media (OM) in rats obtained from commercial suppliers. Procedures for identifying OM are described. OM has been reported to occur in as many as 50% of some commercial rat populations. However, it should not be concluded that a high incidence of OM is characteristic of the laboratory rat in general. Likelihood of OM is high in the presence of respiratory disease; prevention of OM therefore requires isolation of the rat population from the pathogenic microorganisms causing respiratory disease. Various isolation regimens are described and their efficacy compared. The major factor in preventing OM is the exercise of meticulous standards of animal husbandry. Investigators using rats in auditory experiments should obtain veterinary consultation (including regular microbiological evaluation) and carefully examine each animal for OM. Prevailing practice in regard to OM detection should be stated in all research reports involving auditory investigation in rats.—*M. B. Meikle.*

473. Desiderato, Otello; MacKinnon, John R. & Hisson, Helene. (Connecticut Coll) **Development of gastric ulcers in rats following stress termination.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 208-214.—Observed gastric ulcer formation in groups of female albino Charles River unrestrained rats ( $N = 123$ ) sacrificed at varying intervals following the end of a single, 6-hr shock-stress session. Significant ulcer production was not found unless Ss experienced a minimum of 2 hr poststress rest

prior to sacrifice. Findings with appropriate control groups implicate the sudden reversal from stressful to "safe" (home cage) conditions, rather than delay per se, as the major ulcerogenic factor. (15 ref)—*Journal abstract.*

474. Fioretti, Maria C.; Riccardi, Carlo; Menconi, Emma & Martini, Luciano. (U Perugia, Inst of Pharmacology, Italy) **Control of the circadian rhythm of the body temperature in the rat.** *Life Sciences*, 1974(Jun), Vol 14(11), 2111-2119.—The circadian rhythm of body temperature was abolished in male Wistar rats kept either in constant dark or light or blinded. The rhythm was inverted by reversal of the lighting regimen and was unaffected by pinealectomy. It is noted that circadian rhythm probably is not related to changes in patterns of motor activity. (15 ref)

475. Frankenhaeuser, Marianne & Andersson, Karin. (U Stockholm, Psychological Lab, Sweden) **Note on interaction between cognitive and endocrine functions.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 557-558.—Examined relationships between learning rate and adrenaline output. Ability to learn nonsense syllables by the serial anticipation method was significantly superior for 6 high-adrenaline secreters to that of 6 low-adrenaline secreters. The difference in learning rate may reflect a direct effect of adrenaline on the brain.—*Journal abstract.*

476. Frazier, James R. (North Carolina Memorial Hosp, Div for Disorders of Development & Learning, Chapel Hill) **An exploratory attempt to define the components of activation.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1137-1138.—Factor analyzed a battery of physiological and behavioral measures (e.g., reaction time) given to undergraduate males in an attempt to identify components of the activation continuum. Following varimax rotation, 2 factors were interpreted and labeled as arousal factors, while a 3rd factor was identified as directed thinking within the visual modality.

477. Fri, Claes G.; Wiessel, Frits A. & Sedvall, Göran. (Karolinska Inst, Div of Neuropsychopharmacology, Stockholm, Sweden) **Simultaneous quantification of homovanillic acid and 5-hydroxyindoleacetic acid in cerebrospinal fluid by mass fragmentography.** *Life Sciences*, 1974(Jun), Vol 14(12), 2469-2480.

478. Hashimoto, Yuichi; Kurobe, Yoshiko & Hirota, Keizo. (Osaka Teishin Hosp, Japan) **Effect of delivery on serum dopamine- $\beta$ -hydroxylase activity and urinary vanillyl mandelic acid excretion of normal pregnant subjects.** *Biochemical Pharmacology*, 1974(Aug), Vol 23(15), 2185-2187.—Results of a study with 12 24-34 yr old human primiparas demonstrate that the emotional and physiological stress of delivery increased serum dopamine- $\beta$ -hydroxylase (DBH) activity and urinary excretion of vanillyl mandelic acid, and that the increase in serum DBH activity was the result of increased release of serum DBH from the sympathetic nervous system. (19 ref)

479. Hayes, R. W. (Birkbeck Coll, U London, England) **An oculo-cardiac factor in the heart rate deceleration component of the orientation response.** *Biological Psychology*, 1974, Vol 1(4), 315-320.—Briefly reviews some existing models dealing with the occur-



rence of heart-rate (HR) deceleration as a component of the orientation response (OR) and summarizes findings concerning the oculo-cardiac reflex. The HR deceleration component of the OR is reconsidered as possibly resulting from an ocular near-response OR causing an increase in intraocular pressure and thereby eliciting cardiac deceleration. This suggestion for a reflex link between oculomotor near-response activity and HR deceleration may have heuristic value in relating the cardiac OR to somatic mechanisms mediating attentive processes. It is pointed out that the existence of the near-response OR, the intraocular pressure OR, and the oculo-cardiac reflex has been empirically demonstrated, and that both the intraocular pressure OR and the near-response OR have been shown to occur with presentation of novel stimuli in all modalities, with a latency similar to that of the HR deceleration CR. (32 ref) —*Journal abstract.*

480. Jordan, Henry A.; Moses, Hamilton; MacFayden, Bruce V. & Dudrick, Stanley J. (U Pennsylvania) **Hunger and satiety in humans during parenteral hyperalimentation.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 144-155.—Observed 50 patients treated with iv hyperalimentation while receiving from 1,200-4,800 kcal/day via a central venous catheter. Ss were observed while receiving only iv nutrition and also while receiving nutrition by mouth as well as by vein. Assessment of degree of hunger and satiety were made and compared with records of body weight, temperature, blood sugar level, and amount and duration of iv nutrients. Most Ss reported hunger during therapy in spite of the iv calories. The onset of satiety was hastened by the iv nutrients, and although Ss would report mild to ravenous hunger while on iv nutrients alone, they were able to eat only small amounts of food when oral feeding was initiated. 4 Ss received iv fat emulsions in addition to the carbohydrate-amino acid solution. These Ss did not experience hunger during the 24-hr period after fat administration. (25 ref) —*Journal abstract.*

481. Kiritz, Stewart & Moos, Rudolf H. (Monterey Community Hosp, Carmel, CA) **Physiological effects of social environments.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 96-114.—Discusses recent studies which indicate the importance of settings or environmental variables in accounting for individual behavior. Measurement of the perceived social climate is a particularly promising way of investigating the psychosocial characteristics of diverse environments. 3 types of dimensions characterize and discriminate among environmental subunits: relationship, personal development, and system maintenance and system change dimensions. There is evidence that dimensions within each of these 3 categories have important effects on physiological processes. Individual and social environmental variables can interact, leading to differential physiological responses. Measurement of perceived social climate could provide a bridge between "objective" environmental stimuli and individual physiological responses, which are mediated by differences in perception, coping, and defense. Measurement might enable the general improvement of environments or the person-environment fit for specific groups of individuals. (91 ref)—*Journal summary.*

482. Lavie, Peretz; Lord, Jeri W. & Frank, Robert A. (U Florida) **Basic rest-activity cycle in the perception of the spiral after-effect: A sensitive detector of a basic biological rhythm.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 373-379.—Tested 8 16-17 yr old high school volunteers for 2 consecutive days on the spiral aftereffect from 4 PM to 12 midnight. 10 out of the 16 available time series revealed periodicities within the range of periodicities commonly reported for the rapid eye-movement (REM)-nonREM cycle. The close similarity between the 2 cycles supports N. Kleitman's idea (1963) that the REM-nonREM cycle is only part of a 24-hr biological rhythm operating during both sleep and wakefulness, which during nonsomnolent states is manifested in periodic alterations in alertness. (18 ref) —*Journal abstract.*

483. Lovallo, William & Zeiner, Arthur R. (U Oklahoma, Health Sciences Ctr) **Cutaneous vasomotor responses to cold pressor stimulation.** *Psychophysiology*, 1974(Jul), Vol 11(4), 458-471.—Tested the effect of cold pressor (CP) stimulation on cutaneous vasomotor activity in 2 experiments with a total of 56 university student Ss. In Exp I it was demonstrated that the decreased blood volume (constrictor) and increased blood volume (dilator) responses could not be attributed to differential response to instruction. A superimposed reaction-time task did not change ongoing response to CP. Exp II investigated the effects of levels of tonic activity upon response to CP stimulation by 2 methods: experimental manipulation of tonic level by shock and independent measurement of tonic sympathetic activity by pulse amplitude and skin conductance. Resting levels of pulse wave amplitude were significantly correlated with response to CP—the higher the amplitude, the greater the time to blood volume rebound. Results tentatively support the hypothesis that constrictors and dilators differ in sympathetic vasomotor tonus prior to cold pressor.—*Journal abstract.*

484. Lovenberg, Walter & Victor, Stephen J. (NIH, Section on Biochemical Pharmacology, Bethesda, MD) **Regulation of tryptophan and tyrosine hydroxylase.** *Life Sciences*, 1974(Jun), Vol 14(12), 2337-2353.—Reviews the literature showing that the synthesis of serotonin, norepinephrine, and dopamine is regulated by initial amino acid hydroxylases and that the level of tyrosine hydroxylase is regulated by transsynaptic induction. Acute regulation of in vivo hydroxylase activity appears to be by substrate availability in the case of tryptophan hydroxylase and possibly by feedback inhibition with tyrosine hydroxylase. "Receptor mediated feedback inhibition" of the activity of both tyrosine and tryptophan hydroxylase may also have an important role. (55 ref)

485. Lynch, James J.; Fregin, G. Frederick; Mackie, James B. & Monroe, Russell R. (U Maryland, Medical School, Inst of Psychiatry and Human Behavior, Baltimore) **Heart rate changes in the horse to human contact.** *Psychophysiology*, 1974(Jul), Vol 11(4), 472-478.—Explored the effects of human social contact on the electrocardiogram (EKG) and general behavior of 2 horses. Petting elicited a slowing of heart rate, while a person entering and exiting elicited transient but marked heart-rate increases. Transient periods of T-wave inver-

sion occurred in the EKG during human contact. In one of the Ss the frequency of dropped heart beats increased dramatically during successive trials of human petting. These findings parallel previous observations made with dogs. Similar observations of changes in the heart rate and rhythm of patients in coronary care units and a shock-trauma unit during social contact with other humans underscore the need to develop empirical analogs of these reactions. (21 ref)—*Journal abstract*.

486. McCarty, Richard & Richardson, John H. (Johns Hopkins U) **Adrenal response of female mice to variations in living space.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1267-1270.—Following weaning, 48 CFW and 48 CF-1 female mice were isolated for 7 days and randomly assigned to 1 of 3 cage sizes for an additional 7 days. There was a significant increase in adrenal weight and significant decrease in final body weights associated with decreased living space in CFW Ss. For CF-1 Ss however, variations in living space had no significant effects on adrenal or body weights. Results are discussed in relation to the effects of spatial parameters on the endocrine response to stress of all-female groups or mixed-sex populations. (16 ref)—*Journal abstract*.

487. Mohan, Chandra & Radha, E. (Bangalore U) **Circadian rhythm in acetylcholinesterase activity during aging of the central nervous system.** *Life Sciences*, 1974(Jul), Vol 15(2), 231-237.—Acetylcholinesterase activity rhythm was age-dependent in Wistar albino rats, being bimodal at 1 day and unimodal at 3 and 13 wks of age. At 44 and 87 wks the rhythms in medulla and cerebrum were similar, and in the optic lobes the rhythms shifted from bimodal at 44 wks to unimodal at 87 wks.

488. Obrist, Paul A. et al. (U North Carolina, Medical School, Chapel Hill) **Sympathetic influences on cardiac rate and contractility during acute stress in humans.** *Psychophysiology*, 1974(Jul), Vol 11(4), 405-427.—Measured heart rate and cardiac contractility in 36 normal university students during a stressful reaction-time task. During the preparatory interval only vagal influences on heart-rate change could be found which were related to concomitant somatic activity. In expectation of the shock, sympathetic influences became manifested on both heart rate and contractility which were independent of concomitant somatic activity. In a follow-up study, the relationship was evaluated between blood pressure, as measured directly from the radial artery, and both contractility and heart rate. Sympathetic influences on the heart were not secondary to depressor effects, although appreciable phasic decreases in blood pressure sometimes followed the onset of large increases in heart rate and contractility. Data suggest that sympathetic influences on the heart are normally very minimal but are evoked by intense stress when the organism attempts to cope with the stress. (30 ref)—*Journal abstract*.

489. Orem, John & Dement, William C. (Stanford U, Medical School) **Spontaneous eyelid behavior in the sleeping cat.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 145-159.—Recorded movements of the eyelids in 5 adult cats to determine the nature of the closure process at sleep onset and whether or not the eye movements of rapid-eye-movement (REM) sleep are

accompanied by associated lid movements as in wakefulness. After 16 hrs of treadmill deprivation, lid movements were recorded in the chronically implanted and immobile Ss. Results reveal that closure was a complex process consisting of a series of simultaneous downward movements of the upper lid and upward movements of the lower lid and that this closure was an active process. At REM onset, the palpebral fissures widened as the lower lid underwent a slow descent to the open position. In REM there were also phasic twitches of the lids, predominantly upward twitches of the lower lids, and periods in which the upper lid demonstrated movements similar to the lid movements associated with waking eye movements. (22 ref)—*Journal abstract*.

490. Palmblad, Jan et al. **Stress and the human granulocyte: Phagocytosis and turnover.** *Reports from the Laboratory for Clinical Stress Research, Stockholm*, 1973(Dec), No 34, 15 p.—Evaluated physiological susceptibility to intense psychosocial stimuli by exposing 5 young women to a stressful 77-hr vigil. While hearing recorded battle noise at 95 db, they fired rifles at model tanks on an electronic shooting range with only 15-min breaks. During and after 3 days without rest, sleep, or stimulants, and with restriction of activities other than the assigned task, blood and urine samples revealed changes possibly related to endocrine mechanisms. Although bodily reactions to stress are probably complex and multifactorial, it is suggested that a start has been made toward future formulation and testing of hypotheses.—R. L. Sulzer.

491. Ray, William J. & Lamb, Susan B. (Pennsylvania State U) **Locus of control and the voluntary control of heart rate.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 180-182.—Selected 8 internal and 7 external male undergraduates using Rotter's Internal-External Control Scale. A 3-phase experiment was conducted with a 100-beat baseline preceding each phase. During Phases 1 and 3, Ss were instructed to increase or decrease their heart beats. During the 2nd phase, a biofeedback display was operative. Following each increase and decrease trial, Ss completed a questionnaire concerning strategies and a self-report affect scale. The average interbeat-interval of the 2 locus of control groups did not significantly differ. A significant Group  $\times$  Task interaction was found with the internal control Ss performing better on the increase and the externals better on the decrease of heart rate tasks ( $p < .05$ ). Implications for research in psychosomatic medicine are noted.—S. Knapp.

492. Silverman, Julian et al. (California Dept of Mental Hygiene, Agnews State Hosp, San Jose) **Stress, stimulus intensity control, and the structural integration technique.** *Confinia Psychiatrica*, 1973, Vol 16(3-4), 201-219.—Reports on the effects of the structural integration technique on measures of psychological and physiological function (several EEG averaged evoked response procedures, an eye-movement procedure, and a battery of biochemical tests). Inferences and conclusions from the data are based upon a relatively new biophysical model of how individuals modulate environmental stimulation. Changes after structural integration indicated increased openness and better modulated sensitivity to environmental stimulation.—*Journal abstract*.



493. Stolk, Jon M.; Conner, Robert L. & Barchas, Jack D. (Dartmouth Coll, Medical School) **Social environment and brain biogenic amine metabolism in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 203-207.—Investigated the effects of living alone or in groups of 3 or 4 wks on brain biogenic amine metabolism in 50 male Long-Evans rats. Living alone produced an increase in brain norepinephrine turnover relative to the grouped Ss. In addition, reserpine and *para*-chlorophenylalanine treatment affected brain norepinephrine levels more after individual housing than after group housing. Brain serotonin metabolism showed minimal changes in differentially housed Ss. These findings are in direct contrast to results from studies on psychosocial determinants of brain amine metabolism in mice.—*Journal abstract*.

494. Szechtman, Henry; Lambrou, Peter J.; Caggiula, Anthony R. & Redgate, Edward S. (U Pittsburgh) **Plasma corticosterone levels during sexual behavior in male rats.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 191-200.—Determined the activity of the pituitary-adrenal (P-A) system, as reflected in plasma levels of corticosterone, in 14 male Long Evans rats during copulation, exposure to an open field, and in control conditions. Plasma corticosterone concentration during copulation was higher than in control conditions but well below mean levels obtained in the open field. Some males gave no evidence of P-A activation during sexual activity. Ss which showed increased steroid levels during copulation tended to have longer latencies to reinitiate copulation after ejaculation and were behaviorally less active in a subsequent open field test. It is suggested that neither sexual arousal nor copulatory performance necessarily activates the system. Males showing P-A activation may be slow to habituate to a novel stimulus and thus the elevated steroid levels may reflect an insufficient number of habituation trials with the receptive female. (29 ref)—*Journal abstract*.

495. Thompson, Joseph J. & Dixon, Paul W. (U Hawaii, Hilo) **A power function between ratings of pornographic stimuli and psychophysical responses in young normal adult women.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1236-1238.—Presented 13 pornographic pictures to 10 18-34 yr old women with normal MMPI profiles. A galvanic skin response instrument was used to record psychophysical responses to the stimulus pictures, and stimuli were rank-ordered by Ss according to how Ss reacted to them. Algebraic averages were computed and plotted on log-log paper, and power function was obtained between galvanic skin responses and rank order of these stimuli.

496. Van Twyver, H. & Allison, T. (Florida Technological U) **Sleep in the armadillo *Dasypus novemcinctus* at moderate and low ambient temperatures.** *Brain, Behavior & Evolution*, 1974, Vol 9(2), 107-120.—A study of 13 armadillos indicates that paradoxical sleep (PS) can occur at low body temperatures in a placental mammal. Polygraphic characteristics of waking, slow-wave sleep, and PS were in general typically mammalian. Ss spent over 17 hr/day asleep, with 18% of the time in PS. (23 ref)—*Journal abstract*.

497. Young, Larry D. & Blanchard, Edward B. (U Mississippi, Medical Ctr) **Effects of auditory feedback of**

**varying information content on the self-control of heart rate.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 61-68.—Determined the relative efficacy of auditory feedback, varying in the amount of information contained in the feedback signal, for the self-control of heart rate (HR) by comparing 5 groups of 10 graduate and undergraduate students who received either (a) continuous proportional feedback, (b) discontinuous proportional feedback, (c) binary feedback, (d) heart sounds, or (e) no feedback. At each of 2 sessions Ss were given 8 trials in each direction on which they were to raise or lower their HR. Without regard to the amount of information contained in the signal, presentation of auditory feedback aided Ss in raising HR relative to Ss who received no feedback; however, feedback did not yield an advantage in lowering HR. Results suggest that the informing quality of feedback may be multidimensional and that the mechanisms involved in acceleration and deceleration of HR may be different.—*Journal abstract*.

498. Zimmerberg, Betty; Glick, Stanley D. & Jerussi, Thomas P. (Mount Sinai School of Medicine, City U New York) **Neurochemical correlate of a spatial preference in rats.** *Science*, 1974(Aug), Vol 185(4151), 623-625.—Determined spatial (left or right) preferences for female albino Sprague-Dawley rats given foot shock in a T maze. The animals were killed, and left and right striata were assayed separately for dopamine and left and right telencephalic regions were assayed for norepinephrine. Dopamine content was significantly higher (by 12%) in the striata contralateral to Ss' side preferences than in the ipsilateral striata; there was no such difference for telencephalic norepinephrine. The small asymmetry in striatal dopamine content is not due to any learning- or stress-related change induced by the testing procedure but is probably inherent in normal rats. Some spatial behavior appears to be the manifestation of a normal and specific difference in the activity of left and right nigrostriatal systems.—*Journal abstract*.

## Genetics

499. Breland, Nancy S. (Trenton State Coll) **A test of a primary bias in twin studies with respect to measured ability.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 101-109.—Discusses the suggestion that the twin method for investigating hereditary and environmental sources of variation in measured traits is biased by the unique prenatal environments of identical twins. Monozygotic (MZ) twins derived from eggs which split into 2 individuals early in their prenatal development, indicated by concordant handedness within sets, most likely develop with separate placentas, chorions, and amnions. Later-splitting eggs, indicated by discordant handedness within MZ pairs, more likely produce twins who share the same placenta, chorion, and amnion, and experience more severe prenatal competition. Greater prenatal competition was hypothesized to produce greater twin differences in measured ability. A group of 482 sets of MZ twins who took the National Merit Scholarship Qualifying Test (NMQST) in 1962 were used to test this hypothesis. No difference between handedness groups on the set of NMQST scales was found, indicating that the unique prenatal environment of MZ twins does not

appreciably bias heritability estimates of ability. (16 ref)  
—*Journal abstract.*

500. Burnet, Barrie; Connolly, Kevin & Mallinson, Mary. (U Sheffield, England) **Activity and sexual behavior of neurological mutants in *Drosophila melanogaster*.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 227-235.  
—Observations show that the neurological mutants *Hyperkinetic* and *Shaker* in *Drosophila melanogaster* differed quantitatively in their patterns of behavior from the wild type. Differences were apparent during the preimaginal stages, when the mutants showed a reduction in the rate of larval feeding. Adult mutants exhibited a lower rate of sustained locomotor activity; they frequently made jumps or short flights and then fell over. Unlike *Shaker* flies, the *Hyperkinetic* mutants had difficulty in regaining equilibrium after falling over and thrashed about in a disorganized manner. The mutants differed significantly in mean duration of dyskinesia. *Shaker* mutant males did not differ significantly in mating speed from wild type. *Hyperkinetic* males tended to switch rapidly from one behavior to another and showed a marked reduction in mating speed caused by frequent loss of contact with the females during courtship.—*Journal abstract.*

501. Eaves, L. J. & Gale, J. S. (U Birmingham, England) **A method for analyzing the genetic basis of covariation.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 253-267.—Notes that covariances between traits can be partitioned into additive and dominance genetic components and between- and within-family environmental components, using a method analogous to that used in the analysis of single traits. The problem arises as to whether all additive genetic components simply reflect a single additive component in the sense that, given an appropriate rescaling of the breeding values, a single additive genetic component would adequately describe the additive genetic variation. The statistical procedure for testing this hypothesis is discussed in detail. The approach is applied to twin data given by J. C. Loehlin and S. G. Vandenberg (1968) on covariation between 5 of Thurstone's Primary Mental Abilities. Although the data do not permit a reliable separation of additive and dominance components, it is shown that a single genetic component will account for almost all the genetic variation and covariation. Unless there is marked linkage disequilibrium, this implies that most of the genetic variation for the 5 traits can be attributed to the pleiotropic action of genes at a common set of loci. (16 ref)—*Journal abstract.*

502. Festing, Michael F. (MRC Lab Animals Ctr, Carshalton, England) **Water escape learning in mice: III. A diallel study.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 111-124.—Used a  $5 \times 5$  diallel cross to investigate the mode of inheritance of water escape learning in mice. Strains C3H and ICFW had a poor learning performance, while strains DBA/1, CBA-T6, and C57BL/10ScSn improved their performance markedly in successive trials. There was evidence for heterosis and reciprocal cross effects but no evidence for sex differences. General combining ability was low, but specific combining ability was high. Heritability was calculated as .07 (narrow sense) and .73 (broad sense). Variance-covariance analyses indicated a dominant to overdominant

polygenic mode of inheritance with no epistasis, although males showed less dominance and less variation between strains than did females. The most recessive genes were carried by the strains with a poorer learning performance (i.e., ICFW and C3H). (23 ref)—*Journal abstract.*

503. Gallup, Gordon G. (Tulane U) **Genetic influence on tonic immobility in chickens.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 145-147.—80 Production Red chickens were selectively bred on the basis of having shown prolonged or brief immobility reactions at 21 days of age. After only 1 generation, there was sufficient separation between offspring to conclude that tonic immobility has an unusually large heritability component. Results are discussed in terms of their implications for an evolutionary model of animal hypnosis.

504. Guttman, Ruth. (Hebrew U, Jerusalem, Israel) **Genetic analysis of analytical spatial ability: Raven's Progressive Matrices.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 273-284.—Administered the Progressive Matrices test to members of 100 families, including parents, children, and first cousins. Scores varied with age and sex; males' scores were consistently higher than females' scores. Correlations between parents and children were zero for subtests A and B, .19 for C, .30 for D, .22 for E, and .41 for the total test score. Between-mate correlations ranged from zero to .30 on the different subtests. Full-sibling intraclass correlations were .14, .09, .19, .18, and .30 for subtests A-E and .22 for total test score; first-cousin correlations were lower but had the same relative order of size. 12 items gave parent-offspring correlations of .2 and higher. Of these, 1 item, E-8, had a father-son, father-daughter, mother-son, mother-daughter correlational pattern in accordance with a hypothesis of X linkage. It is suggested that differences in levels and/or patterns of intrafamily correlations may sometimes discriminate between items that test different aspects of the problem-solving process. It is suggested that a genetic analysis of a battery of items which are specially designed to test specific elements of this process could lead to the definition of specific abilities and to an elucidation of the mode of inheritance of some of these abilities. (26 ref)—*Journal abstract.*

505. Hegmann, J. P.; Kleso, R. A. & Hartman, H. B. (U Iowa) **Gene differences influencing visual system function and behavior.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 165-170.—Behavioral differences between albino (cc) and pigmented (C-) mice were mimicked by mice homozygous for a recessive allele (p) 13 map units from the c locus. Electoretinograms for cc and dilute pigment (pp) Ss were similar, showing greatly enhanced a- and B-waves compared to normals (C-). A total of 336 Ss were observed. The behavioral and retinal physiology similarities of cc and pp mice probably result from increased sensitivity to illumination. Recently reported decreased ipsilateral retinogeniculate projections characteristic of cc animals may result from genotype-visual environment interactions rather than from pleiotropic effects of the c locus.—*Journal abstract.*

506. Heinze, William J. (U Illinois, Medical Ctr, Ctr for Genetics, Chicago) **A genetic analysis of escape behavior in rats.** *Behavior Genetics*, 1974(Jun), Vol 4(2),



125-131.—Tested 3 strains of highly inbred rats (B, I, and J) and their derived F<sub>1</sub> hybrid progeny (BI, BJ, and IJ) for escape latencies in a novel test situation at 3 ages (30, 60, and 90 days). Highly significant differences were found in escape latencies between genotypes and between ages. There was also a very highly significant Genotype  $\times$  Age interaction; the inbreds had increasing latencies with increasing age, whereas the hybrids did not. Heterosis was observed, and it is concluded that this behavioral heterosis was consistent with the hypothesis of selection for an intermediate optimum in latency to escape. (16 ref)—*Journal abstract*.

507. Insel, Paul M. (Stanford U, Medical School) **Maternal effects in personality.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 133-143.—Examined a sample of 98 families consisting of 589 Ss and composed of 3 generations, on 3 personality dimensions using Eysenck's Psychoticism-Extraversion-Neuroticism Inventory and the Junior Personality Inventory. In addition, each family was administered the Conservatism Scale and Conservatism Scale for Children to measure social attitudes and social desirability. Results indicate significant correlations between mother-child scores and maternal-grandparent-child scores on personality variables but low nonsignificant correlations between father-child scores. Results suggest the presence of maternal effects on personality dimensions. (23 ref)—*Journal abstract*.

508. Kekić, Vladimir & Marinković, Dragoslav. (Inst for Biological Research, Belgrade, Yugoslavia) **Multiple-choice selection for light preference in *Drosophila subobscura*.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 285-300.—Selected *Drosophila subobscura* flies for the ability to choose 1 of 5 light intensities with the aid of an apparatus which enabled the Ss to choose freely. The original distribution of wild flies was as follows: about 60% repeatedly chose the space lighted by 6,500 lx, about 30% chose the 1,300-3,200 lx, and about 10% chose the 30-300 lx. By mating the flies within each of the 3 categories for 19 generations, their proportion increased from 8 to 30% at 30-300 lx, from 32 to 55% at 1,300-3,200 lx, and from 60 to 78% at 6,500 lx. The selective response was greatest at the beginning of the selection, and declined later. Using micronized dusts to mark the Ss, it was determined that on the average about 33% chose the same light intensity in both of 2 24-hr runs, and about 31% more chose for the 2nd time 1 of the neighboring light intensities. Results suggest that phototactic response is a relative property, so that a fly can be "photopositive" or "photonegative" to a dimmer light (including complete darkness) and to a light of much higher intensity. (37 ref)—*Journal abstract*.

509. Klein, Thomas W. (U California, Davis) **Heritability and genetic correlation: Statistical power, population comparisons, and sample size.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 171-189.—Discusses statistical power as it relates to estimates of heritability and genetic correlation, particularly with reference to population comparisons. Power tables  $\alpha = .05$  are presented for estimates of heritability and genetic correlation for 4 research designs (the regression of offspring on midparent values, the regression of offspring on single-parent values, the intraclass correlation of full siblings, and the

intraclass correlation of half siblings) as a function of sample size. In addition, tables of statistical power for the comparison of heritabilities obtained from 2 different populations, using these 4 methodologies, are presented. These tables indicate that for the study of a single population, 400 families of 4 members each is a sufficient sample to achieve a statistical power in excess of 95% for a heritability estimate of .20. However, in the comparison of heritabilities from 2 populations, 800 families of 4 members each (measured in each population) would be required to achieve equivalent statistical power for a difference in heritability of .20.—*Journal abstract*.

510. Lykken, D. T.; Tellegen, A. & Thorkelson, K. (U Minnesota) **Genetic determination of EEG frequency spectra.** *Biological Psychology*, 1974, Vol 1(4), 245-259.—Collected simultaneous EEG samples under 4 conditions in 1 session from 39 pairs of monozygotic (MZ) and 27 pairs of dizygotic (DZ) young adult twins of the same sex. The 3-min EEG samples were spectrum analyzed, and root mean square differences between pairs of spectra were computed for the 2 twin samples and for a group of unrelated pairs obtained from the same samples. 6 parameters were defined to characterize the salient features of the individual spectra: delta, theta, alpha, beta, phi (alpha mid-frequency), and kappa (stability of alpha frequency). All 6 parameters showed intraclass correlations of about .8 for the MZ twins and correlations near zero for the DZ pairs. Comparisons across conditions indicated that, with respect to EEG spectra, the MZ twins resembled their cotwins about 96% as much as they resembled themselves. Holding time and situation constant, most of the variance in the frequency characteristics of the EEG appears genetically determined. (17 ref)—*Journal abstract*.

511. Marinković, Dragoslav. (U Belgrade, Faculty of Science, Yugoslavia) **Light dependence in matings of *Drosophila pseudoobscura*.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 301-303.—Mating in *Drosophila pseudoobscura* is known to be light independent. However, results of an experiment indicate that differences in the ability to mate in the presence of light or in the dark exist in lines selected for positive or for negative phototaxis.

512. Perry, Arnon. (Tel-Aviv U, Leon Recanati Graduate School of Business Administration, Israel) **Heredity, personality traits, product attitude, and product consumption: An exploratory study.** *Journal of Marketing Research*, 1973(Nov), Vol 10(4), 376-379.—Investigated the extent to which the attitude toward and the consumption of alcohol, cigarettes, and coffee can be explained by genetic factors, and to what extent heredity is a link between 2 personality traits (anxiety and introversion-extraversion) and the attitude and consumption of the 3 products. 46 monozygotic and 38 dizygotic pairs of 16-31 yr old twins completed an attitude and degree of consumption questionnaire on cigarettes, alcohol, and coffee; the Eysenck Personality Inventory; and Bendig's short form of the Taylor Manifest Anxiety scale. Attitude demonstrated no significant genetic component for the 3 products or for any combination of variables. No genetic component was found for the 2 personality traits. A significant genetic component, however, was found in consumption

of all 3 products, as well as in the combination of cigarettes and anxiety, cigarettes and alcohol, and cigarettes and coffee. (29 ref)—*L. Gorsey.*

513. **Plomin, Robert J. & Manosevitz, Martin.** (U Texas, Austin) **Behavioral polytypism in wild *Mus musculus*.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 145-157.—Raised offspring of wild Texas and Colorado mice under standard laboratory conditions and tested them as adults for (a) activity, defecation, climbing latency, and jumping in the open field; (b) running-wheel activity; (c) nest-building behavior; (d) temperature preference; and (e) cold and heat stress. Differences among the 2 Texas samples and the Colorado sample were found for all but the last 2 measures. A preliminary attempt was made to assign these behavioral differences to genetic drift or natural selection on the basis of intra- vs interregional differences among the groups. Comparison of data obtained from wild mice with data from inbred and random-bred mice run in the same laboratory with the same apparatuses suggests that wild mice jump much more in the open field and are considerably more active in the open field and in the running wheel than inbred and random-bred laboratory strains.—*Journal abstract.*

514. **Streng, John.** (Free U, Amsterdam, Netherlands) **Exploration and learning behavior in mice selectively bred for high and low levels of activity.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 191-204.—Conducted 2 experiments with 144 mice (BALB/c and C57BL/6 crossed strains). In Exp I, Ss' behavior in the open field was classified at 3-sec intervals for 20 min, into 1 of 6 categories: air sniffing, rearing, grooming, locomotion, sniffing at objects, and freezing. Selective breeding was very effective in changing the behavioral profile of the selected Ss when compared to the control stock. The behavior of the inactive Ss was characterized by more passive exploration which became less pronounced as the observation period progressed. It was hypothesized in Exp II that the selectively bred Ss would also differ with respect to their learning behavior. No differences were found between the active and inactive Ss in wheel-turn avoidance learning. Inactive Ss were significantly slower than the active Ss in running through a Lashley III maze, but there were no significant differences in the number of errors made. It is concluded that learning and exploratory behavior are not related in any simple manner in the mouse.—*Journal abstract.*

## PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

515. **Anders, Thomas F. & Chalemian, Robert J.** (Children's Hosp, Buffalo, NY) **The effects of circumcision on sleep-awake states in human neonates.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 174-179.—Assessed the effect of circumcision on the proportion of subsequent sleep-awake states in 11 normal, full-term male neonates. It was proposed that, as had been previously suggested, the proportion of quiet sleep would be increased as a response to this "procedure." Results demonstrate that no quiet sleep state shifts were present in the immediate hour after circumcision; instead,

significant increases in the proportion of wakefulness were noted, suggesting that later quiet sleep state shifts, if present, may be secondary to changes in wakefulness.—*Journal abstract.*

516. **Baum, M. J.; Södersten, P. & Vreeburg, J. T.** (Erasmus U, Rotterdam, Netherlands) **Mourning and receptive behavior in the ovariectomized female rat: Influence of estradiol, dihydrotestosterone, and genital anesthetization.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 175-190.—Conducted 2 experiments with 24 female hooded and 40 female Wistar ovariectomized rats to determine whether estradiol benzoate (EB) and dihydrotestosterone (DHT) work synergistically in the brain to activate mourning behavior. In Exp I, Ss treated daily with 2 µg EB combined with 500 µg DHT displayed significantly more mounts with pelvic thrusting than other females treated with the oil vehicle, 500 µg DHT, or 2 µg EB. The behavior of Ss receiving EB + DHT was indistinguishable from that of another group of females which received 200 µg testosterone propionate (TP). In Exp II, ovariectomized female rats treated with either 200 µg TP or 2 µg EB + 200 µg dihydrotestosterone propionate (DHTP) mounted significantly more than females treated with 2 µg EB. Both clitoral size and the growth of cornified papillae on the glans clitoris were stimulated by the administration of TP or EB + DHTP. However, in no group was the frequency of mounting affected by anesthetization of the clitoris and external vagina with lidocaine paste. Lordosis quotients of females treated with EB + DHTP were significantly lower than in rats receiving either EB or TP, again regardless of whether or not the genital region was anesthetized. (40 ref)—*Journal abstract.*

517. **Davidson, Julian M. & Smith, Eria R.** (Stanford U, Medical School) **Gonadotropin release as a function of mating and steroid feedback in the female rat.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 163-174.—Studied relationships between mating-induced and steroid-induced luteinizing hormone (LH) release in 63 spayed Long-Evans rats. Large amounts of LH were released approximately 7 hrs following progesterone injection in rats primed with estradiol benzoate (EB). The amount of LH release varied widely depending on (a) the interval between the time of the progesterone injection and the EB priming, (b) the progesterone dose, and (c) the time of day when blood samples were collected. Females, prepared with estrogen-progesterone treatment in a variety of schedules in which these 3 variables were altered systematically, were allowed to mate with vigorous males. Mating did not significantly increase plasma LH levels even when the females showed high degrees of sexual receptivity. Sodium pentobarbital prevented the afternoon LH rise resulting from progesterone treatment 3 days after EB priming. Pituitary sensitivity to LRF was not enhanced in the afternoon, and the mating did not significantly increase plasma LH in these barbiturate-blocked rats. Following administration of 5 large daily doses of EB without progesterone, however, significant increases in LH were produced by mating on the 6th day. Postcopulatory LH release in these circumstances was dependent on a diurnal factor since the effect of mating was greater in the afternoon than in the morning. (27 ref)—*Journal abstract.*



518. Diamond, Milton; Mast, Marian & Yanagimachi, Ryuzo. (U Hawaii, Medical School) **Reproductive development and induced estrus in the prepubertal hamster. *Hormones & Behavior*, 1974(Jun), Vol 5(2), 129-133.**—Investigated the lordosis capability as a possible limiting factor in the initiation of puberty. 60 intact and 40 castrate female golden hamsters at 18-28 days of age were capable of demonstrating an adult-like lordosis response when primed with estrogen and progesterone. This is before ovulation or hypothalamic cyclicity usually occur. Estrous behavior appears to be one of the first reproductive capabilities to mature. Early ovariectomy seems to delay the development of the tissues mediating lordosis. Ovarian maturation is probably the crucial limiting factor for puberty in the hamster. —*Journal abstract.*

519. DiCara, Leo V. & Wilson, Linda M. (U Michigan, Mental Health Research Inst) **Role of gustation in sodium appetite. *Physiological Psychology*, 1974(Mar), Vol 2(1), 43-44.**—Studied the relative effects of sodium repletion via ingestion and via gastric intubation upon the satiation of sodium appetite in 24 albino rats subjected to sodium depletion for the 1st time. Compared to glucose or sham intubation, sodium intubation had no short-term satiating effect, whereas prior ingestion of sodium resulted in complete satiation of sodium appetite. Results support the idea that gustatory signals are critical for regulation of sodium intake. —*Journal abstract.*

520. Galosy, Richard A. & Howard, James L. (U North Carolina, Child Development Inst., Chapel Hill) **Acute and chronic peripheral nerve stimulation: Surgical preparation and electrode design. *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 332-334.**

521. Hendricks, Shelton E. & Duffy, John A. (U Nebraska, Omaha) **Ovarian influences on the development of sexual behavior in neonatally androgenized rats. *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 297-303.**—Studied female sexual behavior in 191 male and female Harlan-Wistar rats. Males were castrated on the day of birth (Day 1). Some males received ovarian implants at that time; others were injected on Day 3 with oil, 5 µg of testosterone propionate (TP), or 50 µg of TP. Females were ovariectomized at birth, 20 days, or 60 days of age; on Day 3 all were injected with oil, 5 µg of TP, or 50 µg of TP. Prepubertal ovarian tenancy in females tended to counteract the effects on sexual receptivity of TP administered during neonatal life. In males, ovarian implants facilitated female sexual behavior at adulthood in oil-injected Ss, but did not significantly influence the effect on neonatally injected TP. —*Journal abstract.*

522. Hughes, B. O. & Wood-Gush, D. G. (Agricultural Research Council, Poultry Research Centre, Edinburgh, Scotland) **An increase in activity of domestic fowls produced by nutritional deficiency. *Animal Behaviour*, 1973(Feb), Vol. 21(1), 10-17.**—Results of 5 experiments show that groups of pullets deprived of calcium in large cages exhibited significant increases in spontaneous activity and engaged in an aberrant behavior pattern—air pecking. The fact that a similar increase in activity was seen under sodium deprivation suggests that

the phenomenon may be of more general occurrence. (21 ref)

523. Lazarus, John & Crook, John H. (U Newcastle-Upon-Tyne, England) **The effects of luteinizing hormone, oestrogen and ovariectomy on the agonistic behaviour of female *Quelea quelea*. *Animal Behaviour*, 1973(Feb), Vol. 21(1), 49-60.**—Previous work with male *Quelea* showed that agonistic behavior in relation to individual distance is controlled by luteinizing hormone (LH) rather than by testosterone, and that male birds are more aggressive than females. The present 4 experiments with female *Quelea* groups show that (a) LH injections increased encounter frequency, (b) ovariectomy in the breeding season increased encounter frequency, and (c) estrogen injections decreased encounter frequency. The effects of LH were specific to agonistic responses rather than mediated through changes in activity. Correlations between changes in natural hormone levels and encounter frequency support the injection findings. Results are consistent with the hypothesis that LH controls aggressive encounters over individual distance in the female as in the male and that estrogenic inhibition of this LH-mediated aggressiveness is a cause of female subordination and the lower encounter frequency found in female groups. (20 ref)—*Journal abstract.*

524. Lee, C. T. & Naranjo, J. N. (Brooklyn Coll, City U New York) **The effects of castration and androgen on the social dominance of BALB/cJ male mice. *Physiological Psychology*, 1974(Mar), Vol 2(1), 93-98.**—Studied the relationship between androgen and the maintenance of social dominance in BALB/cJ male mice. Exp I revealed that 9 out of 10 dominant Ss lost their dominant positions after castration, but of the 10 sham-operated dominant Ss, 9 remained dominant. Thus, androgen appears to be necessary for the maintenance of social dominance. In Exp II, III, and IV varying amounts (.8-8 mg) of testosterone propionate (TP) were injected into castrated dominant Ss, but the hormone did not restore their precastration dominance in any dosage. The relationship between androgen and social order is discussed. (34 ref)—*Journal abstract.*

525. Liebeskind, John C. & Dearmore, Darrell C. (U California, Los Angeles) **A simple, multi-purpose animal preparation for use in a psychobiology laboratory course. *Behavioral Biology*, 1974(Jul), Vol 11(3), 423-428.**—Demonstrates ways in which rats chronically prepared with single, bipolar electrodes in caudal midbrain central gray matter can be used in successive weeks to demonstrate to laboratory course students: sensory evoked potentials in anesthetized and unanesthetized preparations, self-stimulation and/or escape, and stimulation-produced analgesia to peripheral pain. The preparation and procedures are simple, and accuracy in electrode placement is enhanced by the proximity of this structure to stereotaxic zero. Using the same animal repetitively minimizes time spent in surgical preparation and postsurgical recovery. The central gray matter is a relatively unexplored region, and studying it can lead to original observations. —*Journal abstract.*

526. Pittman, James C. & Feeney, Dennis M. (U New Mexico) **Modulation of recurrent inhibition in cat association cortex by reticulocortical arousal. *Experimental Neurology*, 1974(Aug), Vol 44(2), 160-170.**—Used

lesion-induced degeneration and single unit techniques to study the effects of reticular arousal and antidromic callosal stimuli on middle suprasylvian gyrus neurons in the cat. In acute experiments done 2 wks to 6 mo after ablation of the contralateral homotypical cortex in 9 Ss, most neurons showed inhibitory responses to 400-Hz callosal volleys. 5 unoperated Ss served as controls. Excitatory reticular stimulation 300 msec prior to the callosal stimulus increased the duration of the antidromic callosal inhibition. Data are interpreted in terms of recurrent inhibitory circuits in association cortex. (29 ref) —*Journal abstract.*

527. Schmid, Horst. (U Vienna, Psychological Inst, Div of Experimental & Applied Psychology, Austria) **[Conditioning of a relative alpha- and gamma-globulin increase in the serum of rats.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 4(1), 281-305.—Conducted experiments with 108 male, pathogen-free rats of equal age and weight to determine whether alpha and gamma globulin in the serum could be increased by conditioning. Ss were divided into an experimental group of 36, and 3 control groups of 24 each. Experimental Ss were exposed to 10 sessions of extreme stress—a muscular trauma caused by being rotated for 5-min periods at 60 rpm in a Noble-Collip drum. A neutral complex stimulus of light and sound was presented simultaneously. The puncture was done 6 hrs after the conditioning sessions. The 3 control groups were examined for (a) adjustment to the stress administered without simultaneous neutral stimulus, (b) reaction to the puncture itself without other stimuli, and (c) reaction to the neutral stimulus alone. The conditioning appeared to be successful; the neutral stimulus presented by itself produced a relative increase in the alpha-globulin content in the serum, and a relative increase in gamma globulin was also observed. (English summary) (3 p ref) —*T. Fisher.*

528. Sobotka, Thomas J. & Cook, Michelle P. (US DHEW, Food & Drug Administration, Washington, DC) **Postnatal lead acetate exposure in rats: Possible relationship to minimal brain dysfunction.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 5-9.—Male Sprague-Dawley rats receiving oral doses of lead acetate during their 3-wk postnatal development exhibited pharmacobehavioral characteristics similar to those of the minimally brain-dysfunctioned child: altered responsiveness to amphetamine, poor learning performance, and alleviation of this poor performance by amphetamine treatment. Data suggest that prenatal lead exposure may be etiologically related to variants of minimal brain dysfunction.

529. Stern, Judith M. (Rutgers State Coll, New Brunswick) **Estrogen facilitation of progesterone-induced incubation behavior in castrated male ring doves.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 322-337.—Previous studies have shown that incubation is shared by both male and female ring doves and is induced, without prior participation in courtship and nest building, by progesterone (100  $\mu$ g/day) treatment. In the present experiment with 52 mature male ring doves, it was shown that the effectiveness of progesterone is markedly reduced by castration and restored after estradiol benzoate (200  $\mu$ g/day  $\times$  14)

pretreatment, thus simulating the endocrine events which precede incubation in the female. Estrogen also stimulated the appearance of nest cooing (another isomorphic behavior) but not bow cooing (a male-specific display). Results are discussed in terms of hormonal specificity underlying reproductive behavior and the possible physiological roles of estrogen and progesterone in the ring dove. (25 ref)—*Journal abstract.*

530. Stille, G. & Hipplius, H. (Dr A. Wander Research Inst, Bern, Switzerland) **A critical assessment of the concept of "neuroleptics": (On the basis of pharmacological and clinical findings with clozapine).** *Foreign Psychiatry*, 1973-1974(Win), Vol 2(4), 50-66.—Describes the pattern of pharmacological activity of drugs therapeutically active against schizophrenia, designated neuroleptics: the cataleptic effect, inhibition of pharmacogenic stereotypes, and conditioned avoidance. The term "neuroleptic" was originally given by clinicians to certain patterns of clinical activity in which therapeutic action ("antipsychotic effect") and side effects (extrapyramidal motor effects) were taken into account. An antipsychotic effect has been demonstrated with clozapine, but without the pharmacological or extrapyramidal motor side effects. This makes it doubtful whether effects in the animal which are equivalent to the antipsychotic effect and corresponding side effects in man have been detected at all. Only with the classic neuroleptics do the cataleptic effect in animals and the extrapyramidal motor side effects in therapeutic use have value as indicator phenomena. Since the same drug may affect particular functions in totally different ways in humans and animals, concepts such as "neuroleptic" must not be identified too hastily with a clinical effect. (27 ref)—*Journal summary.*

531. Terkel, Joseph & Urbach, Leah. (Tel Aviv U, George S. Wise Ctr for Life Sciences, Israel) **A chronic intravenous cannulation technique adapted for behavioral studies.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 141-148.—Describes a technique by which multiple daily blood samples can be taken to form serial hormone profiles of individual Ss and which does not interfere with ongoing behavioral or physiological processes. Prolactin levels of female rats, which were determined as a measure of stress caused by the technique, were elevated only on the first postoperative day; subsequent levels were comparable to those of decapitated Ss.

532. Trafton, Clinton L. & Kahn, Marcia. (U Arizona) **Effects of cingulate cortex lesions and morphine premedication on morphine intake in rats.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 26-30.—Gave 35 albino rats either bilateral lesions in the cingulate cortex or sham operations. 16 Ss were subjected to a regimen of chronic morphine injections, and 19 received no premedication. Morphine-oriented behavior was indexed by a learned preference for a bitter morphine HCl solution. Bilateral anterior cingulate cortex lesions decreased the acquisition of drug-oriented behavior, while premedication enhanced morphine intake.—*Journal abstract.*

533. Wakeley, Harold; Dudek, John & Kruckeberg, Johanna. (Illinois Inst. of Technology, Research Inst., Life Sciences Research Div., Chicago) **A method for preparing and maintaining rhesus monkeys with chron-**



ic venous catheters. *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 329-331.

534. Wood-Gush, D. G. & Gilbert, A. B. (Agricultural Research Council, Poultry Research Centre, Edinburgh, Scotland) **Some hormones involved in the nesting behaviour of hens.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 98-103.—14 hens with nesting experience that belonged to 2 breeds (a white commercial strain and Brown Leghorns) were ovariectomized and injected daily with estrogen for periods of 6 wks. Thereafter they were given progesterone and estrogen injections daily for 1 wk, alternating with 1 wk of estrogen injections only; at any time during this period half of the Ss were receiving progesterone and estrogen and the remainder estrogen only. Ss of both breeds showed nest examination and nest entry following progesterone and estrogen treatment, but some Brown Leghorns showed these behavior patterns under the influence of estrogen. (16 ref) —*Journal abstract.*

### Brain & Electrical Stimulation & Lesions

535. Alexander, Gay B., Broome, Belinda & Means, Larry W. (East Carolina U) **The effects of an irrelevant intertrial task on pattern discrimination in rats with hippocampal damage.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 459-461.—Compared rats with either hippocampal lesions or sham operations on Y-maze activity and visual pattern discrimination. Lesioned Ss were more active in the maze than controls and showed no evidence of a discrimination deficit with or without distraction (an irrelevant runway task on intertrial intervals). (15 ref)

536. Annau, Z.; Heffner, R. & Koob, G. F. (Johns Hopkins U, School of Hygiene and Public Health) **Electrical self-stimulation of single and multiple loci: Long term observations.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 281-290.—Allowed male hooded rats with chronic septal, anterior, and posterior hypothalamic electrodes continuous access to self-stimulation, food, and water in a 3-lever chamber. A prolonged burst of self-stimulation, with little food and water intake, was followed by bursts of activity on all 3 levers. A 12-hr light-dark cycle imposed a diurnal periodicity on all behaviors except in Ss self-stimulating at the highest daily rates where self-stimulation was equal in dark and light. Under constant light conditions there was a 30-min daily shift in the peak periodicity of all behaviors. Increasing the current by 10  $\mu$ A led to another continuous self-stimulation session for 1 day, with a subsequent decline and stabilization after 3 days. Reduction of the current to its original setting abolished self-stimulation for one day, but within 5 days rates returned to control values. The diurnal periodicity of self-stimulation seemed to be determined by the current intensity.—*Journal abstract.*

537. Bartlett, John R. & Doty, Robert W. (U Rochester, Ctr for Brain Research) **Influence of mesencephalic stimulation on unit activity in striate cortex of squirrel monkeys.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 642-652.—Placed stimulating electrodes at 1 mesencephalic locus in each of 14 squirrel monkeys, primarily in superior colliculus or mesencephalic reticular formation. In all instances stimulation (6 pulses, 200

Hz) at time of implantation altered synaptic transmission through the lateral geniculate nucleus when it preceded stimulation of the optic tract by 50-100 msec. In about  $\frac{1}{2}$  the 124 striate-cortex units tested, the stimulation altered background activity, response to visual input, or itself produced a brief discharge. With the significant exception that altered response to stimulation of optic radiation was infrequent, the mesencephalic influence was manifested on all types of units and/or responses previously described by the authors for striate cortex of the squirrel monkey (see PA, Vol 53:Issue 1). It is concluded that apparent absence of mesencephalic control in many units of the alert animal merely reflects existing maximal operation of the system. (15 ref) —*Journal summary.*

538. Bartlett, John R. & Doty, Robert W. (U Rochester, Ctr for Brain Research) **Response of units in striate cortex of squirrel monkeys to visual and electrical stimuli.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 621-641.—Studied activity of 239 units in the striate cortex of 28 unanesthetized immobilized squirrel monkeys. About 40% of the units tested with diffuse, steady light were luxotonic (i.e., their rate of discharge maintained for less than 1 min, in light vs dark, differed by a factor of at least 2 and/or varied monotonically with log luminance over at least a 3 log<sub>10</sub> range). In 44% of these units, no definitive receptive field was evident, whereas the others had small fields and responded to geometrical features of the stimulus. Rate of light or dark adaptation, threshold for the luxotonic effect, and its continuation beyond the level of rod saturation suggest that cones contribute the major input to luxotonic units. Additional data show that (a)  $\frac{1}{2}$  of the units responded to moving stimuli, (b) 50% responded to stroboscopic flashes, and (c) of 16 units tested for ocular dominance, 60% were binocular. It is concluded that many single units in the striate cortex are at least capable of conveying more than a single class of information. (45 ref) —*Journal summary.*

539. Bernston, Gary G. & Hughes, Howard C. (Ohio State U) **Medullary mechanisms for eating and grooming behaviors in the cat.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 255-265.—Electrical stimulation of localized regions of the medullary reticular formation induced well-coordinated eating and grooming behaviors in 6 male and 13 female cats. Findings suggest that these behaviors resulted from the activation of specific sensorimotor mechanisms, rather than from the induction of generalized drive states. Eating and grooming, however, were directed and goal dependent and not merely motor automatisms. Other elicited responses included escape behavior and fragmentary components of threat behavior. Results contribute to the growing view that the lower brain stem may play an important role in the elaboration and control of complex species-characteristic behaviors. (37 ref) —*Journal abstract.*

540. Bloss, J. L. & Potts, W. J. (Searle Lab, Chicago, IL) **A simple swivel for intracranial electrical stimulation.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 343-344.—Describes an assembly which consists of a commercially available terminal tap, mercotac swivel, and receptacle. The swivel is inexpensive, requires no

machining, and cannot be disconnected by the animal during free movement.

541. Campbell, Byron A. & Baez, Luis A. (Princeton U) **Dissociation of arousal and regulatory behaviors following lesions of the lateral hypothalamus.** *Journal of Comparative & Physiological Psychology*, 1974(Jul), Vol 87(1), 142-149.—Investigated the effect of lesions of the lateral hypothalamus on feeding and spontaneous locomotor activity in 3 experiments with a total of 110 male Sprague-Dawley rats. Lateral hypothalamic lesions produced aphagia and adipsia but did not prevent the increase in locomotor activity characteristic of starvation. In addition, both food deprivation and lateral hypothalamic self-starvation potentiated amphetamine-induced behavioral arousal. However, the lesions did abolish incentive-motivated activity to a stimulus signaling food. Results suggest a dissociation between the neural mechanisms mediating arousal and regulatory behaviors. (32 ref)—*Journal abstract*.

542. Carlson, Neil R. & Vallante, Michael A. (U Massachusetts, Amherst) **Enhanced cue function of olfactory stimulation in mice with septal lesions.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 237-248.—Trained a total of 121 male hybrid normal mice and mice with septal lesions on a go-no-go discrimination task (multiple fixed interval of 15 sec, 15-sec extinction schedule) in 4 experiments. When the discrimination stimulus (the one which indicated to the S whether responding at the end of the interval would be reinforced) was a pellet of food (delivered at the start of the interval) or odor of food or non-nutritive substance (present throughout the 15-sec interval), acquisition of septum-damaged mice was enhanced. These lesions did not, however, alter performance when the discrimination was cued by a buzzer or flashing light. Results suggest that septal lesions produce an increased reactivity to olfactory stimuli and to stimuli associated with the delivery of food reinforcement. (24 ref)—*Journal abstract*.

543. Colby, John J.; Misovich, Stephen & Kasouf, Chickery. (Providence Coll) **Cue prominence as a determinant of VMH obesity.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1131-1136.—Manipulated food prominence in 23 female albino rats to test S. Schachter's (see PA, Vol 46:4450) notion that ventromedial hypothalamic (VMH) obesity is caused by lesion-induced hyperresponsivity to environmental stimuli. Results indicate, contrary to Schachter's proposal, that ad lib overeating by dynamic phase VMH-lesioned rats was not affected by the amount of food present. The findings are discussed in the context of Schachter's explanation and D. W. Thomas and J. Mayer's explanation for human and VMH obesity.—*Journal abstract*.

544. Conrad, B. & Brooks, V. B. (U Western Ontario, London, Canada) **Effects of dentate cooling on rapid alternating arm movements.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 792-804.—Studied the effects of brief reversible cooling of the dentate nucleus on ipsilateral rapid elbow movements in 3 male *Cebus* monkeys that turned a handle in the horizontal plane. It is concluded that in rapid, alternating arm movements, the dentate nucleus is involved in timing their durations and coordinating successive movements.

545. Cruce, Judith A.; Greenwood, M. R.; Johnson, P. R. & Quartermain, David. (U Wisconsin, Medical School, Madison) **Genetic versus hypothalamic obesity: Studies of intake and dietary manipulations in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 295-301.—Studied feeding behavior in 4 experiments with a total of 86 Zucker rats. Ad-lib food and water intakes were significantly greater for the genetically obese rats (fatties) than for their nonobese littermates. The ratio of water intake per gram of food intake was not different for the 2 groups. The ability to regulate caloric intake was then tested in 4 groups of rats: genetically obese, ventromedial hypothalamic lesioned (VMH) obese, sham operated, and normal controls. In response to caloric dilution and quinine adulteration the genetically obese Ss behaved more like normal Ss than like VMH-lesioned Ss. Sensitivity to quinine increased with age in the Zucker fatty. The fact that Ss with genetic obesity and Ss with hypothalamic obesity displayed different behaviors suggests that obesity is not merely a unitary disorder. (20 ref)—*Journal abstract*.

546. Daigneault, E. A. (Louisiana State U, Medical Ctr) **Source of the P<sub>1</sub> component of the cochlea round window recording.** *Acta Oto-Laryngologica*, 1974(Jun), Vol 77(6), 405-411.—Studied the response of cochlear round window potentials of cats and guinea pigs to a short click stimulus coupled with specifically placed neural lesions. The destruction of a specific area of the cochlear nucleus produced a loss of the positive portion of the potentials (P<sub>1</sub>) suggesting that the P<sub>1</sub> potential represents an activity of a peripheral coding or inhibitory mechanism. (German summary) (18 ref)

547. De Sisto, Michael J. & Zweig, Matthew. (Colby Coll) **Differentiation of hypothalamic feeding and killing.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 67-70.—Chronically implanted bipolar electrodes in the posterior lateral hypothalamic-medial forebrain bundle area of 30 hooded rats. Ss which displayed either stimulus-bound feeding or stimulus-bound killing were trained to self-stimulate and tested while given the opportunity to eat or kill during self-stimulation. Average duration of barpressing was greater in the presence of the goal object appropriate to the stimulus-bound behavior, suggesting a differentiation of hypothalamic mechanisms of feeding and killing. (33 ref)—*Journal abstract*.

548. Demski, L. S. & Gerald, J. W. (U New Mexico) **Sound production and other behavioral effects of midbrain stimulation in free-swimming toadfish, *Opsanus beta*.** *Brain, Behavior & Evolution*, 1974, Vol 9(1), 41-59.—Electrically stimulated the midbrain area of the acoustico-lateral lemniscus, ganglion isthmi, and medial torus semicircularis in free-swimming toadfish. Grunts (threat sounds) and boatwhistles (probable courtship calls) were evoked in both sexes during stimulation of this region, which has been termed the sonic midbrain area (SMA). Several locomotor and defensive responses were elicited with sound production; however, neither complete reproductive nor aggressive patterns were observed. Several points adjacent to the SMA were negative for sound production. It is postulated that the SMA integrates various sensory and hormonal stimuli



and controls sound production through connections to lower sonic motor mechanisms. (42 ref)—*Journal abstract.*

549. DeVietti, Terry L. & Hopfer, Thomas M. (Central Washington State Coll) **ECS-induced amnesia: Retention function consistent with state dependency predictions.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 35-37.—Administered a single fear-conditioning footshock to 144 hooded rats, and tested their retention in different subgroups at 24-hr intervals through 144 hrs after conditioning. Retention was strong and undifferentiated at all test intervals. However, rats given ECS .5 sec after the footshock, while evidencing amnesia at all tested intervals, showed less amnesia at 96 and 144 hrs after training and ECS. This pattern of amnesia was predicted by the state-dependency hypothesis. The implications of these data regarding the role of state dependency in determining the recovery of memory following amnesia induced by a posttraining trial ECS are discussed. (23 ref)—*Journal abstract.*

550. Edwards, David A. (Emory U) **Non-sensory involvement of the olfactory bulbs in the mediation of social behaviors.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 287-302.—Discusses the results of studies which demonstrate that bilateral removal of the olfactory bulbs produces a syndrome of profound and apparently permanent social behavioral deficits. These deficits are not seen when mice are rendered anosmic by a peripheral manipulation not affecting the integrity of the olfactory bulbs. It is suggested that the olfactory bulbs are importantly involved in a nonsensory manner in the control of social behaviors in the mouse. (32 ref)—*Journal abstract.*

551. Ellman, Steven J. et al. (City Coll, City U New York) **Relationship between dorsal brainstem sleep sites and intracranial self-stimulation.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 31-34.—Tested the hypothesis that some sites involved in triggering rapid eye movement (REM) sleep are also good sites for intracranial self-stimulation (ICSS). 5 brain locations in 37 albino rats—the locus coeruleus (LC), the medial longitudinal fasciculus (MLF), the dorsal longitudinal fasciculus (DLF), and the ventral raphe (pontine level)—were explored. Rate-intensity functions were obtained from Ss displaying ICSS. High rates of ICSS (15,000/hr) were obtained at several dorsal brain sites. These sites included the LC, pontine aspects of the MLF, and posterior midbrain aspects of the MLF and DLF. ICSS from the LC is interpreted as evidence that noradrenergic ICSS sites are part of the REM sleep neural network.—*Journal abstract.*

552. Evans, S. M. (U. Newcastle upon Tyne, England) **A study of fighting reactions in some nereid polychaetes.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 138-146.—Describes fighting behavior in 3 nereid polychaetes (*Nereis pelagica*, *N. diversicolor*, and *N. dumerilii*). Fighting occurs less often in intra- than interspecific encounters. Many intraspecific encounters end without fighting because the worms either separate immediately on contact or explore one another with their palps and then separate. Individual *N. pelagica* can discriminate between individuals of their own and foreign species because they react differently in intra-

and interspecific encounters. After removal of any one of the anterior sense organs (cirri, palps, or tentacles), they can still make this discrimination but cannot do so after removal of all 3 of these organs.—*Journal abstract.*

553. Fibiger, Hans C. & Grewaal, Darshan S. (U. British Columbia, Div. of Neurological Sciences, Vancouver, Canada) **Neurochemical evidence for denervation supersensitivity: The effect of unilateral substantia nigra lesions on apomorphine-induced increases in neostriatal acetylcholine levels.** *Life Sciences*, 1974(Jul), Vol. 15(1), 57-63.—Unilateral lesions in male Wistar rats induced by injections of 6-hydroxydopamine into the zona compacta of the substantia nigra resulted in reduction of neostriatal dopamine to less than 6% of the control side. 2 mo later intraperitoneal injections of apomorphine (1 mg/kg) produced contralateral turning and a significant increase in neostriatal acetylcholine levels. Haloperidol (1 mg/kg) produced a significant decrease in neostriatal acetylcholine, but this decrease did not differ between the "denervated" and intact neostriata. The lesions did not by themselves affect neostriatal acetylcholine levels. The fact that apomorphine produces a greater increase in neostriatal acetylcholine after lesions of the dopaminergic nigro-neostriatal projection supports earlier behavioral data suggestive of denervation supersensitivity of neostriatal dopaminergic receptors after these lesions. (25 ref)—*Journal abstract.*

554. File, Sandra E. (City of London Polytechnic, England) **Sodium pentobarbital and habituation—acquisition and transfer between states.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 18-22.—Tested 120 hooded rats on habituation of licking response to successively presented tones. Subanesthetic doses of sodium pentobarbital impaired, but did not prevent, the acquisition of the behavioral habituation. Ss habituated in a saline state showed transfer of habituation when later tested in a drugged condition. Ss habituated while drugged and then tested under saline conditions showed much less transfer of habituation, and more Ss showed state-dependent habituation as the drug dose during acquisition of habituation was increased. (33 ref)—*Journal abstract.*

555. Gaito, John. (York U, Downsview, Ontario, Canada) **The kindling effect.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 45-50.—Reviews literature on the kindling effect, a phenomenon whereby animals subjected periodically to low-intensity electrical stimulation unilaterally to the amygdala or some other brain sites gradually develop automatic behaviors which culminate eventually in convulsions. Characteristic brain wave patterns accompany these behavioral changes. A 60-Hz sine wave with a 24-hr interval provides the optimum stimulation. This kindling effect shows some characteristics similar to learning events (i.e., relatively permanent changes, positive and negative transfer effects, and involvement of limbic system). Results suggest that 2 factors are involved in the kindling process: a long-term effect of positive nature (probably due to modified neural circuitry) and a short-term aftereffect of negative nature. (37 ref)—*Journal abstract.*

556. Gittis, Alan & Hothersall, David. (Ohio State U, Lab of Comparative & Physiological Psychology) **DRL performance of juvenile rats with septal lesions.**

*Physiological Psychology*, 1974(Mar), Vol 2(1), 38-42.

—Gave lesions of the septal nuclei to 19 infant hooded rats, and control operations to 12 others. After weaning at 21 days, Ss were trained to leverpress for food. A differential enforcement of low rates (DRL) 20-sec schedule was then used, Ss being tested either in a conventional operant chamber or in one which contained wooden balsa blocks. DRL training continued for 40 daily 60-min sessions. The Ss successfully leverpressed for food. The presence of the wooden blocks facilitated the development of efficient DRL behavior in the lesioned Ss but not in the controls. With training, Ss with septal lesions trained in conventional chambers showed an improvement in their DRL behavior. (26 ref)  
—*Journal abstract.*

557. Glick, S. D. & Marsanico, R. G. (Mount Sinai School of Medicine, City U New York) **Schedule-dependent recovery of barpressing performance in frontal rats.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 65-66.—8 rats with bilateral frontal cortical ablations showed early postoperative rate decrements on either a fixed interval (FI) 15 or fixed ratio (FR) 30 schedule of barpressing for water. Although the performance of all frontal Ss recovered to some extent during 1 mo of postoperative testing, complete recovery occurred only in Ss tested on the FI 15 schedule. Observations of barpressing behavior indicated that FR 30 barpressing required a degree of bimanual motor coordination not required in normal FI 15 barpressing. A persistent disruption of such coordination by frontal cortical lesions appeared to account for the differential recovery of barpressing rates on the 2 schedules.—*Journal abstract.*

558. Goodman, Edward D. & Russell, I. Steele. (Emory U) **Split brain rat: A new surgical approach.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 327-330.—Sectioned the corpus callosum in the midline by insertion of a 24-gauge needle and retractable knife horizontally through the dorsal cerebellum of 5 male albino rats. The callosum was sectioned through most of its extent, and incidental damage to the midline cerebral cortex was either minimal or absent. Gross postoperative motor deficits or other behavioral changes were absent.

559. Hamilton, Charles R.; Tieman, Suzannah B. & Farrell, William S. (California Inst of Technology, Div of Biology, Pasadena) **Cerebral dominance in monkeys?** *Neuropsychologia*, 1974(Mar), Vol 12(2), 193-197.—Trained visual discrimination of several types of stimuli to each hemisphere of 7 split-brain monkeys. Stimuli that differed only in orientation and that were spatially redundant were learned in fewer trials by the left hemisphere than by the right. Other stimuli (e.g., bilaterally symmetrical patterns, up-down mirror images, or photographs of monkeys' faces) were learned, on the average, equally easily by either hemisphere. These preliminary results suggest that monkeys may exhibit some degree of cerebral dominance. (French & German summaries) (19 ref)—*Journal abstract.*

560. Igarashi, M.; Alford, B. R.; Gordon, Wm. P. & Nakai, Y. (Baylor Coll of Medicine, Houston, TX) **Behavioral auditory function after transection of crossed olivo-cochlear bundle in the cat: II. Conditioned visual performance with intense white noise.** *Acta Oto-*

*Laryngologica*, 1974(May), Vol 77(5), 311-317.—Trained 6 healthy adult cats to respond to a visual signal in the presence of distracting background white noise. The fixed performance-ratio was measured by varying the intensity of the background white noise. Following surgical elimination of the crossed olivo-cochlear bundle, Ss exhibited an increase in white noise distraction in the light signal detection task. Statistical analysis confirmed a significant difference between the experimental and sham-operated groups. Electron microscopic and neuro-histological investigations confirmed the disappearance of the efferent nerve endings in the cochlea and that proper midline olivo-cochlear bundle sections had been made. It is suggested that one way in which the crossed olivo-cochlear bundle operates to inhibit acoustic processing is by activation from a sensory system of a different modality. (German summary)—*Journal abstract.*

561. Kemble, Ernest D. & Nagel, Jennifer A. (U. Minnesota, Div. of Social Sciences, Morris) **Effects of amygdaloid lesions in rats on food and water intake and body weight under varied ambient temperatures.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 31-32.—Measured food and water intake and body weight in 7 amygdala-lesioned and 7 control male Holtzman albino rats under 3 (70, 60, and 80°F) ambient temperature conditions. Both experimental and control Ss responded similarly to these manipulations with no suggestion of lesion-induced deficiency. Data are consistent with other research, which suggests that damage to basolateral portions of the amygdala leaves daily food and water regulatory mechanisms intact.—*Journal abstract.*

562. Kenney, Nancy J. & Mook, Douglas. (U Virginia) **Effects of ovariectomy on meal pattern in the albino rat.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 302-309.—In a study with 24 female albino Sherman rats, it was found that after ovariectomy most Ss increased food intake while continuing to eat discrete meals. Meal size increased in ovariectomized Ss, whereas meal frequency decreased. It is suggested that ovariectomy impairs the onset of satiety during a meal but not the ability to regulate total intake through modification of intermeal interval. (21 ref)  
—*Journal abstract.*

563. King, John O. (Coll of St Teresa) **Effects of frontal ablations on auditory discrimination in the rat.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 75-79.—Used a free operant discrimination procedure to study the effects of frontal ablations in 2 groups of 3 Sprague-Dawley rats. Both groups were trained on a multiple fixed-ratio 3 extinction schedule, and then the experimental group received frontal lesions. Following recovery they were returned to the multiple schedule. It was found that for the experimental group there was a significant loss in discrimination following frontal lesions. These results support those of a study by L. Weiskrantz and M. Mishkin (1958).—*Journal abstract.*

564. Kinson, Gordon A. & Liu, Chung-Ching. (U Ottawa, Medical Faculty, Ontario, Canada) **Long-term testicular responses to blinding in rats.** *Life Sciences*, 1974(Jun), Vol 14(11), 2179-2188.—Blinding at 1-mo of age was without effect upon gametogenic function of the



testis of Sprague-Dawley rats. Testicular venous levels of testosterone in intact Ss showed a postpubertal spurt followed by a seasonal peak, and the latter was paralleled by a similar peak in peripheral testosterone. Blinding led to suppression of the postpubertal surge, but testicular vein levels of testosterone were not significantly altered from control values. Testosterone concentrations in peripheral plasma of blinded Ss were consistently lower than in controls until 12 mo postsurgery. Results illustrate a somewhat small degree of gonadal dependency upon photic input in the male rat, particularly when compared with responses reported for the hamster subjected to similar experimental conditions.—*Journal abstract*.

565. Liu, C. M. & Yin, T. H. (National Defense Medical Ctr, Kohlberg Lab, Taipei, Republic of China) **Caloric compensation to gastric loads in rats with hypothalamic hyperphagia.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 231-238.—Hyperphagic male Sprague-Dawley albino rats responded to daily loads of either glucose or oil by reducing food intake without affecting weight gain. Loads of either substance did not enhance fat deposit compared to control loads of water or liquid paraffin. There was no relaxation of caloric compensation even during the acute increase of food intake shortly following the placement of lesions in the ventromedial hypothalamus. (24 ref)

566. MacNeil, Donald A. (Hoffman-LaRoche Inc, Research Div, Nutley, NJ) **Lateral hypothalamic self-stimulation: Effect of excess body weight.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 51-52.—Measured self-stimulation in the lateral hypothalamus of 5 female albino rats which had been made obese by force-feeding. The mean self-stimulation rate was significantly less at the obese weight than at normal weight levels. Results are consistent with the view that a factor correlated with obesity inhibits feeding by inhibiting lateral hypothalamic reward.

567. Manning, Frederick J. & McDonough, John H. (Walter Reed Army Inst of Research, Washington, DC) **Reinforcement omission, non-contingent reinforcement, and limbic lesions in rats.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 327-338.—Gave 2 groups of 6 male Wistar-derived albino rats lesions of the septum and dorsal hippocampus, respectively. Under a fixed-interval (FI) 1-min schedule of food reinforcement, septal Ss leverpressed at significantly higher response rates than 12 intact controls. Under a modified FI 1-min schedule during which food pellets were occasionally omitted, every S made more responses in intervals following omissions than in those following pellet deliveries, but Ss with hippocampal lesions showed a larger increase in response rate than either controls or septals, which did not differ. In Exp II, half of the Ss were subjected to experimental extinction and half provided with noncontingent reinforcement at 1-min intervals. Both procedures decreased responding, but only under extinction did the experimental groups show slower decreases than the controls. Although these data provide a clear double dissociation for septal and dorsal hippocampal lesions, they present substantial difficulties for both disinhibition and perseveration theories of septal and hippocampal function. (32 ref)—*Journal abstract*.

568. McLeese, D. W. (Dept of Environment, Biological Station, St Andrews, New Brunswick, Canada) **Olfactory responses of lobsters (*Homarus americanus*) to solutions from prey species and to seawater extracts and chemical fractions of fish muscle and effects of antennule ablation.** *Marine Behaviour & Physiology*, 1974, Vol 2(3), 237-249.—Tank water from intact prey and extract of Echinoderms were practically nonstimulatory to lobsters, whereas extracts of molluscs, crustaceans, and fish were highly stimulatory. Observations of the olfactory response of lobsters with the medial, lateral and medial, and lateral branches of the antennule bilaterally ablated indicate that the lateral branch performs a chemoreceptive function and that the medial branch assists in chemoreception, perhaps through orientation to water current.

569. Murphy, Lawrence R. & Brown, Thomas S. (DePaul U) **Hippocampal lesions and learned taste aversion.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 60-64.—Compared 16 rats with hippocampal lesions with 16 neocortical and 16 sham-operated controls on a taste-aversion learning task, using an 8% sucrose solution as the conditioned stimulus (CS) and 2% body weight intraperitoneal injection of .15 M lithium chloride as the unconditioned stimulus (UCS). Hippocampally ablated Ss acquired the taste aversion as rapidly as controls after a single CS-UCS pairing. No differences were found among the groups in terms of either the magnitude or extinction of the aversion. Results do not support the interpretation of hippocampal function as a general loss of response inhibition; rather they confirm and extend previous findings indicating that the enhanced perseverative tendencies frequently noted in rats with hippocampal lesions are absent in consummatory-type tasks. (32 ref)—*Journal abstract*.

570. Neill, Darryl B.; Ross, Joseph F. & Grossman, Sebastian P. (Emory U) **Comparison of the effects of frontal, striatal, and septal lesions in paradigms thought to measure incentive motivation or behavioral inhibition.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 297-305.—Conducted 3 experiments with 65 male Holtzman and Sprague-Dawley albino rats; 21 other Ss served as controls. Bilateral electrolytic lesions of the ventral, but not dorsal, anterior striatum produced overresponding in Ss performing on a modified delayed reinforcement of low rates 30-sec schedule of reinforcement. An analysis of the types of errors indicated important differences between the effects of septal and striatal lesions. Comparisons of Ss with frontal, striatal, and septal lesions with respect to their acquisition of saccharine licking, latency to eat in a novel environment, and acquisition of a runway response indicated that only septal lesions reliably enhanced approach tendencies. Data suggest that the behavioral changes seen after striatal or frontal damage in the rat are not due to enhanced responsivity to rewarding stimuli. (40 ref)—*Journal abstract*.

571. Nonneman, Arthur J.; Voigt, James & Kolb, Bryan E. (Pennsylvania State U, Animal Behavior Lab) **Comparisons of behavioral effects of hippocampal and prefrontal cortex lesions in the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 249-260.—5 groups of 5 male Wistar rats each, with

aspiration lesions of dorsomedial frontal cortex, ventrolateral frontal cortex, hippocampus, or posterior cortex, or with sham operations, were tested in 5 behavioral situations: emotionality assessment, serial spatial reversals, 70:30 spatial probability, differential reinforcement of low rates (DRL), and barpress extinction. Ss with posterocortical lesions did not differ from operated controls on any task. The effects of lesions in the 2 anatomically defined frontal subfields were clearly dissociated on spatial reversals, spatial probability, and DRL. Lesions in either subfield produced a significant increase in emotionality relative to controls, and neither lesion affected barpress extinction. Results suggest that both frontal subfields may be functionally related to the hippocampus but in different ways. (31 ref)—*Journal abstract*.

572. Numan, Robert & Lubar, Joel F. (New England Regional Primate Research Ctr, Southborough, MA) **Role of the preoral gyrus and septal area in response modulation in the cat.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 219-234.—In a study with 25 cats, damage to the medial and dorsal septal nuclear groups or to the ventral sector of gyrus preus impaired performance during acquisition of a differential reinforcement of low rates 40 schedule. The deficit was diminished during the presentation of a feedback stimulus signaling the termination of the required delay, but reappeared when feedback was withdrawn. In the absence of feedback, deficient Ss generated response distributions correlated with each other, but not correlated with distributions generated by controls. During feedback, all group distributions were correlated. Collateral behavior was evident in all Ss during nonfeedback periods, and was reduced during feedback. Results support the view that damage to the septum, or frontal cortex impairs the effective utilization of response-produced proprioceptive stimuli. (French & German summaries) (37 ref)—*Journal abstract*.

573. Oakley, David A. & Russell, I. Steele. (University Coll London, England) **Differential and reversal conditioning in partially neocorticate rabbits.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 221-230.—5 normal male New Zealand albino rabbits and 8 others with extensive unilateral or bilateral neocortical lesions were required to differentiate between visual and auditory stimuli in a Pavlovian situation and then to reverse that differentiation. Neocortical ablations had no effect on the initial differentiation, and the lesioned Ss were superior to normals in their performance on the reversal task. The lesioned Ss in particular did not show the same tendency as normals to continue responding to the negative stimulus under reversal conditions. Possible sources of the apparently greater efficiency shown by the neocorticates are discussed. (15 ref)—*Journal abstract*.

574. Olton, David S. & Gage, Fred H. (Johns Hopkins U) **Role of the fornix in the septal syndrome.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 269-279.—Tested female Sprague-Dawley rats for their reactivity to a puff of air, loud noise, and touch on the back following fornix and septal lesions. Septal lesions produced the expected hyperreactivity. Large fornix lesions 9 days prior to the septal lesion, or fornix lesions within 10 min of the septal lesions, blocked the hyperreactivity expected from the septal lesions. Partial

fornix lesions partially suppressed the hyperreactivity. Data indicate that intact septohippocampal connections are necessary for the appearance of hyperreactivity following a septal lesion. (30 ref)—*Journal abstract*.

575. Oscar-Berman, Marlene; Heywood, Simon & Gross, Charles G. (VA Hosp, Boston, MA) **The effects of posterior cortical lesions on eye orientation during visual discrimination by monkeys.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 175-182.—Took motion pictures of the eyes of 12 immature male rhesus monkeys as they learned 2-choice visual discriminations. Preoperative gaze patterns were compared to gaze patterns following ablation of visual areas in the temporal and occipital lobes. After inferotemporal and prestriate lesions, Ss showed (a) increased postoperative staring at the discriminanda on the preferred side; (b) decreased rate of gaze shift from 1 stimulus to another; and (c) as expected, slower learning. (French & German summaries)—*Journal abstract*.

576. Parnas, I.; Armstrong, D. & Strumwasser, F. (California Inst of Technology, Div of Biology) **Prolonged excitatory and inhibitory synaptic modulation of a bursting pacemaker neuron.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 594-608.—Describes long-lasting synaptically induced modulation of the spontaneous activity of the parabolic burster in the parietovisceral ganglion of sponges *Aplysia californica*. This neuron (R15) was innervated by at least 3 axons from the right pleurovisceral connective. One was excitatory while the other 2 evoked biphasic postsynaptic potentials (BPSPs) with a predominantly hyperpolarizing phase. Activation of the excitatory, dextrotubocurarine-sensitive input for only 3 min led to a dramatic increase in the number and frequency of spikes in each burst. Hyperpolarizing the cell to block all spiking for several minutes reversed the effect to the prestimulation level. Synaptic activation was necessary to produce this effect. Stimulating 1 of the BPSPs for 3-10 pulses completely blocked bursting for nearly 1 hr. Findings demonstrate 2 synapses—1 excitatory and 1 inhibitory—which suggest that these inputs may be involved in the entrainment of R15's circadian rhythm of impulse activity. (30 ref)—*Journal summary*.

577. Phillips, Richard E. & Youngren, Orlan M. (U Minnesota) **A brain pathway for thalamically evoked calls in birds.** *Brain, Behavior & Evolution*, 1974, Vol 9(1), 1-6.—Investigated the relationships between 2 brain stem regions where electrical stimulation (ESB) evokes repetitive vocalizations in birds, using anesthetized female F1 strain inbred chickens as Ss. Electrodes were placed in the midbrain call region (MCR) and in a region ventral to nucleus ovoidalis (OM) and checked for ESB-evoked calling. Radio-frequency lesions were then made in MCR, and the OM site was retested for evoked vocalizations. Lesions in MCR abolished calls evoked from OM, indicating that OM excitation produces calls via ipsilateral MCR.—*Journal abstract*.

578. Rutledge, L. T.; Wright, C. & Duncan, J. (U Michigan, Medical School) **Morphological changes in pyramidal cells of mammalian neocortex associated with increased use.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 209-228.—After long-term electrical stimulation of the brain in 4 adult cats, which presumably



produced increased neuronal use, histological studies were made of neocortical neurons involved in transcallosal and extracallosal systems. The observed changes in neuronal structure described in these experiments are interpreted as evidence that increased use of specific pathways to the cerebral cortex produces postsynaptic growth in some cortical neurons. (43 ref)

579. Saporta, Samuel & Greene, Ernest. (U California, Medical School, Ctr for the Health Sciences, Los Angeles) **Orienting bias in the rat produced by hippocampal lesion.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 339-351.—Investigated the view of hippocampal function which proposes that it acts as an attentional gating device, a theory which relies heavily on the inability of hippocampally lesioned animals to orient normally. Results of Exp I with 16 male Long-Evans hooded rats are consistent with the attentional theory: unilateral lesions of the hippocampus produced ipsilateral orienting to symmetrically presented stimuli. However, Exp II with 16 additional Ss showed that the direction of orienting bias to a visual stimulus was not altered by cutting the optic chiasm, a procedure which functionally reversed visual influence to lesioned and intact hemispheres. Since the direction of bias produced by unilateral hippocampal lesion was unchanged by this reversal of sensory input, it seems likely that the orienting bias is due to a motor rather than a sensory impairment. (26 ref)—*Journal abstract*.

580. Sharpe, Lawrence G.; Garnett, Janie E. & Cicero, Theodore J. (Washington U, Medical School) **Analgesia and hyperreactivity produced by intracranial microinjections of morphine into the periaqueductal gray matter of the rat.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 303-313.—Made a total of 137 microinjections of morphine sulfate in doses of 1.0-50  $\mu$ g into various midbrain sites of 47 implanted male Sprague-Dawley rats. 3-6  $\mu$ g of morphine injected in a .5  $\mu$ l volume produced a marked increase in hot-plate reaction time when injected into the periaqueductal gray matter ventral to the cerebral aqueduct encompassing the dorsal raphe nucleus and bordering tissue. Low doses of morphine in other midbrain loci produced less effective antinociceptive activity or no analgesia at all. 10-50  $\mu$ g of morphine eliminated the pain response to limb pinching, but in addition caused Ss to become hyperreactive. Death resulted in 7 Ss. Although mild hyperactivity (i.e., spontaneous motor activation) was frequently observed when 3  $\mu$ g of morphine was microinjected into more lateral midbrain sites, this dose elicited little or no hyperreactivity. Results (a) agree with studies that show identical sites of action for electrical analgesia in the rat, and (b) suggest that morphine and electrical stimulation have similar mechanisms of action in producing analgesia when these active midbrain sites are involved. (34 ref)—*Journal abstract*.

581. Shin, Seon H.; Howitt, Chris & Milligan, John V. (Queen's U, Kingston, Ontario, Canada) **A paradoxical castration effect on LH-RH levels in male rat hypothalamus and serum.** *Life Sciences*, 1974(Jun), Vol 14(12), 2491-2496.—Serum and hypothalamic luteinizing hormone releasing hormone (LH-RH) was lowered in male Sprague-Dawley rats after castration. Testosterone injections raised the hypothalamic LH-RH content signifi-

cantly. The mean value of serum LH level was elevated by testosterone, but not significantly. Hypothalamic LH-RH content was lowered by hypophysectomy and subsequently increased by testosterone injections.

582. Shinoda, Y. & Yoshida, K. (U Tokyo, Faculty of Medicine, Inst of Brain Research, Japan) **Dynamic characteristics of responses to horizontal head angular acceleration in vestibuloocular pathway in the cat.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 653-673.—Determined the dynamic characteristics of responses to sinusoidal oscillation of the head in several structures along the pathway of the horizontal canal system in the vestibuloocular reflex arc. Data from 64 cats reveal the transfer functions of each component structure within the entire vestibuloocular system and suggest the existence of a neural integrator situated postsynaptically to the vestibular nuclei neurons and presynaptically to the ocular motoneurons. (38 ref)

583. Siegel, Philip & Wepsic, James G. (Massachusetts General Hosp Neurosurgical Service, Boston) **Alteration of nociception by stimulation of cerebellar structures in the monkey.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 189-194.—Stimulated 15 cerebellar targets in each of 7 male squirrel monkeys to evaluate the effect of cerebellar stimulation upon painful tail shocks. An elevation of nociceptive thresholds occurred when cerebellar areas whose efferents traverse the brachium conjunctivum were stimulated. Stimulation of cerebellar areas related to the brachium restiformis produced no change. (22 ref)—*Journal abstract*.

584. Teitelbaum, Herman; Catrivas, George N. & McFarland, Willard L. (US Defense Nuclear Agency, Armed Forces Radiobiology Research Inst, Bethesda, MD) **Reversal of morphine tolerance after medial thalamic lesions in the rat.** *Science*, 1974(Aug), Vol 185(4149), 449-451.—Compared the bioelectrical responses of the caudate nucleus, medial thalamus, and cortex of 10 male albino rats to morphine. Tolerance, manifested by a diminished EEG response at cortical and subcortical recording sites, was found in Ss subjected to repeated systemic injections of morphine sulfate. Reversal of tolerance to morphine resulted from destruction of the medial thalamus, although these lesions had little, if any, effect on the withdrawal effects of naloxone.—*Journal abstract*.

585. Thompson, Robert. (Louisiana State U, Baton Rouge) **Localization of the "maze memory system" in the white rat.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 1-17.—Trained 86 albino rats on a 3-cul maze and subsequently performed bilateral cortical or subcortical lesions, and tested the Ss for retention. Defective retention resulted from damage to the anterior neocortex, posterior neocortex, cingulate cortex, corpus striatum, hippocampus, septofornix area, thalamus, posterolateral hypothalamus, mamillary bodies, subthalamus, red nucleus, substantia nigra, central tegmentum, ventral portions of the brain-stem reticular formation, or the cerebellum. Excellent retention was recorded after damage to the amygdaloid complex, rostral medial forebrain bundle, dorsomedial thalamus, or dorsal midbrain. These results, coupled with earlier findings, suggest that the maze habit is dependent upon the activities of 3 functional blocks of the brain: the 1st

block (brain-stem reticular formation) has integrative functions, the 2nd block (sensorimotor cortex, cingulate cortex, cerebellum, and thalamus) has kinesthetic functions, and the 3rd block (occipital cortex, hippocampus, septofornix area, and mamillary bodies) plays a role in the discrimination of spatial cues. (70 ref)—*Journal abstract*.

586. Uemura, Takuya & Cohen, Bernard. (Tokyo Women's Medical Coll, Japan) **Effects of vestibular nuclei lesions on vestibulo-ocular reflexes and posture in monkeys.** *Acta Oto-Laryngologica*, 1973, Suppl 315, 71 p.—Presents details of experiments with 30 juvenile rhesus monkeys with discrete lesions of the lateral, descending, superior, and medial vestibular nuclei. Effects of subsequent labyrinthectomies and postural and oculomotor changes (e.g., head tilt, falling tendencies, nystagmus, and canal paresis) are described and integrated with recent anatomical and physiological studies. (3/4 p ref)

587. Yaginuma, Shigeya & Iwahara, Shinkuro. (Tokyo U of Education, Japan) **Retrograde effects of electroconvulsive shock upon conditioned emotional responses in rats.** *Annual of Animal Psychology*, 1972(Nov), Vol 22(1), 1-8.—Studied the retrograde effects of electroconvulsive shock (ECS) on conditioned immobilization and defecation. 65 male rats of the Wistar-Imamichi strain received foot shock (FS) for 5 sec after being in a test box for 25 sec. The retention of the conditioned emotional responses was tested 24 hr later. The Ss that received ECS within 30 sec of FS froze as frequently, and defecated as many boluses, as the control Ss that did not receive ECS. Results suggest that the retrograde effect of ECS on the retention of passive avoidance cannot be attributed to either the disruption of memory trace or the suppression of conditioned immobilization by ECS.—S. Nakajima.

#### Drug Effects

588. Albin, Maurice S.; Bunegin, Leonid; Massopust, Leo C. & Jannetta, Peter J. (U Pittsburgh, Medical School) **Ketamine-induced postanesthetic delirium attenuated by tetrahydroaminoacridine.** *Experimental Neurology*, 1974(Jul), Vol 44(1), 126-129.—Results of observations made on 20 dogs given ketamine hydrochloride (KH), tetrahydroaminoacridine (THA) or combinations of both show that Ss administered THA 2 min after KH showed a marked and significant decrease in duration of KH anesthesia compared to the KH controls. The THA-KA interaction also significantly decreased abnormal autonomic, central, and motor responses from KH control levels. (16 ref)

589. Angel, Charles; Murphree, Oddis D. & DeLuca, Donald C. (VA Hosp, Neuropsychiatric Research, North Little Rock, AR) **The effects of chlordiazepoxide, amphetamine and cocaine on bar-press behavior in normal and genetically nervous dogs.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 220-223.—Studied 4 stable (A-strain) and 4 "genetically nervous" (E-strain) benzodiazepine dogs. It was found that administration of a benzodiazepine (chlordiazepoxide) facilitated acquisition of goal-directed behavior in genetically nervous Ss. Continued administration of the drug was required to maintain barpress response in this E strain.

The concomitant administration of either cocaine or amphetamine, compounds which inhibit neuronal reuptake of norepinephrine, disrupted the behavioral response of the genetically nervous E-strain Ss to a far greater extent than the stable A-strain Ss. After 14 days of daily administration of chlordiazepoxide, withdrawal of the drug not only resulted in almost complete loss of barpress response in the E-strain Ss but also resulted in a temporary decrease in the acquired behavioral response of the stable A-strain Ss.—*Journal summary*.

590. Bader, A. [Effect of hallucinogenic drugs on artistic creativity.] (Germ) *Confinia Psychiatrica*, 1973, Vol 16(3-4), 159-176.—Reports a discussion between 2 painters, a sociologist with a particular interest in art, a doctor who owns an art gallery, and 4 psychiatrists, during a working session of the German-Language Society of Psychopathology of Expression, at Freudstadt, Germany, in 1972. It was recognized that a hallucinogenic drug cannot itself have any creative value, but may, under certain conditions, induce a modification in style or at least stimulate the presentation of new raw material. The concept of "creativity" was examined, drawing a distinction between the ordinary creativity of the general run of people and the specialized creativity of the artist. The latter entails a formal elaboration which permits communication to others—a function which is in fact disturbed by the drug. It is noted that both qualitative and quantitative factors come into play. The substrate upon which the drug acts must not only be fertile but must be prepared for the experiment. Its sensitivity must be tested and dosages determined accordingly. Both personal conditions (the set), and environmental conditions (the setting) are of fundamental importance. In the absence of adequate preparation, the artist is in danger of using up all his energy in combating the intrusion into his familiar imaginary world of new phenomena produced by the drug. By taking certain technical precautions, physicians can help the artist to derive benefit from this new material.—*Journal abstract*.

591. Blum, K. & Wallace, J. E. (U Texas, Health Science Ctr, San Antonio) **Effects of catecholamine synthesis inhibition on ethanol-induced withdrawal symptoms in mice.** *British Journal of Pharmacology*, 1974(May), Vol 51(1), 109-111.—Studied the effects of  $\alpha$ -methyl-para-tyrosine on ethanol-induced withdrawal symptoms in mice. Significant potentiation of the withdrawal convulsion score induced by ethanol vapor exposure for 3 days was observed. Results indicate that reductions in catecholamines (dopamine and norepinephrine) augment seizure activity induced by subchronic exposure to ethanol.

592. Bradley, P. B. & Dray, A. (U Birmingham, Medical School, England) **The effects of microiontophoretically applied morphine and transmitter substances in rats during chronic treatment and after withdrawal from morphine.** *British Journal of Pharmacology*, 1974(May), Vol 51(1), 104-106.—Studied the effects of microiontophoretically applied acetylcholine (ACh), noradrenaline (NA), 5-hydroxytryptamine (5-HT), and morphine on single brain stem neurons of rats chronically pretreated with morphine and 24 hrs after morphine withdrawal. No significant changes were observed in the



initial spontaneous firing rate or in the qualitative or quantitative effects of ACh, NA, or 5-HT. There was a significant decrease in the number of neurons excited by morphine or showing tachyphylaxis to morphine on repeated applications.

593. **Brophy, Patrick D. & Levitt, Robert A.** (Rose-Hulman Inst of Technology, Div of Humanities & Social Sciences, Terre Haute, IN) **Effects of transmitter mimickers at sites of angiotensin-induced drinking in the cat.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 432-434.—Tested a variety of mimickers of synaptic transmitter activation (e.g., norepinephrine and carbachol) at neural sites in the cat effective for the elicitation of drinking by angiotensin-II. None of the mimickers produced a significant drinking response, although other behavioral effects were noted for carbachol and the catecholamines. (22 ref)

594. **Brown, Clinton C.; McAllister, Diane R. & Turek, Ibrahim.** **Psychomotor test performance with a fenfluramine-amphetamine combination.** *Journal of Clinical Pharmacology*, 1974(Jul), Vol 14(7), 369-376.—Studied the effects of fenfluramine, amphetamine, and a combination of the 2 on the speed and accuracy of psychophysical tests. 24 Ss served in a double-blind factorially designed experiment. 10 psychomotor tests were administered over a 5-day period. Findings were significant on 6 of the 10 tests, usually between amphetamine and placebo. Fenfluramine alone did not differ from placebo. The combination of the 2 drugs produced performances similar to that of amphetamine alone.—*P. Federman*.

595. **Bunney, Benjamin S. & Aghajanian, George K.** (Yale U, Medical School) **A comparison of the effects of chlorpromazine, 7-hydroxychlorpromazine and chlorpromazine sulfoxide on the activity of central dopaminergic neurons.** *Life Sciences*, 1974(Jul), Vol 15(2), 309-318.—Small equivalent doses of chlorpromazine and of 7-hydroxychlorpromazine (7-OH-CPZ) reversed amphetamine-produced depression in dopaminergic ventral tegmental neurons of male Charles River albino rats, whereas chlorpromazine sulfoxide was 50-100 times less potent. Findings suggest that 7-OH-CPZ might be a good antipsychotic agent. (27 ref)

596. **Cicero, Theodore J.; Wilcox, Carol E. & Meyer, Edward R.** (Washington U, Medical School) **Effect of  $\alpha$ -adrenergic blockers on naloxone-binding in brain.** *Biochemical Pharmacology*, 1974(Aug), Vol 23(16), 2349-2352.—Studies of the effects of various drugs on the stereoscopic binding of  $^3\text{H}$ -naloxone in rat-brain homogenates indicate that phenoxybenzamine and phenolamine ( $\alpha$ -adrenergic blockers), like morphine, methadone, and codeine, reduce the binding of naloxone in brain.

597. **Cole, Sherwood O. & Gay, Patricia E.** (Rutgers State U, Camden) **Brain mechanisms underlying the effects of amphetamine on feeding and nonfeeding behaviors: Dissociation and overlap.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 80-88.—Reviews literature on the function of amphetamine and discusses 2 brain mechanisms underlying its effects. In nonfeeding behaviors, the brain processes of the drug's action appear to facilitate aminergic processes which directly influence behavior or inhibit cholinergic processes. In feeding

behavior, the processes underlying the drug's action appear to involve a final adrenergic blocking action in the lateral hypothalamus. Although the primary processes are basically different in feeding and nonfeeding behavior, evidence suggests that there is considerable overlap in the complete central systems (primary and modulatory) involved in such mediations.—*Journal abstract*.

598. **Corner, M. A.; Roholl, P. J. & Bot, A. P.** (Central Inst for Brain Research, Amsterdam, Netherlands) **Effects of glutamate on spontaneous electrical activity in the embryonic chick cerebrum.** *Experimental Neurology*, 1974(Aug), Vol 44(2), 229-245.—Injections of sodium levoglutamate in chick embryos after 15-16 days incubation produced precocious electrical patterns approaching the level found normally at 18-19 days of incubation. Since the rise in the level of this amino acid during normal ontogeny also closely paralleled the electrophysiological changes, it is concluded that glutamate might be involved in regulating the timecourse of functional brain development in this species. (52 ref)

599. **Dmowski, W. Paul; Luna, Manuel & Scommegna, Antonio.** (U Chicago, Medical Ctr) **Hormonal aspects of female sexual response.** *Medical Aspects of Human Sexuality*, 1974(Jun), Vol 8(6), 92-113. Reviews the literature on the effects of hormones on sexual function and behavior in both human and animal Ss. It is emphasized that data from these Ss are not comparable, since a variety of psychological and sociocultural factors mediate the effect of hormones on human sexual behavior; libido, frequency of intercourse, and ability to achieve orgasm appear to be independent of estrogen influence. Evidence suggests that androgens have a role in establishing or imprinting a specific pattern of sexual behavior during intrauterine or early neonatal life, while estrogens have shown no such ability. Progesterone has a biphasic effect on sexual activity by first facilitating and then suppressing estrous behavior; large amounts of progesterone effectively block most sexual activity in female mammals. Androgens have a stimulatory effect on sexual drive in women, while progesterone has an inhibitory effect. The role of neuroendocrine substances (e.g., norepinephrine, dopamine, and serotonin) in sexual behavior is also considered, along with the effects of oral contraceptives. (62 ref)—*L. Gorsey*.

600. **Eckardt, Michael J.; Skurdal, Arlie J. & Brown, Judson S.** (U Oregon, Medical School, Portland) **Conditioned taste aversion produced by low doses of alcohol.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 89-92.—Used a taste-aversion paradigm to demonstrate the aversiveness of intraperitoneal injections of alcohol in 56 albino rats. When injections immediately followed the ingestion of an originally preferred flavor, the extent of subsequent aversion to that flavor varied as a function of dosage, the largest dose tested (1.2 g alcohol/kg) causing the strongest aversion. Delayed injections of 1.2 g/kg, however, did not result in significant aversion. Significant aversiveness was also demonstrated in a 2nd experiment which utilized a blind-injection technique with 16 rats given the 1.2-g/kg dose.—*Journal abstract*.

601. **Feder, H. H. & Silver, Rae.** (Rutgers State U, Inst of Animal Behavior, Newark) **Activation of lordosis in ovariectomized guinea pigs by free and esterified**

**forms of estrone, estradiol-17 $\beta$  and estriol.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 251-255.—Determined threshold doses of estradiol-17 $\beta$  estrone, estriol, estradiol-17 $\beta$ -3-benzoate, and estrone-3-benzoate required to activate lordosis in ovariectomized adult Hartley guinea pigs by injecting these steroids in combination with progesterone. The doses of the 3 free steroids which activated lordosis in about 50% of the Ss ranged from 20 to 50  $\mu$ g. Threshold doses of estradiol benzoate and estrone benzoate were only .4 and 1.7  $\mu$ g, respectively. Data indicate that (a) conversion to estradiol-17 $\beta$  is not an absolute requirement for activation of lordosis and (b) esterified forms of estradiol and estrone are far more potent in inducing lordosis than the corresponding free forms of these steroids. (23 ref)—*Journal abstract*.

602. **Feinberg, I.; Hibi, S.; Cavness, C. & March, J.** (VA Hosp, San Francisco, CA) **Absence of REM rebound after barbiturate withdrawal.** *Science*, 1974(Aug), Vol 185(4150), 534-535.—Conducted 3 experiments which showed that administration of 3 different barbiturates reduced rapid eye movement (REM) sleep. In Exp I, 3 schizophrenic patients and 3 patients with personality disorders received placebos for 5 nights, 200 mg of phenobarbital for 4-5 nights, and placebos (withdrawal) for 4-5 nights. In Exp II, 4 medical students were studied for 4 baseline nights, then 1 received 200 mg of secobarbital for 8 nights, and the other 3 received 200 mg of secobarbital for 1 night and 100 mg for 7 nights. In Exp III, after 4 baseline nights, 4 medical students were given 32 mg of amobarbital 2 times/day for 2 days and 3 times/day for 4 days, and were studied for 3 withdrawal nights. Drug withdrawal led to a return to baseline REM values without significant overshoot. Similar results were observed with administration of benzodiazepines in equivalent dosages; therefore, a distinction between these 2 drug classes on the basis of withdrawal effects appears unwarranted. Further study is needed to determine why high REM levels are sometimes associated with the withdrawal of sedative-hypnotic agents.—*Journal abstract*.

603. **Firth, Hugh.** (U Liverpool, England) **Sleeping pills and dream content.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 547-553.—Attempted to replicate a study by D. Carroll (see PA, Vol 45:5788) on the effects of amylobarbitone on dream content. In the present study with 20 male 19-26 yr olds as Ss, both amylobarbitone and nitrazepam were used. Ss received placebos for 1 wk, low doses of the drugs for 1 wk, high doses for the 3rd wk, and placebo for the 4th wk. It was hypothesized that the 2 drugs would reduce the visual aspects of dreaming, make rapid eye movement (REM) sleep more like non-REM sleep (i.e., less "real"), and on withdrawal, produce very visual, active, and unpleasant dreams. Dream reports were collected from Ss before, during, and after drug administration and were rated as conceptual or perceptual and as visually active or passive, and for hostility, anxiety, sexuality, psychotic thinking, bizarreness, and degree of reality. Contrary to prediction, dreams were virtually indistinguishable under the 3 conditions. Nitrazepam made dreams "everyday-ish," and its withdrawal made them bizarre, and withdrawal of amylobarbitone produced exceptionally vivid dreams and nightmares at home, but not in the

laboratory. Reasons for the contrary results are presented. (36 ref)—*L. Gorsey*.

604. **Gauron, Eugene F. & Rowley, Vinton N.** (U Iowa, Medical School) **Effects of chronic methylphenidate administration on learning and offspring behavior.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 157-158.—Chronic administration of methylphenidate to albino rat pups did not affect avoidance learning in adulthood. High dosages and long durations of the drug did decrease body weight. Preliminary evidence of cross-generational methylphenidate effects on learning was also obtained.

605. **Gluck, John P. & Ferraro, Douglas P.** (U New Mexico) **Effects of  $\Delta^9$ -THC on food and water intake of deprivation experienced rats.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 395-401.—Placed 2 groups of 16 male Wistar albino rats each on either a 23-hr food or water deprivation regimen for 150 days. For 12 days following this period of adaptation, half of the Ss in each group were pretreated with an oral dose of 1.0 mg/kg  $\Delta^9$ -tetrahydrocannabinol ( $\Delta^9$ -THC) which was administered immediately after the daily 1-hr access to food and water. During the 12-day treatment phase, all the Ss were administered the drug dose 2 hrs prior to the daily access period. Ss were then returned to nondrug recovery conditions for 8 days. The amount of food and water consumed during the 1-hr access period was increased by  $\Delta^9$ -THC throughout the treatment phase, regardless of Ss' deprivation or pretreatment drug conditions. (16 ref)—*Journal abstract*.

606. **Hartse, K. M. & Rechtschaffen, A.** (U Chicago, Sleep Lab) **Effect of atropine sulfate on the sleep-related EEG spike activity of the tortoise, *Geochelone carbonaria*.** *Brain, Behavior & Evolution*, 1974, Vol 9(2), 81-94.—Investigated the effect of atropine sulfate on EEG spike activity in 10 adult female tortoises. Results support the hypothesis of the existence of an analogy between the reptilian spike and the electrophysiological phenomena of mammalian slow-wave sleep. (25 ref)—*Journal abstract*.

607. **Hitzemann, Robert J.; Hitzemann, Barbara A. & Loh, Horace H.** (Langley Porter Neuropsychiatric Inst, San Francisco, CA) **Binding of  $^3$ H-naloxone in the mouse brain: Effect of ions and tolerance development.** *Life Sciences*, 1974(Jun), Vol 14(12), 2393-2404.—Binding in the brains of male ICR mice was reversed by levorphanol, morphine, and 1-methadone but not by dextrophan. Levorphanol-sensitive  $^3$ -naloxone binding was blocked by Na $^{+}$ , Li $^{+}$ , Ca $^{++}$ , Mg $^{++}$ , and Mn $^{++}$  but not by K $^{+}$ . Highest activity of specific binding was found in the brain nerve-ending particle fraction. Implantation of a 10-mg naloxone pellet increased the apparent total number of binding sites on the 2nd and 3rd days of implantation.

608. **Holloway, Frank A. & Wansley, Richard A.** (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Motivational parameters in ethanol-induced state-dependent dissociation of avoidance learning.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 71-74.—Studied the effects of ethanol on acquisition and retention of a 1-way avoidance response in 160 albino rats as a function of intertrial time on the grid floor (TGF). During acquisition Day 1, ethanol did not affect performance, but Ss



having shorter TGFs required fewer trials. During retraining on Day 2, an overall state-dependent effect was observed (i.e., Ss receiving the same drug on Days 1 and 2 required fewer trials than those receiving different drugs on Days 1 and 2). The nature of these state-dependent effects varied as a function of TGF. The ethanol-saline Ss required more trials to reach criterion than their controls regardless of the TGF, while saline-ethanol Ss required more trials than their controls only at the longer TGF periods. Results suggest that dissociation of learning in the ethanol-saline and saline-ethanol groups may be differentially influenced by certain motivational factors.—*Journal abstract.*

609. Karniol, Isac G. (São Paulo School of Medicine, Brazil) [Effects of marihuana extracts ( $\Delta^1$ - and  $\Delta^9$ -trans-tetrahydrocannabinol in laboratory animals and in human beings: Comparative study.] (Port) *Revista de Psicologia Normal e Patológica*, 1972(Jan), Vol 18(1-2), 85 p.—Assayed the pharmacological potencies of extracts of 3 samples (A, B, and C) of Brazilian marihuana, and 2 active principles:  $\Delta^1$ -THC and  $\Delta^9$ -THC. 4 methods were used: corneal areflexia in rabbits, decrease in spontaneous motor activity and induction of catatonia in mice, and decrease in rope-climbing activity in rats. In all the tests the order of activity was  $B > A > C$  and  $\Delta^1$ -THC  $>$   $\Delta^9$ -THC. The 5 substances were also administered as smoke to 51 human Ss, using standard double-blind procedures. Pulse rate, time discrimination, and psychological effects were recorded. Varied doses provoked a wide range of responses, but the order of activity of the 5 substances was the same for human Ss as for animals. It is concluded that animal tests can predict the potency of marihuana samples in humans. The relative effects of various extracts of marihuana and of other plants are discussed. (English summary) (106 ref)—N. T. Pinckney.

610. Kastin, Abba J. et al. (VA Hosp, Endocrinology Section of the Medical Service, New Orleans, LA) Extinction of an appetitive operant response after administration of MSH. *Hormones & Behavior*, 1974(Jun), Vol 5(2), 135-139.—Trained 24 food-deprived Sprague-Dawley male albino rats to press a lever to obtain food on either a fixed-ratio (FR) 3 or a variable ratio (VR) 3 schedule of reinforcement. Ss trained on the FR schedule and injected with 10  $\mu$ g of synthetic  $\alpha$ -melanocyte-stimulating hormone (MSH) had delayed extinction of the task as compared with the FR controls injected with diluent. There was no difference between the UR groups receiving MSH or diluent. Results show that MSH affects the behavior of rats in another type of behavioral situation involving an appetitive operant response.—*Journal abstract.*

611. Kolodny, Robert C.; Masters, William H.; Kolodner, Robert M. & Toro, Gelson. (Reproductive Biology Research Foundation, St Louis, MO) Depression of plasma testosterone levels after chronic intensive marihuana use. *New England Journal of Medicine*, 1974(Apr), Vol 290(16), 872-874.—Reports that mean plasma testosterone levels were significantly lower in 20 heterosexual 18-28 yr old men who used marihuana at least 4 days/wk for at least 6 mo (with no other drugs) than in age-matched male controls who had never used

marihuana. Data show that the decreased levels were dose related and indicate that chronic use of marihuana may produce alterations in male reproductive physiology through hypothalamic or pituitary action. (19 ref)

612. Krippner, Stanley & Davidson, Richard. (Maimonides Medical Ctr, Dream Lab, Brooklyn, NY) Paranormal events occurring during chemically-induced psychedelic experience and their implications for religion. *Journal of Altered States of Consciousness*, 1974(Spr), Vol 1(2), 175-184.—Reviews the anthropological, anecdotal, clinical, and experimental evidence concerning paranormal phenomena (e.g., telepathy) during psychedelic sessions. It is concluded that although the data are sparse, the implications for religious experience may be of crucial importance. (27 ref)

613. Livrea, P. (U Bari, Clinic for Nervous & Mental Diseases, Italy) [A study of the neurochemical correlates of "akinesia": I. Central dopaminergic, serotonergic and cholinergic activity in catatonia.] (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 1-12.—Measured the concentrations of homovanillic acid (HVA), 5-hydroxy-indoleacetic acid (5-HIAA), and acetylcholine (Ch) in the cerebrospinal fluid (CSF) before and after probenecid in 4 patients with severe catatonic akinesia. Before probenecid, the HVA and 5-HIAA levels were lower than normal and choline levels were normal or higher. The probenecid administration caused a high increase of HVA and 5-HIAA in the CSF, indicating a very high turnover rate of dopamine (3 times normal) and of serotonin (5 times normal). These findings indicate that in catatonic akinesia there is a preponderance of cholinergic activity in the cholinergic-monoaminergic balance, and are consistent with the neurochemical data of parkinsonian and drug-induced akinesia. (71 ref)—*Journal summary.*

614. Lober, Clifford W. (Duke U, Medical Ctr) Case against the use of d-tubocurarine in operant studies of the cardiovascular system. *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1287-1292.—Reviews evidence showing a high degree of integration between the autonomic and somatic systems and suggests that dextrotubocurarine alters both the central and peripheral perception and response patterns. Many of the observations made upon curarized animals can be explained by a central motor theory. Experimental use of curarine is hindered by the release of histamine in response to administration of curarine. Among other artifacts, curarine-induced release of histamine causes a progressive decrease of pulmonary compliance. When artificial respiration is given to curarized animals, the use of positive pressure ventilation and failure to monitor pulmonary gases are further sources of artifacts. It is noted that some investigators use the respiratory rate initially to adjust heart rate to predetermined levels. (47 ref)—*Journal abstract.*

615. Martz, Robert, et al. (Indiana U, Medical School) The effect of marihuana on auditory thresholds. *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 146-148.—Conducted an experimental study in which 8 21-26 yr old men smoked either placebo marihuana cigarettes or marihuana cigarettes prepared to deliver 50 .1-10 of  $\Delta^1$ -tetrahydrocannabinol. Significant increases were found in both heart rate and positive responses on the Cornell

Medical Index. Although 7 Ss felt that for acuity was improved, changes in Békésy thresholds from .125 to .128 kHz could not be clearly demonstrated.—*Journal summary*.

616. Mead, Philip G. (Keuka Coll) **Effects of overtraining and pretrial administration of dextroamphetamine on reversal learning in rats.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 566.—Trained 20 adult male Long-Evans rats on a brightness discrimination reversal problem containing 1 irrelevant dimension. Prior to being tested, half of the Ss received a 2-mg/kg injection of dextroamphetamine, and half received a 2-mg/kg dose of saline. Each group was further divided so that half of the Ss received 100 postcriterion trials, while the rest were trained only to criterion. Results reveal an overtraining reversal effect but no difference between scores across the drug groups. Findings are discussed in terms of dosage levels, anorexia, and selective attention.—*Author abstract*.

617. Moskowitz, Herbert & Sharma, Satanand. (U California, Inst of Transportation & Traffic Engineering, Los Angeles) **Effects of alcohol on peripheral vision as a function of attention.** *Human Factors*, 1974(Apr), Vol 16(2), 174-180.—Tested 12 male paid college students under a control treatment and 2 alcohol treatments in a perimeter apparatus used for testing peripheral vision. Ss were required to fixate either on a steady-state central fixation light and to detect peripheral lights, or to count blinks produced by the cessations of the fixation light and to detect peripheral lights. Alcohol produced an impairment of peripheral vision only under conditions where the central fixation light blinked and thus required information processing. No performance decrement occurred when the central light did not blink. Results suggest that alcohol interferes with central information processing rather than peripheral sensory mechanisms.—*Journal abstract*.

618. Nazar, Barry L.; Harclerode, Jack; Roth, Robert I. & Butler, R. Christopher. (Bucknell U) **Acquisition of tolerance to  $\Delta$ -9-THC as measured by the response of a cellular function.** *Life Sciences*, 1974(Jun), Vol 14(12), 2513-2520.—Investigated the development of tolerance to delta-9-tetrahydrocannabinol ( $\Delta$ -9-THC) by measuring respiration in brain tissue. Male Swiss albino mice were given either single or 7 daily repeated intraperitoneal injections of 50 mg/kg  $\Delta$ -9-THC or control vehicle. The final injection for all drug-treated Ss included  $^3$ H- $\Delta$ -9-THC. Ss were sacrificed at 1, 2, 4, or 24 hrs or 7 days after the final injection.  $\Delta$ -9-THC depressed respiration, but after repeated injections was significantly less effective in this regard, indicating acquisition of tolerance to  $\Delta$ -9-THC. Because the concentration of radiolabeled cannabinoids in brain tissue from each group is not appreciably different, a cellular as opposed to distributional mode of tolerance is suggested. (15 ref)—*Journal abstract*.

619. Perumal, T. A. & Prakasa Rao, J. (Christian Medical Coll, Velore, India) **Effect of pharmacological blockade on lithium-induced water drinking.** *British Journal of Pharmacology*, 1974(May), Vol 51(1), 107-108.—Intraperitoneal administration of lithium chloride led to a significant increase in the 24-hr water intake of rats. Prior administration of propranolol and haloperidol

blocked the effect of lithium, while atropine did not. The dipsogenic effect of lithium is probably exerted through  $\beta$ -adrenergic and dopaminergic pathways.

620. Porterfield, Al L. & Stern, Jeffrey J. (U Michigan, Dearborn) **Growth hormone and the refractoriness of the prepubertal activity system to estradiol in the rat.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 23-25.—Studied the relationship between growth hormone (GH) and the inability of estradiol to stimulate running in 30 immature female rats. Ss were hypophysectomized and ovariectomized at 21 days old. Starting on Day 25, Ss received either 10  $\mu$ g estradiol benzoate (EB) and isotonic saline or 10  $\mu$ g EB and 1 mg bovine GH. Ss given EB displayed adult running; those given EB and GH showed prolonged juvenile activity. Results demonstrate that GH contributes to the refractoriness of the prepubertal activity system to estradiol. Estrogen also produced a weight loss and precocious vaginal canalization. (20 ref)—*Journal abstract*.

621. Quimby, Kelvin L. et al. (U Wisconsin, Madison) **Enduring learning deficits and cerebral synaptic malformation from exposure to 10 parts of halothane per million.** *Science*, 1974(Aug), Vol 185(4151), 625-627.—Chronic exposure of Sprague-Dawley rats to halothane (10 ppm) during early life produced later deficits in learning a shock-motivated light-dark discrimination and a food-motivated maze pattern, correlated with enduring synaptic membrane malformation in cerebral cortex. Adult exposure had no effect. Halothane may provide a useful analytical tool for study of brain. The behavioral-ultrastructural techniques also suggest a standard for assessing the safety of trace toxicants with central nervous system effects.—*Journal abstract*.

622. Reigle, Thomas G. et al. (Massachusetts Mental Health Ctr, Neuropsychopharmacology Lab, Boston) **Norepinephrine metabolism in the rat brain following acute and chronic administration of thyrotropin releasing hormone.** *Psychopharmacologia*, 1974, Vol 37(1), 1-6.—Administered synthetic thyrotropin releasing hormone (TRH) intraperitoneally to male Sprague-Dawley albino rats to determine the effects of this drug on norepinephrine- $H^+$  metabolism in the brain. With the possible exception of a slight enhancement of release, acute or chronic administration of TRH had little effect on the disposition and metabolism of norepinephrine- $H^+$  in rat brain. In addition, no significant changes were found in brain levels of endogenous norepinephrine, serotonin, or dopamine following the injection of TRH. Thus, little evidence was found to support a possible relationship between the reported clinical antidepressant activity of TRH and its effects on norepinephrine metabolism in brain. (16 ref)—*Journal abstract*.

623. Reynierse, James H. & Balkema, Larry. (Hope Coll) **Effects of progesterone and nesting materials on response prevention and extinction of avoidance in ovariectomized female rats.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 425-428.—48 albino ovariectomized female Sasco rats received either progesterone or oil injections prior to learning a simple 1-way avoidance response. During a 10-min response prevention procedure, half of the Ss in each group had nesting materials present, while the remaining Ss did not. The availability of nesting material during response preven-



tion hastened extinction independent of progesterone injections.—*Journal abstract.*

624. Robinson, Gordon H. & Peebles, Warren J. (U Wisconsin, Madison) **Interactions between alcohol, task difficulty, and compatibility in a choice-reaction task.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 459-466.—Examined the effects of alcohol stress on choice reaction-time tasks of differing difficulty (response alternatives) and compatibility (stimulus-response mapping). Ss were 30 male undergraduates who described themselves as moderate social drinkers. Performance decrement under alcohol stress depended on the interaction of task difficulty and compatibility, low compatibility having a larger effect in more difficult tasks. (20 ref)—*Journal abstract.*

625. Schmaltz, Gerard & Delerm, Bernard. (U de Lille, Lab of Psychophysiology, France) **[Effects of cycloheximide on acquisition and retention of an avoidance learning in the rat: Recovery of memory.]** (*Fren Physiology & Behavior*, 1974(Aug), Vol 13(2), 211-220.—30 min before an avoidance learning session in a Y maze, 401 male Sprague-Dawley rats were given a subcutaneous injection of either cycloheximide or saline. Ss were trained to a criterion of 4 or 8 consecutive avoidance responses. Retention tests were given 2 hrs, 24 hrs, or 6 days after initial learning. Results show (a) acquisition was not affected by the severe protein synthesis inhibition, (b) impairment of memory was found in the low-criterion experimental group 2 hrs after learning and in both experimental groups 24 hrs after learning, and (c) a recovery of memory was observed in both groups 6 days later. A control experiment indicated that the deficits found were not retrieval deficits. Transient amnesia is interpreted in terms of slowing down in long-term memory establishment process, and this is thought to be due to a decrease in the rate of neurotransmitter synthesis. (37 ref)—*English abstract.*

626. Seegal, Richard & Denenberg, Victor H. (U Connecticut) **Maternal experience prevents pup-killing in mice induced by peripheral anosmia.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 339-341.—Used a 2 × 2 design with 30 nulliparous and 30 multiparous Swiss albino mice in which experience and anosmia were manipulated. Anosmia induced by zinc sulfate flush of the nasal epithelium resulted in pup-killing in 13 of 15 primiparous litters, whereas only 2 of 15 multiparous Ss were pup-killers. Results suggest that primiparous mothers depend heavily on olfaction and that a dichotomy exists between the peripheral chemical-induced anosmia (modifiable by experience) and the central, whole-bulb aspiration-induced anosmia, not modifiable by experience.—*Journal abstract.*

627. Stein, Donald G. (Clark U) **The effects of early saline injections and pentylenetetrazol on Hebb-Williams maze performance in the adult rat.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 415-422.—Gave 41 male Charles River CD strain albino rats intraperitoneal injections of either saline or 15 mg/kg pentylenetetrazol (PTZ) from 15 to 35 days of age, and then again at maturity, prior to testing in a Hebb-Williams maze. Ss given saline while immature and again as adults made more errors than 10 Ss never injected or than 10 Ss receiving saline only as adults. Ss receiving PTZ during

development and/or at maturity performed as well as nontreated controls, suggesting that the drug may have counteracted the disrupting effects of the early injections. Injections at maturity were given on alternate days of testing, and all Ss made significantly more errors on days in which treatments were given. Thus, even saline injections can have an immediate effect on performance and can influence behavior of noninjected animals tested in the same apparatus. (25 ref)—*Journal abstract.*

628. Stokes, John D. & Scudder, Charles L. (Loyola U, Strick School of Medicine, Inst for the Study of Mind, Drugs & Behavior, Maywood, IL) **The effect of butylated hydroxyanisole and butylated hydroxytoluene on behavioral development of mice.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 343-350.—The chronic ingestion of .5% butylated hydroxyanisole (BHA) or butylated hydroxytoluene (BHT) by pregnant Swiss-Webster mice and their offspring resulted in a variety of behavioral changes. Compared to controls, BHA-treated offspring showed increased exploration, decreased sleeping, decreased self-grooming, slower learning, and a decreased orientation reflex. BHT-treated offspring showed decreased sleeping, increased social and isolation-induced aggression, and a severe deficit in learning. (22 ref)—*Journal abstract.*

629. Stratton, Lois O. & Kastin, Abba J. (Louisiana State U, New Orleans) **Avoidance learning at two levels of shock in rats receiving MSH.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 149-155.—Trained 32 male Long-Evans rats who received either synthetic  $\alpha$ -melanocyte-stimulating hormone (MSH) or a control diluent in a 2-way shuttle box to avoid shock at 2 intensity levels (.3 and .9 mA). At the low level, MSH improved acquisition, but at the high shock level, MSH rats tended to perform more poorly but were not significantly different from controls. No differences were found in measures of activity or excitability, but higher defecation rates, which may indicate greater emotionality, were observed in Ss receiving high levels of shock and in Ss receiving MSH. Data suggest that MSH may facilitate learning at low, but not at high, levels of shock.—*Journal abstract.*

630. Tart, Charles T. & Kvstensky, Erma. (U California, Davis) **Marijuana intoxication: Feasibility of experiential scaling of level.** *Journal of Altered States of Consciousness*, 1973(Fal), Vol 1(1), 15-21.—On a mailed questionnaire, 40 experienced college users reported psychological factors could markedly alter their response to marijuana, indicating that quantity of drug ingested may not be an adequate measure of the psychological construct of the "level of intoxication" of the altered state of consciousness produced by marijuana. Users showed a highly reliable set of experiential criteria for scaling level, suggesting the usefulness of this psychological approach as an alternative and/or supplement to a pharmacological approach.—*Journal abstract.*

631. Tecce, Joseph J. & Cole, Jonathan O. (Boston State Hosp, Lab of Neuropsychology, MA) **Amphetamine effects in man: Paradoxical drowsiness and lowered electrical brain activity (CNV).** *Science*, 1974(Aug), Vol 185(4149), 451-453.—13 of 20 paid adult volunteers given 10 mg of dextroamphetamine exhibited paradoxical drowsiness accompanied by lowered electrical brain activity (contingent negative variation, or

CNV) in the 1st hr postdrug. During this period, 7 Ss showed behavioral alertness and increased CNV amplitude. Both groups of Ss showed heightened alertness 2 and 3 hrs postdrug. It is concluded that amphetamine is not a simple stimulant of the central nervous system but can also act as a depressant.—*Journal abstract.*

632. Thomsen, Klaus & Olesen, O. Vendelin. (Aarhus U, Inst of Psychiatry, Risskov, Denmark) **Long-term lithium administration to rats: Lithium and sodium dosage and administration, avoidance of intoxication, polyuric control rats.** *International Pharmacopsychiatry*, 1974, Vol 9(2), 118-124.—Gave lithium-containing foods to 5 Brattleboro strain rats with hereditary hypothalamic diabetes insipidus. 5 additional Ss served as controls. During the 1st wks the lithium content of the food was 40 mM/kg. To obtain a serum lithium level comparable to that used in treatment of patients, however, the lithium content of the food had to be raised to 60 mM/kg. Within a few days with this lithium intake, Ss developed signs of intoxication, loss of weight, and decrease of fluid intake. The condition was reversed by giving the Ss a free choice between .9% NaCl and tap water. With this regimen a stable serum lithium concentration of .8 mM was maintained for 2 mo without any signs of intoxication. The lithium-treated Ss drank more saline than did the controls. During the following 2 mo, the mean serum lithium concentration was 1.1 mM and no signs of intoxication occurred. The administration of extra sodium to the lithium-treated Ss did not abolish the lithium-induced lowered antidiuretic response to vasopressin. Results show that by appropriate administration of lithium and sodium intakes it is possible to maintain rats at a serum lithium level of .7-1 mM for long periods of time without signs of intoxication and with the same body weight as controls.—*Journal abstract.*

633. Thornton, William E. & Thornton, Bonnie P. (Naples Community Hosp, FL) **Narcotic poisoning: A review of the literature.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 867-869.—Presents a review of the literature on adverse physical reactions to narcotic drugs. Findings indicate a morbid physical prognosis for the habitual narcotics user. The need for increased prevention and treatment interventions by the medical and nursing professions is emphasized. (46 ref)

634. Tyler, John D. (U North Dakota) **Extinction of conditioned fear: A test of Wolpe's reciprocal inhibition hypothesis.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 127-137.—Tested J. Wolpe's (see PA, Vol 27:4990) reciprocal inhibition hypothesis, which states that fear can be reduced by (a) presenting the fear stimulus, (b) omitting noxious reinforcement, and (c) suppressing fear. 72 DBA/2 mice were given fear acquisition training. Next, a group that received both a drug and extinction-trial (DE), and a conventional experimental-extinction-trial group, were administered conditioned-stimulus (CS) alone trials while drugged with chlorpromazine and saline, respectively. Drug-only (D) Ss and no-treatment controls were injected with chlorpromazine and saline but were not exposed to the CS. Reciprocal inhibition hypothesis predictions were not supported in postextinction tests. The DE mice extinguished with chlorproma-

zine either did not differ from controls or displayed greater fear. (22 ref)—*Journal abstract.*

635. Whalen, Richard E. & Rezek, Donald L. (U California, Irvine) **Inhibition of lordosis in female rats by subcutaneous implants of testosterone, androstenedione or dihydrotestosterone in infancy.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 125-128.—Implanted 40 female Sprague-Dawley rats on the day of birth with Silastic capsules containing nonesterified testosterone, androstenedione, or dihydrotestosterone. The date of vaginal opening was assessed until sacrifice. Ss were ovariectomized, treated with estradiol benzoate and progesterone, and tested for the display of lordosis. Ss were then administered testosterone propionate and the size of the phallus was taken. Testosterone and dihydrotestosterone completely inhibited vaginal opening; androstenedione was partially effective. Testosterone almost completely inhibited lordosis behavior; androstenedione was partially effective and dihydrotestosterone was ineffective. All 3 androgens facilitated phallic development.—*Journal abstract.*

636. Whalen, Richard E. (U California, Irvine) **Estrogen-progesterone induction of mating in female rats.** *Hormones & Behavior*, 1974(Jun), Vol 5(2), 157-162.—Administered 43 ovariectomized female Sprague-Dawley rats 1, 2, 4, and 8 µg of estradiol benzoate and either 10, 25, 50, 100, or 200 µg of progesterone. Ss were then tested for sexual receptivity. The probability of lordosis was related directly to the dose of both steroids. Individual differences in hormone response were marked. Ear wiggling and hopping were primarily related to the dose of progesterone.—*Journal abstract.*

637. Winocur, Gordon & Bagchi, S. P. (Trent U) **Effects of bufotenine and p-chlorophenylalanine on reactivity to footshock.** *Physiological Psychology*, 1974(Mar), Vol 2(1), 75-79.—Conducted 2 experiments in which groups of albino rats were injected with bufotenine, parachlorophenylalanine (PCPA), bufotenine + PCPA (B + PCPA), or saline, and their reactions to footshock were recorded during tests of distractibility and response thresholds. Bufotenine consistently decreased sensitivity to shock, while PCPA consistently increased it. Individual effects of bufotenine and PCPA were not apparent in the B + PCPA groups, which behaved like saline control groups. Results support the hypothesis that bufotenine and PCPA affect reactivity to external stimuli in opposite ways. (15 ref) —*Journal abstract.*

638. Wurtman, Richard J.; Larin, F.; Mostafapour, S. & Fernstrom, J. D. (Massachusetts Inst of Technology, Lab of Neuroendocrine Regulation) **Brain catechol synthesis: Control by brain tyrosine concentration.** *Science*, 1974(Jul), Vol 185(4146), 183-184.—Estimated brain catechol synthesis in male rats by measuring the rate at which brain dopa levels rose following decarboxylase inhibition. Dopa accumulation was accelerated by tyrosine administration, and decreased by treatments that lowered brain tyrosine concentrations (e.g., intraperitoneal tryptophan, leucine, or parachlorophenylalanine). A low dose of phenylalanine elevated brain tyrosine without accelerating dopa synthesis. Findings suggest that nutritional and endocrine factors might



influence brain catecholamine synthesis by controlling the availability of tyrosine.—*Journal abstract.*

639. Yagiela, John A.; McCarthy, Ken D. & Gibb, James W. (U Utah, Coll of Pharmacy) **The effect of hypothermic doses of 1- $\Delta^9$ -tetrahydrocannabinol on biogenic amine metabolism in selected parts of the rat brain.** *Life Sciences*, 1974(Jun), Vol 14(12), 2367-2378.—The dose-dependent fall in body temperature induced by 1- $\Delta^9$ -tetrahydrocannabinol (THC) was rapid in onset and prolonged in duration, unaccompanied by any observed alteration in the concentration or turnover rate of 5-hydroxytryptamine. Norepinephrine (NE) was also unchanged, with the exception of a reduction in the amount of brainstem NE 30 min after the administration of 50 mg/kg THC. (26 ref)

640. Zamble, Edward. (Queen's U, Kingston, Ontario, Canada) **Pavlovian appetitive conditioning under curare in rats.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 101-105.—Conducted 2 experiments with 6 and 10 male Sprague-Dawley albino rats, respectively, in which a conditioned stimulus (CS) was paired with rewarding intracranial stimulation while Ss were immobilized by curare. Tests of the activity response to the CS were carried out before and after conditioning. With either simple or discriminative conditioning, activity to the rewarded CS increased after training. Results are comparable to those in studies using food reward and support the hypothesis that a central motivational state is conditioned to stimuli preceding reward.—*Journal abstract.*

## ANIMAL PSYCHOLOGY

641. Bronstein, Paul M.; Neiman, Howard; Wolkoff, F. Dmitri & Levine, M. Joy. (Brooklyn Coll, City U New York) **The development of habituation in the rat.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 92-96.—In each of 2 studies, Sprague-Dawley albino rats of different ages (8 each at 15, 21, and 100 days old in Exp I and 11 each at 15 and 21 days old in Exp II) were given 1 prolonged open-field trial. Ss of 21 days and older displayed within-session activity decrements, while 15-day-old Ss failed to habituate. The abrupt transition from a pattern of nonhabituation to one of habituation to a novel environment parallels the development of forebrain cholinergic mechanisms during the 3rd and 4th postnatal weeks. Results conform to the suggestion that the 2-wk-old rat is behaviorally similar to the hippocampectomized adult. (23 ref)—*Journal abstract.*

642. Bruen, Katri & Dunham, D. W. (Wright State U.) **Effects of social stimuli on nest building in the zebra finch (*Poephila guttata*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 183-190.—Under experimental conditions with a total of 69 Ss, the sight and sound of a conspecific was conducive to nest building in domesticated male grey zebra finches, but sounds from unseen nearby conspecifics blocked this stimulating effect. The sight and sound of nearby conspecifics, in addition to a single female cagemate, suppressed the rate of nest building, lowered building efficiency, and increased general activity. It is suggested that the close proximity of conspecifics evokes a flocking tendency that interferes

with nest building. If this inference is correct, one of the selective advantages in the spatial separation of flocking and nesting areas, and in the wide spacing of nests in the colony, is avoidance of social stimuli that interfere with nest building.—*Journal abstract.*

643. Dewsbury, Donald A. (U. Florida) **The use of muroid rodents in the psychology laboratory.** *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 301-308.—Describes the potential uses, taxonomy, and husbandry of the rodent superfamily Muroidea, a group of animals with much potential for comparative behavioral study. The superfamily—including Old World rodents, gerbils, hamsters, New World rats, mice, and voles—are readily acquired, easy to maintain, and exist with sufficient ecological and behavioral diversity to enhance the likelihood of significant results. (45 ref)

644. Dimond, S. & Lazarus, J. (University Coll, Cardiff, Wales) **The problem of vigilance in animal life.** *Brain, Behavior & Evolution*, 1974, Vol 9(1), 60-79.—Discusses vigilance as an important facet of animal life, particularly in relation to 3 areas: external danger, the exploitation of environmental resources, and intraspecific communication. The 2nd of these involves, in addition to vigilance, an active search of the environment. The organization of the nervous system imposes certain limitations on the effectiveness of vigilance, and these are described with particular reference to experimental studies of vigilance in man. 3 types of strategy are delineated which function to offset the neural limitations on vigilance; neural mechanisms, individual behavioral strategies, and social strategies. These are considered in relation to those areas of life already defined as requiring a watchkeeping function. (3½ p ref)—*Journal abstract.*

645. Haude, Richard H. & Ray, Oakley S. (U Akron) **Visual observing behavior in the squirrel monkey.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 138-140.—Tested 10 male squirrel monkeys to determine whether visual observing behavior could be measured using a technique developed for rhesus monkeys. Ss engaged in visual observation of a set of projected color slides of other squirrel monkeys to an extent comparable with visual observation by rhesus monkeys. Significant differences in both mean cumulative viewing time and mean frequency of visual observing were found for the different visual incentive conditions used. Previous reports of a low level of visual attention by squirrel monkeys were not confirmed.—*Journal abstract.*

646. Helligenberg, Walter. (Max Planck Inst. for Behavioral Physiology, Seewiesen, W. Germany) **Random processes describing the occurrence of behavioural patterns in a cichlid fish.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 169-182.—Correlation patterns found for 7 measured behaviors of male cichlids suggest that the behaviors share at least 4 slow basic processes which to different extents contribute to long-term fluctuations in the rate of different behaviors. A linear model representing slow fluctuations in the rate of a particular behavior as a linear combination of 4 basic processes yields a reasonable approximation to the long-term correlation pattern observed.

647. Holliday, D. V. (Tracor, San Diego, CA) **Doppler structure in echoes from schools of pelagic fish.** *Journal of the Acoustical Society of America*,

1974(Jun), Vol 55(6), 1313-1322.—Measured the Doppler spread-at-side aspect of 3 schools of fish and related it to swimming motions by a simple algebraic model based on R. Bainbridge's (1958) equation relating fish swimming speed, length, tail-beat amplitude, and tail-beat frequency. The mathematical model was used to estimate the length of the fish in 2 of the schools. Near head or tail aspect, the observed Doppler structure appeared to be related to behavioral swimming characteristics.

648. Impeken, Monica. (Rutgers State U., Inst. of Animal Behavior, Newark) **Response-contingent prenatal experience of maternal calls in the Peking duck (*Anas platyrhynchos*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 164-168.—Investigated whether Peking duck embryos, exposed to (mallard or chicken) maternal calls presented to them in response to their foot movements (as indicator of their motor activity) on the day before hatching, differed in their responsiveness from other embryos exposed to the same calls but not contingent upon their own movements. Results show that response rate was significantly increased to the mallard maternal call, but not to the chicken maternal call, as a function of the contingency. (20 ref)—*Journal abstract*.

649. Jones, R. B. & Nowell, N. W. (U Hull, England) **A comparison of the aversive and female attractant properties of urine from dominant and subordinate male mice.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 141-144.—Tested the urine of 10 individual dominant and 10 subordinate male Tuck T. O. strain mice for male-aversive and female-attractant properties using 20 dominant and subordinate male Ss and 20 estrous and anestrus female Ss in open-field tests. Results indicate (a) the presence of a factor in the urine of dominant males which proved aversive to both dominant and subordinate Ss, (b) the presence of a female attractant in the urine of dominant males, and (c) naive females had to be in estrus to respond positively to male urine. Results are discussed in terms of preputial and coagulating gland contents, androgen levels, and possible territorial functions.—*Journal abstract*.

650. Kuenzle, Clive C. & Knüsel, Alois. (U Zurich, School of Veterinary Medicine, Switzerland) **Mass training of rats in a superenriched environment.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 205-210.—Describes an apparatus that was designed and used for the simultaneous training of 70 male albino rats without requiring much effort from the E. The apparatus is based on an enriched environment and confronts the Ss with true learning situations. The Ss learned to traverse a maze and to select and open appropriate gates in order to get access to either food or water. The number of tasks and their complexity were gradually increased during a training period of 29 days. The apparatus offers a convenient means for supplying the investigator with a large number of trained animals in studies aimed at correlating behavior with brain morphology and biochemistry.—*Journal abstract*.

651. Love, William S. & Houser, Vincent P. (Veterans Administration Hosp., Psychotropic Drug Lab., Perry Point, Md.) **A reliable method for continuously monitoring motor activity in unrestrained squirrel monkeys.**

*Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 325-326.

652. MacKinnon, John. (U Oxford, Animal Behaviour Research Group, England) **The behaviour and ecology of wild orang-utans (*Pongo pygmaeus*).** *Animal Behaviour*, 1974(Feb), Vol 22(1), 3-74.—Spent 21 mo of fieldwork studying wild populations of orangutans in Borneo and Sumatra. 1,500 hrs of daylight observation were made. In contrast to other higher primates, the dispersed distribution of food and the orangutan's slow mode of travel seem to favor solitary habits. Over 80% of foraging units seen contained only 1 independent animal, either alone or with dependent young. Larger groupings were seen when adolescents joined up with other animals or when males and females formed temporary consortships for mating purposes. Comparison between several populations revealed an interesting mechanism for the natural regulation of animal numbers. Differences between Bornean and Sumatran orangutans are discussed in relation to the zoogeography of these 2 islands. (116 ref)—*Journal abstract*.

653. Malcolm, William M. & Hanks, Jess P. (Rutgers State U., New Brunswick) **Landing-site selection and searching behaviour in the micro-lepidopteron *Agonoterpis pulvipennella*.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 45-48.—Observations indicate that the cryptic micro-lepidopteron (Oecophoridae) camouflages itself against predators by distinguishing among several shades of grey and preferring landing sites that match the reflectance of its forewings. Variations in the time it spends searching out a site are of survival value.

654. Mitchell, K. A. (U Glasgow, Scotland) **Activities of two British species of *Pagurus* (Crustacea, Decapoda, Paguroidea).** *Marine Behaviour & Physiology*, 1974, Vol 2(3), 229-236.—Results of 2 series of experiments show that the hermit crab *P. bernhardus* was more active during day than night, whereas the opposite was true of *P. prideauxii*. Under periods of 24 hrs constant illumination, the activity pattern of *P. bernhardus* persisted to a lesser degree but *P. prideauxii* showed no activity pattern.

655. Morgret, Morris K. & Albee, Paul R. (Washington State U.) **An automated open-field apparatus utilizing an improved resistance detection circuit.** *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 327-328.

656. Nadler, Ronald D. (Yerkes Regional Primate Research Ctr, Emory U) **Peripartuitional behavior of a primiparous lowland gorilla.** *Primates*, 1974(Mar), Vol 15(1), 55-73.—Observed and recorded the behavioral interactions of a primiparous lowland gorilla and her newborn female infant during the birth of the infant and the subsequent 27 hrs. The mother's behavior, initially unresponsive to the infant, progressed rapidly through a series of interactions that are described as preliminary to, and perhaps essential for, the ultimate development of appropriate maternal behavior. The relationship between the following different critical activities is discussed: (a) the ingestion of birth fluids by the mother and the establishment of initial contact with the infant, (b) the progression from impersonal contact to ventral-ventral contact, and (c) the coordination between the mother's and infant's vocalizations and activity preceding nursing. (33 ref)—*Journal abstract*.



657. Norton, Thomas T. (U Pennsylvania, Medical School) **Receptive-field properties of superior colliculus cells and development of visual behavior in kittens.** *Journal of Neurophysiology*, 1974(Jul), Vol 37(4), 674-690.—Studied the relationship between the development of receptive field properties in the stratum griseum superficiale of the superior colliculus and the development of visually guided behaviors in 27 10-39 day old kittens. Comparative electrophysiological data from 4 adult cats indicate that immature receptive fields acquired more adult receptive field properties by 15 days of age and continued to change until at least 25 days in the case of 4 of 5 receptive field properties and 35 days for the 5th property, direction selectivity. Tests of visual and auditory behavior conducted before the electrophysiological recordings showed that (a) 2 visually guided behaviors (orienting to a visual stimulus and following it) could be elicited in Ss tested at 16 and 18 days of age, respectively; (b) the onset of these behaviors coincided with the period of rapid change from the immature to the mature state of the receptive fields; and (c) auditory orienting and following responses appeared before visual orienting and following. (52 ref)—*Journal summary*.
658. Ohashi, M.; Kurisu, S.; Imai, H. & Murakami, H. (Kobe U, Japan) **Inexpensive digital recorder for measuring the activity of mice.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 321-325.—Describes a device which registers the frequency of electric pulses generated by the activity of the mice on a counter and automatically photographs the registered count with a camera at specific times. Data obtained through the apparatus coincide satisfactorily with values observed by the kymographic method.
659. Ollason, Janet C. & Slater, Peter J. (U Sussex, School of Biology, Brighton, England) **Changes in the behaviour of the male zebra finch during a 12-hr day.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 191-196.—During a 12-hr day (from 7 AM to 7 PM), 75% of the movement of each of 10 male finches between perches occurred between 8 AM and 2 PM. Trends were apparent in other behaviors, as assessed by the number of 30-sec time units in which they were recorded. Soft call notes, singing, drinking, and taking of sand and cuttlefish bone declined during the day, and sitting still and preening rose.
660. Rydén, Olof. **Responses to an alarming auditory stimulus as affected by massive earlier exposure: A combined field- and laboratory experiment with great tit nestlings (*Parus major*).** *Psychological Research Bulletin, Lund University*, 1974, Vol 14(3), 26 p.—Exposed 3 11-14 day old Great Tit nestlings to 2 hrs of intermittent replays of an alarm note before feedings when the parents were not present and in connection with simulated attacks on the home cage or with the display of a stuffed predator. Results show that (a) Ss exhibited a constant tendency to withdraw from stimuli similar to the alarm note based on an early preference for sounds with opposite qualities and (b) the 3 environmental conditions had transient effects on this tendency. (25 ref)
661. Suthers, Roderick A. & Fattu, James M. (Indiana U.) **Fishing behaviour and acoustic orientation by the bat (*Noctilio labialis*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 61-66.—Found that this species of bat, previously believed to feed entirely on aerial insects, captures aquatic food by dipping its feet into water. Small bits of food on the water's surface were echolocated at a range of about 1 m. The most common orientation cry began with an almost constant frequency of 70 kHz which was then frequency modulated to about 40 kHz. (18 ref)
662. Tortora, Daniel F.; Eyer, Jerry C. & Overmann, Stephen R. (Michigan State U) **The effect of sand deprivation on sandbathing and marking in Mongolian gerbils (*Meriones unguiculatus*).** *Behavioral Biology*, 1974(Jul), Vol 11(3), 403-407.—Observed the behaviors of 20 Mongolian gerbils after 0, 2, 4, 6, and 8 days of sand deprivation. The frequency of 3 behavioral components of sandbathing significantly increased as a function of deprivation. Deprivation also significantly increased territorial marking, and as expected, males marked more frequently than females. Results are examined in terms of an oil-regulation hypothesis for sandbathing. The effects of deprivation support the hypothesis.—*Journal abstract*.
663. Van Deventer, John. (U Wisconsin Ctr, Marshfield) **The feeding latencies of two species of planaria.** *Psychological Record*, 1974(Sum), Vol 24(3), 373-377.—Results of studies with the planaria *Cura foremanii* and *Dugesia tigrina* show that there were no significant differences between the mean feeding latencies of the Control, Handled, and Familiarized groups; food size affected the frequency of *C. foremanii* eating (but not *D. tigrina*) but not feeding latency, and prior handling decreased the feeding latency for *D. tigrina*. It is concluded that failure to replicate J. B. Best and I. Rubenstein's (see PA, Vol 37:2701) results may indicate that *C. foremanii* may not be as reliable a laboratory animal as *D. tigrina*.
664. Webb, Wilse B. (U Florida) **Sleep as an adaptive response.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1023-1027.—Suggests that sleep is an adaptive nonresponse and that the sleep characteristics of particular species reflect the adaptive requirements for nonresponding in the ecological niche of species. The ecological conditions which would modify sleep length, intermittency, and diurnal placement are discussed. Sleep is viewed as a form of instinctive behavior rather than as a nutritional or need satisfying state.—*Journal abstract*.
665. Wells, Annie; Jones, Atlas; Williams, Marvin & Geist, Charles R. (Lincoln U) **Noise, vitamin A deficiency, and emotional behavior in rats.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 392-394.—Investigated the effects of aversive stimulation (loud noise) on the emotionality of 21 male albino Holtzman rats which were food-deprived, satiated, or vitamin A deficient. Activity (number of squares traversed in an open-field task) and defecation scores comprised the measures of emotion. Significantly more boli were recorded for food-deprived Ss than satiated Ss, while the number of boli for vitamin A deficient Ss was in between. Noise significantly increased the number of boli for all groups. Deprivation conditions, noise-no noise, and the interaction of these variables were all significant on activity scores. Food-deprived Ss were the most active, satiated Ss the least active, and again vitamin A deficient Ss fell in

between. Groups were more active with noise. The significant interaction probably resulted from the marked increase in activity by deprived Ss under noise. Thus, aversive stimulation may have greater effect on animals already under stress from food deprivation than on satiated animals.—*Journal abstract*.

666. Woodard, William T. & Bitterman, M. E. (U. Hawaii) Improved techniques for the measurement of consummatory behavior in fishes. *Behavior Research Methods & Instrumentation*, 1974(May), Vol. 6(3), 321-324.

667. Zachman, T. A.; Bell, R. W.; Nitschke, W. & Irwin, B. (Northern Illinois U) Ultrasonic signaling in three inbred strains of mice. *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 137-145.—Subjected 3 litters each of 3 inbred strains of mice (C57BL/6/J, Balb/c/J, C3H/He/J) to 2 temperature parameters: 23.5° C (ambient temperature) and 0° C (cold stress parameter). Ultrasonic recordings of the animal signals were taken at 3, 6, 9, 12, and 15 days of age. The recordings were analyzed for mean peak frequency and for duration and rate of the signals. The number of signals differed significantly between 3 and 6 days; the C57BL/6/J ceased signaling by 6 days while by 12 days only the cold-stressed C3H/H3/J pups were emitting signals. At 3 days all strains differed significantly as a function of signal duration. At 3, 6, and 9 days, 2 of the strains appeared to emit significantly longer signals under cold stress. The mean peak frequency of the signals differed significantly across strains. However, the parameter of cold stress did not appear to affect the signal frequency for any of the strains. The following conclusions are drawn: (a) the suggestion of some type of strain-specific frequency coding; (b) the possibility of differences in the development of homeothermia across strains; and (c) the indication that critical periods for neonatal development may exist.—*Journal summary*.

### Learning & Motivation

668. Aoyagi, Hajime. (Waseda U, Tokyo, Japan) [The effect of partial- and non-reward followed by continuous reward upon extinction to resistance.] (Japn) *Annual of Animal Psychology*, 1972(Nov), Vol 22(1), 9-20.—Studied the effect of partial reinforcement on later extinction. 30 male albino rats received 90 training trials in a straight runway reinforced with food. In the first and last phases of the training, all trials were reinforced, but in the middle phase, either 100% (Group 1), 50% (Group 2), or 0% (Group 3) of 30 trials were reinforced. The running speed in the extinction trials was fastest in Group 2 and slowest in Group 1. The largest difference in speed was found in the initial segment of the runway. Results indicate that the effect of partial reinforcement in the middle phase of training survived through the continuous reinforcement in the last phase of training. The effects of nonreward during training trials appear to be different from those during the extinction trials. (English summary) (17 ref)—S. Nakajima.

669. Baker, A. G. (U Sussex, Brighton, England) Conditioned inhibition is not the symmetrical opposite of conditioned excitation: A test of the Rescorla-Wagner model. *Learning & Motivation*, 1974(Aug), Vol 5(3), 369-379.—R. A. Rescorla and A. R. Wagner's 1972

linear associative model of learning predicts that a neutral stimulus will become weakly excitatory if it is paired with a conditioned inhibitor and the compound is not reinforced. If the inhibitor is not allowed to extinguish during these pairings, the model predicts that the neutral stimulus will become strongly excitatory. The present Exp I tested the latter prediction of a strong effect using 16 male hooded Long-Evans rats in a conditioned emotional response paradigm, and found no evidence that the pairings made the neutral stimulus excitatory. Exp II, with 24 rats, replicated Rescorla's 1972 finding of a weak excitatory effect, but showed that even on a relearning test the experimental group learned no faster than a novel-stimulus control group.—*Journal abstract*.

670. Bankart, C. Peter; Bankart, Brenda M. & Burkett, Michael. (Wabash Coll) Social factors in acquisition of bar pressing by rats. *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1051-1054.—Examined the effects of a response-sophisticated model on the acquisition of a novel operant response (barpressing) in 30 male Holtzman rats. Results are consistent with A. Bandura's (1969) social learning theory and suggest that previous studies may have confounded acquisition with performance in attempting to demonstrate observational learning in species other than humans.—*Journal abstract*.

671. Barlow, J. J. & Sanders, G. D. (University Coll, U London, England) Intertrial interval and passive avoidance learning in *Octopus vulgaris*. *Animal Learning & Behavior*, 1974(May), Vol 2(2), 86-88.—When 105 octopuses were trained on a passive avoidance task at various intertrial intervals from .05 to 10 min, acquisition rate was maximal at the intermediate intervals, a finding similar to those obtained with rats. Explanations involving fear are thought to be inadequate, and the phenomenon is interpreted in terms of short-term memory.

672. Beach, F. A. et al. (US Naval Undersea Ctr, Hawaii Lab, Kailua) Spatial habit reversal in two species of marine mammals. *Psychological Record*, 1974(Sum), Vol 24(3), 385-391.—Tested 2 male California sea lions and 1 female Atlantic bottlenose dolphin over 19 reversals of a spatial problem. Both species performed well on spatial reversal and reached asymptote quickly. Error rates varied more between the 2 sea lions than between the 2 species. Incidence of spontaneous reversal was positively correlated with lower error rates for each S. The tendency for spontaneous reversal on the earlier problems appears in conflict with notions proposing improvement of reversal performance as a function of decrement in retention produced by proactive interference.—*Journal abstract*.

673. Beck, Robert C. & Bidwell, Liane D. (Wake Forest U) Incentive properties of sucrose and saccharin under different deprivation conditions. *Learning & Motivation*, 1974(Aug), Vol 5(3), 328-335.—Reports results of 2 experiments with a total of 48 male albino Holtzman water-deprived, food-deprived, or nondeprived rats. In Exp I it was found that hungry Ss developed a 100% preference for 8% sucrose over water in a maze-choice situation, whereas thirsty Ss developed no preference. When deprivation conditions for the 2 groups were reversed, the pattern of preference relations also reversed. In Exp II nondeprived Ss developed a



preference for either 8% sucrose or .2% saccharin over water, while thirsty Ss did not develop a preference for either of these over water. Results are discussed in terms of incentive theory.—*Journal abstract.*

674. Behar, Isaac & LeBedda, John M. (US Army Aeromedical Research Lab, Fort Rucker, AL) **Effects of differential pretraining on learning-set formation in rhesus monkeys.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 277-283.—Compared the rate of learning-set formation by 4 rhesus monkeys that had previously been pretrained on the win-stay component of the learning-set strategy (Group WS) to the rate evidenced by 4 others that had pretraining on the lose-shift component (Group LS). Differences between groups were small, and asymptotic levels were below those previously obtained by monkeys without pretraining. The negative transfer resulted from generalized tendencies to perseverate or shift (Groups WS and LS, respectively), regardless of response outcome. The former tendency dissipated relatively rapidly, while the latter persisted very markedly throughout the 400-problem learning-set series. It is noted that learning-set formation requires a balance between the win-stay and lose-shift components; however, the optimal ratio is unknown. (19 ref)—*Journal abstract.*

675. Berger, Laurence H. & Kettlewell, Neil M. (U Montana) **The effect of cutaneous afferent activity on instrumental learning in rabbits.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 201-204.—Used 2 methods—an instrumental escape-avoidance paradigm and a yoked classical-conditioning paradigm—to train the nictitating membrane response in 24 New Zealand albino rabbits. The magnitude of cutaneous afferent activity (CAA) from the orbital region of the eye was controlled using mechanical and chemical means. Ss were trained with augmented and diminished CAA. Diminished levels of CAA depressed learning in both training paradigms. Instrumental Ss emitted more nictitating membrane responses than did the yoked classical controls under conditions of augmented CAA. It is concluded that the general importance of the role of CAA in learning was strengthened.—*Journal abstract.*

676. Bolles, Robert C.; Riley, Anthony L.; Cantor, Michael B. & Duncan, Perry M. (U Washington) **The rat's failure to anticipate regularly scheduled daily shock.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 365-372.—Gave 32 female Long-Evans rats in Exp I an electric shock at the same time each day, either at noon or at midnight, for 30 days to see if they would anticipate shock by making a learned escape response before a scheduled shock. In Exp II with 7 female Wistar rats, subcutaneous temperature was recorded before a regularly scheduled daily shock to see if there was anticipatory conditioned emotional reaction. Both experiments showed an absence of anticipation. It is suggested that diurnal anticipation may be limited in the rat to the hunger-feeding system.—*Journal abstract.*

677. Braud, William G. & Ginsburg, Harvey J. (U Houston) **Immobility reactions in domestic fowl (*Gallus gallus*) less than 7 days old: Resolution of a paradox.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 104-108.—Found that 12 domestic white Leghorn chickens showed virtually no immobility reactions until the age of

9 days when tested repeatedly on a flat surface. 12 other chicks showed pronounced immobility reactions as early as 1 day of age when tested repeatedly on a cloth surface which slightly contoured the chick's body. It is suggested that previous failures to observe immobility reactions in chicks less than 7 days old were due to inappropriate testing conditions and not to the absence of fear, insufficient hormonal functioning, or nonfunctioning "releasing nervous mechanisms." Young chicks do indeed become immobile if effector disruption is prevented and/or if increased physical contact during induction augments fear or produces a "prolonged zero" in the animal's defensive distance. (19 ref)—*Journal abstract.*

678. Brodigan, David L. & Trapold, Milton A. (U Minnesota) **Recovery from conditioned suppression to a partially overlapping compound stimulus.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 89-91.—In a conditioned suppression paradigm with 8 male albino rats, a partially overlapping compound stimulus—consisting of 3 min of continuous illumination of the houselight with 3 discrete 5-sec presentations of a tone superimposed—signaled occurrences of electric shock. A .5-sec electric shock was coterminous with each tone presentation. Ss that received this treatment in early conditioning sessions showed considerable recovery from conditioned suppression to the houselight as the experiment progressed. The effect was not reversible, and it could not be demonstrated in Ss that experienced extensive prior conditioning to the houselight alone. Results are discussed in relation to a hypothesis concerning the modulation of behavioral control exerted by elements of compound stimuli and as they relate to a recent theoretical model for Pavlovian fear conditioning.—*Journal abstract.*

679. Burns, Richard A.; Woodard, William T.; Henderson T. B. & Bitterman, M. E. (U South Florida) **Simultaneous contrast in the goldfish.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 97-100.—Conducted an experiment in which 11 goldfish trained with small reward for response to one color and large reward for response to another color performed less well for the small reward than 10 controls trained with small reward for response to both colors. Results (with liquid food as reward) cannot be explained in terms of postingestive inhibition (evidence from prior experiments with *Tubifex* worms as reward being inconsistent on this point) or in terms of within-sessions decrement in drive. Findings bear on the phyletic generality of simultaneous contrast and on the relation of simultaneous to successive contrast, a phenomenon that has thus far failed to appear in goldfish. (17 ref)—*Journal abstract.*

680. Campbell, Byron A.; Misanim, James R.; White, Brent C. & Lytle, Loy D. (Princeton U) **Species differences in ontogeny of memory: Indirect support for neural maturation as a determinant of forgetting.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 193-202.—Studied the development of long-term memory in 150 Sprague-Dawley rats and 80 male Hartley guinea pigs as a function of age, using active escape and passive avoidance tasks. Memory increased with age in the rats but did not change in the guinea pigs. It is concluded that neurological

maturity at the time of original learning appears to be a major determinant of long-term memory. (25 ref) —*Journal abstract.*

681. Capaldi, E. J. & Freese, M. R. (Purdue U) **Partial reward training level and reward magnitude: Effects on acquisition and extinction.** *Learning & Motivation*, 1974(Aug), Vol 5(3), 299-310.—2 groups of 10 male albino Holtzman rats each received either a large magnitude (.90 g) or a small magnitude (.18 g) of partial reward (PR) and 7 successive acquisition-extinction sessions in the runway. The large-magnitude PR group ran much faster than the small-magnitude PR group in the early acquisition sessions, with differences between the groups declining over sessions. In the early extinction sessions, the large-magnitude PR group showed greater resistance to extinction than the small-magnitude PR group, but in the late extinction sessions this relation was reversed. Resistance to extinction decreased over sessions, this decrease being greater under a large than under a small magnitude of PR. (20 ref)—*Journal abstract.*

682. Carlson, Kristin R. & Eibergen, Robert . (U Pittsburgh, Medical School) **Factors influencing the acquisition of tactual random figure discriminations by rhesus monkeys.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 133-137.—Trained 4 mature male rhesus monkeys to perform 2-object random figure discrimination problems by touch, and compared their performance to the visual acquisition of the same problems (reported earlier). In both modalities, choice latencies were shorter to the correct than to the incorrect figure. Tactual learning, however, required significantly more trials to criterion, was independent of stimulus figure complexity, and was characterized by significantly shorter choice latencies. Rotation of the figures 180 deg after criterion performance was achieved yielded partial recognition of the figures visually, but no recognition tactually. Results are explained by different observational or cue-utilization strategies. The majority of the figure is inspected visually, but only the same small section of the perimeter is used tactually. Thus, restricted use of the available cues characterizes tactual performance and is responsible for generating differences in various measures of learning between vision and touch in the monkey. (19 ref)—*Journal abstract.*

683. Carmona, Alfredo; Miller, Neal E. & Demierre, Terrie . (U Costa Rica, San Jose) **Instrumental learning of gastric vascular tonicity responses.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 156-163.—Trained 10 Sprague-Dawley male albino rats with a chronically implanted device that allowed photoelectric plethysmographic measures to be made of the stomach wall while paralyzed with dextrotubocurarine and being artificially respirated. One group was reinforced by avoidance of and/or escape from electric shocks to the tail, whenever increases in the transmission of light through the stomach wall occurred during a CS; another group was reinforced for decreases. Reliable changes in the rewarded direction were learned. Results are interpreted as evidence for the instrumental learning of a gastric response which, in the light of control experiments, very probably was a vasomotor one producing changes in the

amount of blood in the stomach wall. (17 ref)—*Journal abstract.*

684. Caul, William F.; Barrett, Robert J.; Thune, Gene E. & Osborne, Guy L. (Vanderbilt U) **Avoidance decrement as a function of training-test interval: Single cycle or multiphasic?** *Behavioral Biology*, 1974(Jul), Vol 11(3), 409-413.—Assessed the Y-maze avoidance performance in independent groups of male Fisher-derived F344 strain rats ( $N = 63$ ) during a 50-trial test session which followed a 30-trial training session by 15 min, 1, 6, 12, 18, 24, or 30 hrs. While a decrement in avoidance performance was present at the 1-hr interval, there was no evidence for a difference among the other groups. The number of correct discriminations was unaffected by training-test interval.—*Journal abstract.*

685. Chase, Sheila; Geller, Ethel A. & Hendry, Jean S. (Hunter Coll., City U. New York) **On the establishment of a continuous repertoire.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 14-16.—2 pigeons trained to peck the response key directly below a spot of light which appeared in only 3 of 5 positions were tested with the spot in all 5 positions. Key choice, given these test stimuli, showed a mixture of functional control: on some trials, the key beneath the spot was chosen, indicating that the training produced a correspondence between novel points on the stimulus and response dimensions (a continuous repertoire). On other trials, the specific responses acquired during training were made.—*Journal abstract.*

686. Cone, Donna M. (Lynchburg Coll) **Do mammals lick at a constant rate? A critical review of the literature.** *Psychological Record*, 1974(Sum), Vol 24(3), 353-364.—A review of research on uninterrupted licking in mammals indicates that studies which support the invariant-rate hypothesis do not contain statistical analyses. When parametric analyses are used, several variables, including sex, age, deprivation level, time of day, and phase of the test session, are associated with statistically significant burst-lick-rate variability. Possible reasons for the general failure to regard lick-rate invariance as a testable null hypothesis are discussed. (33 ref)—*Journal abstract.*

687. Day, Richard B. & Platt, John R. (McMaster U, Hamilton, Ontario, Canada) **Stimulus control of foodcup approach following fixed ratio reinforcement.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 148-152.—Trained 52 female hooded rats on fixed-ratio (FR) schedules requiring either 5 or 10 leverpresses to produce reinforcement and an intertrial interval (ITI). Half of the Ss at each ratio requirement were extinguished on an FR 5 and half on an FR 10 schedule of ITI presentation. Fewer foodcup approaches were made on the FR 10 than on the FR 5 extinction schedule, regardless of acquisition FR. Leverpresses per approach were fewer on the FR 5 than on the FR 10 extinction schedule and were fewer following FR 5 than following FR 10 acquisition. Data suggest the existence of interoceptive as well as exteroceptive stimulus control of foodcup approach and are discussed in terms of their implications for a response-unit account of extinction.—*Journal abstract.*

688. Dickson, Andrew L. . (U Southern Mississippi) **Temporal course of open-field behavior in albino rats.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 447-452.



—Measured the locomotor activity and defecation of 72 male albino Wistar rats, at 24-hr intervals on 6 consecutive days under 6 schedules of exposure in an open field. Results indicate that the schedule of exposure was an important determiner of locomotor activity and defecation. (27 ref)—*Journal abstract*.

689. Eiserer, Leonard A. & Hoffman, Howard S. (Bryn Mawr Coll) **Imprinting of ducklings to a second stimulus when a previously imprinted stimulus is occasionally presented.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 123-125.—10 newly hatched Khaki Campbell ducklings were imprinted to 1 stimulus and then given prolonged visual exposure to a 2nd discriminable stimulus. Filial behavior toward the 2nd stimulus developed more slowly when the original imprinting stimulus was occasionally presented during exposure to the 2nd stimulus than when the original stimulus was withheld during such exposure. Results are interpreted in terms of a possible motivational aftereffect following presentations of the original imprinting stimulus.—*Journal abstract*.

690. Elias, Merrill F. & Schlager, Gunther. (Syracuse U) **Discrimination learning in mice genetically selected for high and low blood pressure: Initial findings and methodological implications.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 261-267.—Mice bred from an 8-way cross of 8 inbred strains were selected for high or low blood pressure and compared with randomly mated controls on discrimination learning performance. The high blood pressure Ss performed more poorly than the low blood pressure Ss. Subsequent comparisons of high blood pressure Ss from a different foundation stock and extreme blood pressure groups from an F<sub>2</sub> distribution, formed from the cross of F<sub>1</sub> (High × Low) hybrids, indicated that these differences were not due to a causal relationship between blood pressure and performance, linked gene effects, or pleiotropic effects of the same genes. Implications of these findings for the development of animal models for hypertension and behavior studies are discussed. (37 ref)—*Journal abstract*.

691. Elkins, Ralph L. (VA Hosp, Augusta, GA) **Conditioned flavor aversions to familiar tap water in rats: An adjustment with implications for aversion therapy treatment of alcoholism and obesity.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 411-417.—Notes that conditioned flavor aversions, readily established in rats by pairing a novel palatable flavor with radiation-induced or drug-induced illness, are highly efficient adjustments with implications for the treatment of alcoholism and obesity. Recent experiments show that such aversion acquisition is diminished by preconditioning familiarity with the conditioned stimulus (CS) flavor. However, these studies involved single pairings of the target flavor with postingestional illness. In the present experiment with Sprague-Dawley-derived male rats, multiple conditioning trials and discrimination training were combined to produce a marked aversion to a highly familiar and relatively bland substance, plain tap water. This conditioned water aversion demonstrates the transient nature of the CS familiarity effect, thus weakening any contention that preconditioning exposure to target flavors will necessarily render aversion therapy

for alcoholism or obesity ineffective. (39 ref)—*Journal abstract*.

692. Franchina, Joseph J.; Agee, Carol M. & Hauser, Peter J. (Virginia Polytechnic Inst & State U) **Response prevention and extinction of escape behavior: Duration, frequency, similarity, and retraining variables in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 354-363.—Describes 3 experiments in which a total of 158 female hooded rats received escape training, response prevention, and then regular extinction. Following training, Ss in Exp I received 1 response-prevention trial lasting 0, 120, 240, or 400 sec, or multiple trials (6, 12, or 20) lasting 20 sec each. Extinction was faster as prevention duration or frequency increased. At each duration, extinction was faster following multiple- than following single-prevention trials. In Exp II Ss received "prevention" in the original escape situation or in similar or dissimilar situations. Extinction was faster as prevention and training situations increased in similarity. To evaluate the persistence of prevention effects, in Exp III Ss received shock retraining between prevention and regular extinction. Retraining attenuated but did not eradicate the effects of prevention. (19 ref)—*Journal abstract*.

693. Frontali, Marina & Bignami, Giorgio. (Inst of National Council of Research, Rome, Italy) **Stimulus nonequivalences in go/no-go avoidance discriminations: Sensory, drive, and response factors.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 153-160.—Previous work with rats showed slower active avoidance (AA) and passive avoidance (PA) learning in a light-go-noise-light no-go task (L<sup>+</sup> NL<sup>-</sup>) than in a noise-go-light-noise no-go task (N<sup>+</sup> LN<sup>-</sup>) independently of noise intensity and of presence or absence of AA pretraining. Exp I with 64 male Wistar albino rats compared these 2 tasks and the corresponding discriminations with a compound AA and a simple PA signal. The latter were learned at a faster rate, with only negligible differences between the 2 types of stimulus arrangements. Exp II (n = 72) investigated the acquisition and reversal of 4 go-no-go tasks with a simple AA signal, with either a simple or a compound no-go signal and asymmetrical reinforcement. Groups with a simple no-go signal acquired AA with little or no generalization to the other stimulus. In reversal, however, the L<sup>+</sup> N<sup>-</sup> group responded to the no-go signal much more frequently than the other. Both the L<sup>+</sup> NL<sup>-</sup> and the N<sup>+</sup> LN<sup>-</sup> groups gave a large number of responses to the extinction signal, but the differences between the 2 groups were at least as large as in previous work with a PA contingency. Data show that perceptual or attentional phenomena cannot explain stimulus nonequivalences in situations with a compound no-go signal. Furthermore, the similar nonequivalences found in situations with and without differential fear conditioning lead to complex, highly speculative models concerning possible interactions between response and drive-modulating properties of various stimuli. (24 ref)—*Journal abstract*.

694. Garzanit, Frank S. & Richardson, Ann M. (California State U, Los Angeles) **Black-white discrimination and orienting behavior in the desert iguana (*Dipsosaurus dorsalis*).** *Animal Learning & Behavior*,

1974(May), Vol 2(2), 126-128.—Trained 6 desert iguanas on a black-white discrimination problem using a modified Lashley maze I. Results, in terms of number of trials to criterion, compare favorably to those reported for turtles on the same brightness difference. Efficiency of learning was attributed to (a) the angle separating the discriminanda, (b) intertrial substrate temperature, and (c) visual attentional characteristics of the apparatus. Orienting responses varied in expected directions according to speed of learning and difficulty of maze choice points. (19 ref)—*Journal abstract*.

695. Goldstein, Melvin L. (Indiana U, Komomo) **Effect of static background cues on classical fear conditioning.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 145-151.—Varied the duration of exposure of male albino Holtzman rats to background-apparatus cues at 2 levels during classical fear conditioning. Group 1 spent the entire intertrial interval between successive conditioned stimulus-unconditioned stimulus (CS-UCS) E presentations in the shock compartment of a conditioning box. Group 2 was placed into a neutral carrying cage during the intertrial intervals. A hurdle-jump response was used as an indicator of the magnitude of conditioned fear. Group 2 performed more poorly on the test response than Group 1. Results are interpreted in terms of differential conditioning to the components of a compound CS. The background-apparatus cues were identified as 1 component of the compound CS.—*Journal abstract*.

696. Hancock, Robert A. & Ayres, John J. (Kansas State U) **Within-subject effects of sucrose concentration on conditioned suppression of licking.** *Psychological Record*, 1974(Sum), Vol 24(3), 325-331.—Measured dipper licking in 10 male Charles River albino rats tested 18 times under each of 2 sucrose conditions. Conventional indices of preference showed that every S strongly preferred 32% over 8% sucrose, yet only 5 Ss suppressed significantly more to a preaversive conditioned stimulus when licking the less preferred solution. 4 Ss did not suppress differentially as a function of sucrose concentration, and 1 suppressed significantly more when licking 32% than when licking 8%.—*Journal abstract*.

697. Heacock, Del; Smith, Nathan & Thurber, Steven. (Boise State Coll) **A multidimensional analysis of variables related to bar-pressing in the presence of free food.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 105-108.—Made a comparison between schedules of reinforcement—continuous reinforcement (CRF) and fixed ratio (FR-5 and FR-10)—and various levels of deprivation (0, 24, 48, and 72 hrs) in the presence of food. 24 male Sprague-Dawley albino rats were randomly assigned to each of the conditions and trained to barpress on a CRF schedule. The only significant effect ( $p < .05$ ) was found between the CRF and FR-10 schedule. Results contradict previous studies which found high rates of barpressing in the presence of free food.—*Journal abstract*.

698. Hershkowitz, Moshe & Samuel, David. (Weizmann Inst. of Science, Rehovot, Israel) **The retention of learning during metamorphosis of the crested newt (*Triturus cristatus*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 83-85.—Housed 5 crested-newt larvae in individual cages. Ss were given training based on the characteris-

tic "snapping response" of both larvae and adult newts to any dark, small objects. It was found that larvae could be taught a simple discrimination task for food reward. The preference established by training was retained by the adult newts after metamorphosis. No significant change in the natural preference of these animals occurred after metamorphosis. Adult animals appear to be more difficult to train than the larvae.—*Journal abstract*.

699. Hillman, Nancy M.; Fuseller, Penelope H. & Riopelle, Arthur J. (Louisiana State U, Baton Rouge) **Protein deprivation in primates: II. Effects of fondling on feeding behavior of discomforted infant rhesus monkeys.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 369-374.—19 infant rhesus monkeys whose mothers were fed diets providing 1, 2, or 4 g protein/kg body weight/day during pregnancy were fondled for 5 min before their noon and 4 PM feedings on 2-3 days/wk. 14 were caressed between 10 and 30 days of age, and 18 were caressed between 41 and 95 days of age. The intake at meals following handling was compared to that for meals when handling was not given. The younger Ss' intake was specific to the diet group and treatment. The older Ss ate more at the 4 PM meal than at the noon meal and more at weekday, nonhandled feedings than at weekday, handled, or weekend feedings. Differences due to maternal nutritional history were not significant. Infant Ss subjected to a variety of laboratory anxiety-producing tests during weekdays drank more formula on test days than on tranquil weekends. This effect was ameliorated by preprandial comforting.—*Journal abstract*.

700. Hogan, Jerry A. (U Toronto, Ontario, Canada) **On the choice between eating and aggressive display in the Siamese fighting fish (*Beta splendens*).** *Learning & Motivation*, 1974(Aug), Vol 5(3), 273-287.—Reports results of 2 experiments with a total of 44 male Siamese fighting fish. In Exp I Ss were given a choice between food and a mirror image in a T maze. All Ss consistently preferred food. In Exp II the choice of Ss that lived in the T maze for the duration of the experiment was compared with the choice of Ss that were transferred to the T maze for each experimental session. Ss that lived in the T maze consistently preferred food, but Ss that were transferred showed a shift in preference toward mirror image. Differential inhibition of hunger and aggression by fear is suggested as the cause of the preference shift. (17 ref)—*Journal abstract*.

701. Israel, Allen C.; Devine, Vernon T.; O'Dea, Margaret A. & Hamdi, Mark E. (State U. New York, Albany) **Effect of delayed conditioned stimulus termination on extinction of an avoidance response following different termination conditions during acquisition.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 360-362.—Investigated the role of delayed conditioned stimulus (CS) termination in the extinction of a shuttle-box avoidance by exposing 28 male Long-Evans rats to conditions of delayed or nondelayed CS termination. Ss were assigned to 1 of 4 conditions of CS termination: (a) delay during acquisition-delay during extinction, (b) delay-no delay, (c) no delay-delay, or (d) no delay-no delay. Delayed CS termination during acquisition resulted in poorer performance on all



measures of acquisition. Delayed CS termination during extinction resulted in fewer avoidances regardless of acquisition condition. Results are discussed in terms of competing explanations of effects of CS delay.—*Journal abstract.*

702. Katzev, Richard D. & Berman, Jeffrey S. (Reed Coll) **Effect of exposure to conditioned stimulus and control of its termination in the extinction of avoidance behavior.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 347-353.—Describes 2 experiments in which, following signaled shuttle box avoidance training, a total of 52 female Fischer<sub>344</sub> rats were exposed to the conditioned stimulus (CS) during no-shock treatment trials and subsequently tested during extinction trials in which shock was also absent. In Exp I, Ss that could control the termination of the CS during treatment responded significantly more often during extinction than yoked partners that received the same pattern and duration of CS exposure but could not control its termination. Exp II revealed that the probability of responding during extinction was a decreasing function of the duration of CS exposure during treatment. Thus, in the absence of shock, both lack of control over CS termination and increasing CS exposure each independently facilitated the weakening of well-established avoidance responses. (21 ref)—*Journal abstract.*

703. Kello, John E. & Staddon, J. E. (Duke U.) **Control of long-interval performance on mixed cyclic-interval schedules.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 1-4.—Exposed 4 adult male White Carneaux pigeons to a series of cyclic-interval food reinforcement schedules in which each cycle comprised 12 1-min intervals followed by 2 2-min intervals, 2 6-min intervals, or 6 6-min intervals. Response rate was higher and postfood pause shorter in the long (2- or 6-min) than in the short (1-min) intervals. Response rate decreased and pause generally increased across successive 2-min intervals, but response rate increased and pause generally decreased across successive 6-min intervals. Performance in the 2-min intervals is consistent with a temporal discrimination account, but performance in the 6-min intervals supports earlier suggestions that some other factor (response "momentum") may be involved when the long intervals are sufficiently longer than the short.—*Journal abstract.*

704. Kimura, Hiroshi . (Waseda U, Tokyo, Japan) **[Latent extinction of a partially reinforced response in the white rat.]** (Jpn) *Annual of Animal Psychology*, 1971(Mar), Vol 21(2), 81-90.—Confirmed the facilitating effect of latent extinction on a partially reinforced response. 71 male white rats learned to approach food in a straight runway with either 100, 75, 50, or 25% of the trials reinforced. Direct placing of the Ss into the goal box without reinforcement reduced the running speed in later extinction trials in the 100% group, but increased speed in the 50% group. The 75% and 25% groups were not different from control Ss, which were placed into a neutral box. Results agree with the findings of previous workers. (English summary)—S. Nakajima.

705. Klare, Warren F. (Syracuse U) **Conditioned fear and postshock emotionality in vicious circle behavior of rats.** *Journal of Comparative & Physiological Psychology*,

1974(Aug), Vol 87(2), 364-372.—Gave 64 female hooded Long-Evans rats 15 shock-escape trials in a runway (1 trial/day), followed by 30 extinction trials. Half of the Ss received regular extinction treatment, while the others received a punishing shock if they ran. The Ss' level of activity (or freezing) before the trial was used as an index of conditioned fear. In acquisition, these shocked Ss were less active before the trial than 56 additional Ss receiving identical treatment, but without shock. During extinction, punished Ss both ran longer and showed less pretrial activity. This directly supports the vicious circle hypothesis that punishment for running maintains the fear motivating the running. When postshock emotionality was induced before a trial, it tended to suppress vicious circle behavior.—*Journal abstract.*

706. Kullig, Beverly M.; Bryant, Rodney C.; Petty, Frederick & Byrne, William . (U Tennessee, Medical Units, Brain Research Inst, Memphis) **Preliminary studies on acquisition of a discriminated depth-position task by goldfish.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 403-408.—Describes a new technique for the study of discriminated avoidance in the goldfish. 46 goldfish were trained in 1 of 2 conditions: to avoid electric shock by swimming to the top of the tank in the presence of a red light and to the bottom of the tank during a green light stimulus (Red up—Green down), or the reverse condition, to avoid shock by swimming up on green and down on red (Green up—Red down). Results indicate that learning occurred whether trials were spaced or massed and that the technique can be used for acquisition training of individual fish or fish trained in groups. Differences in rate of learning between fish trained in the Red up—Green down condition and fish in the Green up—Red down condition were also found. The superior performance of the Red up—Green down group is discussed in terms of the spectral characteristics of goldfish vision and the nature of the task.—*Journal abstract.*

707. MacDonald, Glenn E. & de Toledo, Leyla . (U Toronto, Ontario, Canada) **Partial reinforcement effects and type of reward.** *Learning & Motivation*, 1974(Aug), Vol 5(3), 288-298.—Describes 2 experiments in which a total of 36 albino and 32 hooded Blue Spruce male rats were trained to barpress or to run down a straight runway for food or for water under conditions of either continuous or partial reinforcement. In both experiments, there was greater persistence of behavior which had been reinforced with food than with water. In Exp II the partial reinforcement extinction effect was observed with food reward but not with water. Within the context of the experimental procedures used, it is concluded that the rat has mechanisms for developing persistence which are dependent on the specific motivational system involved. This conclusion is related to theories of partial reinforcement effects and to possible biological origins of the mechanisms.—*Journal abstract.*

708. Mackintosh, N. J. (U Sussex, Brighton, England) **A search for contrast effects in discrete-trial discrimination learning by pigeons.** *Learning & Motivation*, 1974(Aug), Vol 5(3), 311-327.—Behavioral contrast has often been observed in free-operant experiments with pigeons, but rarely in discrete-trial experiments with rats. Although H. M. Jenkins (see PA, Vol 36:1EJ11J) and H.

S. Terrace (1963) have reported a discrete-trial contrast effect in pigeons, the present 5 experiments with a total of 42 White Carneaux pigeons found no evidence that latency of responding to the positive stimulus (S+) in a discrete-trial situation was reliably decreased by alternating reinforced trials to S+ with nonreinforced trials to the negative stimulus (S-). Latency of responding to S+ was affected neither by the length of the preceding intertrial interval (within the range of 10-60 sec), nor by whether the preceding trial had been to S+ or to S-. Results suggest that the appearance of positive contrast in Jenkins's experiment was a consequence of differences in the variability of the intertrial interval experienced by control and discrimination groups. In 2 of the experiments employing standard free-operant procedures, contrast was observed as an increase in rate of responding to S+, but not as a decrease in latency of the 1st response on each S+ trial. The implication is that contrast effects are more readily observed with the rate measures of free-operant experiments than with the latency measures of discrete-trial experiments. (22 ref)—*Journal abstract*.

709. Manning, Frederick J.; Jackson, Mason C. & McDonough, John H. (Walter Reed Army Inst. of Research, Washington, D.C.) **A simple method of improving leverpress avoidance by rats.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 5-8.—In 3 experiments, a total of 22 Long-Evans hooded and 6 Wistar albino male rats were trained to avoid electric shock in a free-operant leverpress procedure. After stable performance was obtained, sessions were suspended for periods of 1 to 4 wks. In 24 Ss, shock rates were lower, some by as much as 75%, when avoidance sessions were resumed. This improvement extended throughout the entire 60-100-min session and occurred despite variations in apparatus, strain of rat, length or efficacy of prevacation training, lesions in the amygdala, and unshocked exposure to the apparatus during vacation.—*Journal abstract*.

710. Masur, Jandira . (Paulista School of Medicine, São Paulo, Brazil) [The "open field" method as a measure of emotional reactivity of rats.] (Port) *Revista de Psicologia Normal e Patológica*, 1970(Jul), Vol 16(3-4), 195-220.—Reviews the open-field technique from its earliest studies, concentrating of defecation ambulation, grooming, and rearing. On the basis of the research cited, it is concluded that: (a) Strain, age, and sex are important variables. (b) Early experiences are a determinant of behavior in an open field. (c) Direction of behavior alteration induced by different manipulations cannot be predicted. (English summary) (76 ref)—N. T. Pinckney.

711. Matsuda, Michihiko . (Chiba U, Faculty of Education, Japan) [Avoidance behavior for food and compartment conditioned by midbrain central grey stimulation in cats.] (Japn) *Annual of Animal Psychology*, 1971(Mar), Vol 21(2), 69-80.—Studied conditioned avoidance responses using electrical brain stimulation as the unconditioned stimulus. 6 adult cats received stimulation of the ventral part of the mesencephalic central gray area (a) when they approached milk, and (b) when they entered one compartment of a shuttle box. The stimulation intensity was at the threshold of escape,

and was well below the level that produced any sign of pain. All of the 4 Ss that drank the milk acquired passive avoidance response, and 3 out of 6 Ss learned conditioned avoidance of a compartment. Results suggest that the stimulation is negatively reinforcing by producing an aversive motivation, but not by exciting pain fibers. (English summary) (21 ref)—S. Nakajima.

712. Medin, Douglas L. (Rockefeller U., New York, N.Y.) **Position distinctiveness and successive discrimination learning.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 35-36.—Tested the prediction that increased spatial separation of discriminanda would facilitate successive discrimination learning. 8 pigtailed monkeys were trained concurrently on 2 successive discrimination problems, one with a small and the other with a large separation of cues. Better performance was associated with the larger cue separation.—*Journal abstract*.

713. Miller, H. L. & Loveland, Donald H. (Harvard U) **Matching when the number of response alternatives is large.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 106-110.—4 male White Carneaux pigeons could choose between 5 concurrently available response keys, each associated with a different variable-interval schedule of reinforcement. A 2-sec changeover delay was also in effect on each key. In almost all cases, the relative number of responses to a key and the relative time spent at it were nearly equivalent to the relative number of reinforcements it produced. In addition, matching was observed between the relative number of reinforcements at a key and the relative number of changeovers to it.—*Journal abstract*.

714. Mitani, Keiichi; Ando, Masafumi & Nagata, Hiroshi . (Okayama U, Japan) [An enhancement of general activity through a particular learning experience in the white rat.] (Japn) *Annual of Animal Psychology*, 1972(Nov), Vol 22(1), 21-27.—Studied the effect of a learning experience on the level of general activity. Male albino rats 450 days old were handled for 5 days and divided into 2 groups of 9 each. One group received 30 trials of food-reinforced runway training for 12 days, while the other group remained untouched. The trained group showed a higher level of activity in an activity wheel, suggesting that learning experience enhances general activity. (English summary)—S. Nakajima.

715. Montecchi, W. A.; Gallup, G. G. & Dunlap, W. P. (Rutgers U., Inst. of Animal Behavior, Newark) **The peep vocalization in group reared chicks (Gallus domesticus): Its relation to fear.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 116-123.—Conducted 4 experiments to determine the relation of fear and arousal to peeping in 165 socially-reared Production Red chicks. Pretest exposure to loud noise or shock resulted in decreased peeping in Ss tested in isolation, while in the presence of a mirror pretest exposure to loud noise reduced peeping, but pretest shock had no effect. Neither tranquilizer (Pacitran) ingestion or E proximity had any significant influence on peeping. An inverse relationship between peeping and activity latency was also revealed; peeping usually preceded the initiation of activity. (52 ref)—*Journal abstract*.



716. Morgan, M. J. (U Cambridge, England) **Do rats like to work for their food?** *Learning & Motivation*, 1974(Aug), Vol 5(3), 352-368.—Reports results of 5 experiments with a total of 29 female and 14 male hooded rats. Ss were given a choice in a 2-compartment box between response-dependent and response-independent schedules of food presentation. In general, the response-independent schedule was preferred, but the preference was not exclusive and considerable amounts of time were spent on the "work" (response-dependent) side. Food deprivation caused an increased preference for the response-independent schedule when the schedules were fixed, but not when they were variable. Addition of a signal to the work side, indicating the availability of reinforcement, increased preference for that side. Relative numbers of reinforcements obtained on the response-independent side exceeded the relative time spent there; when the relative reinforcements were equated by adding delays to the response-independent side, indifference between the schedules resulted. Latencies of food collection were higher on the response-independent side than on the lever side, and it is suggested that this gives a clue to the factors maintaining "work" in this situation.—*Journal abstract*.
717. Mountjoy, Paul T. (Western Michigan U) **Some early attempts to modify penile erection in horse and human: An historical analysis.** *Psychological Record*, 1974(Sum), Vol 24(3), 291-308.—Notes that between the years 1856 and 1919, Letters Patent were granted by the US Patent Office for 49 antimasturbatory devices; 35 were designed for application to the horse, while 14 were intended for man. After analysis of the surprisingly modern aversive-stimulation principles involved, an attempt is made to relate the onset and cessation of patenting activities to more general cultural variables in Euro-American society. (30 ref)
718. Okano, Tsuneya. (Shizuoka U, Japan) **A preliminary observation of orangutans in the rehabilitation station in Sepilok, Sabah.** *Annual of Animal Psychology*, 1971(Mar), Vol 21(2), 55-67.—Reports on a visit to an orangutan colony in Malaysia. To rehabilitate accidentally or illegally captured apes before returning them to their natural environment, 9 Ss were regularly fed at an unfenced station on the fringe of a jungle. Ss had freedom to leave the station for the jungle and to return to the station at any time. Unlike chimpanzees, orangutans were slow in movement, and did not display fighting or mutual grooming. An adult female and the youngest male formed a close relationship. 3-4 yr old males formed a play group, while 5-8 yr old males and females formed another group without playing. Adults remained in solitude.—S. Nakajima.
719. Olsen, Christopher A.; Delius, Juan D. & Hockey, Robert J. (U Newcastle, England) **Brain temperature alterations and the retention of visual pattern discriminations in pigeons.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 257-260.—Trained 4 racing pigeons in visual discriminations. Immediately after Ss had reached criterion their forebrain was either left untreated, heated, or cooled for 30 min, with water flowing through a chronically implanted cannula system. The effects of the treatments on retention were assessed in retraining sessions. Both brain temperature alterations led to slight saving scores and marked, significant response latency advantages, compared with the control treatment. (15 ref)—*Journal abstract*.
720. Ostroot, David & Mendelson, Joseph. (U Kansas) **Airlicking vs. water drinking in a T-maze: Thirsty rats prefer water.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 195-199.—Conducted an experiment to determine the duration of airlicking which is equivalent in reward value to 10 sec of drinking. 6 male, water-deprived hooded rats were trained to lick an airstream from a standard drinking tube. Ss were then tested in a T maze in which they were confronted with a choice between 10 sec of water and access to an airstream for periods of airlicking varying from 40 to 300 sec. All Ss preferred the water to the airstream, regardless of the duration of airlicking reward and irrespective of the goal positions in the maze. It is concluded that for a thirsty rat the rewarding effects of drinking water are very much greater than those of airlicking.—*Journal abstract*.
721. Petri, Herbert L. (Johns Hopkins U) **Discrimination of schedules that predict reinforcement from non-predictive ones and preference for less predictive schedules by rats.** *Learning & Motivation*, 1974(Aug), Vol 5(3), 336-351.—Examined the behavior of a total of 42 female Sprague-Dawley rats on schedules that either did or did not contain information about impending reinforcement in 2 experiments. Results of Exp I indicate that Ss discriminated between schedules of reinforcement that differed only in the amount of information they contained about impending reinforcement. Exp II revealed a preference for the schedule containing less information about impending reinforcement. Results suggest that predictable nonreinforcement is an important determiner of behavior in choice situations. (19 ref)—*Journal abstract*.
722. Pilley, John W.; Jones, Millard; Parker, Roy & Lyles, James. (Wofford Coll) **Spontaneous recovery as a function of drive and interval for recovery.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2)), 1343-1346.—Gave 54 male albino Holtzman rats 5 training trials/day for 12 days in a straight runway. Following 30 massed extinction trials, Ss were randomly assigned to 1 of 4 spontaneous-recovery groups. The groups received 5 additional extinction trials after intervals of either 5 min or 24 hrs under either low or high drive. High-drive Ss were run under a 23-hr water-deprivation schedule, while low-drive Ss received access to water for 5 min prior to recovery trials. Results show that while high-drive Ss exhibited significantly greater recovery than low-drive Ss at the long recovery-interval, drive did not exert differential effects at the short interval for recovery.—*Journal abstract*.
723. Pinel, John P. & Mucha, R. F. (U British Columbia, Vancouver, Canada) **Role of footshock-produced activity and reactivity functions in the production of incubation and Kamin gradients.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 353-363.—120 male blackhooded rats received 10 noncontingent footshocks (FSs) in the start compartment of a 2-compartment box followed 1 min or 1, 4, or 24 hrs later by a test of 1-way active avoidance. 2 kinds of tests were employed, only one of which involved the administration of additional FSs. Ss

receiving no FS during the test were placed in the start compartment and their active-avoidance latencies were measured; the other Ss received FS during the course of 10 1-way active avoidance trials. In the no-FS condition, avoidance deteriorated monotonically over 24 hrs but in the FS condition the usual U-shaped Kamin effect was observed. Independent activity measures prior to each avoidance trial suggested that both of these functions resulted from FS-produced, time-related changes in activity or reactivity. When no FS was administered during the test, activity decreased monotonically over the 4 FS-test intervals; the reactivity to additional FSs administered during the test was a U-shaped function. Data clearly demonstrate the important role played by activity and reactivity functions in the production of the incubation and Kamin effects, respectively. (18 ref) —*Journal abstract.*

724. Pouthas, Viviane. (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) [Temporal regulation and the development of conditioning.] (Fren) *Année Psychologique*, 1974, Vol 74(1), 109-124.—Studied the acquisition of temporal regulation of behavior (a) during differential reinforcement of low rates (DRL) conditioning by naive rats and by rats pretrained with a fixed interval (FI) schedule, and (b) during FI conditioning by naive rats and by rats pretrained with a DRL schedule. Postreinforcement pauses, interresponse times, and reinforcement rates of the 2 groups of Ss did not differ at the end of DRL conditioning. In the pretrained Ss, the behavior adapted to FI was replaced by behavior adapted to DRL. In contrast, postreinforcement pauses and reinforcement rates of pretrained Ss were higher than those of naive rats at the end of FI conditioning. 2 patterns of behavior elicited by the 2 experimental conditions have thus been observed during FI conditioning. However, 2 types of collateral behavior may have played a different role in adaptation to the 2 schedules; i.e., it is suggested that behavior which occurred in the food-cup area, and only during postreinforcement pauses, had a mediating role; behavior which occurred opposite the food-cup area, and only during DRL, had a role of inhibition compensation. —G. Rubin-Rabson.

725. Powell, Robert W. (U South Florida) Some measures of feeding behavior in captive common crows. *Auk*, 1974(Jul), Vol 91(3), 571-574.—Crows trained to keypeck under a continuous-reinforcement schedule in standard operant conditioning apparatus preferred live mealworms, but dog food and mynah bird pellets were effective when the Ss were food-deprived. Individual differences in food preferences were noted, suggesting that some diversity occurs in this type of crow behavior.

726. Ramsauer, Sharan; Mendelson, Joseph & Freed, William J. (U Kansas) Effects of water temperature on the reward value and satiating capacity of water in water-deprived rats. *Behavioral Biology*, 1974(Jul), Vol 11(3), 381-393.—Hypothesized that, since orolingual cooling is a primary reward for water-deprived rats, cold water should be more rewarding than warm water. 4 male hooded rats were allowed to barpress for water at approximately 12° or 36°C. Testing started when their body weights had dropped to 80% of their predeprivation

levels and was continued as their weights were allowed to drift slowly upward. Mean number of barpresses for cold and body-temperature water were compared under the various body-weight conditions, and in almost all cases the Ss barpressed at a higher rate for cold water. When these same Ss were again deprived to 80% body weight in Exp II, they showed an overwhelming preference for cold over warm water in 10-min choice tests. Exp III with these Ss replicated G. Kapatos and R. M. Gold's finding (1972) that rats offered either only warm water or only cold water in different test sessions drink more warm water than cold. Results support the hypothesis, but it is suggested that the intake of cold water is terminated prematurely by the drop in body temperature which it produces.—*Journal abstract.*

727. Reynierse, James H. (Hope Coll.) Elitism among albino rats: Genius and overachievement. *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 33-34.—From a population of 234 adult albino Sasco rats that had been trained in a shuttlebox, the records of 40 Ss which had shown particularly excellent avoidance performance were identified and examined further. Contrary to the conventional view that shuttlebox avoidance takes many trials to acquire, it was demonstrated that many Ss learned the response quickly, showing maintained avoidance throughout a 200-trial session. Results are discussed in terms of particularly important procedures, notably the presence of odors associated with fear, which facilitate rapid acquisition of shuttlebox avoidance. —*Journal abstract.*

728. Reynierse, James H.; Klomp, Linda & Bach, Paul J. (Hope Coll) Effects of response prevention upon the "Kamin effect" in rats. *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 417-420.—Describes 2 experiments with a total of 96 female Sasco rats and 90 male albino rats. After Ss had incompletely learned a shuttle escape-avoidance task, response prevention procedures were introduced and Ss were retested on the avoidance task after 0, 1, or 24 hrs. Female controls, which did not receive response prevention, showed the U-shaped retention function characteristic of the "Kamin effect," while response prevention disrupted avoidance performance under every condition. Male Ss exhibited a much smaller effect with minimal recovery after 24 hrs. Results are discussed in terms of potential methodological and theoretical significance for the problem of residual fear.—*Journal abstract.*

729. Roberts, William A. & Grant, Douglas S. (U Western Ontario, London, Canada) Short-term memory in the pigeon with presentation time precisely controlled. *Learning & Motivation*, 1974(Aug), Vol 5(3), 393-408.—Studied delayed matching-to-sample in 3 experiments with 10 Silver King pigeons, using a procedure which precisely controlled the presentation time of the sample stimulus. Exp I and II revealed that (a) accuracy of matching increased as a negatively accelerated function of presentation time, (b) accuracy declined when an interstimulus interval was introduced between successive presentations of the sample stimulus, and (c) the rate at which accurate matching was restored after an interstimulus interval was greatest when the initial presentation of the sample was short and the interval was long. It is concluded that a theory of short-



term memory based on the growth and decay of trace strength could account adequately for all of these findings. Exp III studied trace interaction by presenting 2 sample stimuli first in succession and then simultaneously for choice. Predictions from trace competition theory about the specific lengths of presentation of these stimuli at which choice of the 2nd stimulus should be 50% or deviate systematically below 50% were not supported. It appears that a recency mechanism in addition to competition is necessary to explain trace interaction effects.—*Journal abstract.*

730. Rodewald, H. Keith. (Central Michigan U) **A conjoint-measurement analysis of control by dimensions of compound stimuli.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 551-556.—Trained 3 barnyard chickens on a go-no-go discrimination in which the positive stimulus was 3 white dots in a vertical array on a red background and the negative stimulus was 3 white dots in a horizontal array on a green background. The 9 combinations of red, yellow, and green backgrounds with vertical, 45°, and horizontal arrays of dots were presented in extinction. A conjoint-measurement analysis is discussed, and the orientation and color dimensions are shown to be independent and additive.—*Journal abstract.*

731. Rudy, Jerry W. (Princeton U) **Stimulus selection in animal conditioning and paired-associate learning: Variations in the associative process.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol 13(3), 282-296.—Notes that stimulus selection phenomena observed in both animal conditioning and paired-associate (PA) learning generally have been attributed to a selective attention process. Recently, however, some conditioning theorists have departed from an attentional view and have attributed stimulus selection to variations in the associative process. This paper surveys some recent developments in animal conditioning and argues that the emerging principle in this domain—that the associative process is engaged only to the extent that an unpredicted event is experienced—also has utility in dealing with PA findings. To this end, a theory is developed and applied to stimulus selection phenomena of PA learning and transfer. (35 ref)—*Journal abstract.*

732. Russell, P. A. & Williams, D. I. (U. Aberdeen, Scotland) **Effects of repeated testing on rats' locomotor activity in the open-field.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 109-111.—Tested 24 male PVG/C strain black-hooded rats over a series of 10 open-field trials. Results are consistent with reports that an initial decrement in ambulatory activity is followed by an increment. Alternative explanations of the effect are (a) that Trial-1 activity is influenced by a hyperactivity phenomenon unrelated to exploration and (b) that the effect stems from differential habituation of approach and avoidance tendencies. Comparison of the behavior of Ss tested with-without a small object in the center of the field leads to rejection of the former possibility, and it is suggested that the latter may account for some, though not all, of the effects of repeated testing on exploratory behavior.—*Journal abstract.*

733. Russell, P. A. (U. Aberdeen, Scotland) **Effects of fear on the behaviour of rats in an enclosed maze.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 112-115.—Test-

ed 28 female PVG/C strain black-hooded rats, chosen for high- and low-defecation scores, for 5 min on each of 5 consecutive days in an enclosed Y maze. High defecators entered fewer maze arms and showed more rapid habituation of arm entries, but overall alternation percentages did not differentiate the groups. High defecators also showed a preference for the novel arm on their 1st choice between this and the previously visited arm. Results are discussed in terms of differences in fearfulness between the groups and extend the generality of statements about fear and exploration while avoiding problems inherent when fear is manipulated by varying apparatus factors. (23 ref)—*Journal abstract.*

734. Scoble, Stanley R.; Gold, Dennis C. & Fallon, Daniel. (State U New York, Binghamton) **Reward and reward omission: Time-dependent aftereffects in rats and fish.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 452-454.—Both goldfish and rats responded faster on a trial following shortly after reward omission than on trials at longer intervals. On trials shortly after a reward, responding was slower than on trials at longer intervals. These reward omission effects are similar to the invigorating effects of frustrative nonreward.

735. Shanab, Mitri E. & Birnbaum, Dana W. (California State U, Fresno) **Durability of the partial reinforcement and partial delay of reinforcement extinction effects after minimal acquisition training.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 81-85.—Gave 4 groups of 10 male Sprague-Dawley albino rats each 6 acquisition trials (Phase 1) under continuous reinforcement, partial reinforcement, constant delay, or partial delay of reinforcement conditions. In Phase 2 all Ss were given 18 nonreinforced trials, followed by 12 continuously reinforced trials in Phase 3. In Phase 4 all Ss were given 12 more extinction trials. A constant 24-hr intertrial interval was observed throughout the experiment. A strong partial reinforcement extinction effect was obtained in both Phases 2 and 4. Only a temporary partial delay of reinforcement effect was observed, which was restricted to the 1st 9 trials of the 1st extinction phase. No constant delay of reinforcement effect was observed in either extinction phase. Results are discussed in terms of both frustration and sequential theories.—*Journal abstract.*

736. Shanab, Mitri E.; Cavallaro, Gerald & White, Reba. (California State U, Fresno) **Abolition of the partial reinforcement extinction effect (PREE) following extinction of the persistence mechanism.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 117-125.—Gave 3 groups of 30 male Sprague-Dawley albino rats either continuous, partial, or zero reinforcement in a 1st acquisition phase, followed by an extended extinction phase. All Ss were then given a reacquisition phase under continuous reinforcement conditions followed by a 2nd extinction phase. While the usual PREE was found during the major part of the 1st extinction phase, it disappeared during the last few trials of that phase. No PREE was obtained during the 2nd extinction phase in any of the 3 sections of the runway. The abolition of the PREE is attributed to the extinction of the mechanism relating fractional fractional of primary frustration responses to feedback stimuli in the partial reinforcement group.—*Journal abstract.*

737. Smart, J. L. (U Manchester, England) **Activity and exploratory behavior of adult offspring of undernourished mother rats.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 315-321.—Female black and white hooded Lister rats were either adequately fed or were undernourished during much of pregnancy and throughout lactation. Both control and undernourished (UN) offspring had free access to food from weaning. Pups were tested between 15 and 27 wks of age. During repeated exposures on the same day in a rectangular observation box, UN Ss moved about more and reared on their hind legs more often than controls, but defecated less frequently. 2 measures of exploratory behavior—tendency to emerge from a familiar to an unfamiliar area and responsiveness to a novel object—did not differentiate the 2 groups, nor did control and UN Ss differ in the rate at which they pressed a lever to produce a light stimulus in a dark Skinner box. Results indicate that previously undernourished rats are more active than controls in familiar, nonstressful situations. (15 ref)—*Journal abstract*.

738. Sprott, Richard L.; & Symons, James P. (Jackson Lab., Bar Harbor, Me.) **Operant performance in inbred mice.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 46-48.—Conducted experiments which successfully used standard operant procedures to condition mice to barpress for a food reward on a variety of schedules of reinforcement. The schedules included continuous reinforcement, 9 fixed-ratio values, and 6 fixed-interval values. 12 mice of each of 5 genotypes—C57BL/6J, DBA/2J, B6D2F, B6D2F<sub>1</sub>, ob/ob, and C57BL/6J (+/-)—were exposed to some or all of these schedules. Performance was typical of that observed in other organisms, and satiation was not a problem in sessions lasting from 2 to 3½ hrs. Results demonstrate that barpress performance can be obtained with inbred mice as readily as with other organisms.—*Journal abstract*.

739. Tarczyńska, Krystyna; Karliński, Andrzej & Sadowski, Bogdan. (Polish Academy of Sciences, Lab of Applied Physiology, Warsaw) **Method of evoking the instrumental water-rewarded conditioned reflexes in rabbits.** *Acta Physiologica Polonica*, 1972, Vol 23(6), 1103-1107.—Elaborates a method for studying the central mechanisms of thirst and water-electrolyte balance in rabbits. A device for studying instrumental conditioned responses, as well as the electronic circuit for automatic delivery of the conditioned stimulus and reinforcement are described. The experimental procedure, maintenance of rabbits during conditioning, results of instrumental responses, responses to situation and sporadic stimulus, and evaluation of the findings are presented.—*Journal abstract*.

740. Taylor, George T. (State University Coll New York, Potsdam) **Stimulus change and complexity in exploratory behavior.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 115-118.—Examined the relationship between changes in complexity and the consequent exploratory behavior in an experiment with 48 male albino rats. Following extended exposure to a midcomplexity stimulus, Ss were allowed to choose between a stimulus change and the now familiar midcomplexity stimulus. For some Ss the change was to a stimulus of higher complexity and for others to one of lower

complexity. Results suggest that physical stimulus changes to a stimulus of greater complexity is a more effective novel stimulus than physical stimulus changes to lesser complexity, although both changes may function as incentives. (15 ref)—*Journal abstract*.

741. Testa, Thomas J.; Juraska, Janice M. & Maier, Steven F. (U Illinois) **Prior exposure to inescapable electric shock in rats affects extinction behavior after the successful acquisition of an escape response.** *Learning & Motivation*, 1974(Aug), Vol 5(3), 380-392.—Describes 2 experiments with a total of 91 male Sprague-Dawley rats. In Exp I Ss exposed to 64 inescapable electric shocks in a restrainer or merely restrained were later given either 0, 5, 15, or 30 escape-avoidance training trials with a 2-way shuttlebox procedure that does not lead to interference with escape acquisition due to prior exposure to inescapable shock. After escape training all Ss were given an escape-avoidance extinction procedure in which shock was inescapable. Ss which had received exposure to shock responded less often and with longer latencies in extinction than did the restrained Ss. Exp II demonstrated that this effect was caused by the inescapability of the initial shock treatment. Results are explained in terms of (a) associative interference which minimized the effect of shuttlebox escape training for the preshocked Ss and (b) a stronger tendency to recognize the presence of an inescapable shock situation during extinction for the preshocked Ss.—*Journal abstract*.

742. Tondat, Lynn M. (Ohio U) **Is the effect of preshock treatment on shock-elicited aggression independent of situational stimuli?** *Psychological Record*, 1974(Sum), Vol 24(3), 409-417.—During a 4-day Preshock Phase, 64 male Holtzman rats were placed individually for 10 min/day in either Chamber A (illuminated) or Chamber B (pine-scented, not illuminated). Half of the Ss placed in each chamber received shock. During a 4-day Aggression Phase, pairs of Ss of the same preshock condition were placed in Chamber A and administered shock for 10 min/day. Regardless of the similarity of preshock and aggression chambers, preshocked Ss displayed less aggression than nonpreshocked Ss. The preshock effect is interpreted as being mediated by the stimulus consequences of shock.—*Journal abstract*.

743. Wasserman, Edward A. (U Iowa) **Stimulus-reinforcer predictiveness and selective discrimination learning in pigeons.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 284-297.—Conducted 3 experiments with a total of 80 homing pigeons and 10 hybrid cock pigeons to investigate selective discrimination learning during acquisition training. A 2-key autoshaping procedure was used in which Ss' responses to the common and distinctive elements of 2 successively presented compound visual stimuli were recorded separately. The difference between the correlations with reinforcement of the compound stimuli influenced between- and within-trial discrimination learning. The methods and findings of these experiments are discussed in terms of several views of stimulus selection in animal discrimination learning. (23 ref)—*Journal abstract*.

744. Williams, Ben A. (U California, San Diego) **Reward vs extinction in discrimination reversal learning.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol



3(6). 454-456.—Pigeons trained on a series of color-discrimination reversals were given either reward or extinction single-stimulus pretraining at various points during reversal learning improvement. Extinction of the previous positive stimulus facilitated reversal learning more than reward of the previous negative stimulus throughout training.

745. Williams, Donald T. & Ballenger, M. Mark. (York Coll, City U New York) **Successive contrast effects.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 43-50.—Tested 80 white Sprague-Dawley rats for positive and negative contrast effects with the use of a 2 × 2 design (6 or 1 45-mg pellet as reward in pre- or postshift phase) and with the use of the necessary methodological controls. Ss were run in a straight alley for 33 pre- and 10 postshift trials. A significant ( $p < .01$ ) negative contrast effect (NCE) was found, but there was no evidence of a positive contrast effect (PCE). It is concluded that the NCE is a viable behavioral phenomenon, whereas the PCE is questionable. (21 ref) —*Journal abstract.*

746. Yarcower, Matthew & Evans, Gary. (Bryn Mawr Coll) "Combined cue" test of conditioned inhibition in pigeons. *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 261-266.—Conducted an experiment with 15 Silver King pigeons to determine whether the amount of positive-stimulus (S+) training affects the amount of response suppression induced by superimposing a novel stimulus on the S+ stimulus (external inhibition). An increase in the amount of training was accompanied by a reduction in the amount of external inhibition. The reduction in suppression could not be attributed to differences in response rate or to changes in stimulus control by S+. Results of the present study, taken together with those of a prior study, support the suggestion that the degree of external inhibition is codetermined by the degree of S+ stimulus control and by the strength of the behavior controlled by S+. —*Journal abstract.*

747. Young, A. Grant; Hale, P. A. & Fuselier, G. D. (Louisiana State U, Baton Rouge) **A within-S test of the response specificity of the PRE.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 437-439.—Trained 64 male albino rats to leverpress in an operant chamber and to run a straight runway. Half of Ss were trained on a continuous reinforcement schedule (CRF), and the other half on a partial reinforcement schedule (PR). Upon completion of acquisition, the groups were subdivided and given acquisition training in the other apparatus, half under conditions of CRF and the other half under conditions of PR. Upon completion of acquisition on both pieces of apparatus, half of Ss in each subgroup were extinguished in the runway, and the other half were extinguished in the operant chamber. Results show that resistance to extinction of either response was a function only of the training reinforcement for that response, and was independent of the schedule of reinforcement received in training of the other response. Results are discussed in terms of the response specificity of the partial reinforcement effect. —*Journal abstract.*

748. Zerboglio, Dominic J. (U. Missouri, St. Louis) **Wild caught vs inbred mouse strains: Differences in wheel-turn avoidance learning.** *Bulletin of the Psycho-*

*nomic Society*, 1974(Jul), Vol. 4(1), 24-26.—12 Ss from each of 3 Bar Harbor inbred mouse strains—C57BL/6J, C3H/HeJ, and DBA/2J—and two wild caught but laboratory bred *Peromyscus* strains—*P. leucopus* and *P. maniculatus bairdi*—were compared over 8 days of acquisition training on a wheel-turn avoidance task. In the acquisition of the conditioned avoidance response, the Bar Harbor inbreds did not differ but were, as a group, significantly better than the wild caught strains. Differences in activity rate were also apparent but do not account for the differences in avoidance performance. —*Journal abstract.*

### Social & Sexual Behavior

749. Averhoff, W. W. & Richardson, R. H. (U Texas, Austin) **Pheromonal control of mating patterns in *Drosophila melanogaster*.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 207-225.—Performed multiple-choice mating tests comparing the mating propensity among and within inbred lines for *Drosophila melanogaster*. Courtship activity, time to copulation, and assortative mating were all directly correlated with the degree of inbreeding. By the 8th generation of sibling mating, there was a 76% incidence of negative assortative mating in multiple-choice tests and a marked reduction of courtship behavior among siblings. Absence of sperm in the females of nonreproductive pairs indicated that much of the attrition of inbred lines was due to failure of siblings to mate. Olfactometer tests with either unrelated flies or collected pheromone samples as source material indicate that airborne chemosignals were required for initiation of courtship in *D. melanogaster*. Visual and audio cues were noncritical in *D. melanogaster* courtship and mating. It is suggested that intraspecific qualitative pheromone variation, at one or a few loci, is functioning as the control mechanism in selective mating. (22 ref) —*Journal abstract.*

750. Barash, David P. (U Washington) **The evolution of marmot societies: A general theory.** *Science*, 1974(Aug), Vol 185(4149), 415-420.—Discusses a series of studies which reveal consistent and predictable correlations between marmot environments and social systems that indicate the ways in which social behavior may be adjusted to local ecology. The effects of environment on dispersal of the species and on reproductive performance and the marmot's behavioral system of local population control are described. (22 ref)

751. Bauer, Richard H. & Turner, James H. (U. California, Medical School, Los Angeles) **Effects of social conditions and time of testing on activity and striking of goldfish (*Carassius auratus*).** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 12-14.—Separated pairs of goldfish by a clear Plexiglas sheet, an opaque sheet, or mirrors with the reflective surfaces toward the Ss ( $N = 21$ ). Horizontal activity, vertical activity, and striking for food pellets were recorded at 7:00 AM, 12:00 noon, and 4:00 PM for 14 days. Horizontal and vertical activity was greater at 12:00 and 4:00 than at 7:00, increased for approximately the 1st 8 days, and then declined slightly. By the 10th day, horizontal activity was greater for Ss with mirror-image stimulation and those separated by a clear Plexiglas sheet than for Ss separated by an opaque sheet. Striking for

food pellets was not altered by social conditions or time of testing. Results suggest that social facilitation of feeding is not related to increased activity, but probably requires competition for food.—*Journal abstract*.

752. Bengtsson, Hans. **Retinal stimulation underlying the approach responses of naive chicks toward moving objects of different diameters.** *Psychological Research Bulletin; Lund University*, 1974, Vol 14(2), 8 p.—Analyzed data from a study by A. H. Schulman et al (see PA, Vol 46:4455) which identified the visual stimulus conditions which elicit initial approach responses in neonate chicks in order to further determine critical features of the proximal retinal stimulation that evoke the approach response. Data show that the effectiveness of eliciting approach behavior to an object moving toward the chick is a function of the relative increase in speed of the object's visual angle.

753. Borchelt, Peter L. & Overmann, Stephen R. (Michigan State U) **Development of dustbathing in bobwhite quail: I. Effects of age, experience, texture of dust, strain, and social facilitation.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 305–313.—Found that quail chicks dustbathed in fine dust at an earlier age than in coarse dust. A different Age  $\times$  Experience developmental pattern was found for dustbathing in a different strain of Bobwhite quail. Chicks experienced in dustbathing facilitated significantly the development of dustbathing in naive chicks.

754. Box, Hilary O. & Pook, A. G. (U Reading, England) **A quantitative method for studying behaviour in small groups of monkeys in captivity.** *Primates*, 1974(Mar), Vol 15(1), 101–105.—Describes a method in which the behavior of individual animals is recorded to minimize order effects and observer differences in studying social behavior among a small group of captive monkeys. Gross activity profiles, obtained by using time sampling and a modified event recording technique, are presented.

755. Chamove, Arnold S. (U Stirling, Scotland) **A new primate social behaviour category system.** *Primates*, 1974(Mar), Vol 15(1), 85–99.—After a brief critical review of some primate behavioral recording techniques, a new device and scoring system is described. Frequency, duration, duration–frequency, and modified frequency data of a large number of behaviors can be obtained using this adding machine and printout counter. Data collected using this system are illustrated. (43 ref)

756. Chappell, Patricia F. & Meier, Gilbert W. (Boston U, Medical Ctr) **Behavior modification in a mother–infant dyad.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 296.—Made observations of an isolate-reared female rhesus monkey and her infant from Day 1 of the infant's birth until 4 mo later. The mother showed atypical behavior toward her infant, including omission of grooming, stereotypy, aggression, and frequent bouts of rejection.

757. Clark, Dennis L. & Kessler, Karen L. (U Arizona) **Pairwise dominance and social preference in squirrel monkeys.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1083–1090.—Observed 5 male and 5 female squirrel monkeys, previously tested for dominance, in a noncompetitive and social preference

situation. Following nonsocial adaptation trials, all possible pairs of monkeys were observed, one pairmate serving as S and the other as a stimulus animal in a free-choice preference test. Ss' latencies to enter the apparatus and activity levels were greatly reduced by the addition of social partners. While social choices were not influenced by the dominance of the stimulus animal, the sex of the stimulus monkey proved to be an effective variable in that females elicited more approach behaviors than males.—*Journal abstract*.

758. Connor, James L. (U Nebraska, Lincoln) **Waning and recovery of conspecific aggression in the house mouse (*Mus musculus* L.).** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 215–227.—Reports results of 3 experiments with a total of 254 wild, C57/BL6, and DBA/2 mice. 4-hr exposure to fighting opportunities depressed intermale mice to a low baseline level. A subsequent 18-hr restriction in fighting opportunities restored aggression to its previous level. The time course of these effects was the same whether aggression was measured as the proportion of time spent fighting, trial length, or attack-reinforced barpressing rates. Replacing familiar intruders with novel intruders failed to affect baseline aggression, aggressive waning, or aggressive recovery. Waning and recovery effects replicated across the outbred wild stock of mice and the aggressive inbred strain (C57/BL6) but failed to replicate with the relatively nonaggressive inbred strain (DBA/2). (27 ref)—*Journal abstract*.

759. Creer, Thomas L. (Children's Asthma Research Inst. & Hosp., Denver, Colo.) **Communal housing and shock-induced aggression.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 51–53.—In Exp I, testing, which began after 18 naive male Sprague-Dawley rats had been evenly divided and confined to 1 of 3 communal cages for 30 days, indicated that only 1 pair from each of the 3 cages exhibited high rates of fighting. The other 2 pairs in each cage displayed low and variable rates of aggression. In Exp II the Ss in each communal cage were paired in round-robin fashion with all cagemates. Results show that Ss displaying higher rates of aggression in Exp I again exhibited high frequencies of fighting. Rates displayed by other Ss were a function of the particular pairing. Thus, some Ss fought when confronted with a more aggressive protagonist. Others, however, did not fight, regardless of the composition of the match.—*Journal abstract*.

760. Dewsbury, D. A. (U Florida) **Copulatory behavior of California mice (*Peromyscus californicus*).** *Brain, Behavior & Evolution*, 1974, Vol 9(2), 95–106.—Observed 17 male–female pairs of California mice in 60 tests of copulatory behavior. Ss showed a pattern with no functional lock, intravaginal thrusting, ejaculation possible on single insertions, and multiple ejaculations. Results suggest that the evolution of copulatory behavior in hystricomorph and myomorph rodents is less divergent than previously proposed. (27 ref)—*Journal abstract*.

761. Dewsbury, Donald A. (U Florida) **Copulatory behavior of wild-trapped and laboratory-reared cactus mice (*Peromyscus eremicus*) from two natural populations.** *Behavioral Biology*, 1974(Jul), Vol 11(3), 315–326.—Observed copulatory behavior in 4–6 tests of each of 24 male–female pairs of cactus mice. Ss showed long



latencies to initiate copulation. Multiple intromissions with intravaginal thrusting always preceded ejaculation. Only 1 ejaculation occurred in most tests. Locking was observed on 1.5% of all copulations. Copulatory pattern showed little variation as a function of population and rearing condition. A total of 62.8% of all copulations occurred in incomplete series after the last ejaculation and sperm transfer. It is proposed that these "postejaculatory copulations" may either be necessary for induction of neuroendocrine reflexes in the female or increase male reproductive success by reducing the likelihood that the female will mate with a different male. (34 ref) —*Journal abstract*

762. Erwin, J.; Maple, T.; Willott, J. & Mitchell, G. (California, Davis) **Persistent peer attachments of rhesus monkeys: Responses to reunion after two years of separation.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1179-1183. — 6 male and 6 female 4½-yr-old rhesus monkeys were reunited with same-sex peers with which they had spent their 2nd yr of life. Responses of Ss to reunion with familiar animals were compared with their responses to pairing with unfamiliar same-sex peers. Ss displayed less aggression, fear submission, and disturbance, and more affiliation, while paired with familiar peers than with unfamiliar peers. —*Journal abstract*.

763. Ghitelli, William B. & Thor, Donald H. (Edward R. Johnstone Training & Research Center, Bordentown, N.J.) **The rodent model of irritable aggression: A method for analyses of individual roles in paired fighting.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 17-19. — Selected 10 pairs of Long-Evans male rats for reliable fighting to footshock. For each pair, 1 member on Day 1 (and the other member on Day 2) was temporarily rendered docile by local anesthesia of the vibrissal pad. Attack scores decreased ( $p < .0001$ ) when 1 member was anesthetized, but component elements of the score varied in direction. Biting increased ( $p < .001$ ) and boxing decreased ( $p < .0001$ ). Upright inherent ambiguity in standard observational measures of paired fighting behavior. The present method has evident potential for discriminating nonapparent dominance relationships in normally fighting pairs and for stabilizing aggressor-target roles in the shock-elicited aggression paradigm. (16 ref) —*Journal abstract*.

764. Gillett, Sylvia D. (U. York, England) **The role of integumental colour pattern in locust grouping.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 153-156. — Measured the social behavior of normally pigmented and albino locusts. Albino nymphs and adults grouped less than normal locusts. In mixed-animal tests albino locusts showed no increase in grouping, and normal locusts showed no decrease in grouping. (17 ref)

765. Grota, Lee J. (U. Rochester, School of Medicine & Dentistry) **Effects of litter size, age of young, and parity on foster mother behaviour in *Rattus norvegicus*.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 78-82. — Results of 2 experiments with female Sprague-Dawley albino rats show that maternal behavior in the presence of newborn pups was determined by the age and size of the litter independent of parity of the mother, previous experience with different-sized litters, and the number of days after delivery the measurements are taken. After fostering 10-day-old young, maternal behavior was

influenced by the age and size of the litter and also by the mother's previous experience with different-sized litters. —*Journal abstract*.

766. Heinz, Gary. (Patuxent Wildlife Research Center, Laurel, Md.) **Responses of ring-necked pheasant chicks (*Phasianus colchicus*) to conspecific calls.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 1-9. — Measured the locomotor responses of pheasant chicks to conspecific calls and the vocalizations of the chicks relating to their locomotor responses in a test apparatus permitting approach or retreat movements. The brood-gathering call and the content call elicited strong approach from chicks, whereas the alarm call and the squeak call inhibited locomotion. (19 ref)

767. Hinkel, Thomas J. & Maier, Richard. (Rockhurst Coll) **Isolation and aggression in Siamese fighting fish (*Betta splendens*).** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1323-1326. — Tested the hypothesis that animals show an increased tendency toward aggression as deprivation of fighting is extended. 60 male Siamese fighting fish were observed to determine aggressive display strength to a mirror image following 15 min or 6, 24, or 72 hrs of visual isolation. Results indicate shorter attack latencies and progressive increments for total time of gill-cover erections as the length of the isolation period was increased. —*Journal abstract*.

768. Hodgdon, Harry E. & Larson, Joseph S. (U. Massachusetts, Amherst) **Some sexual differences in behaviour within a colony of marked beavers (*Castor canadensis*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 147-152. — Studied social and construction behaviors of 8 beavers in the field in central Massachusetts. The colony was organized around the adult female. She emerged from the lodge first 93% of the time, tail-slapped twice as frequently as the adult male, was the alpha member of the family in dominance encounters, and elicited more calls from other beavers than any other animal. Tail-slapping by females was significantly more effective in causing beavers to move to deep water than tail-slaps by males. The adult female led the family in lodge maintenance, food cache building, and dam maintenance. The adult male performed close dam inspection twice as often as the adult female. (24 ref) —*Journal abstract*.

769. Howard, J. L.; Obrist, P. A.; Gaebelein, C. J. & Galosy, R. A. (U North Carolina, Chapel Hill) **Multiple somatic measures and heart rate during classical aversive conditioning in the cat.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 228-236. — In 2 experiments, a total of 9 freely moving cats were subjected to classical aversive conditioning under either a delay or a trace paradigm using a tone conditioned stimulus (CS) and a shock unconditioned stimulus (UCS). During a 7- or 9-sec CS-UCS interval, heart rate (HR) decelerated and concomitantly, general activity, neural activity in the pyramidal motor system, respiration amplitude, and neck muscle electromyogram (EMG) decreased. General activity and pyramidal activity were more related to HR than were respiration and EMG. The close correspondence between HR and the various measures of somatic activity are interpreted as showing the dependence of HR change on the metabolic demands of the organism. The concomitance

demonstrated between HR change and somatic change provides further evidence against HR change as a direct index of emotional or motivational processes. (24 ref)—*Journal abstract*.

770. Jensen, Gordon D. & Tokuda, Kisaburo. (U California, Davis) **Spatial organization of captive monkeys.** *Primates*, 1974(Mar), Vol 15(1), 75-83.—Formed an artificial group of 18 pigtailed monkeys, selected by sex and size (age) to simulate the composition of natural groups of macaques. All were strangers to each other. Observations were made over 5 mo of Ss' resting and clustering locations in a laboratory compound. Spatial organization was found to emerge about 1 mo after the group was formed when the group acquired a competent leader. The leader, certain high-ranking females, and/or females in estrus were seen consistently in a geographically central area of the compound and therefore were termed central monkeys. This central subgroup, coherent in terms of area and roles, persisted throughout the study. Development of increased group structure was also indicated by increased stability of dyadic affectional relationships. Results indicate that social organization of the pigtailed macaque will develop when some of the environmental and prior experience variables are controlled. The results highlight the leader's role and suggest that it is at least as essential in social organization as kinship and factors inherent in a natural environment. Estrous cycles of females and seasonal variations of temperature in the compound were other factors affecting spatial and social relationships of the group members.—*Journal abstract*.

771. Langford, Andrew & Hogan, Jerry A. (U. Toronto, Ontario, Canada) **Effects of chick vocalizations on ongoing behaviour.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 160-163.—Conducted 2 experiments with a total of 48 Burmese red jungle-fowl chicks. Recorded feeding twitters, shrill calls, and tones of 2 intensities were presented to Ss that were pecking a key for food on a variable interval schedule of reinforcement. The shrill calls and tones had an immediate inhibitory effect on pecking which dissipated in about 5 min. Feeding twitters had no effect on pecking rate. (17 ref)—*Journal abstract*.

772. Larsson, K., et al. (U Göteborg, Unit of Psychobiology, Sweden) **Delayed onset of sexual activity of male rats subjected to pre- and postnatal undernutrition.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 307-311.—Subjected male Sprague-Dawley rats to pre- and postnatal undernutrition and studied their sexual and locomotive behavior. The underfed Ss were slower in initiating sexual behavior than the intact ones, and some of the Ss never showed any mounting behavior during the period of testing. Occurrence of spermatozoa in a penile smear was delayed in the underfed Ss. The Ss subjected to restricted food consumption showed an increased locomotive activity in an open field situation, but habituation occurred at a normal rate.—*Journal abstract*.

773. Levine, John M. & Zentall, Thomas R. (U Pittsburgh) **Effect of a conspecific's presence on deprived rats' performance: Social facilitation vs distraction/imitation.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 119-122.—Investigated effects of

(a) conspecific's "mere presence" and (b) water deprivation on emission of dominant responses by rats. R. B. Zajonc (see PA, Vol 39:16348) suggested that a conspecific's presence functions like a physiologically based drive in enhancing performance of dominant responses. Alternative interpretations suggest that a conspecific's presence impairs performance by distracting the O or eliciting imitation of irrelevant responses. The social facilitation vs distraction-imitation hypotheses were tested in a 2 × 2 design: 32 barpress-trained male Long-Evans rats, deprived of water for 4 or 23 hrs, barpressed for water in the presence of a naive rat or alone. Results support social facilitation theory: Performance was significantly higher when the conspecific was present rather than absent and when the responder was 23 hrs rather than 4 hrs deprived. It is suggested that degree of contact may be important in determining how a conspecific's presence affects performance of dominant responses. (25 ref)—*Journal abstract*.

774. Martin, J. (Utah State U) **Copulatory and vocal behavior of a pair of whiskered owls.** *Auk*, 1974(Jul), Vol 91(3), 619-624.—Describes 2 songs and other vocal displays of a single pair of whiskered owls and the contexts in which the vocalizations were used, particularly before, during, and after copulation.

775. Michener, Gail R. (U Saskatchewan, Regina, Canada) **Development of adult-young identification in Richardson's ground squirrel.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 375-384.—8 adult female ground squirrels were paired in an observation box with their own young and with unrelated young aged 20-24 days through 40-44 days. Social discrimination was characterized by a predominance of cohesive over agonistic contacts between related pairs, and a predominance of agonistic over cohesive contacts between unrelated pairs. Both adults and young were capable of identifying the other S as familiar or unfamiliar. Adults did not pick up or carry young aged over 29 days. Young that were not carried could identify adults at 20-24 days of age when the eyes were still closed. They responded cohesively with the mother and submissively with the unrelated adult. This pattern of behavior was maintained after the eyes opened. Adults initiated fewer contacts than young; the majority of their responses involved nasal investigation of the young. (24 ref)—*Journal abstract*.

776. Michener, Gail R. (U. Cape Coast, Ghana) **Maternal behaviour in Richardson's ground squirrel (*Spermophilus richardsonii richardsonii*): Retrieval of young by non-lactating females.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 157-159.—Investigated retrieval of ground-squirrel young by females which had littered in the previous year and by virgins. More (5 of 6) nonparous mothers retrieved than did virgins (1 of 7). Ss which did not retrieve attacked the young. Ss which retrieved also exhibited other maternal responses (cleaning, nidification, and lactation position). Results suggest that previous parity has a long-lasting effect on the response of nonlactating females to young. (17 ref)—*Journal abstract*.

777. Newman, John D. & Symmes, David. (NIH, Inst of Child Health & Human Development, Behavioral Biology Branch, Bethesda, MD) **Vocal pathology in**



**socially deprived monkeys.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 351-358.—Found structural abnormalities in the clear calls of 2 male and 2 female rhesus monkeys raised in partial social isolation. These abnormalities included abrupt pitch changes, harmonic emphasis shifts, temporal discontinuity, and lack of the characteristic inflection found in such calls from 2 male and 1 female mother-reared controls. Other forms of vocalization appeared structurally normal. Vocal pathologies were distinctive for each isolate tested, and persisted over the age range of 8-24 mo. (16 ref)

—*Journal abstract.*

778. Norikoshi, Kohsiki. (Osaka City U, Japan) **The development of peer-mate relationships in Japanese macaque infants.** *Primates*, 1974(Mar), Vol 15(1), 39-46.—Studied the play behavior of Japanese macaque infants in the field for 6 mo at Arashiyama, Japan. 3 types of play were identified. The 1st (solitary play) was observed in 5-12 wk old infants. The 2nd type of play (parallel play) was observed in infants from 12 to 21 wks old. After the 12th wk, the 3rd type of play (associate play) was seen. At this point the infants seldom played without partners. It is in associate play that dominant and submissive behavior may be seen, and from which dominance relations may be assumed. It is suggested that the rank of a 12-wk-old infant parallels that of its mother. (16 ref)—*Journal abstract.*

779. Pruzan, Anita & Ehrman, Lee. (Hunter Coll, City U New York) **Age, experience, and rare-male mating advantages in *Drosophila pseudoobscura*.** *Behavior Genetics*, 1974(Jun), Vol 4(2), 159-164.—Examined frequency-dependent sexual selection in female *Drosophila* who differed in age and in previous mating experiences. Direct observation tests were conducted employing females of the previously described Arrowhead (AR) and Chiricahua (CH) homokaryotypes. 4-day-old virgin females conferred mating advantages on all tested rare males or, AR, AR, and CH). Females that had a previous mating experience when younger awarded a rare-male advantage only when the rare male was of the same genotype of karyotype as their 1st mate, and matings were random when the 1st-mate type males were common. Equivalently aged (11 days) virgin females mated significantly more than expected with minority males if they were of the same karyotype as the females themselves, whereas matings were near random when the males were different. Frequency-dependent mating, therefore, is both age and experience dependent. —*Journal abstract.*

780. Rosenson, Leon M. (Richard Stockton State Coll.) **Group formation in the captive greater bushbaby (*Galago crassicaudatus crassicaudatus*).** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 67-77.—1 male and 3 female bushbabies were released into a room and observed for 30 days. Consistent relationships, but no straight-line hierarchy, were formed. Grooming and marking were the most frequent activities. Females fought over proximity to the male even though none were in estrus. One female initiated over 90% of agonistic encounters. When she was removed for 9 days the remaining Ss continued their friendly relations; when she was returned she briefly reasserted dominance over the other 2 females. (21 ref)

—*Journal abstract.*

781. Russock, Howard I. & Schein, Martin W. (West Virginia U) **Effect of early experience and age on initial responsiveness of *Tilapia mossambica* fry to a maternal model.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 111-114.—High levels of responsiveness were exhibited by all fry of a maternal mouth-brooding fish regardless of rearing experience, indicating that responsiveness to the mother's mouth is fully developed at birth and needs no previous social experience for its expression. It was also found that naive fry were strongly attracted to the model at 13 and 16 days of age but were neutral or actively avoiding it at 26 days of age. This decline is almost identical to the decline in responsiveness of normally reared fry toward their actual mother.

782. Sachs, Benjamin D.; Macalone, Roger & Fegy, Linda. (U Connecticut) **Pacing of copulatory behavior in the male rat: Effects of receptive females and intermittent shocks.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 326-331.—Describes 2 experiments with 7 male hooded Long-Evans rats. In Exp I, Ss were tested with females continuously present and with the presence of the female after each sex act contingent upon a barpress. The sole effect of the barpress requirement was to increase the intervals between copulations before ejaculation. In Exp II, intermittent shocks were superimposed upon the conditions of Exp I. Shocks were followed with short latency by mounts in the ad-lib condition and by barpress and mounts in the operant condition. The pacing of copulatory acts before ejaculation is inferred to result from an interaction of stimuli from the female and feedback from the copulatory acts; after ejaculation, factors primarily endogenous to the male govern the timing of resumption of copulation. (18 ref)—*Journal abstract.*

783. Suomi, S. J.; Eisele, C. D.; Grady, S. A. & Tripp, R. L. (U Wisconsin, Primate Lab, Madison) **Social preferences of monkeys reared in an enriched laboratory social environment.** *Child Development*, 1973(Sep), Vol 44(3), 451-460.—Each of 26 1-mo to 4-yr-old rhesus monkeys who had been reared in a nuclear family environment with continual access to mother, father, and siblings and with limited access to other parents and their offspring were tested individually for preferences between (a) mother, familiar adult female, and unfamiliar adult female; (b) father, familiar adult male, and unfamiliar adult male; (c) sibling, familiar peer, and unfamiliar peer; and (d) mother and father. Ss of all ages preferred their mothers to other adult females, preferred their fathers to other adult males, preferred their mothers to their fathers, but exhibited no preference among siblings and peers. (25 ref)—*Journal abstract.*

784. Syme, G. J. & Doak, J. B. (U Western Australia, Nedlands) **Problems in the analysis of competitive data.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 69-74.—A review of the literature indicates that while a number of studies have investigated the effects of experimental manipulations on the competitive behavior of laboratory rodents, little systematization has been achieved in either experimental design or statistical analyses. A review of the analyses used in a number of competitive studies leads to the conclusion that between-group competitive experiments should be analyzed with one-sample statistics. It is

suggested that if the one-sample chi square is used, the expected frequency should be calculated from the number of Ss in the experimental group. Reanalysis of some competitive experiments is recommended. (18 ref)—*Journal abstract*.

785. Van Deventer, John . (U Wisconsin Ctr, Marshfield) **The behavior of two species of planaria in confined spaces.** *Psychological Record*, 1974(Sum), Vol 24(3), 379-384.—Conducted 2 studies which examined the behavior of 100 *Cura foremanii* and 100 *Dugesia tigrina* in large and small spaces. It was found that the smaller the space (the greater the probability of contact with a corner for rectangular spaces and the greater the degree of angularity for cylindrical spaces), the shorter the mean time to cessation of locomotion. When given a choice between settling in a large or a small volume under diurnal conditions, both *C. foremanii* and *D. tigrina* chose the small volume. With continuous darkness, while *D. tigrina* appeared to continue to choose the smaller volume, *C. foremanii* avoided it. The behavior is explained as an interaction of chemotaxis and positive thigmotaxis.—*Journal abstract*.

### Sensory Processes

786. Capps, Mary J. & Preciado, Manuel C. (U Minnesota, Medical School) **Vestibular habituation in paralyzed cats.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 272-276.—Studied the role of the eye movement response in the production of vestibular habituation in 12 cats. One group of Ss was subjected to an habituation series of 15 unilateral caloric irrigations while paralyzed with gallamine triethiodide. A 2nd group underwent an identical habituation procedure but was not paralyzed. Tests conducted following recovery from paralysis showed that the responses of the previously is Ss were habituated and did not differ from the responses of Ss habituated in a normal manner. Data support a central origin for the phenomenon of vestibular habituation.—*Journal abstract*.

787. Carricaburu, Pierre . (National Museum of Natural History, Paris, France) **[Under what aspect do insects see colored objects?]** (Fren) *Vision Research*, 1974(Aug), Vol 14(8), 671-675.—Used color photography to study insect color vision. A trichromatic selection was made through 3 filters—ultraviolet, blue, and green—and the 3 negatives were printed through 3 filters—blue, green, and red. Striking differences from human color vision were observed. (French, German, & Russian summaries)

788. Gold, Richard M. & Prowse, James . (U Massachusetts, Amherst) **Water temperature preference shifts during hydration.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 291-296.—In 3 experiments, 18 thirsty female Carworth albino rats chose cool water over warm water at the beginning of daily 2-choice drinking sessions, but after 6-8 min of drinking their preference shifted to warm water. The temperature preference shift persisted when the Ss were hyperthermic, thus ruling out thermoregulation as an explanatory mechanism. Hydration, not thermoregulation, appeared to mediate the shift in water temperature preference. When only cool water was available at the end of the drinking session (nonpreferred) total water intake was

suppressed. The same amount of cool water at the beginning of the drinking session (preferred) did not suppress water intake. Thus the cool to warm water temperature preference shift explains how cool water can be both rewarding and satiating.—*Journal abstract*.

789. Herman, Louis M. & Arbeit, William R. (U Hawaii) **Frequency difference limens in the bottlenose dolphin: 1-70 Kc/s.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 109-120.—Obtained frequency difference limens (DL) for an Atlantic bottlenose dolphin, *Tursiops truncatus* (Montagu) for 1, 6, 12, 19, 27, 36, 50, and 70 kHz. Ss were required to select the pure tone signal from a sequential pair consisting of a pure tone signal and a frequency-modulated (FM) signal of the same center frequency. Using a threshold-tracking procedure, the percent-frequency (EP) the FM signal was reduced following correct responses and increased following errors, providing estimates of the minimum deviation required for correct discrimination. The effects of modulation rates of 1 and 2 Hz were also studied. Thresholds and threshold variability were lowest for the 2-Hz rate. Relative DLs ( $\Delta F/F$ ) were roughly constant (.002-.003) for 6-50 kHz but were elevated for 1 kHz and 70 kHz. Results indicate exceptionally fine frequency discrimination by *T. truncatus* between 6 and 50 kHz.—M. B. Meikle.

790. Hoppe, Susan A. & Langford, Ted L. (Purdue U) **Binaural interaction in cat and man: I. Signal detection and noise cross correlation.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1263-1265.—Studied detection of diotic 500-Hz tones partially masked by diotic and dichotic noise in 2 cats and compared the results with similar detection data for 2 human Ss. The interaural correlation of the masker was varied by delaying the channel to 1 ear from 0 to 5 msec in steps of 1 msec. The absolute sensitivity of the cat was less than that of man, and smaller masking-level differences were found for the cat at each delay. The temporal interval over which the binaural system of the cat was able to effect a correlation between events occurring at the 2 ears was smaller than in man, while the critical band appeared to be wider. (15 ref)—*Journal abstract*.

791. Kelly, Jack B. (Carleton U, Ottawa, Ontario, Canada) **Localization of paired sound sources in the rat: Small time differences.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1277-1284.—Trained 17 male Wistar albino rats to perform 2 sound-localization tasks with single and paired sound sources. All Ss were first trained to detect a change from a series of single clicks on the left to a series on the right. They were then given training with paired clicks separated by a small time interval; the discrimination was between left-right pairs and right-left pairs. 5 Ss were given further tests with smaller values using the method of constant stimuli. Transition from single to paired clicks occurred for values between .5 and 4.0 msec. Ability to discriminate paired clicks was demonstrated for values between .25 and 16.0 msec. The limits for discrimination ranged from 62  $\mu$ sec to 32 msec. Results are discussed in relation to the precedence effect in human hearing. (17 ref)—*Journal abstract*.



792. Laursen, A. Mosfeldt & Rasmussen, J. Born. (Inst of Neurophysiology, Lab of Behavioral Physiology, Copenhagen, Denmark) **Circle-ellipse discrimination in monkeys: Comparison of titration schedules with the method of limits.** *Biological Psychology*, 1974, Vol 1(4), 293-301.—Reinforced 3 male vervet monkeys with food pellets for choosing a response key with a back-projected circle from among 7 keys with identical ellipses. Ellipse ratios from .400 to .985 were available in 18 discrete steps. Schedules were tested in the following sequence: (a) A titration schedule was used with different up-and-down transformed response rules. Training began with a rule of 3:1 indicating that after 3 correct responses the next trial presented ellipse ratios 1 step higher. A change to a lower ratio occurred after 1 incorrect response, and subsequently, up-and-down rules from 1:3 to 9:1 were tested, 1 rule per session. (b) The method of limits was then used in which 1 ellipse ratio was tested per session, first in a sequence of increasing and then of decreasing ratio. (c) Finally, a titration schedule with sequential likelihood ratio tests was employed. A target probability of correct responses was approached by deciding after each trial whether to change to a larger or to a smaller ellipse ratio. Psychometric functions derived from Schedules (a) and (b) coincided. Schedule (c) produced oscillations in the difficulty of the presented stimuli. It is concluded that discrete trial titration schedules with different up-and-down transformed response rules provided reliable measures of threshold in a visual shape discrimination.—*Journal abstract*.
793. LaVail, Matthew M.; Sidman, Murray; Rausin, Ricki & Sidman, Richard L. (Harvard U, Medical School, Boston) **Discrimination of light intensity by rats with inherited retinal degeneration: A behavioral and cytological study.** *Vision Research*, 1974(Aug), Vol 14 (8), 693-702.—4 rats of the Royal College of Surgeons (RCS) strain with inherited retinal degeneration suppressed leverpressing behavior in response to onset of light at ages 6 mo to more than 2 yrs. Control experiments established that the Ss were responding to light rather than to some other stimulus, and that the response was mediated by the eyes. Electron microscopic examination of the retinas demonstrated numerous surviving photoreceptor cells which lacked outer segments but which did make synaptic contact with presumed bipolar and/or horizontal cell processes. Counts of conventional and ribbon synapses in the inner plexiform layer showed that the circuitry through the retinas was relatively well preserved. Pigment epithelial cells made tight and gap junctions with Müller cell processes, which in turn were apposed to the photoreceptor cells. Possible cellular mechanisms mediating visual behavior in RCS rats are discussed. (French, German, & Russian summaries) (41 ref)—*Journal abstract*.
794. Martin, Graham R. & Gordon, Ian E. (U Exeter, England) **Increment-threshold spectral sensitivity in the tawny owl (*Strix aluco*).** *Vision Research*, 1974(Aug), Vol 14(8), 615-621.—Behaviorally determined photopic spectral sensitivity functions in 3 tawny owls, using a 2-choice simultaneous discrimination procedure. The functions obtained from the 3 Ss showed very close agreement. All had maximum sensitivity at about 580 nm, and in 2 of the Ss a submaximum at about 525 nm was evident. A comparison is made between this function and that from 2 humans tested in the same apparatus. The possible effects of selective absorption by preretinal media on the owl's function are considered. (French, German, & Russian summaries) (47 ref)—*Journal abstract*.
795. Popper, Arthur N.; Salmon, Michael & Parvulescu, Antares. (U. Hawaii) **Sound localization by the Hawaiian squirrelfishes, *Myripristis berndti* and *M. argyromus*.** *Animal Behaviour*, 1973(Feb), Vol. 21(1), 86-97.—Investigated sound localization in a large pond which opened into a bay and was similar to the normal environment of squirrelfish. Observations were made of movements towards 1 of 2 underwater loud speakers emitting squirrelfish alarm calls normally produced in response to predators. When the sound source was within 2.0 m of the test cage housing the Ss, they faced and moved toward the speaker. Ss responded some of the time when the source was within 3.0 m but generally did not orient to the sound source when the speaker was beyond 3.0 m. Response loss was correlated with the S being in the acoustic far-field. Possible cues which release and direct localization remain unknown, but include particle velocity information alone, or some change in relationships between particle velocity and pressure. (29 ref)—*Journal abstract*.
796. Porter, Richard H. & Czaplinski, James A. (George Peabody Coll for Teachers, John F. Kennedy Ctr for Research on Education & Human Development) **Responses of water snakes (*Natrix r. rhombifera*) and garter snakes (*Thamnophis sirtalis*) to chemical cues.** *Animal Learning & Behavior*, 1974(May), Vol 2(2), 129-132.—Conducted 5 experiments with a total of 10 water snakes and 24 garter snakes. In a series of simultaneous 2-choice preference tests, water snakes displayed a significant preference for a clean area of a test chamber vs an area soiled by a conspecific. No differential responsiveness was found for a clean area as compared to an area soiled by either a sympatric species of garter snake or by the individual water snake Ss. A similar series of tests with individual garter snakes revealed significant preferences for areas soiled either by the Ss themselves or by conspecifics as compared to clean areas. No preferences were found for a clean area of the test chamber vs an area soiled by a sympatric water snake. The possible role of chemical cues in the mediation of dispersion and social responsiveness is discussed.—*Journal abstract*.
797. Robinson, John S. & Fish, Stephen E. (Sonoma State Hosp. Brain-Behavior Research Ctr, Eldridge, CA) **A cat's form-experienced but visual-motor deprived eye lacks focal vision.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 331-342.—Allowed 6 laboratory-reared cats to move about freely from birth to 18 mo with 1 eye open; the other eye was open during daily 1-hr periods of binocular exposure in a holder, but was deprived of all visual-motor experience. Focal vision failed to develop in the deprived eye (DE). The DE's guidance deficit was especially pronounced for targets in the central field and in the photopic light range (it was much smaller in the periphery and in the mesopic range). Conjugate eye control, required for binocular fixation of objects in focal viewing, was disrupted by strabismus (squint). The identification function of focal vision was

virtually absent in the DE—it showed only slight recognition of patterns learned by the experienced eye and little ability to learn to identify them itself. (23 ref)—*Journal abstract*.

798. Simner, Marvin L. (U Western Ontario, London, Canada) **Effects of early posthatch exposure to intermittent light on visual flicker rate preference in chicks.** *Journal of Comparative & Physiological Psychology*, 1974(Aug), Vol 87(2), 267-271.—Gave independent groups of newly hatched White Leghorn chicks ( $N = 45$ ) 15 hr of continuous exposure to several rates of flashing white light during the period when the naive preference for a 4 flash/sec rate over a nonflashing light began to emerge. Tests conducted immediately following termination of exposure showed that although this treatment generated a marked reduction in locomotor activity and distress calling, it produced no change in the Ss' naive flash rate preference. (23 ref)—*Journal abstract*.

799. Tavalga, William N. (American Museum of Natural History, New York, NY) **Signal/noise ratio and the critical band in fishes.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1323-1333.—Measured auditory thresholds in 10 Ss from each of 3 teleost species: goldfish (*Carassius auratus*), pin fish (*Lagodon rhomboides*), and African mouth-breeder (*Tilapia macrocephala*). In the goldfish, the signal-to-noise ratio to broad-band noise was about 22 db, and direct measurement of the critical band yielded a value between 100 and 200 Hz. Single-tone masking effects in the goldfish showed partial remote masking and strong masking at frequencies within 5 to 20 Hz of the signal. Audiograms for pinfish and *Tilapia* were significantly higher than in the goldfish, but the signal-to-noise ratio values were in the same range. The evidence supports the existence of a critical band in the goldfish, but not in the other species tested. The relationship of signal-to-noise ratio to the critical band is discussed in reference to the frequency-discrimination capacities and hearing mechanisms in fishes. (54 ref)—*Journal abstract*.

800. Yamamoto, Takashi & Kawamura, Yojiro. (Osaka U, Dental School, Japan) **An off-type response of the chorda tympani nerve in the rat.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 239-243.—Elicited a transient burst activity in the chorda tympani nerve of 27 Wistar albino rats with a water rinse (off-type response) after a sucrose solution had been previously applied to the tongue. A possible mechanism for the generation of this response is suggested, and 2 different acceptor groups in the sugar-sensitive macromolecule are hypothesized. (16 ref)

801. Yamamoto, Takashi & Kawamura, Yojiro. (Osaka U, Dental School, Japan) **Chloroform responses of the chorda tympani nerve in the rat.** *Physiology & Behavior*, 1974(Aug), Vol 13(2), 245-250.—Application of chloroform solution to the tongues of 35 Wistar albino rats did not produce an off-type response in the chorda tympani nerve, following subsequent water rinse, as did the application of a sucrose solution. Effects of some metallic ions on the response to chloroform were also different from those on the sucrose response and suggest that sucrose and chloroform combine to the different loci within the same taste-receptor macromolecule.

## DEVELOPMENTAL PSYCHOLOGY

802. ———. **Abstracts and bibliography.** *Child Development*, 1974(Jun), Vol 48(3-4), 129-280.—Presents a collection of 427 abstracts of journal articles and books on various aspects of child development, including biology, clinical medicine and public health, developmental and comparative psychology, personality, social psychology, and education and counseling.

803. Adams, Gerald R. (Pennsylvania State U, Coll of Human Development, Div of Individual & Family Studies) **An investigation of differential reinforced imitation training on imitative behavior.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 221-233.—Examined the function of reinforcement as a performance vs a learning variable using varying imitation training conditions with 40 black and 40 white nursery-school children. The analysis consisted of 5 2 (Testing Situation)  $\times$  2 (White vs Black Children)  $\times$  8 (Training Conditions) factorials with the use of an analysis of variance technique. Results question the hypothesis that reinforcement is only a performance variable. Partial support is provided for the assumption that imitative behavior may be maintained through similarity of responding where imitation has been acquired through a strong history of reinforcement for imitation. Few racial differences were discovered. (17 ref)—*Journal abstract*.

804. Belmont, Ira. (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr for Research in Mental Retardation & Human Development, Yeshiva U) **Requirements of the early reading task.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 527-537.—Discusses the specific requirements of the early reading task and identifies related competencies which children must develop if they are to meet the requirements successfully. (36 ref)

805. Bohannon, John N. & Friedlander, Bernard Z. (U. Hartford) **The effect of intonation on syntax recognition in elementary school children.** *Child Development*, 1973(Sep), Vol. 44(3), 675-677.—Administered an automated evaluation of selective listening to story narratives to 60 children in kindergarten through 5th grade to test the general proposition that children manifest a shift in critical language listening from voice intonation to coherent meaning as a function of age. 10 children at each grade level were given a choice between a meaningless (randomized syntax) narrative with a lively intonation and the same story with meaningful (normal syntax) narration but monotonous intonation. Kindergarten and 1st-grade children used the flat intonation pattern as a cue to choose the more meaningful story version, and there was significant development toward more decisive selection for meaning in the higher grades. —*Journal abstract*.

806. Bower, T. G. (U Edinburgh, Scotland) **Development in infancy.** San Francisco, CA: W. H. Freeman, 1974. viii, 258 p. \$10(cloth), \$5.95(paper).—Details methods in current use to obtain information from infants and elucidates the processes whereby infants develop their necessary capacities, particularly cognitive. Results of investigations of infants' space perception, radial localization by eye, perception of distance, object perception, and development of motor behavior are included. (10 p ref)



807. Buss, Allan R. (U Alberta, Ctr for Advanced Study in Theoretical Psychology, Edmonton, Canada) **A recursive-nonrecursive factor model and developmental causal networks.** *Human Development*, 1974, Vol 17(2), 139-151.—Presents a model in which both unidirectional (recursive) and bidirectional (nonrecursive) influence properties are considered. The distinction of between vs within domain factors generates 4 major types of models. The components may assume any of the following: lower-order factors, higher-order factors, simple variables, and complex criterion variables. Some of R. B. Cattell's developmental theory is related to the present model. (30 ref)

808. Butzin, Clifford A. & Anderson, Norman H. (U California, San Diego) **Functional measurement of children's judgments.** *Child Development*, 1973(Sep), Vol 44(3), 529-537.—30 5-13 yr olds judged attractiveness of pairs of toys in a  $3 \times 3$  design. These judgments obeyed the parallelism prediction of information integration theory, thus supporting either an adding or an averaging model. An auxiliary critical test eliminated the adding model. Quite similar results were obtained for children 5-7 yrs old and children 7-13. Results extend the range of the averaging hypothesis of general integration theory from adults to children. They also illustrate the applicability of functional measurement methodology to obtain interval scales of subjective value for the individual child. (16 ref)—*Journal abstract*.

809. Cantwell, Zita M. & Svajian, Pergrouhi N. (Brooklyn Coll, City U New York) **Adolescence: Studies in development.** Itasca, IL: F. E. Peacock, 1974. x, 526 p. \$7.50.—Presents a collection of 33 papers on genetic and environmental factors in human development and their application to concepts of adolescence. The personal individuality and interpersonal relationships of the adolescent are discussed, as well as his moral development, language, abilities, motivations, and transition to adulthood.

810. Carmean, Stephen L. (Western Washington State Coll) **Procedure, timing, and task difficulty as moderators of the effect of vocalization of choices during discrimination learning.** *Child Development*, 1973(Sep), Vol 44(3), 693-696.—Conducted 4 experiments differing in the age of Ss (undergraduates or 3rd graders), time of vocalization (before or after responding), and procedure (vocalizing choices with or without correction, or nonvocal with or without correction) to determine if vocalization of responses affects performance in a discrimination learning task. Results indicate that the type of procedure (corrective or noncorrective) acts as a moderator of the effect of vocalization and that the timing of the vocalization and task difficulty are also relevant variables.—*Journal abstract*.

811. Corsini, David A. & Berg, Allan J. (U Connecticut) **Inter-task correspondence in the five to seven shift: Transposition, cue interference, and spatial memory.** *Child Development*, 1973(Sep), Vol 44(3), 467-475.—Examined the interrelationships of performance across 3 tasks (transposition, tactual cue interference, and memory for spatial placements) in 45 4-, 6-, and 8-yr-old children. Significant developmental differences were observed on each of the 3 tasks. The pattern of intercorrelations suggests a high degree of correspond-

ence between tasks. Original learning in the transposition task was related only to form discrimination without interference; form discrimination without interference was moderately related to the other 3 measures; and the 2 criteria measures—form discrimination with interference and spatial memory—were highly related. This pattern, plus a significant correlation between spatial memory and cue interference for each age group, suggests that there may be a common unitary process accounting for a moderate portion of the variance in these tasks.—*Journal abstract*.

812. Dewing, Kathleen & Kennealy, Noreen. **Age-related differences in spatial position and serial position effects in short-term memory.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 277-286.—Trained 4 groups of 40 Ss each, aged 4-5 yrs, 6-7 yrs, 12-13 yrs, and young adult undergraduates, on stimulus displays depicting 4 familiar, easily labelled objects. Ss were tested for recall with a test stimulus showing 1 of the 4 objects in the training display and a dotted blank in the position to be tested. The effect of the spatial location of various components of the stimulus display was examined. Spatial position influenced the recall performance of the 2 younger groups but not that of the older children or adults. Age-related differences in the use of spatial cues are discussed in terms of other relevant investigations. The effect of the temporal presentation order of the stimulus displays was analyzed and revealed age-related differences. Strong primacy effects were evident for the 3 older groups but not for the kindergartners. Implications of the results are discussed in relation to current theories of verbal mediation. (21 ref)—*Journal abstract*.

813. Di Simoni, Frank G. (East Stroudsburg State Coll) **Influence of utterance length upon bilabial closure duration for /p/ in three-, six-, and nine-year-old children.** *Journal of the Acoustical Society of America*, 1974(Jun), Vol 55(6), 1353-1354.—Examined aspects of the chronological sequence of development of durational control systems in 30 3-, 6-, and 9-yr-old children. The effect of utterance length of stimulus material on phoneme duration, previously noted for adults, was present in the speech of the 3-yr-old Ss. Results suggest the possibility of a hierarchy of coarticulatory functions.

814. Golomb, Claire. (Brandeis U) **Young children's sculpture and drawing: A study in representational development.** Cambridge, MA: Harvard University Press, 1974. xiii, 197 p.—Presents a study of 300 children between the ages of 2 and 7 in the US and Israel which traced the development of the human figure in 2 different media—drawing and modeling. The book is illustrated with more than 100 drawings and sculptures that retain the children's spontaneous remarks.

815. Greenberg, David J.; O'Donnell, William J. & Crawford, Donald. (U Illinois, Medical Ctr, Chicago) **Complexity levels, habituation, and individual differences in early infancy.** *Child Development*, 1973(Sep), Vol 44(3), 569-574.—Administered a rate-of-habituation and a complexity-level test to 51 11-wk-old infants. As predicted, those Ss who habituated rapidly (rapidly decreased their looking time to a single repeated stimulus in the habituation test) looked longer at the more complex patterns in the complexity test. The majority of

Ss with irregular habituation patterns resembled the slow habituators in terms of level of complexity preferred while the remaining irregular habituators appeared to respond randomly to both attentional tests. (17 ref)—*Journal abstract.*

816. Grunebaum, Henry; Weiss, Justin L.; Gallant, David & Cohler, Bertram J. (Harvard U, Medical School, Boston) **Attention in young children of psychotic mothers.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 887-891.—Compared findings from investigations of 68 1-6 yr old children of psychotic mothers and 68 1-6 yr old children of normal matched control mothers. 1-yr-old children were administered the Escalona scale of object permanence, and all age groups and parents completed appropriate versions of the Embedded Figures Test. 5-6 yr olds and their parents completed the Continuous Performance Test (CPT), a repetitive visual task requiring sustained attention. Behavior of children in the testing situation was observed and rated. Significant differences were found in the development of cognition and attention in the 1-, 3-, and 5-yr-old children of psychotic mothers, compared with the children of nonpsychiatric mothers. No differences were found in the 6-yr-old children or between sexes. CPT omission scores of psychotic mothers and sons were significantly correlated, but not those of mothers and daughters. CPT commission errors were uncorrelated for both sons and daughters. Field independence-dependence scores were highly correlated for psychotic mothers and daughters, but not for mothers and sons. There were no significant correlations for control mothers and their children. Children of schizophrenic mothers appear especially vulnerable to attentional deficits.—*L. Gorsey.*

817. Guilford, Joan S. (Sheridan Psychological Services, Beverly Hills, CA) **Maturation of values in young children.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 241-248.—Compared 611 1st, 2nd, and 3rd graders in 1 sample on the basis of differences between factor scores on the original form of the Values Inventory for Children (VIC). A 2nd sample of 1,167 1st, 2nd, 3rd, and 4th graders was administered the revised VIC, and factor score differences were tested for significance. As Ss matured, they became less selfish and domineering, less approving of asocial behaviors, and more inclined to value large numbers of friends. There was some evidence that Ss valued academic matters less as they matured. (15 ref)—*Journal abstract.*

818. Halverson, Charles F. & Waldrop, Mary F. (National Inst. of Mental Health, Child Research Branch, Bethesda, Md.) **The relations of mechanically recorded activity level to varieties of preschool play behavior.** *Child Development*, 1973(Sep), Vol. 44(3), 678-681.—Reported relations between data from a simple and reliable activity recorder, O data of vigorous play in outdoor and indoor settings, and teachers' ratings of 58 2½-yr-old children. The recorder consists of 3 small manual wristwatches placed in a small packet so that each watch records movement in 1 of 3 dimensions (horizontal, vertical, or lateral). Any movement across 1 dimension results in a movement of the sweep-hand of the appropriate watch. Data from the recorder were highly related to other objective data for both sexes outdoors, but only males showed generality of play

across situations. Recorder data showed males more active than females and were related to nearly all teachers' ratings for both sexes. (15 ref)—*Journal abstract.*

819. Henry, Frances P. (United States International U.) **Effect of reinforcement conditions on a discrimination learning task for impulsive versus reflective children.** *Child Development*, 1973(Sep), Vol. 44(3), 657-660.—Assigned 90 male 1st graders, identified as either reflective or impulsive on the Matching Familiar Figures Test, to 1 of 6 reward conditions in a discrimination learning task. The conditions were verbal reward, verbal punishment, verbal reward plus punishment, nonverbal reward, nonverbal punishment, nonverbal reward plus punishment. Overall, reflective Ss showed the best performances. For all groups performances were poorest under reward conditions and better under the punishment and reward plus punishment conditions. Neither reinforcement type nor reinforcement combination appeared to be related to the response style of the child.—*Journal abstract.*

820. Ingram, Eben & Fitzgerald, Hiram E. (Michigan State U) **Individual differences in infant orienting and autonomic conditioning.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 359-367.—Attempted, and subsequently demonstrated, conditioned discrimination and discrimination reversal of the skin potential response in 12 84-135 day old infants. Analysis of individual S data indicates individual differences in conditionability, as well as a significant relation between orienting response magnitude and conditionability. In general, high-magnitude orienters discriminated; low-magnitude orienters did not. Behavioral ratings of state, sex of S, and stimulus order were not related to orienting or to conditionability. (22 ref)—*Journal abstract.*

821. Israel, Allen C. & O'Leary, K. Daniel. (State U New York, Albany) **Developing correspondence between children's words and deeds.** *Child Development*, 1973(Sep), Vol 44(3), 575-581.—32 preschool children in a free-play situation experienced 1 of 2 training sequences: saying then doing or doing then saying. The effect of these training sequences on the development of a correspondence between children's verbal and nonverbal behaviors was examined in 2 experiments. Increases in correspondence were a function of the reinforcement contingency and the sequence of behaviors. Reinforcers contingent upon verbal behavior were not sufficient to produce increases in both verbal and nonverbal behaviors (correspondence). Increased correspondence occurred when reinforcers were contingent upon both behaviors and with a say-do sequence. The do-say sequence produced high levels of correspondence only after previous say-do training. Exp II examined the effects of reinforcing the 2 sequences without a portion of the training procedures included in Exp I. Again the say-do sequence produced higher levels of correspondence.—*Journal abstract.*

822. Kearsley, Richard B. (Tremont Street Infant Ctr, Boston, MA) **The newborn's response to auditory stimulation: A demonstration of orienting and defensive behavior.** *Child Development*, 1973(Sep), Vol 44(3), 582-591.—Exposed 48 normal newborns to simple and complex sounds controlled for intensity, frequency, and



rise time. Eye opening followed prolonged rates of onset, and eye closing followed rapidly onsetting signals. Maximum cardiac deceleration occurred to frequencies of 500 and 2,000 cps; maximum cardiac acceleration to frequencies of 1,000 cps. Signals producing maximum deceleration were accompanied by eye opening and reduced head movement; those followed by maximum acceleration produced eye closing and increased head movement. Specific combinations of intensity and rise time when applied to particular frequencies appeared to be optimal stimuli for evoking orienting and defensive behavior. (15 ref)—*Journal abstract*.

823. LaVoie, Joseph C. (U Nebraska, Omaha) **The effects of an aversive stimulus, a rationale, and sex of child on punishment effectiveness and generalization.** *Child Development*, 1973(Sep), Vol 44(3), 505-510.—Investigated punisher effectiveness and generalization of an aversive stimulus, a rationale, and a combination of the 2 in a laboratory analog designed for punishment research, with 80 1st- and 2nd-grade boys and girls. 3 factors assumed to influence punishment—sex of child, an aversive stimulus, and a rationale—were combined in a  $2 \times 2 \times 2$  factorial design, with a female serving as the punitive agent. Significantly greater suppression of deviant behavior and punishment generalization occurred when the punisher consisted of an aversive stimulus. Use of a rationale resulted in discrimination rather than punishment generalization. Punishment was more effective with girls than boys.—*Journal abstract*.

824. Lee, David N. & Aronson, Eric. (U Edinburgh, Scotland) **Visual proprioceptive control of standing in human infants.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 529-532.—Conducted an experiment in which 7 normal 13-16 mo old infants learning to stand were caused to sway and even to fall backward or forward in response to appropriate visual stimulation. Results show that the Ss used visual proprioceptive information about body sway in order to maintain stable posture. Moreover, the visual proprioceptive information was more potent than the nonvisual.—*Journal abstract*.

825. Maratsos, Michael P. (U Minnesota, Inst of Child Development) **Nonegocentric communication abilities in preschool children.** *Child Development*, 1973(Sep), Vol 44(3), 697-700.—Administered a simple referential communication task to 24 3-5 yr olds. Each S communicated either to an E who apparently could not see the referents that S was referring to or to an E who could see the referents. The Ss communicating to an apparently blind E were far more explicit verbally than those communicating to an E who could see.—*Journal abstract*.

826. Parker, Ronald K. & Rugel, Robert P. (Graduate Center, City U. New York) **The conditioning and reversal of reward value.** *Child Development*, 1973(Sep), Vol. 44(3), 666-669.—Investigated the degree to which counterconditioning could alter the positive or negative value acquired by a neutral stimulus in a conditioning situation with 56 8-9 yr olds. Neutral stimuli were paired with either winning \$.02, losing \$.01, or no consequences in a conditioning game. After 3 sessions of the game, the positive and negative consequences were reversed, and 5 additional sessions were conducted. A verbal evaluation measure revealed significant positive and negative

conditioning and counterconditioning effects, while a reward expectancy measure showed significant positive, but not negative, conditioning and counterconditioning effects. The dependent measures used to assess the effects of conditioning had no independent effect on subsequent evaluations of the once neutral stimuli.—*Journal abstract*.

827. Pomerleau-Malcuit, Andrée & Clifton, Rachel K. (U Quebec, National Inst of Scientific Research, Quebec, Canada) **Neonatal heart-rate response to tactile, auditory, and vestibular stimulation in different states.** *Child Development*, 1973(Sep), Vol 44(3), 485-496.—Analyzed newborn cardiac activity in the context of the orienting response. Stimuli in 3 modalities were presented to 46 newborn infants in different states: before and after a feeding, while sleeping and awake. Each S received 3 trials of tactile, vestibular, and auditory stimulation. Statistical analyses were performed on heart rate (HR) during each of the 10 sec of stimulation. In sleeping Ss, the HR response was primarily accelerative to tactile and vestibular stimulation but unreliable to auditory stimulation. For the awake Ss, the feeding variable affected Ss' responsivity to auditory and vestibular stimuli. Before feeding, awake Ss decelerated to both types of stimuli. After feeding, there was no reliable response to any stimulus. A decelerative response was also found to vestibular stimulation in sleeping babies tested before feeding, but only when this type of stimulus was presented first in the sequence. In general, newborns tended to respond with less variability when tested before feeding. (41 ref)—*Journal abstract*.

828. Ratliff, Richard G. & Root, Jeffrey R. (U Colorado) **Two-choice discrimination learning in children as a joint function of incentive level and punishment.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 249-257.—Ran 65 male 4th and 5th graders in a 2-choice discrimination learning task for punishment, high- or low-value reinforcement, or the combination of punishment with high- or low-value reinforcement. A significant main effect of Reinforcement revealed that only Ss in the punishment group showed significant evidence of learning. Results are discussed as possibly being due to the distraction caused by tangible reinforcement, although an alternative explanation was offered on the basis of previous findings that males perform better for punishment than for reward. (18 ref)—*Journal abstract*.

829. Schloon, Marje; Shelhorn, Brigitte & Flehmig, Inge. (U. Hamburg, Psychological Inst., W. Germany) **[Reliability of the Denver development test.]** (Germ) *Zeitschrift für Entwicklungspsychologie und Pädagogische Psychologie*, 1974, Vol. 6(1), 39-50.—Tested the reliability of the German version of the Denver Developmental Screening Test (DDST) in 3 groups of 30 children each aged 6 mo, 18 mo, and 3 yrs. Ss were retested 1 wk later. The test reliabilities calculated from developmental ages were .66 for the 6-mo-old group, .82 for the 18-mo-old group, and .83 for the 3-yr-old group. Possible interpretations for the low value of the test reliability in the 6 mo olds are discussed. The item reliabilities, calculated from the raw values, showed median values between .80-1.0. Results are compared with those obtained in Hamburg.

Germany and in Denver, Colorado. The best test-retest reliabilities were found for 3 yr olds. From the compared items, about  $\frac{1}{2}$  showed high or low agreement in both studies. It is concluded that the German version of the DDST is usable as a screening test from the aspect of its reliability with some corrections in regard to the scoring objectivity.—*English summary.*

830. Siegel, Alexander W.; Kirasic, Kathleen C. & Kilburg, Richard R. (U Pittsburgh) **Recognition memory in reflective and impulsive preschool children.** *Child Development*, 1973(Sep), Vol. 44(3), 651-656.—Tested 16 reflective and 8 impulsive black preschool children (identified by the Kansas Reflection-Impulsivity Scale) in a forced-choice recognition memory task. The possibility that correct responses could be made on the basis of verbal labels, purely visual feature analyses, or both was systematically varied. Reflective Ss made more correct recognition choices than did impulsive Ss under all conditions. The order of condition difficulty indicated that both verbal labeling and visual feature analysis, independent of verbal processes, were responsible for successful recognition performance in these Ss.—*Journal abstract.*

831. Sigman, Marian; Kopp, Claire B.; Parmelee, Arthur H. & Jeffrey, Wendell E. (U California, Los Angeles) **Visual attention and neurological organization in neonates.** *Child Development*, 1973(Sep), Vol. 44(3), 461-466.—Administered a neurological examination (e.g., assessments of reflex patterns, muscle tone, and arousal) and a measure of visual attentiveness to 25 24-48 hr old infants. Scores on the neurological examination were significantly related to the length of the 1st fixation of each stimulus and the total length of fixation of the 1st stimulus. The alterability of the baby's state during the neurological examination was also correlated with visual alertness. It is suggested that Ss who complete testing in newborn attention studies may comprise a highly selected sample of neonates.—*Journal abstract.*

832. Surwillo, Walter W. (U Louisville, Medical School) **Speed of movement in relation to period of the electroencephalogram in normal children.** *Psychophysiology*, 1974(Jul), Vol. 11(4), 491-496.—Investigated movement time (MT) and simple reaction time (RT) in relation to period of the EEG in a group of 17 healthy male 8-17 yr old Ss. MT and RT were measured by means of a modified version of the dart-throwing game in which S thrust his arm and forefinger forward, as quickly as possible, at a target located 28 cm away. Statistically significant negative correlations between RT and age and between MT and age confirmed previous reports that younger children not only take more time to initiate a response than older children but also move more slowly. RT was positively correlated with EEG period, but MT and EEG period were not related. Findings suggest that while MT and RT in children appear to run similar developmental courses, the speeds of initiation and of execution of a response are not determined by the same processes. (27 ref)—*Journal abstract.*

833. Tizard, Jack. (U London, Inst of Education, Thomas Coram Research Unit, England) **The upbringing of other people's children: Implications of research**

and for research. *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol. 15(3), 161-173.—Suggests that the variety of provision for deprived and handicapped children offers rich material for research into factors affecting the functioning of complex organizations and into environmental factors affecting child development. Recent studies have shown significant associations between aspects of the formal organizational structure of institutions, staff child-care practices, and the behavior of the children. (38 ref)

834. Walls, Richard T. (West Virginia U.) **Delay of reinforcement development.** *Child Development*, 1973(Sep), Vol. 44(3), 689-692.—146 preschool, 3rd-, and 6th-grade children classified as socioeconomically disadvantaged or nondisadvantaged were Ss in a voluntary-delay-of-reinforcement paradigm. Following the 1st day's "work" session, Ss were given the option of selecting a toy costing 3 tokens then and paying the remaining 2 tokens when they had earned them or waiting until they had saved up enough to buy the toy. Results indicate a shift from preference for immediate reinforcement in preschool to deferred selection in 6th grade for both socioeconomic groups. Relations between the present 1:1 value ratio and the ratio of  $< 1$  represented by traditional delay-of-gratification investigations are discussed.—*Journal abstract.*

835. Warga, Richard G. (Bucks County Community Coll) **Personal awareness: A psychology of adjustment.** Atlanta, GA: Houghton Mifflin, 1974. xi, 546 p. \$10.95.—Presents a textbook which offers an exploratory course in personality applied psychology, from both preventive and corrective viewpoints. Among the topics included are adjustment and motivation, personality, social interaction, perception and emotions, abnormal behavior and behavior modification, sex, drugs, alienation, and suicide.

836. Werner, Emmy E. (U California, Davis) **From birth to latency: Behavioral differences in a multiracial group of twins.** *Child Development*, 1973(Sep), Vol. 44(3), 438-444.—Reports intrapair differences in a multiracial group of 12 twin pairs, from the cohort of 1955-1957 births on the island of Kauai, Hawaii, on infant behavior ratings and cognitive skills in early and middle childhood. Among discordant twins, both monozygotic and dizygotic, the second-born had experienced more adverse perinatal events than the firstborn. Birth sequence differentiated more among discordant twins than birth weight, favoring the firstborn on maternal ratings of activity in the 1st yr, Cattell Infant Intelligence Scale IQ at age 2, Primary Mental Abilities reasoning factor, visual-motor development, and school achievement at age 10. Intrapair differences in activity level, Sociability, and temper at age 1 persisted and were related to cognitive skills at ages 2 and 10. (21 ref)—*Journal abstract.*

837. Wetherford, Margaret J. & Cohen, Leslie B. (U Illinois, Children's Research Ctr) **Developmental changes in infant visual preferences for novelty and familiarity.** *Child Development*, 1973(Sep), Vol. 44(3), 416-424.—Examined infant preferences for novel and familiar visual stimuli in 2 experiments. In both, infants were repeatedly shown 1 pattern with novel patterns interspersed at 3 intervals in the familiarization series. In



Exp I. 54 infants 6-12 wks of age were examined both longitudinally and cross-sectionally. Exp II was a partial replication of Exp I with 16 6-8 wk olds. Habituation to the familiar pattern occurred at 10-12 wks but not at 6-8 wks. Older Ss also preferred novel patterns, while younger Ss preferred familiar ones. Results from the cross-sectional design are clearer than from the longitudinal design. Findings support J. Hunt's 1963 2-stage model of infant preferences. (19 ref)—*Journal abstract*.

838. Williams, Joyce W. & Smith, Marjorie. (Florida State U) **Middle childhood: Behavior and development.** New York, NY: Macmillan, 1974. xv, 492 p.—Presents a review of recent research on physical, mental, social, and emotional development during ages 5-12 and how these types of growth influence behavior and interpersonal relationships. Topics include the effects of the cultural milieu, the family, school, peer activities, and religion on development, how children think, and the child as a consumer. (19 p ref)

839. Zelniker, Tamar & Oppenheimer, Louis. (Tel-Aviv U, Ramat-Aviv, Israel) **Modification of information processing of impulsive children.** *Child Development*, 1973(Sep), Vol 44(3), 445-450.—Investigated the effect of different training methods on perceptual learning of 60 5-6 yr old impulsive children (identified by the Matching Familiar Figures Test). 2 training methods were used: a matching to sample method (M) and a differentiation method (D). The M training required Ss to select from a set of stimuli those that were exactly the same as a standard figure, whereas the D training required Ss to find those figures that were different from the standard. Training was followed by a transfer test to assess different types of information-processing techniques: (a) distinctive features, (b) prototype, and (c) control. Results of the transfer test show that of the D subgroups, the distinctive-features group was superior to the other 2 groups, which were not significantly different from each other. No significant differences were found among the M subgroups on the transfer test. Data indicate that Ss that had received the D training learned to process, primarily, features distinguishing among the stimuli, whereas Ss that had received the M training did not show a preference for a particular mode of perceptual learning.—*Journal abstract*.

### Cognitive & Physical Development

840. Brucefors, Agneta et al. (U Lund, Sweden) **Trends in development of abilities related to somatic growth.** *Human Development*, 1974, Vol 17(2), 152-159.—Selected and compared, from a longitudinal sample of 202 children studied from birth to 8 yrs of age, a group with more rapid development than normal and one with a slower development. A relationship between the development of abilities and weight and height increases was found for boys aged 4 wks to 2 yrs and between the development of abilities and height increase for girls aged 2-8 yrs.

841. Auzias, Marguerite. (National Inst of Health & Medical Research, Alfred Binet Ctr., Paris, France) **[Plasticity in linear movement of children who write with their left hand.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(1), 1-30.—Reports on how children who write with their left hand adapt themselves

to conventional left-to-right movement and succeed in writing as fast as children who write with their right hand. Test results of 5-11 yr old left-handers show that their spontaneous patterns of activity can be easily reorganized.—*K. J. Hartman*.

842. Ayers, Jerry B.; Rohr, Michael E. & Ayers, Mary N. (Tennessee Technological U) **Perceptual-motor skills, ability to conserve, and school readiness.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 491-494.—Attempted to determine the relationship of perceptual-motor skills and ability to conserve to school readiness. 94 Ss in kindergarten and 1st grade were administered the Purdue Perceptual-Motor Survey, the Metropolitan Readiness Test, and 6 Piaget tasks to measure logical thinking. Scores on the Purdue scale and Piaget tasks were not correlated; however, both sets of scores were moderately correlated with school readiness as measured by the Metropolitan test.—*Journal abstract*.

843. Blaler, Irv; Doll, Lynda & Winsberg, Bertrand G. (New York State Dept of Mental Hygiene, Child Psychiatric Evaluation Research Unit, NY) **A modified Lincoln-Oseretsky Motor Development Scale: Provisional standardization.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 599-614.—Describes modification of the Lincoln-Oseretsky (L-O) Motor Development Scale into a brief instrument which would be easy to administer and score and which would yield a set of norms against which to assess motor development/proficiency in deviant children of elementary school age. An earlier 31-item modification of the L-O, administered to 210 5-11 yr old normal boys, led to the provisional standardization of a modified scale (ML-O) of 26 items, arranged in approximate order of difficulty and dependence. The scale (a) reflected the developmental nature of motor proficiency, (b) demonstrated acceptable reliability and validity, and (c) required a total administration time of under 30 min. This provisional standardization yielded tentative age and percentile norms. Ongoing validation studies indicate that the modified scale discriminates between clinical populations and the normative group and could help to identify neuromotor deviation among children. (41 ref)—*Journal abstract*.

844. Bird, J. Elizabeth & Bennett, Adrienne F. (Macquarie U, North Ryde, NSW, Australia) **A developmental study of recognition of pictures and nouns.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 117-126.—Gave 20 children at each of 4 age levels (4, 6, 8, and 10 yrs) continuous recognition tasks using concrete noun, abstract noun, and pictorial stimuli in a 4 × 3 factorial design. Pictures were recognized significantly better than concrete and abstract nouns at the 4- and 6-yr age levels and significantly better than abstract nouns at the 8- and 10-yr age levels. There were no significant differences between recognition of concrete and abstract nouns at any age level, which opposed the findings from adult studies. Recognition for both concrete and abstract nouns was linear and increased significantly with age, but no age trends for picture recognition were found. (33 ref)—*Journal abstract*.

845. Bloom, Lois; Hood, Lois & Lightbown, Patsy. (Teachers Coll, Columbia U) **Imitation in language development: If, when, and why.** *Cognitive Psychology*, 1974(Jul), Vol 6(3), 380-420.—To explore the function of

imitation for first-language learning, imitative and spontaneous utterances were compared in the naturalistic speech of 6 children during the ages of 18-25 mo as they progressed from single-word utterances (when mean length of utterance was essentially 1.0) to the emergence of grammar (when mean length of utterance approached 2.0). The relative extent of imitation, and lexical and grammatical variation in imitative and spontaneous speech, were determined. There were inter-S differences in the extent of imitation, but each S was consistent in the tendency to imitate or not to imitate across time. For those Ss who imitated, there were both lexical and grammatical differences in imitative and spontaneous speech, and a developmental shift from imitative to spontaneous use of particular words and semantic-syntactic relations between words. Results are discussed as evidence of an active processing of model utterances relative to the contexts in which they occur for information for language learning. (44 ref)—*Journal abstract*.

846. Bogard, Dolores A. (State University Coll New York, Cortland) **Visual perception of static and dynamic two-dimensional objects.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 395-398.—Investigated differences between visual perception of static (nonmoving) and dynamic (moving) 2-dimensional objects at several ages. The ability of 4 age groups (6-7, 11-13, 18-22, and 66-79 yrs) to perceive figure-ground was assessed. A total of 129 Ss were tested. A test of visual perception of figure-ground was selected and adapted to a dynamic condition. Results show a significant difference between performance on the static and dynamic tests of visual perception across all age levels, with fewer errors made on the dynamic test. There was a significant difference in performance between ages. It is concluded that there is a difference between static and dynamic visual perception of figure-ground at the ages studied and that perception of figure-ground tends to improve with age.—*Journal abstract*.

847. Chovan, William L. (Western Carolina U) **Some observations of two culturally different groups of children on memory and coordination tasks.** *Western Carolina University Journal of Education*, 1973(Fal), Vol 5(2), 19-24.—Administered Recall and Motor Coordination scales of the Kahn Intelligence Tests to 30 6-yr-old children, of whom 15 were supported by Aid to Dependent Children (ADC) and 15 had parents at managerial level (FSS). No significant differences on recall and motor coordination were found between ADC and FSS Ss. (17 ref)—*J. Joesting*.

848. Clark, Eve V. (Stanford U) **Non-linguistic strategies and the acquisition of word meanings.** *Cognition*, 1973, Vol 2(2), 161-182.—Proposes that children's apparent comprehension of certain words is at 1st dependent on a combination of their linguistic hypotheses about a word's meaning and certain nonlinguistic strategies. 70 1½-5 yr olds were given instructions requiring comprehension of the locative terms "in," "on," and "under." Results show that Ss went through 3 stages: (a) they consistently used certain nonlinguistic strategies characterized by 2 ordered rules, (b) they applied these rules to only 1 or 2 of the locative instructions, and (c) they exhibited full semantic knowl-

edge of the 3 word meanings. Because of these nonlinguistic strategies, the younger Ss always appeared to understand "in" correctly, sometimes appeared to understand "on," and never understand "under." It is argued, nevertheless, that these nonlinguistic strategies determine the order of acquisition of the 3 locative terms. (French summary) (23 ref)—*Journal abstract*.

849. Cornell, Edward H. (Albert Einstein Coll of Medicine, Yeshiva U) **Infants' discrimination of photographs of faces following redundant presentations.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 98-106.—Used infants' discrimination of photographs of faces, as indicated by fixation toward novel targets, as the criterion to evaluate familiarization conditions designed to facilitate the exercise of selective attention. Groups of 128 19- and 23-wk-old infants were shown either pictures of different faces of the same sex, differing poses of the same face, or repeated exposures of the face that served as a test stimulus. The older infants demonstrated differential attention to novel over familiar stimuli during subsequent recognition tests, and an examination of their responsiveness during familiarization presentations indicated differing trends of looking activity.—*Journal abstract*.

850. Cuvo, Anthony J. (Southern Illinois U, Rehabilitation Inst) **Incentive level influence on overt rehearsal and free recall as a function of age.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 167-181.—Conducted 2 studies to test incentive magnitude effects on free recall. Exp I examined whether 2 incentive levels would differentially influence rehearsal of words paired with the incentive values. 5th and 8th graders and college adults were tested in conditions in which they were instructed to (a) do all rehearsal overtly or (b) engage in a counting task subsequent to item presentation and refrain from overt and covert rehearsal. College Ss rehearsed and recalled significantly more \$.10 than \$.01 words. 8th graders tended to favor \$.10 items in recall and rehearsal, but the differences were of questionable reliability. 5th graders failed to produce reliable incentive level effects. Exp II showed that 5th graders, as well as older Ss, recalled more high-incentive words under standard free-recall instructions in which rehearsal was presumed to be covert. Results support theories emphasizing rehearsal as a mediator of incentive level effects on learning.—*Journal abstract*.

851. Davis, Albert J. & Lange, Garrett. (Vassar Coll.) **Parent-child communication and the development of categorization styles in preschool children.** *Child Development*, 1973(Sep), Vol. 44(3), 624-629.—Examined linguistic communication styles of 56 parents in interaction with their preschool children in storytelling and block-sorting tasks and the relationships between these styles and children's categorization style preferences. Children's categorization style preferences were assessed using I. Sigel's Styles of Categorization Test. Parents conveyed proportionately more relational-contextual messages in both tasks, with descriptive messages increasing and categorical-inferential messages decreasing from the storytelling to the more structured block-sorting task. Correlational analyses pointed to the mother-father unit, rather than either parent considered singly, as a socializing agent for the development of



descriptive categorizing styles in young children.  
—*Journal abstract.*

852. Denney, Douglas R. (U. Kansas) **Reflection and impulsivity as determinants of conceptual strategy.** *Child Development*, 1973(Sep), Vol. 44(3), 614-623.—Instructed 64 7-8 yr old reflective and impulsive children (identified by the Matching Familiar Figures Test) to hasten or delay their responses on a test of hypothesis-seeking and constraint-seeking conceptual strategies (20 questions procedure). Latency of response data on pre-, training, and immediate posttests showed that the attempts to hasten or delay responses were successful in changing response latencies. Furthermore, Ss who were instructed to hasten their responses increased their use of hypothesis-seeking strategies; Ss who were instructed to delay their responses did not change their strategy. Results are interpreted in terms of S. White's temporal stacking model. Data indicate that cognitive tempo may be one factor, though by no means an exclusive one, underlying conceptual strategy. (21 ref)—*Journal abstract.*

853. Drummond, Thomas B.; Williams, Tannis M. & Aiken, Leona S. (Catholic U. of America) **Children's use of prototypes in pattern classification.** *Child Development*, 1973(Sep), Vol. 44(3), 686-688.—In a schematic concept formation task, 30 2nd and 5th graders were required to sort 60 computer-generated, 8-sided polygons into their 2 classes. In sorting each pattern the child could ask to see either of the 2 class prototypes, both, or neither. Use of the 4 possible prototype information strategies did not vary with age, but 5th graders were significantly more accurate than 2nd graders. Results indicate that age differences in schematic concept formation are due more to the efficiency of information use than to differences in strategy or the selection of information to be used.—*Journal abstract.*

854. Elkind, David. (U Rochester) **Infant intelligence.** *Australian Journal of Mental Retardation*, 1974(Mar), Vol 3(1), 6-8.—Discusses the implications of M. Lewis and H. McGurk's findings (see PA, Vol 50:725) concerning the lack of reliability and validity of infant intelligence tests (e.g., the Bayley Scales of Infant Development). It is suggested that the findings demonstrate the inutility of programs which assess the effects of "infant stimulation," since what is being "stimulated" are the same sensorimotor skills which appear in infant intelligence scales. Discontinuities between infant and later intelligence scores raise questions as to the genetic origin of intelligence and its stability over time. It is concluded that intelligence should be considered in dynamic biological terms as an evolving organ system, rather than in static psychometric terms.—A. Olson.

855. Fagan, Thomas J. & Schulman, Allan H. (Virginia Polytechnic Inst. & State U.) **The effects of conceptual training on reversal shift performance of young children.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 39-41.—Studied the relationship between conceptual training (analytic vs nonanalytic) and performance on a reversal shift task in 45 white, middle-class children from each of 4-, 6-, and 8-yr-old age groups. Results reveal that (a) with increasing age, reversal shift performance improved; (b) only 6-yr-old Ss showed a stable conceptual style; and (c) while both types of

training enhanced reversal performance, analytic training resulted in greater facilitation of reversal shift learning. It is concluded that conceptual training channels an S's attention upon the relevant dimensions of the shift task.—*Journal abstract.*

856. Ford, Mary A.; Stern, Daniel N. & Dillon, Donald J. (Coll of Mt St Vincent) **Performance of children ages 3 to 5 on the Draw-a-Person Task: Sex differences.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1188.—Data from 29 female and 29 male middle-class 3-5 yr olds show that girls performed at a significantly more advanced level in respect to detailing and body concept development on the Draw-A-Person Test.

857. Furth, Hans G. & Milgram, Norman A. (Catholic U of America, Ctr for Research in Thinking & Language) **Labeling and grouping effects in the recall of pictures by children.** *Child Development*, 1973(Sep), Vol 44(3), 511-518.—Studied free recall of an array of pictures followed by sequential location recall in 256 4-12 yr olds under 4 main presentation conditions—arrays of pictures differing in salience of categories (contiguous, systematic, random grouping of category instances) vs noncategorical (control) array—and 2 task conditions, overt labeling vs pointing. Successive vs simultaneous presentation was also studied. Grouping effects on memory were systematically related to salience of grouping and to age. 2 labeling effects on memory performance were observed: (a) a direct primary effect at all ages that facilitated attention to the static configuration of all memory items and (b) an indirect developmental effect of organizing that aided the discovery of categories under specific grouping and age conditions. The direct effect was observed mainly on location recall, while the development effect was observed on free recall trials.—*Journal abstract.*

858. Goldstein, Steven G. & Braun, Lisa S. (U Vermont) **Reversal of expected transfer as a function of increased age.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1139-1145.—Investigated the relationship between aging and performance on a simple and a complex bilateral motor task. 209 Ss were divided into 6 age groups (20-29, 30-39, 40-49, 50-59, 60-69, and 70-79 yrs) and given the Finger Oscillation and Tactual Performance tests from the Halstead Impairment Index. Results show a systematic and accelerating increase in the proportion of reversals on tactual performance as a partial function of age; however, this was not the case for the Finger Oscillation test where the proportion of reversals for the older Ss (60-69 yrs) were no greater than the proportion for the youngest Ss. It is suggested that the transfer mechanism deteriorates with increasing age at a faster rate than the simple motor functions represented by the Finger Oscillation test. (18 ref)—L. Gorsey.

859. Hale, Gordon A. & Taweel, Suzanne S. (Educational Testing Service, Princeton, NJ) **Age differences in children's performance on measures of component selection and incidental learning.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 107-116.—Administered 1 of 3 learning tasks—a component selection problem, in which the 2 components of the stimuli were redundant and could both serve as functional cues, and 2 incidental learning tasks, in which 1

stimulus component was task-relevant and the other was incidental—to 149 5- and 147 8-yr-olds. A posttest, measuring the children's recall for information about each component separately, was assumed to reflect the degree of attention directed to each component during learning. Attention to the nondominant component increased with age when this feature was redundant with the dominant component but not when it was incidental. Results suggest a developmental improvement in the flexibility of attention deployment; as children grow older they tend increasingly to differentiate between situations in which it is useful to attend to several stimulus features and situations in which it is more advantageous to attend selectively.—*Journal abstract.*

860. Hedrick, Dona L. & Kunze, LuVern H. (U Washington, Child Development & Mental Retardation Ctr) **Diotic listening in young children.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 591-598.—Gave a diotic competing message task to 120 children, preschool through 3rd grade. The competing auditory messages were prerecorded and presented free field via loudspeaker. The messages consisted of a signal message and a distraction message, varied systematically in relative intensity and content. Results indicate that errors on the competing message task varied inversely with age, increased with changes toward more unfavorable signal to distraction levels for the younger Ss, and were directly influenced by the content of the distraction message for all ages. (15 ref)—*Journal abstract.*

861. Hogan, Robert. (Johns Hopkins U) **Dialectical aspects of moral development.** *Human Development*, 1974, Vol 17(2), 107-117.—Defines the concept of the dialectic and places it within the context of a well-defined methodology—organicism—which contrasts markedly with the logical empiricism of much contemporary psychology. The relevance of a dialectical perspective for developmental psychology is demonstrated in 2 ways. First, 3 standard models of moral development (namely those proposed by Freud, G. H. Mead, and Piaget) are summarized, using the definition of the dialectic developed here. Second, an alternative viewpoint on moralization is outlined which attempts systematically to incorporate a dialectical perspective. An irony implicit in the study of moral development is noted: that a viable society may need its immoralists.—*Journal abstract.*

862. Hollos, Marida & Cowan, Philip A. (U. Oslo, Norway) **Social isolation and cognitive development: Logical operations and role-taking abilities in three Norwegian social settings.** *Child Development*, 1973(Sep), Vol. 44(3), 630-641.—Administered 9 measures of conservation, classification, and role taking to 48 7-9 yr olds in each of 3 social settings in rural Norway—a farm community, a village, and a town. The primary difference among the 3 samples was the amount of verbal and social interaction which the children engaged in with parents and peers. Factor analysis yielded 2 main factors—a logical operations factor involving all classification and conservation tests and a role-taking factor involving all multiple perspective and communications tests. Age effects were prominent in logical operations, while setting effects predominated in role taking. Farm children, the most socially isolated,

received relatively low scores on role-taking tasks, but performed as well or better than village and town children on logical operations. Contrary to J. S. Bruner's hypothesis, language stimulation and schooling do not seem to play a major role in the development of logical operations. (25 ref)—*Journal abstract.*

863. Hutson, Barbara A. & Powers, James. (State U New York, Albany) **Reversing irreversible sentences: Semantic and syntactic factors.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 99-110.—Presented active and passive sentences with probable and improbable semantic content to 100 1st graders and 100 kindergartners. An "irreversible" sentence was considered probable and its reverse was considered improbable. In a design employing syntax, probability, grade, and sex as factors, probability and syntax were found to be significant both as main effects and in their interaction. Probability had little effect on the comprehension of active sentences, but strongly affected comprehension of passive sentences. 1st graders responded correctly more often than kindergartners; the difference was greatest on improbable sentences, with improbable passive sentences the most difficult. Sex differences were not found. The greater difficulty in comprehending less familiar sentences when syntactic form is not supported by semantic content suggests that the semantic component of grammar may play an important role in the child's acquisition of syntactic comprehension.—*Journal abstract.*

864. Huttenlocher, Janelle. (Teachers Coll, Columbia U) **The origins of language comprehension.** In R. L. Solso (Ed), *Theories in cognitive psychology: The Loyola Symposium*. Potomac, MD: Lawrence Erlbaum, 1974, ix, 386 p. \$14.95.—Presents pilot data from a longitudinal investigation of receptive language development (i.e., the first stages in systematic responses to word sounds) in 3 10-18 mo old children. Data suggest that receptive language precedes productive language, that there is not a simple relation between the child's response to words and his production of words, and that there is a progression in the type of response the child makes to words in the period before he speaks. Overall aspects of the children's behavior (e.g., attention), methodological issues, and sample protocols are described. (30 ref)

865. Jordan, Brian T. & Jordan, Susan G. (Highlands Mental Health Ctr, Sebring, FL) **Jordan Left-Right Reversal Test: A study of visual reversals in children.** *Child Psychiatry & Human Development*, 1974(Spr), Vol 4(3), 178-187.—Developed the Jordan Left-Right Reversal Test to standardize a measure for symbol reversals (letters and numbers) in normal 6-10 yr old children. A random sample of 2,500 Ss was tested in schools in 6 different states. Results established age-sex norms for symbol reversals. Error scores were inversely related to age and were generally lower for girls. Younger children (6-8.5) made significantly more number reversals than letter reversals. Boys in this age group made the highest percentage of number errors. Administration of the test to a sample of Ss with minimal brain dysfunction indicated that the test has adequate discrimination ability and suggests that visual reversals are a symptom of this childhood disorder. (15 ref)—*Journal abstract.*

866. Kohen-Raz, Reuven. (Hebrew U, Jerusalem, Israel) **Physiological maturation and mental growth at**



**pre-adolescence and puberty.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol 15(3), 199-213.—Conducted a 2-yr follow-up study with 350 boys and 350 girls of average mental level in grades 5-8 from higher and lower middle-class environments in Israel. In the higher-class group, physiological maturation was related to cognitive variables predominantly at Grades 5-7 in girls and at grades 7-8 in boys (i.e., during the respective physical growth spurts). In the lower-class group the relationship between physiological and intellectual growth was inconsistent. Performance on nonverbal tests correlated higher with physiological growth in boys. Season of birth was an important intervening variable. Results, which are in accordance with findings of a pilot study, demonstrate environmental and possibly genetic differences in relationships between cognitive and physiological maturation, but do not unambiguously confirm the occurrence of a pubertal mental growth spurt. (25 ref)—*Journal summary*.

867. Kurtines, William & Greif, Esther B. (Florida International U) **The development of moral thought: Review and evaluation of Kohlberg's approach.** *Psychological Bulletin*, 1974(Aug), Vol 81(8), 453-470.—Evaluates the evidence supporting L. Kohlberg's theory on the development of moral thought. A systematic review of the literature suggests that there are several conceptual and methodological problems with the approach. The problems include the derivation, administration, and scoring of the model's primary measurement device (Moral Judgment Scale); the lack of evidence for both the reliability and validity of that device; and the absence of direct evidence for the basic assumptions of the theory. It is concluded that the empirical utility of the model has yet to be demonstrated. (40 ref)—*Journal abstract*.

868. Lee, Laura L. (Northwestern U) **Developmental sentence analysis: A grammatical assessment procedure for speech and language clinicians.** Evanston, IL: Northwestern University Press, 1974. xxi, 277 p. \$13.50.—Presents a clinical manual for assessing the grammatical structure of children's spontaneous speech; guidelines for planning effective interventional training in clinical settings are also presented. Also discussed are developmental syntax and morphology, findings from a normative study of 2-6 yr old children, and comparisons of the developmental sentence analysis procedure with other studies of language acquisition. (4% p ref)

869. Lehalle, Henri. (U Rouen, Teaching Research Units, France) **[Genetic constancy of the bond between stability and transitivity of choice.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 101-108.—Presented black-and-white photographs to 58 children in the age groups 5-6 yrs, 8-10 yrs, and 9-10 yrs who were asked their preferences in paired comparisons. Several presentations were made under the same conditions. As previously found, with increased age, intransitivity decreased and stabilization of choice occurred. For all ages, transitive choices corresponded to stable choices, and intransitive choices corresponded to a lack of choice stability. 2 possible interpretations require further testing: (a) With age, the choice situation is more often interpreted as sensation for which the coordination of criteria of choice becomes necessary. (b) When objects

are situated marginally, they become less discriminable.—G. Rubin-Rabson.

870. Longobardi, Ellen T. & Wolff, Peter. (U Wisconsin, Madison) **A comparison of motoric and verbal responses on a Piagetian rate-time task.** *Child Development*, 1973(Sep), Vol 44(3), 433-437.—Attempted to extend Piaget's thoughts on sensory-motor development to the preoperational child's performance of a Piagetian rate-time task. Specifically, the ability to imitate motorically E's performance of the task was compared with the ability to give conceptually correct verbal replies to questions about the task. Ss were 32 nursery school and 32 2nd-grade children. The 2nd-grade Ss were able to imitate a given rate-time relationship whereas their verbal (symbolic) conceptualization remained as inadequate as that of the nursery school Ss, who were unable to imitate these relationships. The differential development of rate-time relationships in the 2 response modes suggests the need for an understanding of the connection between actions which may exist in the absence of any indication of the symbolic understanding of logical or infralogical relations in the child.—*Journal abstract*.

871. Looft, William R. (Pennsylvania State U, Coll of Human Development) **Animistic thought in children: Understanding of "living" across its associated attributes.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 235-240.—Identified 39 2nd graders from an initial pool of 59 Ss as "nonanimistic" according to their classification of 16 objects into "living" and "nonliving" categories. Further analyses of the Ss' generalization responses for the same objects across 3 associated biological criteria—need-for-nutritment, respiration, reproduction—were carried out. It was found that these supposedly "nonanimistic" Ss did not fully grasp the implications of the life concept. A conceptual *horizontal décalage* is suggested, in that the need-for-nutritment concept was better generalized than the respiration concept, and the respiration concept was more accurately generalized than that of reproduction. These attributes were ascribed more accurately to nonliving than to living things.—*Journal abstract*.

872. Lurçat, L. (U René Descartes, Teaching & Research Unit of Educational Science, Paris, France) **[Perception and reproduction of morphological discontinuities.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(1), 31-42.—Reports on difficulties of 3-6 yr old children in reproducing 2 right-angled triangles when one is rotated 180°. The visual model permits better success in following orthographic trajectories. The exercises require resolution of contradictions between hand movements and forms.—K. J. Hartman.

873. Macready, Corise & Macready, George B. **Conservation of weight in self, others, and objects.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 372-374.—Found that under analogous transformations 2nd and 3rd graders ( $N = 64$ ) tended to conserve both their own and another person's weight prior to conserving the weight of nonhuman objects (a rubber doll and a piece of clay). Findings suggest that children acquire conservation of weight in a sequential manner, with the type of object used in a conservation

task affecting the time when conservation is first observed.—*Journal abstract.*

874. Maliphant, R.; Supramaniam, S. & Saraga, E. (U Coll, London, England) **Acquiring skill in reading: A review of experimental research.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol 15(3), 175-185.—Examines experimental research concerned with the acquisition of skill in reading, with emphasis on the complex role of perceptual and cognitive processes. It is suggested that experimental studies directed towards an analysis of the task would have 2 major advantages. They would provide both a better understanding of the nature of the process and a more adequate theoretical basis for developing effective remedial measures. (72 ref)—*Journal summary.*

875. McGraw, Kenneth O. & McCullers, John C. (U Oklahoma) **The distracting effect of material reward: An alternative explanation for the superior performance of reward groups in probability learning.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 149-158.—Determined whether the distraction effect associated with material rewards in discrimination learning can account for the superior performance of reward groups in probability learning. The performance of 144 school children (preschool, 2nd, and 5th grades) on a 2-choice successive discrimination task was compared under 3 reinforcement conditions (material reward, marker, and knowledge of results). The 2 events in the task had different frequencies of occurrence, as in probability learning, yet they appeared in a constant order to make 100% payoff possible. Ss in the reward and marker groups learned the task more slowly, and the nonlearners among them used stereotyped alternation patterns to a greater degree than Ss in the knowledge-of-results condition. Findings suggest that a distracting effect of material reward is present in probability learning and may explain the superior performance of reward groups typically found in probability learning studies.—*Journal abstract.*

876. Melnick, Gerald L. (Yeshiva U, Curriculum Research & Development Ctr in Mental Retardation) **A mechanism for transition of concrete to abstract cognitive processes.** *Child Development*, 1973(Sep), Vol 44(3), 599-605.—Proposes an extension of discrimination-learning theory based on the inhibition of stimulus intensity as a mechanism of cognitive development. According to this discrimination-inhibition theory, children experience concrete cues such as form, brightness, etc., with an intensity which captures and holds the orienting response and thereby prevents children from focusing on more abstract stimuli (e.g., cues for number of elements and identity over time). Ss were 48 normal and 37 educable mentally retarded kindergartners and 1st graders. The amount of stimulus distortion in Piaget's conservation-of-number paradigm was varied. Results indicate that the predominant category of transitional children (both normal and retarded) was composed of children who conserved at a low level of stimulus intensity but failed to conserve at a higher level of stimulus intensity ( $p < .01$ ). Data support the discrimination-inhibition theory.—*Journal abstract.*

877. Miller, Patricia H.; Grabowski, Teddy L. & Heldmeyer, Karen H. (U. Michigan) **The role of stimulus**

**dimensions in the conservation of substance.** *Child Development*, 1973(Sep), Vol. 44(3), 646-650.—Examined children's use of length and width dimensions in a conservation of substance task. Data from 84 kindergartners show that nonconservers were selective in their use of dimensions: Ss tended to use length to define amount, while ignoring width, regardless of the extent of the transformations, the order in which they saw the transformations, and whether the transformations were begun again on each trial or continued from trial to trial. Transitional conservers were less likely than nonconservers to always base their nonconservation answers on length. Results contradict Piaget's 4-step equilibrium model of the development of compensation and conservation.—*Journal abstract.*

878. Montgomery, Gary T. & Landers, William F. (Auburn U) **Transmission of risk-taking through modeling at two age levels.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1187-1196.—33 males and 33 females in each of Grades 1 and 5 observed a videotaped model perform on a chance-type risk task and subsequently performed on the task themselves; measures of sex-role development were also taken. While Ss imitated the behavior of the model and the sexes differed substantially on the measures of sex-role, there was no indication of developmental changes in either the performance or imitation of risk-taking. These results support predictions from A. Bandura's social learning theory but did not show risk-taking to be positively associated with sex-role development for Ss of this age, as P. Slovic's 1966 hypothesis might suggest. (20 ref)—*Journal abstract.*

879. Nelson, Keith E. & Earl, Nancy. (Stanford U.) **Information search by preschool children: Induced use of categories and category hierarchies.** *Child Development*, 1973(Sep), Vol. 44(3), 682-685.—Data from 40 4-5 yr olds support the findings of previous studies that 4-6 yr olds in information-seeking games (e.g., 20 Questions) seldom sift alternatives through the use of questions referring to categories. Following pretest trials in a picture-item task, a "category induction" manipulation was used in which items were spatially arranged so that standard categories would be noticeable; Ss were asked to mention any similarities between items during the pretest and learning trials. This manipulation induced children's use of category questions. It is argued that children spontaneously fail to employ task-relevant conceptual abilities because they do not consider that these conceptual abilities will be useful in the solution of the problem.—*Journal abstract.*

880. Nelson, Keith E.; Carskaddon, Gaye & Bonvillian, John D. (Stanford U) **Syntax acquisition: Impact of experimental variation in adult verbal interaction with the child.** *Child Development*, 1973(Sep), Vol 44(3), 497-504.—Reports that 22 sessions of verbal interaction significantly facilitated syntax acquisition by 27 32-40 mo olds. In response to sentences of the child, Es replied with recast sentences that maintained the same basic meaning but provided new syntactic information. Furthermore, a selective bias in these replies, toward use of new predicate information, was matched by selectively stronger facilitation in terms of verb measures.—*Journal abstract.*



881. Nodine, Calvin F. & Simmons, Francine G. (Temple U) **Processing distinctive features in the differentiation of letterlike symbols.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 21-28.—Compared eye movements of a total of 25 kindergarten and 3rd-grade Ss during the differentiation of matched and unmatched pairs of letterlike symbols. The pairs differed on 1 of 4 dichotomous feature dimensions: form, opening, line, and origin. Despite the fact that older Ss required half as many fixations, frames, and cross-comparisons per pair to arrive at the *same-different* judgment than younger Ss, they fixated proportionally more distinctive features (.41) than younger Ss (.36). The greater selectivity and economy in the extraction and processing of information by older Ss is interpreted to be the result of increased cognitive programming of eye movements. Older Ss, because of their familiarity with graphic features, were able to call upon memory for identification and interpretation of visual inputs. Younger Ss relied on a purely perceptual strategy to extract and process graphic information.—*Journal abstract*.

882. Odom, Richard D. & Corbin, David W. (Vanderbilt U) **Perceptual salience and children's multidimensional problem solving.** *Child Development*, 1973(Sep), Vol 44(3), 425-432.—Studied uni- and multi-dimensional processing in 72 6- and 9-yr-old children using recall tasks in which an array of stimuli was reconstructed to match a model array. Hierarchies of perceptual salience were assessed prior to Ss' participation in tasks in which the salience of the relevant dimensions was varied. Results indicate that both age groups were able to solve multidimensional problems but that solution rate was retarded by the unidimensional processing of highly salient dimensions.—*Journal abstract*.

883. Pačesová, Jaroslava. **The development of vocabulary in the child.** Brno, Czechoslovakia: Universita J. E. Purkyně, 1968. 258 p.—Traces the language development of a Czech-speaking boy, recorded from the first utterances of speech until the time when the phonetic realization of different phonemes was stabilized. Each phoneme with its variants is described and charted as to frequency and place of occurrence. (4 p ref)

884. Pasewark, Richard A.; Scherr, Stephen S. & Sawyer, Robert N. (U Wyoming) **Correlations of scores on the Vane Kindergarten, Wechsler Preschool and Primary Scale of Intelligence and Metropolitan Reading Tests.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 518.—Administered to 30 kindergartners the Vane Kindergarten, the Wechsler Preschool and Primary Scale of Intelligence (WPPSI), and the Metropolitan Reading Readiness Tests. Correlations between scores on the 2 intelligence tests and the Metropolitan test were fairly comparable. Total Metropolitan score correlated .56 with Total Vane IQ and .58 with WPPSI Full Scale IQ.—*Author abstract*.

885. Posnansky, Carla J. (U Colorado) **An investigation of serial learning and retention processes in children.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 127-148.—Conducted 3 studies to investigate both serial learning (SL) and retention processes in 252 1st-6th graders. SL processes were

evaluated for both pictorial and verbal materials by use of a probing methodology, and retention processes were studied as a function of the amount of intratask interference during original learning. All 3 SL stimuli considered (prior item, serial position, and prior-item cluster) were found to be functional, although the prior-item stimulus was most frequently used. Additionally, SL rate improved with increasing age. The introduction of interference into SL through acoustic, associative, or semantic similarity facilitated retention in control as well as proactive and retroactive inhibition conditions. Pictorial serial list items improved SL performance only for 2nd, 3rd, and 4th graders, while 5th graders performed better with verbal materials and 6th-grade performance was comparable in both presentation modes. (25 ref)—*Journal abstract*.

886. Pufall, Peter B. (Smith Coll., Clark Science Center) **Induction of linear-order concepts: A comparison of three training techniques.** *Child Development*, 1973(Sep), Vol. 44(3), 642-645.—Trained 45 kindergartners who had failed to attain criterion on 3 tests of linear order under 1 of 3 conditions. Reciprocity training gave the S practice in constructing orders identical with (ABC) or the reciprocal of (CBA) a model (ABC). Reversibility training included reciprocity training and experience predicting and observing the outcome of a 135° rotation and its reverse (-135°). Discrimination training required the S to identify pairs of orders as identical, reciprocals, or different (e.g., ABC to ACB). Under all 3 conditions Ss demonstrated learning during training and significant specific transfer effects, while only reversibility training led to generalized transfer to all 3 tasks during posttesting.—*Journal abstract*.

887. Ramirez, Manuel & Price-Williams, Douglass. (U California, Riverside) **Cognitive styles in children: Two Mexican communities.** *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 93-101.—Administered the rod-and-frame test to 136 Mexican school children of both sexes, aged 9-11 and 13-15 yrs, who were from a traditionally and conservatively oriented community or from a less traditional community located near the US border. Children's mothers were interviewed and tested with a socialization questionnaire. Results indicate that children from the traditionally oriented community were more field dependent in their cognitive styles. Differences between mothers in the 2 communities on the socialization questionnaire were not significant. The need to modify the field-dependent socialization cluster is discussed. (Spanish summary)—*S. Slak*.

888. Riley, Larry & Flite, Gary. (Northwest Missouri State U.) **Syntagmatic versus paradigmatic paired-associate acquisition.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 375-376.—Tested the hypothesis that the syntagmatic-paradigmatic shift in children's verbal learning occurs at increasing age levels as the complexity of the acquisition task is increased. A total of 20 2nd and 4th graders acquired lists of syntagmatic or paradigmatic paired associates to a criterion of 20 successive correct responses, but not necessarily on the same trial. Results show a significant symmetrical Grade Level  $\times$  List Type interaction. The syntagmatic Grade-2 and paradigmatic Grade-4 lists were more easily acquired than were the paradigmatic Grade-2 and

syntagmatic Grade-4 lists. It is concluded that the shift appears in paired-associate acquisition after it appears in associative recognition acquisition and before it appears in sentence creation tasks.—*Journal abstract.*

889. Rosenthal, Ted L. & Zimmerman, Barry J. (U. Arizona) **Organization, observation, and guided practice in concept attainment and generalization.** *Child Development*, 1973(Sep), Vol. 44(3), 606-613.—Studied the degree of organization in presenting stimuli, and training through modeling vs guided practice, on a dial-reading concept using 144 3rd and 5th graders. Full stimulus organization created substantially stronger acquisition but no better transfer; all organization levels performed comparably in generalization, indicating that, under certain conditions, maximally organized intratask formats may not produce optimal intertask transfer. Vicarious training produced comparable learning among both grades and accounted for over twice as much dependent-measure variance as did direct guided practice, which interacted with grade level. Sex of child did not influence the results. (22 ref)—*Journal abstract.*

890. Ruble, Diane N. & Nakamura, Charles Y. (U. California, Los Angeles) **Outerdirectedness as a problem-solving approach in relation to developmental level and selected task variables.** *Child Development*, 1973(Sep), Vol. 44(3), 519-528.—Studied the relation between 4 aspects of outer-directedness (developmental trends, types of reinforcement, task difficulty, and pride) and the performance of 128 kindergartners and 1st, 2nd and 3rd graders on color identification and a block design task. Outer-directedness was assessed by S's glancing behavior during the 2 tasks. 2 types of reinforcement (extrinsic or intrinsic) were used, and Ss were told either that the task was very easy or very difficult. Results show that outer-directedness decreased with age, increased when the task was described as difficult, and was associated with pride ratings. The effectiveness of intrinsic reinforcement increased with age. (22 ref)—*L. Gorsey.*

891. Schaeffer, Benson; Eggleston, Valeria H. & Scott, Judy L. (U. Oregon) **Number development in young children.** *Cognitive Psychology*, 1974(Jul), Vol. 6(3), 357-379.—Presents new data on children's acquisition of counting skills, based on tests with 65 Ss aged 2 yrs to 5 yrs 11 mo. 3 aspects of counting were studied: the formation of the cardinality rule that the last number named during counting denotes the number of objects in an array, the mastery of the counting procedure or the coordination of ordered number names and objects counted, and the growth of the knowledge that  $x + 1$  is greater than  $x$ . A model is outlined which posits the hierarchic integration of 6 number skills to account for the growth of the knowledge that  $x + 1$  is greater than  $x$  and the development of number conservation. The 6 skills are the cardinality rule, the counting procedure, acquisition of more  $x$ 's, judgments of relative numerosity, pattern recognition of small numbers, and one-to-one correspondences. (20 ref)—*Journal abstract.*

892. Schou, Peter. (Copenhagen U, Denmark) **[Associations and linguistic development.]** (Danish) *Nordisk Psykologi*, 1973, Vol. 25(2), 134-143.—Discusses the correlation between associations and linguistic

development from the viewpoint of behavioral and generative linguistic models. (English summary)

893. Sheldon, Amy. (U. Minnesota) **The role of parallel function in the acquisition of relative clauses in English.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Jun), Vol. 13(3), 272-281.—Tested 33 44-65 mo old nursery school children for their comprehension of 4 types of sentences with relative clauses, to determine the role of the following factors in comprehension: (a) position of the embedded clause, (b) word order in the embedded clause, and (c) grammatical functions of the identical noun phrases. Results indicate that if the identical noun phrases had the same function in their respective clauses the sentence was significantly easier to understand. The nonsignificant effects of the position of the embedded clause and of the word order in the relative clause disconfirm a putative universal of language acquisition, which has recently been proposed by D. I. Slobin (1971). The parallel function hypothesis is proposed to account for the present findings, and the implications that it has for the grammar of adult English are considered. (23 ref)—*Journal abstract.*

894. Simon, A. & Ward, L. O. (University Coll Swansea, Wales) **Age, ability and positioning variables influencing pupils' judgments of the size of the Müller-Lyer illusion.** *Perceptual & Motor Skills*, 1974(Jun), Vol. 38(3, Pt 2), 1339-1343.—Tested 80 11-14 yr olds on the Müller-Lyer illusion. At each age, 10 Ss were classified as remedial and 10 as normal with respect to reading ability on the Schonell Silent Reading Test (R4). The illusion was presented with the starting position either in or out and to the right or left of S. No differences in susceptibility to the illusion attributable to age or reading ability were found, but the direction of the starting point significantly affected performance.—*Journal abstract.*

895. Simpson, Elizabeth L. (U. Southern California) **Moral development research: A case study of scientific cultural bias.** *Human Development*, 1974, Vol. 17(2), 81-106.—Analyzes evidence supporting the hierarchy of moral reasoning (from the lowest stage of blind acceptance of powerful authority to the application of abstract principles of justice and equality) and the claims put forth for the cross-cultural universality of the cognitive-developmental theory. Findings suggest that the definitions of stages and the assumptions underlying them, including the view that the scheme is universally applicable, are ethnocentric and culturally-biased. (55 ref)

896. Stenild, Mariane. (U. Aarhus, Psychological Inst, Denmark) **[The importance of language in the cognitive development of children.]** (Danish) *Nordisk Psykologi*, 1973, Vol. 25(2), 93-104.—Discusses different views of the role of language in the cognitive development of children. J. Piaget held that language is of no importance in cognitive development. Russian scientists have held that communication emphasizes the orienting, selecting, and guiding functions of language. An anthropological-linguistic tradition accentuates the importance of the categorical character of word symbols and syntax. The various theories have not been unambiguously corroborated in experiments. The important factors in linguistic influence, the significant development stages, and the



activities which language may influence must be specified. (English summary) (24 ref)—*P. Mylov.*

897. Tanaka, Toshitaka; Iwasaki, Junko & Miki, Chise. (Osaka Coll of Social Work, Japan) [Development of the cognition of letters: I.] (Japn) *Japanese Journal of Psychology*, 1974(Apr), Vol 45(1), 37-45.—Investigated which of 2 types of Japanese written symbols (Hiragana or Kanji) are DC to recognize, whether there are sex differences in recognition performance, and whether horizontal or vertical arrangements of letters are easier to recognize. 5-14 yr old Ss were administered a letter-cancelling task for each type of written characters. Results show that (a) Hiragana was easier to recognize than Kanji for 5-7 yr old Ss, (b) Kanji was easier to recognize than Hiragana for Ss over 8 yrs of age, (c) females had better recognition scores than males, and (d) horizontal arrangements were easier to recognize than vertical ones.—*English abstract.*

898. Toner, Ignatius J. (U North Carolina, Charlotte) Maintenance of delay behavior in grade school children. *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1247-1250.—Gave 48 8-11 yr olds a delay-of-reward task in which possession of accumulating candy rewards was made contingent upon the stopping of further accumulation. Ss exposed to the candy during the waiting period did not have different delay times from those in the reward-absent condition. However, while delay in the reward-present condition did not increase with age, delay in the reward-absent condition was positively related to age. The mechanisms of delaying ability which continued to develop during the school years involved consideration of goal objects which were physically absent. A variation in interreward interval did not affect delay times.—*Journal abstract.*

899. Van Duyne, H. John. (Northern Illinois U, Cognitive Studies Lab) Age and intelligence factors as predictors of the development of verbal control of nonverbal behavior. *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 321-331.—Investigated whether verbal IQ, performance IQ, or chronological age is a better predictor of verbal control of nonverbal behavior. The Wechsler Preschool and Primary Scale of Intelligence and a verbal control task were administered to 20 4-yr-old and 20 5-yr-old children. Results of a stepwise regression analysis indicate performance IQ as the best predictor of verbal control of nonverbal behavior, followed by age, and then verbal IQ. It is theorized that performance IQ and verbal control of behavior require integration of the auditory decoding system and visual-motor encoding system, while verbal IQ does not require that integration. The finding that age is a better predictor than verbal IQ was a product of the statistical procedure employed with 1 notable exception: the female population.—*Journal abstract.*

900. Vietze, Peter; Foster, Martha & Friedman, Steven. (George Peabody Coll for Teachers) Response differentiation in infants: A sex difference in learning. *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 479-484.—Conducted an experiment with 8 male and 8 female infants 10 wks old. A visual stimulus was made contingent upon free-operant directional head turns. Male infants significantly increased their rate of head turns to the rewarded side while rate of turns in the nonrewarded direction did

not change from baseline levels. Female infants did not demonstrate conditioning. The finding of a significant sex difference in response differentiation is discussed in terms of previous research which suggests that sex differences in conditionability may be a function of mode of reinforcement.—*Journal abstract.*

901. Williams, David V. (Ithaca Coll) Children's verbal learning and comprehension in aural and visual modes. *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 503-509.—Compared paired-associates, sentences, and prose passages in auditory and visual presentation to 96 4th-6th graders. Immediate and delayed measures of memory/comprehension were employed. The materials were chosen to be representative of verbal activities in educational settings and tasks separately employed in previous studies. The auditory mode was significantly superior in the prose-delayed condition. A 2nd study with 70 3rd graders assessed the effects of "availability" of stimulus materials across modes, pointing to the need for a clearer understanding of variables associated with mode and practice effects within modes.—*Journal abstract.*

902. Zurabashvili, Avlipl D. (M. Asatiani Research Inst of Psychiatry, Tbilisi, USSR) The problem of the interrelationship of structure and function. *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jan), Vol 26(1), 1-5.—Speculates on the ontogenic development of the human central nervous system. Recent research in synaptoarchitectonics suggests that ontogeny is not a simple repetition of phylogeny and the basic biogenetic recapitulation law requires correction. Work with electron microscopy confirms that psychoneural functions are tremendously complex and cannot be reduced to the category of physical energy.—*K. J. Hartman.*

### Emotional & Personality Development

903. Angel, Klaus. The role of the internal object and external object in object relationships, separation anxiety, object constancy and symbiosis. *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 541-546 8(1).—Supports the idea that early object relationships, separation anxiety, and symbiosis can be accurately described only by distinguishing between the role of internal and external objects. In addition it is suggested that symbiosis and separation anxiety are intrapsychic concepts and do not describe "who leaves whom" or "who does what to whom." 2 meanings of object constancy are defined: early and late need-fulfilment lessens in later life but does not disappear. The relationship between separation anxiety and object constancy is also discussed.—*R. S. Albin.*

904. Bates, John E.; Bentler, P. M. & Thompson, Spencer K. (Indiana U) Measurement of deviant gender development in boys. *Child Development*, 1973(Sep), Vol 44(3), 591-598.—Describes the development of a parent-report Gender Behavior Inventory for Boys. This inventory was factor analyzed (Study I) and validated (Study II) using normal and extremely effeminate 5-12 yr old boys. 4 factors—Feminine Behavior Extraversion, Behavior Disturbance, and Mother's Boy—emerged. Highly significant mean differences were obtained between a clinical sample of 15 gender-problem referrals and 175 normal controls on 3 of the 4 factors:

the gender-problem boys were more effeminate and less extraverted, and showed more behavior disturbances. Within the range-restricted clinical sample, clinical judgments of severity of gender disturbance correlated moderately well only with the feminine behavior factor. Age-trend analyses (Study III) showed an overall tendency for normal 5-10 yr old boys to show less cross-gender behavior (feminine behavior) with increasing age; however, specific cross-gender behaviors had low frequencies even at the youngest ages. (18 ref)—*Journal abstract*.

905. Cangemi, Joseph P. & Englander, Meryl R. (Western Kentucky U) **From self-awareness to self-actualization.** *College Student Journal*, 1974(Apr), Vol 8(2), 88-92.—Defines complete self-awareness as the ability to view oneself objectively. Self-awareness is suggested as the key to survival in this period of anxiety. Failure to attain the proper level of self-awareness usually leads to a sense of inadequacy and to emotional turmoil, reactions which hamper the individual's ability to function in society. Adequate self-awareness is the first step toward self-actualization or self-fulfillment. The intervening steps are insight, self-understanding, self-acceptance, psychological growth, psychological health, and self-actualization. It is suggested that one of the goals of education, particularly higher education, should be to teach the student self-awareness and possibly self-actualization. (22 ref)—A. J. Ter Keurst.

906. Cohen, Stewart & Oden, Sherri. (U Rhode Island) **An examination of creativity and locus of control in children.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 179-185.—Examined the adequacy of the locus of control concept in relation to creative behavior in samples of 61 kindergartners and 69 2nd graders. Among female 2nd graders creativity performance, as assessed by an adapted form of M. A. Wallach and N. Kogan's Instances task, was significantly correlated with locus of control scores. In contrast, among male kindergartners, locus of control scores were negatively correlated with creativity measures, as examined by the Wallach and Kogan Uses test. Probable explanations of the data are reviewed in terms of sex and age differences. (18 ref)—*Journal abstract*.

907. Cohen, Stewart. (U Rhode Island) **Exploratory task behavior and creativity in young children.** *Home Economics Research Journal*, 1974(Jun), Vol 2(4), 262-267.—Investigated the association between exploratory task performance and creativity in 129 kindergartners and 2nd graders. Exploratory behavior was assessed with a series of embedded figures tests, and creativity was assessed using the Instances Test. Among kindergartners of both sexes, exploratory and creativity measures were positively correlated. However, a different pattern of correlations was observed among 2nd graders; particularly among males, correlations were sharply lower than for the kindergartners. Data indicate that the early established exploration-creativity relationship may not hold over time. Developmental differences and children's exposure to structured learning environments in more advanced grades may account for the results. (17 ref)—*Journal abstract*.

908. Gottfried, Allen W. & Gottfried, Adele E. (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr

for Research on Mental Retardation & Human Development, Yeshiva U) **Influence of social power vs status envy modeled behaviors on children's preferences for models.** *Psychological Reports*, (Jun), Vol 34(3, Pt 2), 1147-1150.—Compared social power theory and J. W. Whiting's (1960) status envy theory for their effects on children's model preferences. 30 kindergarten children observed a show in which neuter gender puppets exhibited behaviors dictated by these theories. Statistical analyses showed that (a) sex was not associated with model preference and (b) the status envy model was significantly preferred by Ss. It is concluded that models who dispense both positive and negative reinforcements are not likely to be preferred to models consuming positive reinforcements. Results are interpreted within a social learning framework.—*Journal abstract*.

909. Joshi, Ram T. (Langley County Secondary School, Slough, England) **Field-dependence, anxiety and personality.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1328.—Administered the short form of the Embedded Figures Test, the Junior Manifest Anxiety scale, and the Junior Maudsley Personality Inventory to 143 British 12 yr olds. A correlation of .23 ( $p < .01$ ) was obtained between neuroticism and manifest anxiety, but all other correlation coefficients were not significant.

910. Lifshitz, Michaela. (Haifa U, Israel) **Social locus-of-control dimension as a function of age and the socialization milieu.** *Child Development*, 1973(Sep), Vol 44(3), 538-546.—Administered Crandall's Intellectual Achievement Responsibility questionnaire (IAR) to 183 9-14 yr children 3 kibbutz movements in Israel to explore the meaning of locus of control among children raised within a specified framework. 62 of the Ss were considered to be "problematic." Differing mental health status and sex of Ss did not significantly affect the responses to the questionnaire. On the other hand, responses varied significantly as a function of (a) age, with gradual increase in self-crediting and self-blaming responses; and (b) having been reared in different kibbutz movements. This finding may reflect differential socialization influences upon the acquisition of perceptions of internal-external control across the developmental span. Ss reported having more control over results as they were probably given more freedom and responsibility to conduct their own affairs. (24 ref)—*Journal abstract*.

911. Mann, John. (State University Coll New York, Geneseo) **Learning to be: The education of human potential.** New York, NY: Free Press, 1974. xii, 269 p. \$3.95.—Attempts to create an "internal curriculum" to help children develop their feelings as well as their intellects, and explores such new learning methods as psychosynthesis, Tai Chi Chuan, and tantric yoga. Awareness and sensitivity techniques are adapted for classroom use and are related to 15 basic human functions (e.g., creative expression, intelligence, attending, and the will).

912. Stephens, Mark W. & Delys, Pamela. (Purdue U.) **External control expectancies among disadvantaged children at preschool age.** *Child Development*, 1973(Sep), Vol. 44(3), 670-674.—Compared internal-external control (I-E) expectancies of disadvantaged preschool children in Head Start classes with those of middle-class



children in 1 Montessori and 2 parent cooperative nursery schools using the Stephens-Delys Reinforcement Contingency Interview (SDRCI). There were 55 Head Start (1 white group and 1 black group), 16 Montessori, and 34 parent cooperative nursery school children. The middle-class groups had significantly higher internal control scores than did the Head Start groups but did not differ from each other, and the black and white Head Start groups did not differ significantly from one another. It is concluded that the external control expectancies of both black and white disadvantaged children appear to precede their school attendance. (21 ref)—*Journal abstract*.

913. West, Malcolm L. **Social roles and personal styles: A proposed classification system of child behavior.** *Psychotherapy: Theory, Research & Practice*, 1974(Spring), Vol 11(1), 93-96.—Proposes a method for classifying child behavior that is useful for the counselor. The system represents the child's personality as an integration of social roles and personal styles. The child's emerging personality is viewed as a synthesis of social roles external to him (child, pupil, and friend) with his unique enactment of these roles based upon his active adaptation to them (personal styles). Case studies illustrate this classification system.—C. P. McCreary.

#### Social Behavior & Family Relations

914. Ames, Louise B. & Chase, Joan A. (Gesell Inst of Child Development, New Haven, CT) **Don't push your preschooler.** New York, NY: Harper & Row, 1974. x, 212 p. \$6.95.—Suggests that parents learn to relax and enjoy their children, rather than attempting to increase their learning abilities or intelligence, since children learn to walk, talk, and think without adult interference. Recommendations for helping the child to know himself and for enriching his environment are presented, along with solutions to various problems and issues encountered when raising a preschool child. (62 ref)

915. Beach, David R. & Sokoloff, Mark J. (U Wisconsin, Parkside) **Spatially dominated nonverbal communication of children: A methodological study.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1303-1310.—Developed procedures and scales for time-sampling 4 aspects of children's nonverbal communication activity: distance, orientation, position, and visual regard. These scales, plus an index of verbalization, were applied to videotaped recordings of 6 girls and 8 boys, all 4 or 5 yrs old, chosen at random from same-sex, same-age, triads engaged in free play. Interrater scale reliabilities ranged from .39 for verbalization and .85 for position. Contrary to prediction, girls maintained greater distance than did boys. Interscale correlations were suggestive of other sex differences and provided validation of the general procedures. Regression analyses for each sex indicated that distance behavior was significantly related to a composite of the other communication behaviors assessed. (15 ref)—*Journal abstract*.

916. Chaplin, Mary V. & Keller, Harold R. (U South Carolina) **Decentering and social interaction.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 269-275.—Investigated the hypothesis that children who interact effectively with their peers are better able to decenter (i.e., take the point of view of another) in interpersonal

areas than children who do not interact effectively with their peers. 48 3rd and 6th graders participated in the study involving a 2 (grade level)  $\times$  2 (sex)  $\times$  2 (effective and ineffective social interaction based upon popular and unpopular sociometric ratings, respectively) factorial design. M. Feffer's role-taking task and Piaget's mountain task were used as measures of decentering in interpersonal and impersonal areas, respectively. 6th graders performed significantly better than 3rd graders on the role-taking task, and 3rd graders rated as poor social interactors scored significantly lower on the role-taking task than the other groups. There were no significant differences among groups on the Piagetian mountain task, and no sex differences on either task. Correlations between scores on the 2 tasks reveal a significant positive relationship for the unpopular 3rd graders only. (17 ref)—*Journal abstract*.

917. Cohen, Stewart & Przybycien, Colette A. (U Rhode Island) **Some effects of sociometrically selected peer models on the cognitive styles of impulsive children.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 213-220.—Investigated the influence of peer models on the modification of impulsive response styles among 50 4th and 6th graders. Sociometrically chosen peers were trained to provide reflective verbal and behavioral cues in responding to a selected task. They later performed these skills in the presence of a peer O. A comparison of posttest performance measures of peer Os with control Ss revealed significant increases in response latencies and decreases in error scores among Ss exposed to peer models.—*Journal abstract*.

918. Dielman, T. E.; Barton, K. & Cattell, R. B. (U Michigan, Inst for Social Research, Survey Research Ctr) **Relationships among family attitude dimensions and child motivation.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 295-302.—Administered the Family Attitudes Measure, which examines dimensions of intrafamilial attitudes, to the parents of 250 junior high school children. The children were tested on the School Motivation Analysis Test (SMAT). Among the many relationships obtained the most consistent predictor of SMAT scores was that of interspouse hostility, which was positively related to the children's assertiveness and sex scores and negatively related to children's narcissism, protectiveness, and superego scores. In the case of the child self-sentiment scores a reversal occurred, with the fathers' interspouse hostility being positively related and the mothers' negatively related. Results are tentative pending cross-validation; they are regarded as hypothesis generating rather than as hypothesis testing. Although the linear multiple regression model used is a powerful one, it would not be unreasonable to expect interactions among some of the family attitude factors and, further, interactions of these factors with sex of the child and family demographic variables.—*Journal abstract*.

919. Duck, Steven W. (U Lancaster, England) **Personal relationships and personal constructs: A study of friendship formation.** New York, NY: John Wiley & Sons, 1973. ix, 170 p. \$12.—Discusses social relationships, problems of interpersonal attraction, and stages of acquaintance and describes a longitudinal study of developing friendship patterns. The filtering theory is

developed, and early filtering is examined and evaluated. (7 p ref)

920. Farnill, Douglas . (Duke U, Graduate School) **The effects of social-judgment set on children's use of intent information.** *Journal of Personality*, 1974(Jun), Vol 42(2), 276-289.—Compared the effects of 2 types of social judgment situations, moral judgment and value maintenance, on children's consideration of intentionality in their evaluations of others. A total of 84 male kindergartners, 1st graders, and 3rd graders made ratings of 6 peer actors presented individually in a videotaped episode involving the breaking of flowerpots. The 6 episodes combined 3 intention conditions (malicious intent, good intention associated with unavoidable accident, and good intention associated with ineptitude) with 2 levels of negative consequence (1 or 4 flowerpots broken). 42 Ss evaluated the actors from a moral judgment standpoint and 42 from a value-maintenance standpoint. Ss' use of intention varied with the type of evaluatory situation. In value maintenance situations, Ss differentiated between the malicious and accidental conditions significantly more than in the moral judgment situations. It is concluded that value maintenance conditions allow children greater freedom to adopt whatever basis of evaluation is most conducive to the attainment of personal goals, while moral judgment situations generally inhibit the consideration of intentionality.—*Journal summary*.

921. Garvey, Catherine & Hogan, Robert . (Johns Hopkins U) **Social speech and social interaction: Egocentrism revisited.** *Child Development*, 1973(Sep), Vol 44(3), 562-568.—Studied the development of social speech by videotaping 18 dyads of children (3½-5 yrs old) in 15-min play sessions. Behavior was coded by the time children spent in mutual interaction, and speech was coded by the degree to which utterances were adapted to the verbal or nonverbal behavior of the partner. Results indicate a high level of mutual responsiveness in both speech and behavior. It is suggested that children in this age range are capable of genuinely social behavior, that early forms of social speech entail a surprising level of interpersonal understanding, and that these speech forms are amenable to systematic study. (16 ref)—*Journal abstract*.

922. Graves, Donna; Walters, James & Stinnett, Nick . (Oklahoma State U) **Relationship between perceptions of family life and attitudes concerning father-son interaction.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 303-309.—Developed a form of the Home Life Scale for university men, an instrument which provides a measure of perceptions of their home life in their families of orientation; and examined the perceptions of 108 male undergraduates in relation to selected background characteristics and to their attitudes concerning father-son relationships. No significant relationships were observed between (a) home life perceptions and (b) age, marital status, father's occupation and education, source of family income, and socioeconomic status of parents; nor were any significant relationships observed between (a) attitudes concerning father-son relationships and (b) age, marital status, father's occupation and education, source of family income, and socioeconomic status of parents. However, a significant

relationship ( $p = .05$ ) was observed between home life perceptions and attitudes concerning father-son relationships, indicating that those Ss who hold negative perceptions concerning their families of orientation reflected the most permissive attitudes concerning father-son relationships.—*Journal abstract*.

923. Greenberg, Kenneth R. (U Maryland) **A tiger by the tail: Parenting in a troubled society.** Chicago, IL: Nelson-Hall, 1974. xii, 259 p. \$7.95.—Presents guidelines for early child training and for rearing older children and adolescents, and discusses the impact of public education on the child, the contributions that parents can make to educational problems, and the relationship between a child and his parents after the child marries and becomes a parent.

924. Grossman, Bruce D. & Levy, Paul S. (Hofstra U) **A factor analytic study of coping behavior in preschool children.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 287-294.—Examined the potential use of factor analytic techniques to identify personality dimensions in young children. The present scales were designed to reflect a child's total area of functioning and to require the least amount of interference on the part of the rater. 3 studies were done with a total of 129 3-6 yr old children. Of the factors identified, 3 were reproduced consistently in each of the studies. Factor I, Social Confidence, is characterized by leadership and assertiveness in interpersonal relations. Factor II, Cooperation, suggests a passivity in interpersonal relations and somewhat of a dependent stance. Factor III, Persistence, reflects a potential for problem solving and task orientation and has some relationship to autonomy. 2 additional factors which appeared rather consistently are Mobility and Aggression. Results suggest the possibility of deriving factor scores for separate children for comparative and developmental study.—*Journal abstract*.

925. Heilbrun, Alfred B. (Emory U) **Parental evaluative history and selective recognition of evaluative words.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 259-268.—Hypothesized that prior social experience influences current perception of historically relevant cues. 78 male undergraduates were separated into those who rated their fathers positive in their evaluations of them (HN) and those who rated their fathers as more negative (LN). These groups did not differ in their perception of maternal evaluative cues when presented alone. When paternal evaluative cues were presented as distractors, selective attention to maternal cues was more disrupted for the LN group. Deployment of attention to task-irrelevant paternal cues did not differ for the HN and the LN groups. However, the LN Ss did demonstrate a negative qualitative bias in those intrusion errors which came from the task-irrelevant paternal set, whereas HN Ss showed a positive qualitative bias. It is concluded that greater disruption of LN task performance may have been the result of responses, such as anxiety, associated with their negative bias.—*Journal abstract*.

926. Lahiri, Subrata . (International Inst for Population Studies, Bombay, India) **Preference for sons and ideal family in urban India.** *Indian Journal of Social Work*, 1974(Jan), Vol 34(4), 323-336.—Reports that in the sample surveyed (16,000 husbands) all sections of the



population, regardless of economic status, expressed a 2 to 1 preference for sons rather than daughters. The preference was lowest in the large metropolitan areas, and decreased among the older respondents. Ideal family size stabilized at 3.38 toward the end of family building years. Increased education was associated with a smaller ideal family.

927. Lee, Robert A. (El Camino Coll) **Socialization-anxiety: Toward an integrated theory of human behavior.** Dubuque, IA: Kendall/Hunt, 1974. xi, 226 p. —Presents the background and derivation, rationale, and methodology of a new theory which suggests that socialization and anxiety are the fundamental and exclusive determinants of human behavior. A review of the related literature and research hypotheses and applications of the theory to varieties of behavior, therapy, personality, and society are included.

928. Meares, Russell & Horvath, Thomas. (U Melbourne, Austin Hosp, Heidelberg, Vic, Australia) **A physiological approach to the study of attachment: The mother's attention and her infant's heart rate.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 3-7.—Studied 14 mothers and their neonatal babies in a maternity hospital during breast-feeding and control periods. Those mothers whose attention to external stimuli diminished during feeding, as inferred from habituation rate, had babies whose heart rates significantly increased during feeding. Mothers who did not show the expected relative inattention to external stimuli during feeding had babies whose heart rate did not significantly increase when they were fed. The possible relevance of these findings to the study of attachment behavior is considered. (21 ref)—*Journal abstract*.

929. Naffziger, Clauden C. & Naffziger, Ken. **Development of sex role stereotypes.** *Family Coordinator*, 1974(Jul), Vol 23(3), 251-258.—Briefly reviews the development of patriarchal systems and the cognitive, affective, and conative aspects of stereotyping. Research on sex differences in stereotyping is discussed, emphasizing the role of schools and family structures in supporting stereotypes. Suggestions for demystifying sex roles are presented, and the need to be aware of every individual's potential is noted. (20 ref)

930. Prothro, Edwin T. & Diab, Lutfy N. (American U Beirut, Lebanon) **Changing family patterns in the Arab East.** Beirut, Lebanon: American University in Beirut, 1974. ix, 240 p. \$10.—Presents a sociological and psychological study of family patterns in Sunni Muslim families in cities and villages of Lebanon, Syria, and Jordan. Data from interviews with over 2,000 women are included, along with discussions of census data, government statistical reports, and comparative studies of other cultures in the areas of courtship and marriage, extended family ties, modesty and the role of women, and divorce and polygyny. (8½ p ref)

931. Reilly, Mary (Ed.). (U Southern California) **Play as exploratory learning: Studies of curiosity behavior.** Beverly Hills, CA: Sage, 1974. 314 p.—Presents an heuristic approach to the phenomenon of play, searching for the general questions about external and internal reality that play can answer and applying specific play questions to the behavior of the deficit child.

932. Rubin, Kenneth H. & Schneider, Frank W. (U. Waterloo, Ontario, Canada) **The relationship between moral judgment, egocentrism, and altruistic behavior.** *Child Development*, 1973(Sep), Vol. 44(3), 661-665.—Administered cognitive measures of communicative egocentrism and moral judgment to 55 7-yr-old children. Ss were then given 2 opportunities to display altruistic behavior—to donate candy to poor children and to help a younger child complete a task. Success on the 2 cognitive measures was positively correlated with the incidence of altruistic behavior in both altruism conditions. With Peabody Picture Vocabulary Test mental age partialled out, the correlations between the cognitive measures and donating candy were significantly lower than the correlation between the cognitive measures and helping. The difference between the correlations was accounted for by the fact that only in the candy donation were there cues that helped S attend to the possibility of emitting an altruistic act. Finally, the communicative and moral judgment measures were significantly correlated. (16 ref)—*Journal abstract*.

933. Schmitz-Scherzer, Reinhard; Bierhoff, Hans W.; Lustig, Annette & Güth, Karl. (Psychological Inst., Bonn, W. Germany) **[Visitor frequency of playgrounds: A pilot study.]** (Germ) *Zeitschrift für Entwicklungspsychologie und Pädagogische Psychologie*, 1974, Vol. 6(1), 51-59.—Interviewed 100 mothers of 2-8 yr old children playing on 6 urban playgrounds. Results show that the motivation of the attendance of playgrounds is very complex; the socioeconomic situation as well as urban geographical aspects were quite important.—*English summary*.

934. Skeris, Piotr. **[Models of family life in workmen's quarters of a large town.]** (Polh) *Roczniki Filozoficzne*, 1973, Vol. 21(2), 77-103.—Presents data on living conditions and delinquency in a Polish municipal housing project, collected during interviews with 328 resident families. Analyses show that (a) family life was less influenced by the member's rural-urban origins than by educational and training levels; (b) the highest birth rate occurred among unskilled laborers and the lowest among skilled and white-collar workers, although the birth rate was decreasing rapidly among all socioeconomic groups; (c) fewer wives of skilled workers than of laborers were employed, and those wives who worked were predominantly domestics; and (d) neglect of the children of unskilled workers, because of employed mothers' absence from the home, resulted in a considerable amount of juvenile delinquency. It is concluded that better planning of municipal housing projects to provide for socioeconomically homogeneous populations, better facilities, and increased social services is urgent.—*English summary*.

935. Starr, Jerold M. (U Pennsylvania) **Social structure and social personality.** Boston, MA: Little, Brown, 1974. xiii, 461 p. \$12.95.—Presents an overview of the structure and process of socialization, emphasizing the impact of institutions on individuals. Major topics include the patterning of personality, the effects of technology and of class and race stratification on personality, and the role of the agents of socialization.

936. Stevens-Long, Judith. (California State U, Los Angeles) **The effect of behavioral context on some aspects of adult disciplinary practice and affect.** *Child*

*Development*, 1973(Sep), Vol 44(3), 476-484.—Parents (57 mothers and 3 fathers) of elementary school children responded to videotaped sequences portraying either an overactive, an underactive, or an average-active child. Ss selected a disciplinary practice and recorded affect toward the children at 10 points during the sequences, 5 of which occurred after S viewed a brief incident of aggression by the child. It was hypothesized that overactive children would be punished more severely than the other children; that the label "emotionally disturbed" would influence adult responses; and that affect and choice of discipline would be correlated. Analysis of variance generally supported these hypotheses, although there were interactions among aggression, activity level and labeling for choice of discipline. Moreover, the underactive child evoked more severe punishment under some conditions than the average-active child.—*Journal abstract*.

937. Tautermannová, M. **Smiling in infants.** *Child Development*, 1973(Sep), Vol 44(3), 701-704.—Studied the development of smiling in 7 infants over a 24-wk period. Data from 1-hr observations show that the duration of smiling depended on the age of infants, on the social interaction between the adult and the infant, and on the time that had passed from the beginning of the observation. There were significant individual differences in the length of smiling that increased with age. There were also individual differences in infants in their reaction to social interactions with adults.—*Journal abstract*.

938. Thomas, L. Eugene & Stankiewicz, John F. (U Connecticut) **Family correlates of parent-child attitude congruence: Is it time to throw in the towel?** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1038.—Determined the congruence between 66 college juniors and their parents for 16 measures of political, social, and psychological attitudes. 7 indices of family emotional climate and interaction (e.g., permissiveness) were devised from parent and child interviews. These family measures failed to correlate significantly with attitude congruence for any of the 4 parent-child dyads.

939. Weiss, Walter F. (Indiana Youth Ctr, Communications Lab) **America's wandering youth: A sociological study of hitchhikers in the United States.** Jericho, NY: Exposition Press, 1974. xvi, 95 p. \$4.50.—Discusses the psychological, philosophical, and religious forces which have molded today's youth, examines the society in which they live, and considers the ongoing evolution of 3 basic American institutions—the family, the school, and the church.

940. Zinner, John & Shapiro, Roger. (NIMH, Section of Personality Development, Bethesda, MD) **Projective identification as a mode of perception and behaviour in families of adolescents.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 523-530.—Examines family group dynamics in relation to psychological outcome of the adolescent. A case history of a family is presented. Family group behavior and subjective experience are determined to varying degrees by shared unconscious fantasies or assumptions. The threat of parental anxiety and object loss is an important factor determining the collusion of the adolescent with parental projections. (24 ref)—R. S. Albin.

## Adult Development & Aging

941. Bell, Bill D. (U Arkansas, Little Rock) **Cognitive dissonance and the life satisfaction of older adults.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 564-571.—Examined the implications of consistency theory with regard to the life satisfaction of older adults, by conducting pre- and postretirement interviews with 114 older males in an urban area. With the exception of the family area, pre- and postretirement analysis yielded little support for the consistency hypothesis (i.e., expectational disconfirmation will be accompanied by negative changes in life satisfaction). Instead, some evidence indicates the type of disconfirmation to be more central to the explanation of life-satisfaction change than disconfirmation per se. In the family, for instance, the more positive the disconfirmation indicated, the more negative the change evidenced in life satisfaction. For voluntary association and community sectors, however, disconfirmation (both positive and negative) as well as the specific type of disconfirmation bore little relationship to the issue of satisfaction change. Findings do, however, suggest differential "rewards" to characterize the role areas in question. (33 ref)—*Journal abstract*.

942. Botwinick, Jack & Storandt, Martha. (Washington U) **Cardiovascular status, depressive affect, and other factors in reaction time.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 543-548.—Several previous studies suggest that reaction-time (RT) slowing with increasing adult age may be different for men and women, and that RT slowness is related to cardiovascular symptoms, to depressive affect symptoms, and to little physical exercise. Results of the present study with 96 20-74 yr old adults corroborated suggestions that RT slowness is related to cardiovascular and depressive affect symptoms. However, no sex differences in RT slowing were found. Physical exercise seemed to be associated with quick RT in young adults, but not in elderly ones. RT relationships with education level were also seen, but interactions between each of these factors and age were not found.—*Journal abstract*.

943. Carroll, Douglas. (Baltimore City Hosp. MD) **Sleep, periodic breathing and snoring in the aged: Control of ventilation in the aging and diseased respiratory system.** *Journal of the American Geriatrics Society*, 1974(Jul), Vol 22(7), 307-315.—Discusses studies of the mechanical characteristics of the human lung in relation to aging; most of these studies have involved conditions of stress or disease. To date there is no firm evidence that normal old age under ordinary conditions of living is associated with impaired regulation of respiration. (66 ref)

944. Glamser, Francis D. (Stetson U) **The importance of age to conservative opinions: A multivariate analysis.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 549-554.—Interviewed 118 23-66 yr old females to determine whether older people are more conservative than younger people with regard to opinions on controversial issues (e.g., race, law enforcement, and patriotism). Variables explored included age, size of childhood community, father's education and occupation, and respondent's education. A significant positive correlation was found between age and conservative opinions even when social class, education, father's



socioeconomic status, and the size of the respondent's childhood community were controlled. Only education was more important than age as a correlate of conservatism among the variables studied. There was no polarization of opinions on the basis of age. Of 3 suggested explanations for the relationship between age and conservative opinions, the social and cultural were seen as the most fruitful. (20 ref)—*Journal abstract*.

945. Gordon, Chad; Gaitz, Charles M. & Scott, Judith. (Texas Research Inst of Mental Sciences, Houston) **Value priorities and leisure activities among middle aged and older Anglos.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 13-26.—Studied leisure activities of 156 middle-aged (40-64 yrs old) and 152 older (65-94 yrs old) residents of Houston, Texas. A structured interview was used to obtain information regarding leisure, value preferences, social attitudes, and mental health. Numerous factors (e.g., age, sex, education, and income) were found to correlate with qualitative and quantitative indices of leisure activities. Important in explaining the great diversity of leisure forms is the idea of conceptualizing leisure as having dimensions of breadth, intensity, and activity-passivity; it is equally important to analyze leisure into different subdimensions.—*M. Oscar-Berman*.

946. Huyck, Margaret H. (Illinois Inst of Technology) **Growing older: What you need to know about aging.** Englewood Cliffs, NJ: Prentice-Hall, 1974. xii, 179 p.—Suggests ways to prepare for the aging process, how to help parents cope with aging, explains biological and psychological changes that occur during aging, and discusses middle-aged marriage and sex in old age. (16 ref)

947. Kahn, Samuel. **Essays on longevity.** New York, NY: Philosophical Library, 1974. 198 p.—Presents discussions on aging with respect to longevity, geriatrics, and gerontology. Among the topics included are the sociology of age, problems of retirement, "failing" senility, diseases of the aged, preventive treatment, and heart disease and diet.

948. Maddox, George L. & Douglass, Elizabeth B. (Duke U, Ctr for the Study of Aging & Human Development) **Aging and individual differences: A longitudinal analysis of social, psychological, and physiological indicators.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 555-563.—Conducted a longitudinal study in which a defined older population of 106 adults was observed 6 times over a period of 13 yrs. 2 hypotheses were affirmed: (a) individual differences do not decrease with age in late life; and (b) individuals tend to maintain the same rank on a variety of social, psychological, and physiological indicators in relation to their age peers throughout the later years of life. (23 ref)—*Journal abstract*.

949. Nystrom, Eleanor P. (U Puget Sound) **Activity patterns and leisure concepts among the elderly.** *American Journal of Occupational Therapy*, 1974(Jul), Vol 28(6), 337-345.—Conducted a descriptive interview survey among 65 60-90 yr old residents of a low-income urban housing development. Activity patterns, leisure concepts and uses, and meanings of leisure-time activities were examined. Results of an analysis of an activity index for frequency and variety of activity participation showed no differences due to age in the sample. Analysis

of leisure concepts showed that most Ss defined leisure as pleasant anticipation or recollection. Social interaction or being a spectator were the most frequent uses of leisure. Further study of leisure as freedom from obligation and of mechanisms for coping with nonstructured time seems indicated for understanding the elderly person's meaningful use of leisure. (32 ref)—*Journal abstract*.

950. Scheingold, Lee D. & Wagner, Nathaniel N. (U Washington) **Sound sex and the aging heart.** New York, NY: Human Sciences Press, 1974. 168 p. \$7.95.—Discusses marital and extramarital sex in the mid and later years, with special reference to cardiac problems. Sexual functioning, the consequences of aging, and resumption of sexual activity after a heart attack are detailed.

951. Warren, Harriet H. (New Hampshire Hosp, Concord) **Self-perception of independence among urban elderly.** *American Journal of Occupational Therapy*, 1974(Jul), Vol 28(6), 329-336.—Interviewed community-based older people to ascertain their assessment of health and functional capacities. An attempt was made to determine how older people rate their general health; how they perceive their level of independence in caring for their daily needs; and what concerns them most about being able to manage on their own. 65 60-90 yr old ambulatory men and women from a low-income housing project were surveyed. 74% reported relatively good health and fairly high independence, as defined by a 4-point dependence-independence scale. Reported areas of greatest concern were housecleaning and the ability to get out and around. (35 ref)—*Journal abstract*.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

952. Berkowitz, Marvin. (New York City Police Dept, Applied Technology Group, NY) **The social costs of human underdevelopment: Case study of seven New York City neighborhoods.** New York, NY: Praeger, 1974. xv, 299 p.—Presents an empirical study based on the view that urban problems can be adequately assessed within a human capital framework in which unproductive city residents generate differentially high social costs (i.e., monetary and nonmonetary burdens that some individuals bear as a result of the actions of others). Topics include the dilemma of human underdevelopment, the generation and nature of social costs, neighborhood use of public services, costs of housing, fire protection, crime, and correlates of the social costs of crime. (16 p ref)

953. Luchins, Abraham S. & Luchins, Edith H. (State U New York, Albany) **Wertheimer's seminars revisited: Problems in social psychology: I.** Albany, NY: State University New York, Psychology Dept, 1971. 385 p.—The 1st of 2 volumes presenting M. Wertheimer's views on prewar problems in social science which continue to be perplexing. Discussion of the relevance, use, aims, ethics, and methodology of social science is followed by Wertheimer's analysis of various theories about the nature of man, in which he emphasizes how these theorists have attempted to shape and control man's thinking about himself. Many other aspects of

group theory, ethics, and personality are also considered.  
—*Author abstract.*

954. **Perrucci, Carolyn C. & Targ, Dena B.** (Purdue U) **Marriage and the family: A critical analysis and proposals for change.** New York, NY: David McKay, 1974. xvii, 457 p.—Presents a collection of 34 readings which combine feminist values with a sociological perspective of current American family life and marriage. Among the topics discussed are racial and social-class perspectives, sex-role socialization, birth control and abortion, economic aspects of marriage, and women in middle age.

### Culture & Ethnology & Race Relations & Religion

955. **Barber, Lucie W.** (Union Coll & U) **Ministry with parents of infants and preschool children.** *Religious Education*, 1974(Mar), Vol 69(2), 192-197.—Suggests that parents of young children can foster the best religious instruction of preschoolers, when their teaching provides individualized and continuous instruction within a loving atmosphere. Approaches to parent education could involve any of the following (or some combination): a home visitation instructional visit by the religious educator once or twice a week, a parents' education group in the church or synagogue, and a youth program in the church that prepares for parenting skills. An infancy design program has produced and tested actual curricular materials for parents of infants from birth to 30 mo old and is making use of various strategies and aids that parents of young children may incorporate into their religious instruction.—*E. Gavin.*

956. **Bell, Bill D.** (U Arkansas, Little Rock) **Church participation and the older adult: An orientational approach.** *Kansas Journal of Sociology*, 1974(Spr), Vol 10(1), 19-28.—Examined the utility of Jacoby's Instrumental-Expressive Orientation Indices in predicting the church participation of 54 United Methodist males (mean age = 65 yrs). Findings indicate significant differences between orientation scores. The respondents proved more instrumentally than expressively oriented toward the church. Further, a significant relationship was noted between Instrumental Orientation scores and church participation. No significant relationship was observed in Expressive scores. Ss tended to view participation in the church as a means to 1 or more social ends rather than as an end in itself. 24% of the variance in participation was explained without reference to religious antecedents. (23 ref)—*Journal abstract.*

957. **Berger, Peter L.** (Douglass Coll, Rutgers State U) **Some second thoughts on substantive versus functional definitions of religion.** *Journal for the Scientific Study of Religion*, 1974(Jun), Vol 13(2), 125-133.—Considers that scientific approaches to religion have always alternated between functional and substantive definitions of the field—between defining religion in terms of its social or psychological functions and in terms of its believed contents. Recently there has been a predominance of functional definitions, and apart from their scientific utility, they have come to serve an ideological use—as a quasi-scientific legitimation of the avoidance of transcendence. This is in accord with a secularized zeitgeist, but threatens to lose sight of the very phenomenon of religion. To regain the phenome-

non, what is required is a return to a substantive definition, an understanding of religion "from within." A. Schutz's analysis of "multiple realities" in human experience may serve as a useful starting point for this.  
—*Journal abstract.*

958. **Cheetham, R. W.; Sibisi, H. & Cheetham, R. J.** (U Natal, Faculty of Medicine, Durban, South Africa) **Psychiatric problems encountered in urban Zulu adolescents with specific reference to changes in sex education.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 41-48.—Compares the sexual and courtship practices of traditional Zulus with those of urban Zulus exposed to Western-oriented culture. More antisocial behavior and social disintegration were manifest in urban youth. It is suggested that the peer group communication and adult inculcation of responsibility practiced by traditional Zulus could be used in all societies to reduce adolescent psychopathology. (43 ref)

959. **Eastwell, H.** (Darwin Hosp, NT, Australia) **Dilemmas of Aboriginal marriage in East Arnhem Land, North Australia.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 49-53.—Describes an Aboriginal group with complex marriage customs, including a high degree of polygyny. The introduction of a cash economy produced a loss of traditional roles within the polygynous family and was associated with many cases of psychiatric illness. 9 of these cases are described.

960. **Eister, Allan W. (Ed.).** (Wellesley Coll) **Changing perspectives in the scientific study of religion.** New York, NY: John Wiley & Sons, 1974. xxii, 370 p. \$14.50.—Presents a series of 16 essays in which social scientists describe the adaptation of their theories and methods to the study of religion and religious phenomena. Among the topics discussed are the adequacy of present definitions of religion, faith, and secularity for analyzing religious phenomena; the nature and function of religion in society; the means by which religious institutions are changing to meet the spiritual needs of their followers; and how religious institutions legitimate their positions in a pluralistic society.

961. **Grollman, Earl A.** (Beth El Temple Ctr, Belmont, MA) **The way of dialogue on death between parents and children.** *Religious Education*, 1974(Mar), Vol 69(2), 198-206.—Proposes that children have the right to be included in situations that involve death. Adults reveal maturity when they help the child to realize that as adults they have no final answers concerning death, but that they can talk about it in a mutually advantageous way. Children from 3 to 5 may deny death as a regular and final process; between 5 and 9 they appear able to accept the idea that a person has died but may not understand it as something that will happen to everyone, oneself included. In imparting instruction, honesty is the most important consideration. The best style of explanation is natural and loving. The child should be told immediately of a death of someone close to him, in familiar surroundings whenever possible. Children, like people of any age, respond variously to death. The mental health of both children and adults depends upon the frank acknowledgement of painful separation, that allows for the expression of grief and of



various emotions that come as natural reactions to family disorganization.—E. Gavin.

962. Killen, Pat; Wildman, Robert W. & Wildman, Robert W. II. (Georgia Coll) **Superstitiousness and intelligence.** *Psychological Reports*, (Jun), Vol 34(3, Pt 2), 1158.—Administered an original 57-item superstitiousness questionnaire and the Otis Quick-Scoring Mental Ability Tests to 49 high school seniors. Ss with above average Otis IQs were significantly less superstitious than average-IQ Ss. This effect may have been caused by intelligence directly or by its influence on Ss' social group.

963. Kokonis, Nicholas D. (George Williams Coll) **Three wishes of black American children: Psychosocial implications.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1335-1338.—Investigated the wishes of 63 male and 74 female 7-12 yr old black American children to obtain normative data and to compare these children with other cultural groups. Ss wished for material things more often than anything else, boys tended to wish for money and material things more strongly than girls, and girls were more interested in personal attributes and skills than boys. No developmental trends were noted. Findings are compared with those of studies dealing with white American and Greek and Greek-American children, emphasizing psychosocial change in human development.—*Journal abstract.*

964. Langford, Barbara J. & Langford, Charles C. (U Oregon) **Review of the polls.** *Journal for the Scientific Study of Religion*, 1974(Jun), Vol 13(2), 221-222.—Discusses the results of a national survey of 1,502 persons about church attendance and altruistic behavior conducted by the American Institute of Public Opinion (Gallup poll). Regardless of religious affiliation, those who attended church in the 7 days preceding the survey were more likely than nonattenders to perceive themselves as taking concrete actions on the behalf of others.

965. Lewis, Vern C. (Biola Coll.) **A psychological analysis of faith.** *Journal of Psychology & Theology*, 1974(Spring), Vol. 2(2), 97-103.—Suggests that a deeper analysis of faith can be achieved by examining the concept of attitudes in psychology. Attitudes are shown to have cognitive, affective, and active components. 3 levels of attitudes are also identified: acceptance, preference, and commitment. Several passages of Scripture are presented as evidence that biblical faith also has these same 3 components and levels. It is concluded that moving from the well-researched field of attitudes to a less understood concept such as faith can aid in the understanding of faith. (26 ref)—*Journal abstract.*

966. London, Ivan D. (Brooklyn Coll, City U New York) **The revenge of heaven: A brief methodological account.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1023-1030.—Presents a chronological account of the psychopolitical research that lead to *The Revenge of Heaven: Journal of a Young Chinese*, K. Ling's idiographic study of China's Cultural Revolution. The underlying methodological rationale of using literary techniques and conceptions in group-dependent, as a way of reconstituting perceived reality from the data is discussed.

967. Mack, Delores E. (U Lagos, Nigeria) **The power relationship in black families and white families.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3),

409-413.—Focused on the power relationship in 80 married couples selected to vary by race (40 black and 40 white) and class (40 middle class and 40 working class). Marital power was measured by 3 tasks: a questionnaire, which couples first filled out individually, then jointly; a discussion, in which couples attempted to arrive at a joint statement about 2 topics; and a bargaining situation, which required couples to bargain over 4 items imported from Africa. Results indicate that on only 1 task—completing the questionnaire—was a significant racial or class difference apparent. On that task working-class husbands were significantly more powerful than middle-class husbands.—*Journal abstract.*

968. Roll, Samuel; Hinton, Richard & Glazer, Michael. (U New Mexico) **Dreams of death: Mexican-Americans vs Anglo-Americans.** *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 111-115.—Tested the hypothesis that Mexican-Americans have more death-related concerns in their reported dreams than their Anglo-American counterparts. 65 Mexican-American and 243 Anglo-American university students of both sexes were given a 48-item questionnaire. The hypothesis was confirmed. (Spanish summary)

969. Rossi, Ino (Ed.). (St John's U, Jamaica, New York) **The unconscious in culture: The structuralism of Claude Lévi-Strauss in perspective.** New York, NY: E. P. Dutton, 1974. xvii, 487 p. \$6.95.—Presents a collection of 19 theoretical and discussion papers on structural anthropology as formulated by C. Lévi-Strauss. The papers (a) attempt to clarify the theoretical and methodological premises of structuralism; (b) suggest various types of ethnological applications and ways to strengthen the procedures of structural analysis; and (c) compare it with empirical, cybernetic, Marxist, and existential approaches.

970. Rush, John A. **Witchcraft and sorcery: An anthropological perspective of the occult.** Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Presents a discussion of the history and theory of, and research on, the occult in Europe, Africa, the Americans, and Asia. The relationships between witchcraft, religion, sorcery and magic, and between the occult and psychotherapy are discussed, and data on Italian witchcraft and sorcery obtained from a 4-yr study of an Italian kinship network in Canada are presented. (7 p ref)

971. Simmons, Dale D. (Oregon State U) **Personal values of university students in Mexico and in Oregon.** *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 103-110.—Administered the Simmons Value Survey, consisting of 100 inventory statements, to 3 groups: (a) 111 students of the Preparatoria program at Guadalajara University, (b) 41 students of the Facultad de Filosofía y Letras program at Guadalajara University, and (c) 199 General Psychology students at Oregon State University, to assess cross-cultural differences in personal values. Results were as follows: (a) In spite of many significant differences between the groups, the overall priority systems of the groups were significantly correlated, so that all 3 groups could be considered subsamples of the same population. (b) The groups showed no significant difference in the overall level of valuing. (c) Sex differences were negligible, indicating no need to establish separate norms for each sex. (d) D. Guerrero's

distinction between the "active" and the "passive" syndromes for the US and Mexican population, respectively, was not well supported. (Spanish summary) (19 ref)—*S. Slak*.

972. Walters, Annette. (St Ambrose Coll) **Religious education, values, and morals.** *Religious Education*, 1974(Mar), Vol 69(2), 246-248.—Suggests that only 3 schools of psychology, and their derivatives, have made important contributions to moral education: the psychoanalytical, the behavioristic, and the cognitive. Behavioristic and cognitive theory need to be supplemented with the depth psychology of Freud and Jung, which has mistakenly been associated with moral permissiveness. While all 3 schools of psychology have made some contributions to moral education, it is concluded that their complementary insights could also benefit from the perspectives of religious educators. —*E. Gavin*.

973. Zentner, Henry. (U Calgary, Faculty of Education, Alberta, Canada) **Profiles of the supernatural: Inquiries into the socio-psychological foundations of religious behavior.** Calgary, Canada: Strayer, 1972. xxvi, 120 p. \$7.50(cloth), \$3.25(paper).—Examines the similarities and differences between Catholicism, Calvinistic Protestantism, and Canadian Indian Animism. The manner in which these religious communities have helped their adherents find and maintain a sense of personal identity and integrity is explored. The relationship of their differing modes of religious training and of defining reality to behavior in worship, mental health, education, and social organization is discussed.

#### Social Issues & Social Processes

974. Aldous, Joan. (U Georgia) **The making of family roles and family change.** *Family Coordinator*, 1974(Jul), Vol 23(3), 231-235.—Discusses the concept of role-making, the process of behavioral experimentation in which persons assume the viewpoints of another in various interaction patterns. The characteristics of this process in marriage and family situations, where gender roles and identities are becoming increasingly diffuse, is noted. It is suggested that marriage counselors who work with couples in conflict should understand how the changing nature of family roles may affect the marriage and should encourage couples to base roles on competency, time available, and interest, rather than on gender. The consequences of inappropriate role-making and the problems of special types of families (e.g., 1-parent families) are considered, and it is emphasized that both community, psychological, and dynamic influences should be examined before changes in family patterns based on role-making are adopted. —*L. Gorsey*.

975. Astin, Helen S.; Suniewick, Nancy & Dweck, Susan. **Women: A bibliography on their education and careers.** New York, NY: Behavioral Publications, 1974. v, 243 p. \$10.95.—Presents a collection of over 350 abstracts and annotations of the research literature on the educational and occupational status of women. Topics include determinants of careers, the history and economics of women in the work force, the marital and familial status of working women, developmental studies, and the role of continuing education in women's careers.

976. Baizerman, Michael; Sheehan, Cynthia; Ellison, David L. & Schlesinger, Edward R. (U Minnesota, Ctr for Youth Development & Research) **A critique of the research literature concerning pregnant adolescents, 1960-1970.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 61-75.

977. Braga, Joseph & Braga, Laurie. (U Miami, Medical School) **Growing with children: The early childhood years.** Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 205 p.—Details the needs, capabilities, and limitations of children from birth to 6 yrs of age, and presents methods of behavior management and practical suggestions for childrearing. (45 ref)

978. Brooks, Glenwood C.; Sedlacek, William E. & Mindus, Lester A. (U Maryland, Cultural Study Ctr) **Interracial contact and attitudes among university students.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 102-110.—Conducted an attitudinal and demographic poll of 1,391 undergraduates at a large state university, 84% of whom were white. Results show that 39% of the freshmen indicated they had no close friends of another race, with upperclass responses showing a similar pattern. Most black Ss reported having spent most of their lives in the city, whereas Ss from the other groups (white, Oriental, Spanish-American, and American Indian) indicated they had spent most time in the suburbs. Only 9% of all Ss disagreed that it would be enjoyable to have a roommate of another race, and no sex differences or Sex  $\times$  Race interactions were observed in responses. Data indicate the existence of a cultural parallelism among students from various minority groups, and emphasize the need for continued interracial contact. —*L. Gorsey*.

979. Calhoun, James F. (State U New York, Stony Brook) **Attitudes toward the sale and use of drugs: A cross-sectional analysis of those who used drugs.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 31-47.—Surveyed attitudes about the sale and use of drugs among 117 junior high school students, 73 senior high school students, 92 undergraduates, 39 parents of the high school students, 40 university staff members, and 38 junior and senior high school teachers. All Ss completed a 2-part questionnaire about attitudes toward the use and sale of drugs (tobacco, alcohol, marihuana, heroin, barbiturates, amphetamines, hallucinogens, and cocaine) and their actual use of these drugs. The larger proportion of users of each drug was made up of secondary and college students, especially marihuana and hallucinogens. Adults contributed more to the barbiturate, amphetamines, tobacco, and alcohol user groups. Users considered the drugs they used to be better (i.e., safer, less addictive, or less harmful) than randomly selected respondents. Users of hallucinogens, amphetamines, and barbiturates tended to use more of all drugs than users of marihuana, tobacco, or alcohol. —*L. Gorsey*.

980. Carman, Roderick S. (U Wyoming) **Values, expectations, and drug use among high school students in a rural community.** *International Journal of the Addictions*, 1974, Vol 9(1), 57-80.—Administered a personal values questionnaire, based on Rotter's social learning theory of personality, and a drug use survey to 327 9th-12th graders in a rural high school. It was



hypothesized that Ss who manifest low freedom of movement, characterized by low expectations of achieving valued goals, would be more likely to report heavier drug use, more frequent periods of intoxication, and greater social complications resulting from drug use. Results support the hypothesis, in that low freedom of movement in the goal area of recognition-achievement was correlated with drug use, especially in the case of barbiturates and hallucinogens.—*L. Gorsev.*

981. **Coblner, W. Godfrey.** (Albert Einstein Coll of Medicine, Yeshiva U) **Pregnancy in the single adolescent girl: The role of cognitive functions.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 17-29.—Conducted interviews with 211 single adolescent girls, free of known psychiatric disturbance, who had undergone an elective abortion at a metropolitan municipal hospital. The extent to which Ss were acquainted with birth control methods and had actually attempted to avoid their pregnancy was assessed. Similar data relating to birth control were obtained in interviews with a group of 200 single adolescents pregnant for the 1st time, and from 50 girls serving as controls who had effectively practiced birth control for at least 6 mo. The great majority of the girls came from the same socioeconomic background, close to the subsistence level. Results indicate that about 75% of the pregnancies were unintended. 3 psychological cognitive mechanisms were uncovered which virtually blocked the conversion of birth control knowledge into its successful practice. This finding suggests that adolescent out-of-wedlock pregnancies do not exclusively arise from motivational factors. (23 ref)—*Journal abstract.*

982. **Cuber, John F.** (Ohio State U) **Sex in the upper middle class.** *Medical Aspects of Human Sexuality*, 1974(Jul), Vol. 8(7), 8-34.—Discusses characteristics of the behavioral structure of the upper middle class and suggests that career demands made on upper-middle-class couples adversely affect their sex lives. An anthropology professor's discussion of the article is also included, which further clarifies the effects of social mobility, status inconsistency, and ethnic subculture on sexual behavior.

983. **Cullen, Francis T.** (Teachers Coll, Columbia U) **Attitudes of players and spectators toward norm-violation in ice hockey.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1146.—Administered a 4-item attitude questionnaire on rule-breaking just prior to the start of a game to 18 college hockey players and 46 undergraduate spectators (20 females). Data indicate that (a) both the players and the spectators generally approved of norm-violation, (b) player approval was greater than that of male and female spectators, and (c) male spectator approval was greater than that of female spectators.

984. **De Nicola, Pietro & Peruzza, Marino.** (U Pavia, Italy) **Sex in the aged.** *Journal of the American Geriatrics Society*, 1974(Aug), Vol 22(8), 380-382.—Analyzes sexual activity and habits in the aged on the basis of the pertinent literature and on personal observations of 53 male and 32 female 62-81 yr old Ss. The importance of diseases and of environmental, social, and psychological factors is discussed in connection with impairment of sexual activity in old people. It is concluded that sexual activity in the aged is not exceptional and may give

serenity to aging. Medical, social, and psychological prophylactic counseling should be applied as early as possible by geriatricians in collaboration with sexologists.—*Journal abstract.*

985. **DiRenzo, Gordon J.** (U Delaware) **Personality and politics.** Garden City, NY: Anchor, 1974. xv, 539 p. \$3.50.—Presents a collection of 20 papers on the relationship of personality and politics, including psychological motivations in recruitment to political roles and careers, personality types among politically active persons, the relationship of personality to specific political ideologies, the interaction of personality and various political dynamics, and methodological and theoretical issues in the study of the psychology of politics. (23% p ref)

986. **Fallding, Harold & Miles, Carol.** (U Waterloo, Ontario, Canada) **Drinking, community and civilization: The account of a New Jersey interview study.** New Brunswick, NJ: Rutgers Center of Alcohol Studies, 1974. xvii, 73 p. \$6.—Presents a typology of drinking constructed from interviews with residents of 2 New Jersey communities during a long-term study. 4 types of drinking—community-symbolic, facilitative, assuagement, and retaliative—are defined, and each is considered in terms of its cultural significance. (40 ref)

987. **Farley, Frank H. & Farley, Sonja V.** (U Wisconsin, Madison) **Birth order and political orientation in college women.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1045-1046.—Only-child, firstborn, and later-born groups of female undergraduates completed global self-ratings of conservatism-liberalism. Results do not support the hypothesis that conservatism is related to birth order.

988. **Farnsworth, Dana L.** (Harvard U) **The young adult: An overview.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 845-851.—Describes changes in the attitudes and behavior of young adults over the past 2 decades, including disaffection on the college campus, the new conservatism, countercultural life-styles, drug use and abuse, and changing codes of sexuality. The need for young adults and their elders to work together toward the solution of problems in a society where personal integrity is considered to have declined alarmingly is emphasized. (18 ref)

989. **Ferguson, Ben & Kennelly, Kevin.** (North Texas State U) **Internal-external locus of control and perception of authority figures.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1119-1123.—To investigate differences between internal and external Ss' characteristic views of figures in authority, the Authority Figure Perception Test, a paper-and-pencil test, was constructed (scale reliabilities ranged from .82 to .33) and administered along with Rotter's Internal-External Control Scale to 76 14-18 yr old male preparatory high school students. As hypothesized, internals more than externals perceived figures in authority (a) as more encouraging of constructive environmental manipulations, (b) as more supportive when difficulty was encountered, (c) as more positively reinforcing, (d) as having more predictable standards, (e) as acting more upon issue-oriented reason, and (f) in a generally more positive light. As age increased, there was a decrease in the tendency to perceive authority figures as positively reinforcing, as

having predictable standards, and in a generally positive light.—*Journal abstract.*

990. Fisher, Allan H. & DiSario, Martha R. (Human Resources Research Organization, Alexandria, VA) **Attitudes of youth toward military service in a zero-draft environment: Results of a national survey conducted in November 1972.** Alexandria, VA: Air Force Human Resources Lab, Manpower Development Branch, MR 74-8, 1974. 108 p.—Results of a survey of 1,924 16-21 yr old males indicate that high school students had a higher enlistment potential than college students or males not in school and that a fully paid college education was the greatest enlistment incentive, especially to 16-17 yr olds.

991. Fisher, Gary & Brickman, Harry R. (Cedars-Sinai Medical Ctr, Los Angeles, CA) **Multiple drug use of marihuana users.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 40-43.—Studied illicit nonmedical use of 6 classes of drugs (alcohol, stimulants, psychedelics, tranquilizers, barbiturates, and hard narcotics) by 530 users and 573 nonusers of marihuana. Regular use of all 6 drugs was minimal, alcohol being the drug used most regularly by all respondents. Those who used marihuana daily also used the other drugs more frequently.—*M. Oscar-Berman.*

992. Fisher, Gary & Steckler, Allan. (Cedars-Sinai Medical Ctr, Los Angeles, CA) **Psychological effects, personality and behavioral changes attributed to marihuana use.** *International Journal of the Addictions*, 1974, Vol 9(1), 101-126.—Administered a 220-item questionnaire on marihuana use and its effects to 524 16-66 yr old Ss, classified according to use pattern: trial, past, occasional, regular, and daily users. Ss reported the occurrence of 33 psychological effects of marihuana, changes on 14 behavioral and personality variables, the effects on alcohol and tobacco consumption, effects on sexual activity, and reasons for marihuana use. Results indicate that as marihuana use increases, there are increases in pleasurable effects and beneficial results in personality and behavioral areas and decreases in negative and unexpected consequences. Trial users reported the least pleasant effects and the greatest untoward effects, and past users reported considerably less benefits than current users. The primary reason given for using marihuana was "to have fun." (18 ref) —*Journal abstract.*

993. Fochtman, Dianne. (Children's Memorial Hosp, Chicago, IL) **A comparative study of pediatric nurses' attitudes toward death.** *Life-Threatening Behavior*, 1974(Sum), Vol 4(2), 107-117.—Administered a 24-item questionnaire on attitudes toward death and the care of dying patients to 47 professional and 10 nonprofessional pediatric nurses in 3 hospitals. There were no significant differences among Ss in education, background, or previous clinical experience. There were significant differences between Ss who worked on terminal wards and those who worked on either benign or acute wards in their attitudes toward the prolongation of life and their degree of composure in situations with dying children and their families.—*Journal abstract.*

994. Fröhlich, Hans H. (Humbolt U Berlin, Jurisprudence Section, E Germany) **[The significance of sexual knowledge, interests and pre-existing experiences for**

**the special credibility of the witness personality.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jan), Vol 26(1), 25-32.—Comments on significance of factors affecting the credibility of minors as witnesses in sexual crimes. Child and adolescent witnesses often admit considerable personal sexual experience.—*K. J. Hartman.*

995. Gallogly, Frances D. **Housing decisions in selecting a residence in a planned townhouse development.** *Home Economics Research Journal*, 1974(Jun), Vol 2(4), 251-261.—Studied the process by which families decide to move to a planned townhouse community, using a decision-making model involving predictor, selection process, and outcome of move variables. Housing space was of primary importance in decisions to move, along with the physical appearance of the neighborhood and recreational facilities available. Problems and appeals of new planned communities are discussed. (17 ref)

996. Gardner, Elmer A. **Implications of psychoactive drug therapy.** *New England Journal of Medicine*, 1974(Apr), Vol 290(14), 800-802.—Discusses recent data which indicate, contrary to popular belief, that the US is not a greatly overmedicated society which abuses antianxiety/sedative drugs and that physicians are generally cautious in prescribing drugs of this type. The increasing use of drugs to control behavior and alleviate uncomfortable symptoms will require greater public attention and scrutiny, and studies which continually monitor prescription rates and drug consumption will aid in establishing policies relevant to preventing the abuse of these drugs.—*L. Gorsey.*

997. Helfgot, Joseph. (State U New York, Stony Brook) **Professional reform organizations and symbolic representation of the poor.** *American Sociological Review*, 1974(Aug), Vol 39(4), 475-491.—Examined the changes and sources of change in Mobilization for Youth, a well-known professional reform organization emphasizing the interplay of change-oriented goals with their environment. The extent and forms of 2 goals, militant community action and indigenous participation, were traced throughout the organization history, and a distinction was made between various interpretations of participation and the concept "indigenous." To maintain the organization its goals were changed many times. Maintenance was aided by the recruitment of professionalized, middle-class, minority group members, taken as being the equivalent of the poor. A feature of professional reform organizations is just such symbolic representation. Several interpretations of these results in terms of other government-sponsored reform movements are discussed. (38 ref)—*Journal abstract.*

998. Jakobi, L. & Marquer, P. (Musée de l'Homme, Ctr of Anthropological Research, Paris, France) **[Study of the relations between matrimonial matching and exogamy for two groups of French couples.]** (Fren) *Biométrie Humaine*, 1973(Mar), Vol 8(1-2), 21-37.—Reports a study of 238 French married couples from endogamous groups (in which individuals are restricted to marriage within the group) compared with 132 exogamous couples (not thus restricted), both groups from agricultural areas of Brittany and Bearn. Anthropometric and social data were compiled and correlated.



and similarities and differences between the groups are reported. (English summary)—*B. L. Kintz.*

999. Kentsmith, David K. (U Nebraska, Medical School, Psychiatric Inst. Omaha) **The rape of the lock revisited.** *Psychiatric Quarterly*, 1973, Vol 47(4), 571-585.—Reviews the significance of hair in history and legend and considers the impulses which lead young American males to wear long hair. It is concluded that the projective reaction of adults to long hair on an adolescent male is "the result of an intensive challenge to the success of repression by an adult of his own primitive drives, both aggressive and sexual."

1000. Khandekar, Mandakini. (Tata Inst of Social Sciences, Unit for Study of the Urban Child & Youth, Bombay, India) **A study of drop-outs.** *Indian Journal of Social Work*, 1974(Jan), Vol 34(4), 367-385.—Describes a study of socioeconomic and environmental characteristics of 14-21 yr old dropouts from a secondary education. Among the items examined were the educational background of the dropouts (DO) and of other children in the household, the factors which contributed to dropping out, the extent of the DO's knowledge of educational and vocational training opportunities, their motivation for such training, and their reactions to rehabilitation programs. Preliminary findings are discussed.

1001. Kolb, Douglas; Gunderson, E. K. & Nail, Richard L. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Pre-service drug abuse: Family and social history characteristics.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 278-282.—Administered a personal history and drug use questionnaire to 903 enlisted men at a US Navy drug rehabilitation center. Illegal use of 6 types of drugs (cannabis, hallucinogens, opiates, stimulants, hypnotics, and cocaine) before entrance into the service was assessed, and 4 levels of preservice drug involvement were defined (low, low average, high average, and heavy). There were 468 nonusers. Results show that (a) heavy preservice drug use was associated with manifestations of disturbed family relationships (e.g., running away, negative relationships with fathers, and leaving home at an early age); (b) heavy use was also associated with a history of antisocial behavior in the community and poor school adjustment; and (c) heavy preservice users exhibited a pattern of fiscal irresponsibility and histories of outpatient psychiatric or psychological treatment. There was no relationship between preservice drug use and any major health problem preceding the year of entry into the service or between drug involvement and emotional disorders among siblings. Socioeconomic status was not a major factor in drug use.—*L. Gorsey.*

1002. Krisberg, Barry. (U California, School of Criminology, Berkeley) **Gang youth and hustling: The psychology of survival.** *Issues in Criminology*, 1974(Spr), Vol 9(1), 115-131.—Reports the results of interviews and observations conducted among 22 18-23 yr old black gang leaders in Philadelphia. All leaders were high school dropouts, and their combined arrest records totalled more than 175 contacts with the law, primarily for offenses involving violence, weapon use, and assaultive behavior. The theme of survival in the activities of the gang leaders is predominant; survival becomes a

functional adaptation to an uncompromising social environment. The world views of the leaders incorporate this psychology of survival into beliefs in strict determinism as an explanation of human behavior, a pragmatic and conservative view of human nature, and a refusal to make plans for the future. The effects of an "urban leadership training" program on the outlook and lifestyles of these gang leaders are examined, and reasons for the program's failure are suggested. (19 ref)—*L. Gorsey.*

1003. Larsen, Jean P. & White, Barbara A. (Pocatello School District, ID) **Comparison of selected perceptual and personality variables among college men, deviant and non-deviant in hair length.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1315-1318.—Administered the Security-Insecurity Inventory, the Rod-and-Frame Test, and the Survey of Interpersonal Values to 30 male undergraduates with hair below the shoulders (deviant) and 30 with hair above the shoulders (nondeviant). Significant differences were found between the 2 groups, deviants were more field independent and placed a greater value on Independence and a lesser value on Conformity and Recognition than nondeviants. No differences were found between the 2 groups on the security-insecurity dimension.—*L. Gorsey.*

1004. Lasswell, Marcia E. (California State U, Pomona) **Is there a best age to marry? An interpretation.** *Family Coordinator*, 1974(Jul), Vol 23(3), 237-242.—Discusses research on the average ages of people who marry for the first time, the correlation between age at marriage and success of the marriage, and the age at marriage as it relates to the establishment of a family. Social influences on the trend to marry at a later age are also examined (e.g., Women's Liberation, economic prosperity, and freer attitudes toward sex). When all data are considered, it appears that a successful marriage is best achieved when women are 25 and men are 28; they should not have children until 2 to 3 yrs later. These ages are considerably later than the most popular age for marriage (23 for men and 20 for women), a factor which may contribute to the high divorce rate.—*Journal abstract.*

1005. Levenson, Hanna. (Texas A&M U) **Involvement in antipollution activities and perceived negative consequences from pollution.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1105-1106.—Administered an involvement activities checklist and a measure of the perceived importance of the issue of pollution to 96 male and female members and nonmembers of an antipollution group. Members considered pollution a significantly higher priority problem and believed to a greater degree that they would be negatively affected by pollution than did nonmembers.

1006. Lunneborg, Patricia W. (U Washington) **Validity of Attitudes toward Women Scale.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1281-1282.—Found that the Attitudes toward Women Scale was sensitive to differences between northern and southern college samples and to differences in a northern group exposed to a course on psychology of sex differences. Compared to the normative sample, women grew even more liberal, and original differences between men and women disappeared.

1007. **Marin, Gerardo**. (U de los Andes, Bogota, Colombia) [Psychosocial aspects of the use of marihuana.] (Span) *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 117-124.—Reviews literature on personality, psychosocial and sociodemographic factors, and differences between users and nonusers of marihuana. Theories dealing with this problem are evaluated. (50 ref)

1008. **Mazis, Michael B.; Settle, Robert B. & Leslie, Dennis C.** (U Florida) **Elimination of phosphate detergents and psychological reactance.** *Journal of Marketing Research*, 1973(Nov), Vol 10(4), 390-395.—Administered a questionnaire about attitudes toward laundry detergents, laws regulating the use of phosphates, and demographic characteristics to 76 housewives in Miami, Florida, and to 45 Ss in Tampa (control). Based on reactance theory, it was hypothesized that Miami consumers, who were prohibited by law from buying products containing phosphates, would have more positive attitudes toward the effectiveness of phosphate detergents than consumers living in an area where phosphates were for sale (Tampa housewives), and that Miami consumers would have more negative attitudes toward governmental water pollution measures and laws against phosphate detergents than the consumers unaffected by the phosphate ban. Findings support the hypotheses and also show that Ss forced to switch from their favorite detergent were less favorable about the effectiveness and cost of the no-phosphate vs phosphate detergents than were consumers who were able to maintain brand continuity.—*L. Gorsey*.

1009. **McCutcheon, Lynn E.** (Catholic U of America) **Development and validation of a scale to measure attitude toward population control.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1235-1242.—Describes the development of the Population Opinion Poll (POP), a Likert-type scale designed to measure attitudes toward population control. Its reliability and validity are described, based on data from 376 college students. Significant correlations were obtained between Ss' POP scores and scores on scales measuring social, religious, and birth-control attitudes. (16 ref)—*Journal abstract*.

1010. **Menninger, W. Roy**. (Menninger Foundation, Topeka, KS) **Decisions in sexuality: An act of impulse, conscience, or society?** *Medical Aspects of Human Sexuality*, 1974(Jun), Vol 8(6), 56-91.—Presents a psychoanalytically-oriented discussion of the complex forces that affect decisions about sexual behavior. Sexual anxiety in young adults and adolescents, the role of unconscious and conscious conflict in sexual decision making, sex as an expression of nonsexual motivations and feelings, and the defenses and strategies used by persons who must make these decisions are examined. It is concluded that the anxiety felt in making a sexual decision is more than a problem of guilt, that sexual relationships often embody many of one's ideas about himself, and that the interplay of biological, social, and psychological forces which mediate sexual behaviors may be better understood if discussion groups are made an important component of the counseling process. 4 commentaries on the article are included.—*L. Gorsey*.

1011. **Merenda, Peter F. & Shapurian, Reza**. (U Rhode Island) **English students' perception of Heath and ideal self.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3,

Pt 2), 1207-1210.—Asked 50 English university students to give their perceptions of Prime Minister Heath and of their ideal self using the Activity Vector Analysis. 2 distinct clusters were noted which correspond closely to previously obtained perceptions of national leaders vs the ideal self-concept. Mean vectors for the Heath vs ideal self clusters were essentially uncorrelated ( $r = -.17$ ).—*Journal abstract*.

1012. **Miller, Alma G.** (Acadia U, Wolfville, Nova Scotia, Canada) **The relationship between family interaction and sexual behavior in adolescence.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 285-288.—Videotaped the discussions of 9 families with unmarried pregnant daughters and 7 families with daughters who were members of a community organization (Girl Scouts). Each segment of the videotaped interaction was classified into 1 of 12 categories (e.g., agreement or disagreement), using Bales interaction process analysis. The 2 types of families did not differ on daughter's age, parents' ages, social class, family size, or religion, but the daughters did differ on birth order and school grades. Data support several distinctive patterns in families of unwed mothers which were identified from the clinical literature, including powerful mother, passive father, daughter excessively involved with mother, and negative interactions.—*L. Gorsey*.

1013. **Morrow, Gary R.; Clarke, Walter V. & Merenda, Peter F.** **Perception of role of the President: A nine-year follow up.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1259-1262.—Administered the Activity Vector Analysis to 31 16-43 yr old college students matched for age and sex with a 1964 sample surveyed by P. F. Merenda (see PA, Vol 39:7611) to assess the words which they felt described the kind of person the President of the United States should be. Comparisons of the resulting cluster with the previously obtained data show that there has been a slight change in the stereotyped perception of the ideal president in that the new ideal is generally less opinionated and decisive as well as more receptive and appreciative of another person's point of view than was previously found.—*Journal abstract*.

1014. **Murphy, H. B.** (McGill U, Montreal, Quebec, Canada) **Theories of youth unrest in cross-cultural perspective.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 31-40.—Reviews the literature on the adolescent protest movement in different societies. It is concluded that most of these movements cannot be explained in terms of 1 theory of adolescence, but that their behavioral aspects can be explained by a combination of the psychoanalytic theory of adolescent sexuality, sociological role theory, and the theory of the hierarchy of needs. (60 ref)

1015. **Pierson, Elaine C. & D'Antonio, William V.** (U Pennsylvania, Student Health Service) **Female and male: Dimensions of human sexuality.** Philadelphia, PA: J. B. Lippincott, 1974. ix, 349 p. \$8.95(cloth), \$5.95(paper).—Presents an introduction to the anatomy, physiology, and psychology of sexual behavior, intended for young adults. Sexual dysfunctions, reproduction, contraception and abortion, factors in premarital and nonmarital sex, marriage, and adolescent sexual behavior and concerns are discussed. (7 p ref)



1016. Pliner, Patricia & Cappell, Howard. (Erindale Coll, U Toronto, Mississauga, Ontario, Canada) **Modification of affective consequences of alcohol: A comparison of social and solitary drinking.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 418-425.—Tested 2 predictions based on S. Schachter's 1964 theory of emotion regarding the interaction of alcohol consumed in social and solitary situations. Ss were 60 male and 60 female 18-30 yr old adults. It was predicted that the cognitive circumstances of social drinking would promote an affective response to alcohol, whereas the same objective level of intoxication would be responded to as physical symptoms among solitary drinkers. Additionally, it was predicted that the social manipulation would be effective only to the extent that "plasticity" was induced (i.e., only when alcohol and not placebo was consumed). Both predictions were generally confirmed, using self-report of mood and O ratings of amusement as dependent variables. It is conjectured that the social circumstances of drinking may be important in determining the reinforcing value of the intoxicated state. (15 ref)—*Journal abstract*.

1017. Preston, Samuel H. (U Washington) **Differential fertility, unwanted fertility, and racial trends in occupational achievement.** *American Sociological Review*, 1974(Aug), Vol 39(4), 492-506.—Estimated the effects on future occupational achievement and mobility levels of maintaining current class differences in fertility. Separate computations were made for the white and nonwhite populations, under the assumption that both groups will be subject to the mobility regime of all men recorded in the 1962 Current Population Survey (mean age = 43.3 yrs). Because fertility differentials are larger in the nonwhite population, maintaining them has a greater impact on this group. Differential fertility reduces the proportion of nonwhite men in the top 3 occupational groups by 10-11% in the 2nd generation and beyond, and raises the proportion in the bottom 3 groups by 21-23%. Eliminating unwanted fertility from recorded class differences largely removes the effect of differential fertility on occupational distributions. (25 ref)—*Journal abstract*.

1018. Quarter, Jack. (Ontario Inst for Studies in Education, Toronto, Canada) **Political socialization at the University of Toronto: A three-year longitudinal study.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 219-233.—Analyzed change in the political orientation of 248 male students between their entrance and departure from a Canadian university; the characteristics related to change were also examined. These investigations were conducted in 2 settings—a laboratory where artificial conditions were set up to induce a change in attitudes and a natural field setting where changes in attitudes were viewed over a 3-yr period. Although results provide partial support for the hypothesis that Ss would be radicalized by their university experience, the change in attitudes was small. Reasons for the small amount of change are discussed. (French summary) (28 ref)—*Journal abstract*.

1019. Ray, Rose E. & Thompson, William D. (Purdue U) **Autonomic correlates of female guilt responses to erotic visual stimuli.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1299-1306.—Investigated the interaction

between the personality trait of sex guilt and types of sexual stimuli and their effect on heart rate and the galvanic skin response (GSR). 60 undergraduate women were divided into high sex-guilt and low sex-guilt groups on the basis of their responses to Mosher's True-False Guilt Inventory. 10 high sex-guilt and 10 low sex-guilt Ss were randomly assigned to each of 3 experimental stimuli. All Ss responded with significantly greater GSRs when viewing the masturbatory and coital stimuli than they did while viewing the dating stimulus. Low sex-guilt Ss exhibited a significant cardiac deceleration when viewing the coital stimulus, while high sex-guilt Ss exhibited a nonsignificant cardiac acceleration to the same stimulus. (27 ref)—*Journal abstract*.

1020. Reich, Wilhelm. **The function of the orgasm: Sex-economic problems of biological energy: Volume I of The Discovery of the Orgone.** (Trans Vincent R. Carfagno). New York, NY: Touchstone, 1973. viii, 400 p. \$3.95.—Presents the core of W. Reich's search for a single basic, universal force underlying life and creation. Reich's medical and scientific study of the human organism over a period of 20 yrs is summarized, and the development of this work from psychology into biology and into the discovery of the cosmic orgone energy is traced.

1021. Rohrbaugh, Michael & Eads, Gerald. (U North Dakota) **Effects of the Vietnam experience on subsequent drug use among servicemen.** *International Journal of the Addictions*, 1974, Vol 9(1), 25-40.—Data from 3 groups of 1,743 active duty servicemen surveyed in 1971 at a midwestern military installation provided only limited evidence that service in Southeast Asia affected subsequent drug use. The reported incidence of opiate use in the presurvey month was higher for Vietnam returnees than for nonreturnee controls from the same units on only 1 of 3 surveys.

1022. Rosenblum, Jay A. (New York U, Medical School) **Human sexuality and the cerebral cortex.** *Diseases of the Nervous System*, 1974(Jun), Vol 35(6), 268-271.—Reviews the literature on the physiological relationships between the cerebral cortex and various aspects of sexual behavior and experience. Evidence indicates that there is a link between the temporal lobes and sexual behavior. Cases of temporal lobe epilepsy associated with sexual disorders (e.g., impotency and hyposexuality) are reviewed. Important issues and problems in this research field are discussed, including the meaning of deviant sexual behavior and the lack of basic criteria and definitions of impotency and hyposexuality.—A. Olson.

1023. Sorrentino, Richard M.; Vidmar, Neil & Goodstadt, Michael S. (U Western Ontario, London, Canada) **Opinion change in a crisis: Effects of the 1970 Canadian kidnapping crisis on political and ethnic attitudes.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 199-218.—Conducted a total of 7 surveys with 2 separate sample populations (310 English-Canadian residents and 595 Canadian college students) before, during, and after the Canadian kidnapping crisis of 1970, in which a militant French separatist group kidnapped 1 English and 1 Canadian official. While no long-term effects on opinions towards French Canadians or the government's use of restrictive measures were

observed, results show considerable short-term changes in opinions during the height of the crisis. Ss increased their support of any action which was or could be taken by the government in order to deal with the crisis; they also tended to obscure differences between those directly or indirectly involved with the crisis. Other reactions to the crisis as well as the methodological implications of the study are discussed. (French summary) (18 ref) —*Journal abstract.*

1024. Stoeckeler, Hazel S. & Hasegawa, Minoru. (U Minnesota, St Paul) **A technique for identifying values as behavioral potentials in making consumer housing decisions.** *Home Economics Research Journal*, 1974(Jun), Vol 2(4), 268-280.—Describes a technique for measuring and interpreting individual hierarchies of values and for identifying individuals as types according to their values. 207 female undergraduates in 3 sections of a beginning course in housing, 169 of their parents, and 74 young males of the student's choice were administered pre- and posttest questionnaires assessing the relative importance of 9 sociopsychological variables in both personal orientation and housing decisions. The scoring system is based on a computer analysis of response hierarchies and cross-classified data. Data (a) suggest that this methodology can provide a means for gathering individual and group data on values and for identifying behavioral potentials in making consumer decisions and (b) confirm the existence of housing value groups. The importance of "economy" and "family centrism" in housing value hierarchies as previously reported was also supported. (21 ref)—*Journal abstract.*

1025. Toldson, Ivory L. (Temple U) **The human potential movement and black unity: Counseling Blacks in groups.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 69-76.—Discusses how the human potential movement is oriented almost entirely to white problems and how it promotes racism and the negative aspects of capitalism. It is suggested that, if revamped, the movement may be helpful in restoring and furthering black unity by organizing "black identity groups" for helping blacks to recognize their individuality and their African heritage.

1026. Turner, Barbara F. & Kahn, Robert L. (U Massachusetts, School of Education, Amherst) **Age as a political issue.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 572-580.—Studied attitudes toward aging, chronological age, and the role of age as a political issue in a primary election contest between 2 candidates of similar ideology but markedly different ages—a 40-yr-old challenger vs an 84-yr-old incumbent. Interviews were obtained during the weeks preceding the election with 256 respondents, drawn from middle-class areas in the election district. It was found that attitudes toward aging, measured by semantic differential, became more favorable as age of respondent increased. Despite this, candidate preference was not related to age. Preference for the younger man was related to negative attitudes toward the age of the older candidate and to perception of age as a salient campaign issue. Opinions regarding each candidate reflected primarily a strong bias for the preferred candidate. It is concluded that the age of the 2 men did not in itself substantially influence candidate preference.—*Journal abstract.*

1027. Uricchio, William A. & Williams, Mary K. (Carlow Coll) **Proceedings of a research conference on natural family planning.** Washington, DC: Human Life Foundation, 1973. xxv, 316 p.—Includes topics on biorhythms; gamete survival and effects of aging; US clinical experiences; prediction, detection, and control of ovulation; psychological and sociological implications; and method effectiveness evaluation in family planning.

1028. West, Ranyard. **International law and psychology: 2 studies: The intrusion of order, Conscience and society.** Dobbs Ferry, NY: Oceana Publications, 1974. xxvii, 260 p.—Presents 2 theoretical discussions of psychology, political philosophy, social ethics, and human nature. Topics and concepts discussed include the roots of prejudice, reactions to power, law vs sovereignty, critical episodes in modern history, current issues in the psychology of politics, psychological theories of human nature, the nature of loyalty, and the role of social organization in international law.

1029. Wogan, Michael. (U Connecticut) **Illicit drug use among college students.** *College Student Journal*, 1974(Apr), Vol 8(2), 56-62.—Summarizes some of the data pertaining to the use of illicit drugs among college students. According to J. L. Anker (1971), the following percentages of lower-classmen (freshmen and sophomore students) have used the indicated drugs on one or more occasions: marihuana, 55%; amphetamines, 19%; hallucinogens, 16%; barbiturates, 12% and opiates, 7%. Drug usage was positively associated with the higher social classes. Drugs seem to be used most frequently by students in large private liberal arts colleges, then (in descending order of frequency) by those in private universities, major state universities, smaller state universities, small colleges, and junior colleges. Agnostics and atheists reported the most frequent usage, followed by persons claiming adherence to an Eastern religion, Jews, Catholics, and Protestants. Although usage was more frequent among lower-classmen, use by juniors and seniors is increasing. Female students reported a lower percentage of drug usage than males. Drug users were more adventuresome than nonusers. (25 ref)—*A. J. Ter Keurst.*

1030. Wolins, Martin (Ed.). (U California, Berkeley) **Successful group care: Explorations in the powerful environment.** Chicago, IL: Aldine, 1974. ix, 463 p. \$14.75.—Presents a collection of relevant research on group child-care in cross-cultural perspective. Successful group-care settings in Austria, Great Britain, Israel, Mexico, Poland, the Soviet Union, and Yugoslavia are detailed, as well as those in the US. (33 p ref)

1031. Zikmund, William G. & Miller, Stephen J. (Oklahoma State U) **Internal/external control of reinforcement and women's participation in direct social action.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1163-1166.—Mailed a questionnaire and Rotter's Internal-External (I-E) Control Scale to a probability sample of women in 1 state to investigate the relationship between internal-external control of reinforcement and women's participation in the 1973 consumers' meat boycott. Analysis of responses on the 166 returned questionnaires did not support the hypothesis that internals, as determiners of their own fate, would be more active in this socioeconomic event. Results suggest



that the power of the I-E Scale to predict boycott behavior is weak.—*Journal abstract.*

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

1032. Abernethy, Virginia. (Harvard U, Medical School, Boston) **Dominance and sexual behavior: A hypothesis.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 813-817.—Primatological, ethnographic, and psychiatric data suggest the hypothesis that male dominance facilitates male-female copulatory behavior while female dominance inhibits it. A mother-son pair of rhesus macaques is described in which 2 incestuous episodes took place. Several human societies in which the wife is economically independent of her husband and has higher status in the home are discussed, as well as the significance of maternal dominance in the dynamics of male homosexuality. Presentation of these data is followed by suggestions for testing the hypothesis and a discussion of the social and therapeutic implications of the observed relationships. (18 ref)—*Journal abstract.*

1033. Armistead, Nigel (Ed.). **Reconstructing social psychology.** Harmondsworth, England: Penguin, 1974. 330 p. \$3.95.—Presents 20 essays on current developments in humanistic psychology, phenomenology, and Marxism. The value judgments of conventional social psychology are criticized, and suggestions are made for the reconstruction of social psychology for a contemporary society.

1034. Berk, Richard A. (Northwestern U) **Collective behavior.** Dubuque, IA: Wm. C. Brown, 1974. viii, 80 p.—Discusses methodological issues in the study of collective behavior; recent approaches to group processes; and the perspectives of Freud, G. LeBon, H. Blumer, W. Kornhauser, and N. Smelser.

1035. Cahn, Meyer M. (California State U, San Francisco) **Desacralization as a response to group change.** *Interpersonal Development*, 1973-1974, Vol 4(1), 62-64.—Discusses the phenomenon of desacralization. When groups or individuals have not participated in the working through of change experiences, they are often left without sufficient emotional resources for responding in a satisfactory and collaborative way. In such a condition, they often respond by minimizing or negating the story of change which is being reported to them.

1036. Cooper, Cary L. (U Manchester, Inst of Science & Technology, England) **A bibliography of current encounter and T-group research: 1971-1973.** *Interpersonal Development*, 1973-1974, Vol 4(1), 65-68.

1037. Crahay, S. [Close field conflict.] (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 302-310.—Examined therapeutic interviews and analyzed conflict situations which for emotional or social reasons appear to be without solution. These analyses offer a better understanding of the patient's adaptive abilities, or his lack of them, and suggest strategies to help patients in their struggle to adjust to existential conflicts. (Dutch, English, German, Italian & Spanish summaries)—*E. Coché*

1038. Eoyang, Carson K. (Stanford U) **Effects of group size and privacy in residential crowding.** *Journal*

*of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 389-392.—Conducted a field survey of residents of a university trailer park to distinguish between the effects associated with group size and effects associated with social stimulation. The S sample consisted of 58 university students who were asked to rate their living space and their satisfaction with various aspects of trailer living. The results show that with total area fixed, the numbers of occupants per unit accounted for greater variance in living space ratings than did degree of privacy, and time and personal attributes accounted for few differences in satisfaction. Results also support the distinction between the psychological experience of crowding and the conditions that induce it.—*Journal abstract.*

1039. Gerson, Barbara. (New York U) **Consciousness-raising groups with elementary school girls: A case study.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 30-35.—Describes a consciousness-raising (C-R) group for 4th- and 5th-grade girls in a public school. The girls took a questionnaire to determine their degree of sex-role stereotyping; results indicate that members came to the group with "liberated" viewpoints. Differences between girls and women's C-R groups were observed, but also similarities. Topics discussed in group sessions included relationships with parents, sex, dating, attractiveness, marriage, and future careers. The girls seemed to benefit more from talking about present problems than about future goals.—*C. P. McCreary.*

1040. Hinde, R. A. (MRC Unit on the Development & Integration of Behaviour, Cambridge, England) **Biological bases of human social behaviour.** New York, NY: McGraw-Hill, 1974. xv, 462 p.—Reviews studies of nonhuman species and extrapolates from animal to human social behavior. Questions of causation and development in communication, early social experience, mother-infant interaction, aggression and sociosexual behavior, and group structure and spatial relationships are discussed. (35 p ref)

1041. Lankford, Philip M. (U California, Los Angeles) **Comparative analysis of clique identification methods.** *Sociometry*, 1974(Jun), Vol 37(2), 287-305.—Applied 5 methods, each representative of a distinctive mathematical approach to clique identification, to 2 sociomatrices and compared the results. The matrices were selected for their mathematical properties to test certain characteristics of the methods. L. L. McQuitty's linkage analysis provided a cheap, efficient means of producing a few strongly linked cliques. Direct factor analysis and factor analysis of a correlation matrix produced similar results, but direct factor analysis was relatively expensive and provided a less workable solution. C. H. Hubbell's method of raising a matrix to the  $p^{\text{th}}$  power did less well, as the relative number of zero entries may affect the resulting cliques. Multidimensional scaling did very poorly, producing cliques dissimilar to those produced by the other 4 methods. (28 ref)—*Journal abstract.*

1042. Morrison, Richard J. (Carnegie-Mellon U) **Caplow's model: A reformulation.** *Journal of Mathematical Sociology*, 1974, Vol 3(2), 215-230.—Examines T. Caplow's (see PA, Vol 31:6902) model of coalitions in

the triad and identifies several shortcomings. Retaining the basic structure of Caplow's arguments, the problem is recast as one of interdependent rational decision-making. The reformulation allows a more general notion of strength and the adoption of probabilistic choice to allow predictions about the relative frequencies of the various coalitions. (15 ref)

1043. **Murstein, Bernard I. & Spitz, Leah T.** (Connecticut Coll) **Aristotle and friendship: A factor-analytic study.** *Interpersonal Development*, 1973-1974, Vol 4(1), 21-34.—Proposes several hypotheses suggested by Aristotle's concepts of friendship. These hypotheses were tested factor-analytically. 3 dimensions (factors) of friendship were examined: Goodness, Enjoyableness, and Utility. An 80-item bipolar adjective checklist was constructed and administered to 120 female undergraduates. Results of the factor analyses are generally consistent with the formulations of Aristotle as propounded some 2,000 yrs ago.—*Journal abstract.*

1044. **Orlick, T. D.** (U Ottawa, Faculty of Physical Education, Ontario, Canada) **An interview schedule designed to assess family sports environment.** *International Journal of Sport Psychology*, 1974, Vol 5(1), 13-27.—Constructed an interview schedule which proved to be valid and internally consistent, and to have an average inter-rater scoring reliability of .93.

1045. **Schellenberg, James A.** (Western Michigan U) **An introduction to social psychology.** (2nd ed.) New York, NY: Random House, 1974. viii, 360 p.—Presents an introductory review and discussion of 7 areas of social psychology and theory and research—affiliation, aggression, social influence, attitudes, groups, social norms, and personality in society—emphasizing that social psychology is the study of interpersonal processes and behavior. (10 p ref)

1046. **Watts, Thomas D.** (Tulane U) **Ethnomethodology: A consideration of theory and research.** *Cornell Journal of Social Relations*, 1974(Spr), Vol 9(1), 99-115.—Reviews the rationale of ethnomethodology in terms of its linguistic, normative, and reflexive uses. The use of ethnomethodological procedures in assessing the social organization and processing of various institutions (e.g., the judicial system) is also examined. (87 ref)

#### Group Dynamics & Interpersonal Communication

1047. **Behrendt, William; O'Neal, Edgar & Morris, Louis.** (Tulane U, Newcombe Coll) **Beliefs about one's bodily state, emotionality, and aggression.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 411-416.—Gave a placebo to 70 male undergraduates, telling them that it was a stimulant, analgesic, reflex-inhibitor, or vitamin. Ss completed a mood questionnaire, after receiving either 6 shocks (attack) or 2 shocks (no attack), ostensibly an evaluation of their solution to a problem. They then used shock to evaluate a standard solution produced by their former evaluator (a confederate). No significant differences were detected among the placebo conditions in shock number, duration, intensity, or latency. However, among Ss reporting that the "drug" seemed to have some effect, those attacked and taking the reflex-inhibitor had significantly longer shock latencies. Attacked analgesic Ss did not perceive the shocks as less painful but rated themselves highest in insult. (17 ref)—*Journal abstract.*

1048. **Black, Harvey & Angells, Virginia B.** (Boston U) **Interpersonal attraction: An empirical investigation of platonic and romantic love.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1243-1246.—Used a 2 × 4 design to assess effects of sex and college class on judgment of platonic and romantic partners by 198 male and 175 female undergraduates. Females gave higher overall ratings to past or present platonic and romantic partners than males. This result may be attributed to the belief that interpersonal attraction may be related to contemporary sex-role patterns.—*Journal abstract.*

1049. **Brehmer, Berndt.** (U Umea, Psychological Inst, Sweden) **Policy conflict and policy change as a function of task characteristics: III. The effects of the distribution of the validities of the cues in the conflict task.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 135-138.—Used K. R. Hammond's (see PA, Vol 40:4126) "lens model" interpersonal conflict paradigm in a 2 × 2 design which varied levels of task predictability and levels of cue validity distribution (only 1 cue valid vs 2 equally valid cues) with 64 paid undergraduates. Results show that the level of agreement was higher when only 1 cue was valid than when both cues were valid, but this effect was obtained only when task predictability was high. In the low-predictability condition there were no differences between the 2 levels of cue validity distribution. Results also show that agreement was a positive function of the predictability of the task. It is concluded that, to understand policy conflict, it is not sufficient to analyze only the characteristics of the parties to the conflict; it is also necessary to analyze the characteristics of the task facing the parties.—*Journal abstract.*

1050. **Brehmer, Berndt.** (U Umea, Sweden) **Policy conflict and policy change as a function of task characteristics: IV. The effect of cue intercorrelations.** *Umea Psychological Reports*, 1974, No 79, 24 p.—Hypothesized that intercorrelations between the cues in the conflict task will inhibit the reduction of the systematic differences in policies in policy conflict as studied in K. R. Hammond's (1965) "lens model" interpersonal conflict paradigm. 2 experiments were conducted with 64 undergraduates in each. Results support the hypothesis and suggest that the effect was due to the fact that the Ss had greater freedom in developing different policies when the cues were intercorrelated. Findings also suggest that the process of policy change, when the conflict task has a lower degree of predictability than the original policy learning task, might differ from that when the conflict task has the same predictability as the original task. (20 ref)—*Journal abstract.*

1051. **Brown, G. A.** (New U Ulster, Coleraine, Northern Ireland) **A reply to Turner and Sevinc.** *British Journal of Social & Clinical Psychology*, 1974(Jun), Vol 13(2), 217.—Responds to C. T. Turner and M. Sevinc's (see PA, Vol 52: 12286) methodological criticisms of the author's study of interaction patterns among British and immigrant children. The criticism that sex bias existed in the data is agreed with, and the reliability of the behavior classification instrument is discussed.

1052. **Carp, Frances M.** (Wright Inst, Berkeley, CA) **Position effects on interview responses.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 581-587.—Investigat-



ed the effects upon response distributions of 2 types of position effect: the serial order in which response options for an item are presented and the location of an item in an interview. Primacy effect was statistically significant and meaningfully large in regard to evaluative items in an interview with 899 adults aged over 65 yrs; either the positive or negative end of the scale drew more responses when it was presented first. This effect was not observed for factual items. There was no difference in responses to an evaluative item presented early and late in the interview with response options in the same order at both presentations. Results suggest that it may not be necessary to present general questions prior to specific ones in order to avoid response contamination, though further evidence is necessary. It is concluded that (a) to obtain valid group values, counterbalanced presentation of response options is necessary; and (b) standard scores for individuals should be used in making subgroup comparisons and other statistical procedures (e.g., correlational analysis). (16 ref)—*Journal abstract*.

1053. Cicourel, Aaron V. (U California, San Diego) **Cognitive sociology: Language and meaning in social interaction.** New York, NY: Free Press, 1974. 179 p. \$7.95(cloth), \$2.50(paper).—Analyzes the relationship of language and social dynamics and argues for a fuller understanding of the verbal and nonverbal communications which make man a social being. Criticisms of recent linguistic theories are presented to emphasize the idea that cognitive and linguistic structures are basic to social interaction, and empirical data from a 1st-grade classroom and the sign language of the deaf are included to illustrate the principles of ethnomethodology, interpretive procedures and normative roles, and cross-modal communication. (6 p ref)

1054. Codol, Jean P. (National Ctr for Scientific Research, Lab of Social Psychology, Aix-en-Provence, France) **[Social norms and the pattern of equilibrium.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 201-218.—Asserts that the pattern of equilibrium is only a manifestation of social "good form" and is thus highly dependent on the culturally normative character of the social relations to which it is applied. 70 Ss were asked to judge, from their own and others' viewpoints, the more or less normative character of 2 types of social relations; i.e., friendliness-unfriendliness and agreement-disagreement of ideas. Of 16 correlations calculated in the different experimental conditions for the relation between the pattern of equilibrium manifested by each S and the degree of normativeness attributed to each type of relation, 14 were statistically significant. Equilibrium and social norms appeared to be interdependent.—G. Rubin-Rabson.

1055. Efran, Michael G. (Scarborough Coll., U. Toronto, Ontario, Canada) **The effect of physical appearance on the judgment of guilt, interpersonal attraction, and severity of recommended punishment in a simulated jury task.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 45-54.—Conducted an opinion survey with 108 college students and a simulated jury experiment with an additional 66 college students. The survey revealed that most Ss believed that (a) a defendant's character and previous history should influence jurors' decision (79%) and (b) the defendant's

physical appearance should not bias these decisions (93%). The simulated jury experiment tested the hypothesis (derived from a reinforcement model of interpersonal attraction and previous research on physical appearance) that attractive defendants would be more positively evaluated than unattractive ones despite the seeming irrelevance of appearance to judicial decisions. It was found that physically attractive defendants were evaluated with less certainty of guilt ( $p < .05$ ), less severe recommended punishment ( $p < .005$ ), and greater attraction than were unattractive defendants. The importance of independent affective and cognitive components of the attraction process is emphasized. (32 ref)—*Journal abstract*.

1056. Entwisle, Doris R. & Webster, Murray. (Johns Hopkins U) **Expectations in mixed racial groups.** *Sociology of Education*, 1974(Sum), Vol 47(3), 301-318.—Studied how the status characteristics of adults and children affect adults' ability to raise a child's expectations of his own performance on school-like tasks. Black and white 2nd, 3rd, and 4th graders participated in a team story completion task with middle-class black and white young adult women serving as Es. Ss whose rates of volunteering items for the stories were near the median were then assigned to either a 2nd story completion group in which he received strong positive reinforcement from E or a control group in which he listened to a story. All Ss then completed another team story completion task. White adults were effective in raising expectations of white or black children in mixed racial work groups; black adults were effective with black children but not with white children in mixed groups. Results, both consistent and inconsistent with previous findings from homogeneous groups, are interpreted in terms of the children's relative socioeconomic position with respect to members of their own race. (19 ref)—*Journal abstract*.

1057. Fox, Renée C. **Experiment perilous: Physicians and patients facing the unknown.** Philadelphia, PA: University of Pennsylvania Press, 1974. 262 p. \$5.95.—Presents a physician's account of a 2-yr period in the lives of the patients and other doctors on a small metabolic research ward. Problems and stresses of both the physicians and patients are discussed in detail, case examples are presented, and the significance of this "experiment perilous" within the field of the sociology of medicine is examined.

1058. Fromme, Donald K. & Beam, Donna C. (Oklahoma State U.) **Dominance and sex differences in nonverbal responses to differential eye contact.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 76-87.—Divided 16 male and 16 female undergraduates into high- and low-dominant groups based on scores on the Bernreuter Personality Scale. Ss were assigned to 1 of 2 cohorts who either avoided eye contact or maintained a steady gaze. Starting 100 in. apart, Ss were asked to approach the cohort to the point where they felt most comfortable. Dependent measures were personal space, approach rate, reciprocal eye contact, and attitude toward cohort. It was found that high-dominant Ss showed increased proxemic behavior in responding to a direct gaze, while low-dominant Ss showed a decrease. Males tended to use personal space and approach rate to

signal dominance, while females used reciprocal eye contact. An exception was found to previous findings that positive attitudes are associated with high levels of eye contact; low-dominant males, but no other group, responded to direct gaze with a more negative attitude. (24 ref)—*Journal abstract*.

1059. Furukawa, Hisataka. (Kyushu U., Fukuoka, Japan) [The effect of success or failure evaluation upon followers' morale and perception of leadership function.] (Japn) *Japanese Journal of Experimental Social Psychology*, 1972(Mar), Vol. 11(2), 133-147.—Studied the effect of social evaluation (success or failure) upon group members' morale (task satisfaction, group esteem, and group cohesiveness) and their perception of leadership types. 120 junior high school boys were divided into 4- or 5-member groups and asked to make up a story concerning TAT pictures from the Thematic Apperception Test after a 15-min group discussion under a leader whose leadership type was experimentally controlled. The leadership types were performance-oriented (P-type) and maintenance-oriented (M-type). The stories were evaluated by an "authority," who gave success or failure evaluation according to a prearranged scheme. Analysis of variance of Ss' morale scores and evaluation scores of leadership type indicates that (a) the feedback of success evaluation significantly increased Ss' morale and shifted their perception of leadership function toward PM type (strong in both P and M functions), and (b) the feedback of failure evaluation significantly decreased their morale and shifted their perception of leadership toward pm type (weak in both P and M). (23 ref)—*Journal abstract*.

1060. Geen, Russell G. & Stonner, David. (U. Missouri, Columbia) The meaning of observed violence: Effects on arousal and aggressive behavior. *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 55-63.—80 male college students were either attacked by a confederate or treated neutrally and then watched a violent movie. Groups of Ss were told beforehand that the fighting in the movie was motivated by either desires for revenge, professionalism, or altruism. Other Ss were shown the film without comment. Relative to Ss in all other conditions, Ss who had been attacked and told that the fight was motivated by revenge subsequently (a) gave more intense shocks to the confederate, (b) rated themselves as less restrained in aggressing, and (c) manifested higher levels of blood pressure at the conclusion of the film. Results indicate that the meaning attached to observed violence may affect the aggression elicited by that violence in at least 2 ways: by lowering inhibitions against aggressing and by raising arousal levels. (21 ref)—*Journal abstract*.

1061. Grolman, Bernard. (State U New York, Stony Brook) Helping behavior and group size: Some exploratory stochastic models. *Behavioral Science*, 1974(Jul), Vol. 19(4), 210-224.—Reanalyzes data from previous experiments on helping behavior. An exponential model in which the probability of helping behavior taking place remains constant regardless of number of bystanders appears to fit data from experiments involving noncommunicating strangers. An exponential model in which the probability of helping behavior declines as the square of the number of bystanders appears to fit data from experiments involving strangers in an emergency situa-

tion with communication possibilities. Groups of friends in an emergency situation with communication possibilities appear to coordinate behavior so as to engage in helping behavior with the same probability as single individuals.—*Journal abstract*.

1062. Hogan, James L.; Fisher, Roger H. & Morrison, Bruce J. (Miami U) Social feedback and cooperative game behavior. *Psychological Reports*, 1974(Jun), Vol. 34(3, Pt 2), 1075-1082.—Examined the effects of social feedback (praise and criticism) as well as opponent's strategy on the cooperation of 80 same-sex pairs of undergraduates who played 40 trials of the Prisoner's Dilemma game. Feedback was seen by Ss as administered by a peer or E and was either praise or criticism. There were 5 feedback conditions: peer praise, E praise, peer criticism, E criticism, and a neutral control condition. The opponent's strategy was programmed by E to be either Honest-Cooperative, Honest-Competitive, Dishonest-Cooperative, or Dishonest-Competitive. Analysis indicated that feedback was generally effective in increasing cooperation beyond that in the control group. However, with a competitive opponent, only E praise led to increased cooperation. It is suggested that the clarity of the feedback agent's role is crucial and that ambiguous motives may diminish the effectiveness of his feedback.—*Journal abstract*.

1063. Jacher, Wladyslaw. [Contemporary views upon the social bond.] (Poln) *Roczniki Filozoficzne*, 1973, Vol. 21(2), 61-76.—Considers 2 aspects of the social bond: the process of its spreading in the group, illustrated by empirical social research; and the internal nature of the bond itself, illustrated by studies concerning the elements and processes creating the social bond. A survey of modern thought on the social bond is presented, and 2 specific trends are noted: (a) the attribution of social bonds to an internal consciousness of the psychic states of the community and to a common feeling of unity and identification and (b) the concept that social bonds depend on the relationships of the individual to the group and of the individual group to other existing groups. It is suggested that these trends provide material for wider theoretical and empirical research.—*English summary*.

1064. Kaneko, Satoru. (Kyoto U., Japan) [Bargaining behavior in coalition formation: I.] (Japn) *Japanese Journal of Experimental Social Psychology*, 1972(Mar), Vol. 11(2), 109-126.—Studied coalition formation in a 3-person game when members have different power and are allowed to bargain with any other member to ally or to intervene against alliance of others. Reward division between allied members was also subject to bargaining. Ss were 45 junior high school boys, formed into groups of 3 members according to a near-sociometric test. Types of power triad were 3-2-2, 4-3-2, and 4-2-2. Ss advanced on a game board by throwing a die where the rate of advance was determined by the product of points on the die and the power weight which, if the players were allied, was the sum of weights between the allies. Coalitions were formed between the 2 weaker members, thus confirming T. Caplow's hypothesis for the first 2 types of power triad but rejecting it split the 3rd type. In the 3-2-2 triad, equal split of reward among coalition members was observed more often than parity split in



which the reward received is proportional to the power weight; in triad type 4-2-2, the reverse was true. In 4-3-2 triads, the 2 types of reward splitting occurred equally often. (41 ref)—*Journal abstract*.

1065. Krop, Harry; Messinger, Jacqueline & Reiner, Charles. (VA Hosp, Gainesville, FL) **Increasing eye contact by covert reinforcement.** *Interpersonal Development*, 1973-1974, Vol 4(1), 51-57.—Assessed the effects of contingent covert reinforcement on eye contact in 114 unmarried undergraduates who were given a 52-item self-disclosure questionnaire. Following an initial administration of the questionnaire, Ss were randomly assigned to 1 of 3 groups and were administered the questionnaire for a 2nd time. One group was given covert reinforcement contingent upon 5 consecutive sec of eye contact. The 2nd group was given covert reinforcement noncontingently. A control group received no reinforcement. Following a 3rd administration of the items, results show that eye contact increased significantly only for the contingent covert reinforcement group. Follow-up data show that long-term effects were not manifested.—*Journal abstract*.

1066. Lerner, Richard M. & Moore, Tanes. (Eastern Michigan U) **Sex and status effects on perception of physical attractiveness.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1047-1050.—Studied the effects of ascribed academic status, target-person's sex, and rater's sex on the perception of height, weight, and physical attractiveness. The interrelations among these variables were also studied. 301 college students (61% females) rated a male or a female identified as possessing 1 of 5 levels of academic status. In all status conditions, (a) the male and female target persons were seen as about equal in height; (b) the male was estimated as heavier than the female; and (c) at the lowest and intermediate status levels, female Ss saw the male target person as more attractive than the female, while the reverse tended to be the case for males' ratings of the targets. Height and weight estimates were inversely correlated for the male target and positively related for the female target. Height estimates were positively related to attractiveness ratings for the male target, while neither height nor weight estimates predicted attractiveness ratings for the female target.—*Journal abstract*.

1067. Long, Thomas J. & Bosshart, Donald. (U Illinois) **The Facilitator Behavior Index.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1059-1068.—Attempted to develop an instrument which might identify, in more than a global way, persons having attributes of an encounter group facilitator judged effective by both his peers and superiors. A pilot instrument was developed, administered to 24 group facilitators rating 32 group facilitator trainees, and tested against currently available global rating measures in 2 independent trials. Factor analysis indicated that 3 main attributes make independent contributions to the judged effectiveness of an encounter group facilitator: generalized interpersonal sensitivity, ability to express spontaneously a full range of emotions and feelings, and nondirective leadership style. The scale developed is considered to be a useful feedback tool to aid in group-facilitator training, as well as a promising evaluation technique. A finding of this study leads to questions about the effect of group

consensus as a method of rating the effectiveness of group facilitators.—*Journal abstract*.

1068. Melnick, Merrill J. & Chemers, Martin M. (State University Coll New York, Brockport) **Effects of group social structure on the success of basketball teams.** *Research Quarterly*, 1974(Mar), Vol 45(1), 1-8.—Administered a pretournament questionnaire to measure 2 group structural variables—status consensus and cohesion—to 21 university intramural basketball teams. Won-lost percentages were correlated with multiple measures of each variable. Won-lost percentages of the teams which were ranked highest and lowest on each of the structural variables were also compared. Results show that team performance was not significantly related to either status consensus or cohesion. Several methodological problems in investigating the relationship between group social structure and group success are discussed.—*Journal abstract*.

1069. Moore, Joseph A. (Memorial U Newfoundland, St John's, Canada) **Relationship between loneliness and interpersonal relationships.** *Canadian Counselor*, 1974(Apr), Vol 8(2), 84-89.—Investigated H. S. Sullivan's (1953) view that loneliness is related to the type of childhood friends and activities and G. Zillbörg's (1938) view that lonely adults are more hostile in interpersonal situations. 88 female college students filled in a loneliness questionnaire and Leary's Interpersonal Check List, and answered questions about childhood friends. The hostility hypothesis was confirmed and the friendship hypothesis partially confirmed. The more lonely Ss were significantly more hostile-submissive. Findings suggest that a person's own behavior is an enduring mode of interaction responsible for bringing about, perpetuating, aggravating, and/or solving loneliness feelings. (French summary)—*Journal abstract*.

1070. Parker, Laurence. (Cornell U) **The ridiculous: A critique of "The psychology of interpersonal attraction."** *Cornell Journal of Social Relations*, 1974(Spr), Vol 9(1), 165-178.—Offers a critique of a representative work of the current experimental paradigm presented by S. C. Jones (1974) in "The Psychology of Interpersonal Attraction." It is argued that the results which Jones summarized are either trivial, common knowledge, or based on conceptual confusions and that current methods of research and thinking in social psychology are powerless to shed light on phenomena like love and affection. (22 ref)

1071. Pfeiffer, J. William & Jones, John E. **A handbook of structured experiences for human relations training: Volume IV.** Iowa City, IA: University Associates, 1973. vii, 118 p.—Presents a collection of exercises, techniques, and games (called "structured experiences") designed for experienced-based learning and focusing on individual behavior, constructive feedback, processing, and psychological integration. These human relations training materials were gathered from actual training designs and from facilitators in the field.

1072. Sargent, Harold R. (Pennsylvania State U, Sharon) **A new look at informal organization.** *College Student Journal*, 1974(Apr), Vol 8(2), 63-66.—Discusses the informal organization, which comes into being because of unsatisfactory conditions which need to be remedied, but the solutions offered by the administrative

establishment are unacceptable to the group. The organization crystallizes around a leader who serves as spokesman. The purpose of the group is usually vague and changeable but it must satisfy the need for communication. The reactions and interactions of members of the group influence its initiatives and purposes. Positive personalities in the group achieve cooperation among themselves and other similar groups. The informal organization as a protest group seldom subverts the permanent and general goals of the establishment because it is not usually successful enough to hold its members.—A. J. Ter Keurst.

1073. Scheidt, Fredrick J. & Smith, Mary E. (Vassar Coll) **Same-sex dyads and Toman's theory of birth-order compatibility.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1174.—To examine W. Toman's (1962, 1969) theory of birth-order compatibility and the stability of interpersonal relations, dormitory roommates indicated their birth order and the degree of interpersonal conflict experienced with their roommates. Results show that dyads compatible for birth order exhibited less interpersonal conflict than dyads with incompatible birth order ( $p < .05$ ).

1074. Scherer, Shawn E. (U Toronto, Ontario, Canada) **Influence of proximity and eye contact on impression formation.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 538.—Explored the effect of proximity and eye contact on impressions formed by dyad members under an inflexible seating arrangement. Pairs of Ss ( $N = 40$ ) sat 3.5 ft or 8 ft apart, at 0 or 60° orientations, for 10 min, then rated their impressions of one another. Results support the hypothesis that increased proximity and eye contact elicit greater positive evaluations. Ss rated each other most positively in the 3.5-ft, 60° condition and least favorably in the 8-ft, 0° condition.—Author abstract.

1075. Snyder, E. E. & Spreitzer, E. A. (Bowling Green State U) **Involvement in sports and psychological well-being.** *International Journal of Sport Psychology*, 1974, Vol 5(1), 28-39.—Examined the psychological consequences of sports involvement among adults. The theoretical expectation of a positive relationship between such involvement and psychological well-being was generally supported by the data. The relationship between behavioral involvement and psychological well-being was stronger for females, whereas emotional involvement was a stronger predictor of positive affect among males. The salutary consequences of social interaction with other people may contribute to psychological well-being, and participation in sports is an important means of achieving such interaction. In addition, psychological well-being is likely to result from the intrinsic pleasure and fun that flow from sports. (17 ref)—Journal abstract.

1076. Stamm, Keith R. & Pearce, W. Barnett. (U. Washington) **Message locus and message content: Two studies in communication behavior and coorientational relations.** *Communication Research*, 1974(Apr), Vol. 1(2), 184-203.—Describes a process model of coorientation in which 4 cognitive states are defined in terms of the accuracy with which each person in a dyad perceives the similarity between his own orientation and the orientation of the other. 2 studies are reported which (a) studied

the effects of allowing options in the locus of communication behavior and (b) analyzed the degree of self-disclosure in messages generated with respect to different cognitive states. Ss were 176 undergraduates in Study 1 and 36 high school students in Study 2. Results show that the frequency of messages with a locus external to the dyad was low and did not vary across coorientational states. Variance in self-disclosure was not explained by coorientational states. Findings replicate previously demonstrated regularities in information giving and seeking behaviors.—Journal abstract.

1077. Stamps, Louis W. & Teevan, Richard C. (U Wisconsin, La Crosse) **Fear of failure and conformity in the Asch and Crutchfield situations.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1327-1330.—Investigated the relationship between expectancy of failure and conformity behavior with 63 male college freshmen and sophomores. The Thematic Apperception Test was used to measure fear of failure. Conformity was assessed using both S. F. Asch's 1956 procedure, in which 7 confederates opposed S's judgment, and R. S. Crutchfield's 1955 procedure, in which 4 opposing perceptual judgments were given to isolated Ss. Results support the hypothesis that there would be a positive relationship between conformity and expectancy of failure in the Asch situation and not in the Crutchfield situation. Implications for the modification of fear of failure and related behavior are noted. (17 ref)—Journal abstract.

1078. Stanfield, Gary G. (U Missouri, Columbia) **A critique and integration of the major social psychological approaches to the study of coalition formation.** *Kansas Journal of Sociology*, 1974(Spring), Vol 10(1), 5-17.—Attempts to integrate more closely the personality trait approaches and the structural approach to coalition formation. A historical description of the area is presented, and learning and cumulative score are discussed. A critique of sex and Machiavellianism studies concludes with theoretical speculation merging these 2 approaches. The merits of the competing utilitarian theories are examined, and bases of the superiority of W. A. Gamson's 1961 exchange theory are posited. A brief summary of coalition theory is presented. Previously stated restrictions on the application of coalition theory are criticized, and a broader range of application is set forth. (43 ref)—Journal abstract.

1079. Wolf, Gerrit. (Yale U.) **Some conversational conditions and processes of brief encounters.** *Communication Research*, 1974(Apr), Vol. 1(2), 167-183.—Analyzed conversation—the exchange of opinions between 2 parties—as a function of topical experience, attitude polarization, and 3 behavioral processes (agreement, confrontation, and consideration). 2 experiments were conducted which consisted of 15-min conversations between an undergraduate and a confederate who predominantly expressed agreement or disagreement. Os coded the frequency with which the 3 processes occurred in S's responses. In Exp II, the same Ss from Exp I (30 undergraduates) were used to determine if the experience of Exp I would affect a 2nd conversation. Different effects of experience and behavioral-process factors on the frequency of conversational statements were observed. Behavioral processes did not function by a similarity of attitude mechanism. (18 ref)—L. Gorsey.



1080. Worrall, Norman; Taylor, Vanessa M.; Ricketts, Jennifer P. & Jones, Ann P. (Hatfield Polytechnic, England) **Personal hygiene cues in impression formation. *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1269-1270.**—Studied how the differential weights assigned by 80 undergraduates to negative grooming cues (breath odor, sweat odor, dirty fingernails, and dandruff) are used in impression formation. Both sexes used these cues in a similar way when evaluating the opposite sex, but quite differently when evaluating their own sex.

### Social Perception & Motivation & Attitudes

1081. Austin, William & Susmilch, Charles . (U Virginia) **Comment on Lane and Messé's confusing clarification of equity theory. *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 400-404.**—Critically reviews I. Lane and L. A. Messé's 1972 study, which purports to have clarified key issues in equity theory. The issues surrounding a notion of internal standards, and methodological and procedural flaws in the study under review are discussed.

1082. Baron, Robert A. (Purdue U) **The aggression-inhibiting influence of heightened sexual arousal. *Journal of Personality and Social Psychology*, 1974(Sep), Vol 30(3), 318-322.**—Investigated the hypothesis that heightened sexual arousal tends to facilitate subsequent aggression under conditions where Ss have been exposed to strong provocation from the victim but tends to inhibit such behavior in the absence of prior instigation. 40 undergraduate males were angered or not angered by a confederate of the E, exposed to erotic or neutral stimuli, and provided with an opportunity to aggress against this individual by means of electric shock. Results indicate that heightened sexual arousal was highly effective in inhibiting subsequent aggression by Ss in the angered group but failed to influence significantly the strength of such behavior on the part of Ss in the nonangered condition. (17 ref)—*Journal abstract*.

1083. Brigham, John C.; Bloom, Lawrence M.; Gunn, Steven P. & Torok, Thomas . (Florida State U) **Attitude measurement via the bogus pipeline: A dry well? *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 97-114.**—Presented the concepts of response constraint and accuracy constraint as ways of conceptualizing the constraining effects which others may have on a person's expressed attitudinal responses. The bogus pipeline paradigm was used to assess the effects of varying levels of response and accuracy constraints on whites' expressed attitudes. A total of 225 white undergraduates were used as Ss. Attitudes toward blacks were investigated in Studies 1 and 2, and attitudes toward a variety of attitude objects were assessed in Study 3. Few significant differences in responses according to levels of response and accuracy constraint were found. It is suggested that college students' responses in conventional measurement situations, even regarding topics of considerable social sensitivity, may be subject to less intentional bias than is often assumed by researchers. It is further suggested that motivation to avoid being "second-guessed" by a machine may not be as strong as researchers involved with the bogus pipeline paradigm have proposed. (16 ref)—*Journal abstract*.

1084. Calder, Bobby J. (U Illinois) **An analysis of the Jones, Davis, and Gergen attribution paradigm. *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 55-59.**—Considers that attribution theories predict that an inference about a behavior is stronger to the extent that the cause of the behavior appears distinctive. The determinants of this idea of distinctiveness are analyzed using the experimental paradigm of E. E. Jones et al (see PA, Vol 37:1306) in which Ss observe a job interview situation. 2 determinants are discussed: (a) typically, the extent to which information about an internal state is assumed on the basis of an individual's belonging to some category of people; and (b) propensity, the extent to which an internal state in general is associated with a behavior. It is concluded that although some previous research has been structured to create distinctiveness through role cues (in-role vs out-of-role), future studies should recognize the possibility of other cues (e.g., occupation) in producing distinctiveness. —*Journal abstract*.

1085. Carlisle, A. L. & Howell, Robert J. (Utah State Prison, Draper) **Comparison of filmed violence and anger as measured by changes in affective states. *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1259-1266.**—Investigated the relationship between anger, filmed violence, and subsequent aggression in 128 male college students. Angered and nonangered Ss (manipulated by the number of shocks received from a confederate) were shown a violent fight scene or a more neutral but exciting auto race scene. Half of the Ss were then allowed to return shock to their aggressor while the other half looked at a magazine. Level of anger was measured at 3 points during the experiment, using a modified version of the Mood Adjective Check List. Results indicate that both the violent film and the neutral film generated anger. Also, hostile aggression occurred regardless of whether Ss had or had not been angered. These results are discussed in terms of catharsis and reinforcement. Problems of interpretation of film results are also discussed. (15 ref)—*Journal abstract*.

1086. Clark, Kenneth B. (City U New York) **Pathos of power. New York, NY: Harper & Row, 1974. xviii, 188 p. \$7.95.**—Traces the origin, the growing implications, and the conclusions to be drawn from the author's theory of power and its abuse. Criticism is made of human intelligence which serves amoral power; the duties of the intellectual toward human survival and the place of the social scientist in the present and future of mankind are discussed.

1087. Crockett, Walter H. & Miesel, Paul . (U Kansas) **Construct connectedness, strength of disconfirmation, and impression change. *Journal of Personality*, 1974(Jun), Vol 42(2), 290-299.**—In a study with 45 male undergraduates, the degree of connectedness of Ss' interpersonal constructs (measured by the Role Construct Repertory Test) was correlated with the change in their impressions of another person on those constructs. It was found that this correlation was significantly positive when Ss' earlier judgments were said to be poor and their inferences to their most central constructs (measured by an implication grid) were directly disconfirmed. The correlation was significantly negative when Ss' earlier judgments were said to be poor but no

inferences were specifically disconfirmed, and was nonsignificantly negative when Ss' earlier judgments were said to be poor and a behavioral prediction keyed to the most central construct was disconfirmed. It is concluded that for Ss whose personal constructs are massively connected, a change of inference on 1 construct dimension demands a change on many others, while changes of Ss whose constructs are sparsely connected are limited to the disconfirmed construct and 2 or 3 other closely related constructs.—*Journal summary.*

1088. Eiser, J. Richard & White, Camilla J. (U Bristol, England) **Evaluative consistency and social judgment.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 349-359.—Examined the assumption that the polarization of a person's judgments of attitude statements is a function both of his own attitude toward the issue and of the verbal labels used to define the endpoints of the rating scale. 75 14-15 yr olds rated 10 statements concerned with the issue of adult authority on 10 bipolar scales that differed with respect to implicit evaluation. Results support the prediction that the more polarization a person shows on a given scale, the more his own evaluations of the items are congruent with the value connotations of the scale labels. (32 ref)—*Journal abstract.*

1089. Ferguson, Leonard W. & Koury, Norman J. (Ohio U) **Peer drug use as estimated by current users, ex-users, and nonusers of marijuana.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1113-1114.—Data from 577 current users of marijuana in grades 7-12, 453 ex-users, and 8,105 nonusers show that current users and ex-users of marijuana overestimated peer drug usage, while nonusers were essentially correct in their estimations.

1090. Griffitt, William; May, James & Veitch, Russell. (Kansas State U) **Sexual stimulation and interpersonal behavior: Heterosexual evaluative responses, visual behavior, and physical proximity.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 367-377.—Examined the effects of erotica-produced sexual stimulation on heterosexual behavior in 2 experiments. Ss were a total of 94 male and 102 female introductory psychology college students. Results of Exp I show that sexually aroused females evaluated the likability of symbolically represented males more positively than that of symbolically represented females. Sexual arousal was found to exert no influence on males' evaluations of symbolically represented females. Exp II showed that (a) sexually aroused Ss of both sexes attended visually more to opposite-sex than to same-sex targets and looked more at heterosexual targets than did nonaroused Ss, (b) sexually aroused Ss who responded negatively to sexual stimulation physically avoided heterosexual persons in terms of seating proximity, and (c) only those who responded positively to sex stimulation evaluated more favorably or looked more at opposite-sex targets than same-sex targets. (23 ref)—*Journal abstract.*

1091. Hodges, Bert H. (Vanderbilt U) **Effect of valence on relative weighting in impression formation.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 378-381.—Assessed relative weighting of traits in 3 types of personality descriptions: those with only

favorable traits (PP), with favorable and unfavorable traits (PN), and with only unfavorable traits (NN). Ss were 48 introductory psychology students. Predictions that traits in PP descriptions would be weighted equally and that the more negative trait in PN and NN descriptions would receive greater weight were supported by the results. The results are generally consistent with the initial impression averaging model, although a possible difficulty with respect to the relative size of set-size effects for PP and NN descriptions was noted.—*Journal abstract.*

1092. Hottel, Joseph H. & Kahn, Arnold. (Iowa State U) **Sex differences in a mixed-motive conflict situation.** *Journal of Personality*, 1974(Jun), Vol 42(2), 260-275.—Hypothesized that (a) males would be more cooperative and more imitative of each other than would females in the Prisoner's Dilemma game; and (b) when given the opportunity to communicate, males would talk about strategy matters and consequently enhance their levels of cooperation and imitation, while females would discuss nonstrategic matters and show less change in their game behavior. These hypotheses were supported with data from 30 male and 30 female undergraduates. Sex composition of the dyad and communication opportunities were varied over 6 blocks and 30 trials each. Results suggest that males are success-oriented and play opportunistically, and cooperative behavior on their part is an attempt to maximize their gains. Females appear more socially-oriented, and their choice of the competitive response may be a defensive measure in a situation where their primary goal of social interaction is restricted. (25 ref)—*Journal summary.*

1093. Knott, Paul D.; Lasater, Lane & Shuman, Rich. (Colorado Youth Services Inst, Denver) **Aggression-guilt and conditionability for aggressiveness.** *Journal of Personality*, 1974(Jun), Vol 42(2), 332-344.—Reports that scores of 22 male undergraduates on the Rokeach Dogmatism Scale, the Coopersmith Self-Esteem Inventory, the Welsh Anxiety and the Psychopathy (Pd) scales of the Minnesota Multiphasic Personality Inventory, and Block et al's Child Rearing Practices Inventory (CRPI) were related to aggression-guilt as defined by the Mosher Incomplete Sentences Test. High- and low-guilt Ss were then exposed to either reinforcement for aggressive responses (shocks to another S) or to nonaggressive responses. Low-guilt Ss emitted more aggressive responses than high-guilt Ss during the baseline period and were more responsive to reinforcement for aggressive responding than nonaggressive responding. There were no differences between high- and low-guilt Ss on the dogmatism and self-esteem measures. Low-guilt Ss were less anxious and had higher Pd scores than high-guilt Ss. Significant differences between the high- and low-guilt groups were also found on the CRPI. (22 ref)—*Journal summary.*

1094. Lamberth, John; Rataj, Gregory W. & Padd, Wayne. (Temple U) **An evaluation of differential topic importance, population homogeneity, and relatedness of attitudinal stimuli in attraction research.** *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 89-91.—Conducted a reevaluation of topic importance for D. Byrne and D. Nelson's (see PA, Vol 38:10041) pool of attitudes and obtained differential importance



ratings for 56 completely new items as well as correlations between attitude items and the percentage of people favoring each side of each attitude topic. 197 undergraduates completed a new 56-item attitude survey and Byrne and Nelson's attitude survey in 1 of 2 ways: either by ranking the attitudes from most to least important or by assigning numbers from 1 to 4, 1 being the most important and 4 the least important. Results suggest that importance ratings, population agreement on attitude items, and the degree to which attitude topics are related be more carefully considered in the selection of stimuli used in attraction studies.—*Journal abstract.*

1095. Lester, Andrew M. & Thelen, Mark H. (U Missouri) **Effects of creativity on imitative behavior.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1320. —High- and low-creative undergraduates viewed 2 videotaped clinical interviews with a compulsive hand-washer. The script contained 5 "idiosyncratic" interviewer questions. Ss then played the role of the interviewer with a confederate compulsive handwasher. Creative Ss imitated the idiosyncratic interviewer questions significantly more than noncreative Ss.

1096. Merenda, Peter F.; Shapurian, Reza & Clarke, Walter V. (U Rhode Island) **Pre-election public image of Nixon and McGovern given by English students.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 575-578. —Administered the Activity Vector Analysis to 50 English university students, with instructions to check those words which they truly felt described Nixon and McGovern. These opinions were obtained October 30, 1972, 1 wk before the election. There was much greater consensus regarding the public image of Nixon, who was perceived as a hard-hitting, forceful, self-centered, and dominant personality. McGovern, with much less agreement among the respondents, was described as an optimistic, enthusiastic, self-confident personality who displayed a deep interest in people.—*Journal abstract.*

1097. Messé, Lawrence A. & Lane, Irving M. (Michigan State U) **Rediscovering the need for multiple operations: A reply to Austin and Susmilch.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 405-408.—Replies to W. Austin and C. Susmilch (see PA, Vol 53:Issue 1) who question the validity of the present authors' concept of an internal standard. The truism that only empirical tests can answer empirical questions is reaffirmed.

1098. Miller, Arthur G. (Miami U) **Perceived freedom and the attribution of attitudes.** *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 61-79. —192 undergraduates read an essay on amnesty for draft evaders supposedly written by another student. The instructions specified that the position had been assigned or chosen by the writer. The essay's position was either pro or con and was presented in strong or weak terms. Ss were asked a number of questions about the essay and the writer, the primary dependent variable being an estimation of the writer's deepest or truest beliefs on amnesty. The attributional data generally replicated earlier work by E. E. Jones et al (1967, 1971) within correspondent inference theory—specifically that essay content was more determinative of attributed attitudes under choice than no-choice conditions, but still a highly significant factor under no-choice conditions. However,

the finding that a weak essay under no-choice conditions would produce attributions of the opposite attitude was not replicated. The relative weakness of the essays used in Jones et al's and the present study is discussed. Ss were then divided into low and high groups on the basis of the amount of freedom they perceived in both the no-choice and choice conditions. Perceived freedom related in a predictable way to a certain combination of situational variables and meaningfully to a number of judgmental items.—*Journal abstract.*

1099. Naiman, Thomas H. & Breed, George. (U South Dakota) **Gaze duration as a cue for judging conversational tone.** *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 115-122.—Showed 9 silent video-recordings of an older male speaking to a younger female to 23 female undergraduates. The 9 recordings differed in the percent of interaction time that each participant looked at the other's eyes (0, 50, or 100%). At the end of each 15-sec recording, Ss rated the listener's attitude toward the speaker and the tone of the conversation. Results indicate that Ss attended to the visual behavior of the participants to decode the nature of each interaction. Conversational tone and listener attitude were rated highest with increased interpersonal gaze.—*Journal abstract.*

1100. Okanes, Marvin M. (Ohio U) **Machiavellian attitudes and choice of values among students in a business college.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1342.—Administered the Rokeach Value Survey and the Mach V Scale to 97 college seniors in a business policy class. The terminal value of equality and 3 instrumental values—forgiving, honest, and imaginative—showed significantly different rankings between high-Mach and low-Mach groups as predicted.

1101. Risky, Dwight R. & Birnbaum, Michael H. (U California, Los Angeles) **Compensatory effects in moral judgment: Two rights don't make up for a wrong.** *Journal of Experimental Psychology*, 1974(Jul), Vol 103(1), 171-173.—Ratings made by undergraduates of the overall level of morality of persons described as having committed both moral and immoral behaviors indicate that the overall goodness of a person was determined mostly by his worst bad deed, with good deeds having lesser influence.

1102. Seligman, Clive; Paschall, Nancy & Takata, Glenn. (Northwestern U) **Effects of physical attractiveness on attribution of responsibility.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 290-296.—Previous research has shown that a stereotype favorable to physically attractive individuals seems to exist. The present study examined how this "what is beautiful is good" stereotype influences observers' attributions of responsibility to target persons. Ss were 72 male and 72 female high school students. A significant interaction was found between physical attractiveness and the outcome of the event. Physically attractive women were seen as more responsible for a good outcome than unattractive women, while unattractive females were seen as more responsible for a bad outcome than attractive females. Results are interpreted within a framework of balance theory. (French summary)—*Journal abstract.*

1103. Sherman, Richard C. & Dowdle, Michael D. (Miami U) **The perception of crime and punishment: A multidimensional scaling analysis.** *Social Science Research*, 1974(Jun), Vol 3(2), 109-126.—Conducted 2 studies with a total of 412 undergraduates to determine (a) the degree to which seriousness is an underlying dimension in the perception of crimes, (b) the relationship of seriousness and other perceived properties of crimes with punishments prescribed by law and punishments assigned by Ss themselves, and (c) the relationship between personality variables (assessed by the California F Scale and Rotter's Internal-External Control Scale) and both the salience of perceptual dimensions and the severity of punishments assigned. Similarity judgments for 2 sets of crimes were multidimensionally scaled, and in both cases the 4-dimensional solutions were optimal. None of the dimensions was highly associated with judged seriousness. Seriousness was only moderately related to punishments prescribed by law. Authoritarianism and Locus of Control were significantly related to the salience of perceptual dimensions for 1 of the 2 sets of crimes. High authoritarians called for more severe punishments for crimes on 3 of the dimensions in 1 set, but assigned significantly longer sentences than other Ss only for capital offenses. (18 ref)—*Journal abstract.*
1104. Sieber, Sam D. (Columbia U) **Toward a theory of role accumulation.** *American Sociological Review*, 1974(Aug), Vol 39(4), 567-578.—Disputes the assumption that multiplicity of roles produces a strong tendency toward role strain as a consequence of role conflict or role overload. The benefits of role accumulation tend to outweigh any stress to which it might give rise, thereby yielding net gratification. 4 types of rewards derived from role accumulation are discussed: role privileges; overall status security; resources for status enhancement and role performance; and enrichment of the personality and ego gratification. The importance of taking rights more fully into account in research and theory is emphasized. The possibility that barriers to role accumulation are a source of social instability is briefly assessed. (26 ref)—*Journal abstract.*
1105. Sosis, Ruth H. (U Chicago) **Internal-external control and the perception of responsibility of another for an accident.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 393-399.—Investigated the effects of internal-external control (as measured by Rotter's Internal-External Control Scale) upon a perceiver's attribution of responsibility to a defendant in an automobile accident. Ss were 70 high school students who were divided into 3 levels of internal-external control: internal, moderate, and external. Ss were asked to read an account of an automobile accident and a description of the defendant and then to respond to a questionnaire regarding the accident and the defendant. Results indicate that internals assigned the most responsibility to the defendant for the accident, moderates assigned an intermediate amount, and externals assigned the least amount. On items derived from the determinants of the attribution of responsibility as discussed in the literature, internals judged the defendants more harshly than did externals, with moderates falling between the other 2 groups. The data point to the occurrence of projection of the Ss' own respective internality and externality onto the defendant.—*Journal abstract.*
1106. Stevens, Barbara. **The sexually oppressed male.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 16-21.—Presents a theoretical discussion of the meaning of the male sexual stereotype and some of the problems created for men by their sexual roles. In our culture men are denied the opportunity to develop their dependent, emotional selves and are taught a set of rules to "prove" their masculinity. These rules are dehumanizing and prohibit the growth of a truly meaningful relationship with a woman. A case history describes how a man used sexual stereotypes to control or avoid any real relationship with women.—C. P. McCreary.
1107. Stone, Vernon A. & Hoyt, James L. (U Wisconsin, School of Journalism & Mass Communication, Madison) **The emergence of source-message orientation as a communication variable.** *Communication Research*, 1974(Jan), Vol. 1(1), 89-109.—Conducted 2 experiments in which a total of 340 high school seniors were classified as source-oriented, intermediate, or message-oriented by a bipolar test. Results of both experiments support the prediction that source likability would increase attitude change more for source-oriented than for message-oriented persons. In Exp I, the additional prediction that message informativeness would increase attitude change more for message-oriented than for source-oriented persons was supported only when the source was likable; when the source was unlikable, results were reversed. In Exp II, source expertness yielded no differences; however, its manipulation apparently was weak. Intermediate-oriented persons tended to respond in source-oriented ways to source variables and in message-oriented ways to message variables, indicating a need to conceptualize source-message orientation as a 2-dimensional variable. (18 ref)—*Journal abstract.*
1108. Turner, Charles W. & Simons, Lynn S. (U Utah) **Effects of subject sophistication and evaluation apprehension on aggressive responses to weapons.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 341-348.—Investigated the effects of evaluation apprehension and S sophistication on aggressive behavior of 77 male university students. A 3 × 2 design was used consisting of 3 levels of S sophistication and 2 levels of evaluation apprehension in an otherwise close replication of the 7-shock-unassociated-weapons condition from L. Berkowitz and A. LePage (see PA, Vol 41:16673). A 7th condition replicated the procedures of their 7-shock-no-weapons condition. The results indicate that increased levels of both evaluation apprehension and S sophistication led to decreased numbers of shock administered by Ss to their frustrators. The findings suggest that the most naive and unsophisticated Ss should be used in laboratory studies of aggression so that inhibitions do not mask the effects of important independent variables. (16 ref)—*Journal abstract.*
1109. Wittkower, Erik D. & Weldman, Hazel H. (McGill U, Montreal, Quebec, Canada) **[Magical thought and the integration of psychoanalytic and anthropological theory.]** (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(3), 129-137.—Discusses the meaning of



magical thought for psychoanalysts and anthropologists. For psychoanalysts, magical thought is part of the psychopathology of individuals. It is a stage in the child's development, expressing his fantasies of omnipotence under the sway of the pleasure principle as a means of dealing with frustration. The adult regresses to these stages under stress. For anthropologists, magical thought represents magical practices derived from the cognitive structure already existing in adult members of the society. Psychoanalysis links ambiguity in social exchange to psychological ambivalence; anthropology links the feeling of powerlessness against nature to the feeling of impotence. The ecological approach may bridge the gap between these 2 concepts, so that magic may be seen not only as a pathological symptom but also as an adaptive thought process.—*H. Bruml.*

1110. Worchel, Stephen. (U North Carolina, Chapel Hill) **The effect of three types of arbitrary thwarting on the instigation to aggression.** *Journal of Personality*, 1974(Jun), Vol 42(2), 300-318.—Conducted 2 experiments to investigate the aggression-instigating effects of arbitrary thwartings involving either a random frustration, a violation of expectancy, or an elimination of behavioral freedom. Ss were a total of 136 male undergraduates. 3 levels of thwarting were used by assigning Ss the incentive item (credit, cash, or men's cologne) he had rated 1st, 2nd, or least attractive. Results indicate that thwartings involving eliminations of behavioral freedom instigated significantly greater aggression (as measured by evaluations of research assistants) than the other 2 types of thwarting, and that the stronger the frustration involving such an elimination of freedom, the greater the aggression. Frustrations involving a violation of expectancy yielded significantly greater aggression than frustrations not involving such violations only when the thwarting was severe. In the elimination of freedom conditions, the assigned alternative decreased in attractiveness while the denied item increased. The opposite effect was found in the other thwarting conditions. (16 ref)—*Journal summary.*

1111. Wright, Paul H. (U North Dakota) **The delineation and measurement of some key variables in the study of friendship.** *Representative Research in Social Psychology*, 1974(Jun), Vol 5(2), 93-96.—Summarizes a comprehensive report presenting a model and a coordinated assessment technique for studies of friendship formation and change. This summary attempts to highlight expansions of the model since it was originally introduced by the author (see PA, Vol 44:5093) and to outline briefly the major research studies involved in developing and testing the measurement technique. The comprehensive report covers the model as a whole, including background and rationale, and presents the major research on the technique in detail. The friendship questionnaire—the Acquaintance Description Form—is also described.—*Journal abstract.*

1112. Yukl, Gary. (Baruch Coll, City U New York) **Effects of the opponent's initial offer, concession magnitude and concession frequency on bargaining behavior.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 323-335.—2 laboratory experiments examined how a bargainer's aspiration level, offers, and perception of the opponent are affected by a

programed opponent's initial offer, concession magnitude, and concession frequency. Some discrepancies in the research literature on aspiration level hypothesis of bargaining were also investigated. Ss were 60 male undergraduates. Results indicate that Ss had lower aspirations and made a more favorable initial and final offer when the opponent made a hard initial offer than when the opponent made a soft initial offer. Ss made a more favorable final offer, had lower aspirations, and perceived the opponent to be tougher when the opponent made small concessions than when the opponent made large concessions. The superiority of a small-concession strategy occurred only when opponent concessions were frequent and they allowed Ss to obtain positive payoffs from a settlement. (17 ref)—*Journal abstract.*

## COMMUNICATION AND LANGUAGE

1113. Baltzer, Annie. (Hjorring Teachers' Training Coll, Denmark) **[Imitation in the acquisition of the mother tongue and foreign languages.]** (Danish) *Nordisk Psykologi*, 1973, Vol 25(2), 113-121.—Suggests that the term "imitation" fails to take into account essential aspects of acquiring 1st and 2nd languages, i.e., the significance of the situation, the creative or generative aspects, the significance of motivation, or the strategy used by the individual for learning. As an isolated method, imitation will not help the student to progress in a foreign language. (English summary)—*P. Mylov.*

1114. Barry, William J. (U Kiel, Inst of Phonetics, W Germany) **Language background and the perception of foreign accent.** *Journal of Phonetics*, 1974(Jan), Vol 2(1), 65-89.—The interlingual German-English wordpairs *Tip-tip*, *Pass-pus*, and *Busch-bush* (spoken by 4 English and 6 German speakers) were offered to 2 groups of English Os for judgment of their acceptability as English and to 4 groups of German learners of English from 2 regions of Germany for judgment as English or German. Various acoustic properties of the stimuli were measured and the degree of correlation with the group judgments calculated. Results indicate that certain acoustic properties vary systematically according to language and dialect background, and that different properties influence the decisions of the O groups according to their language or dialect background. (39 ref)—*Journal abstract.*

1115. Bentley, C. F. (U Sydney, NSW, Australia) **The monster in the bedroom: Sexual symbolism in Bram Stoker's Dracula.** *Literature & Psychology*, 1972, Vol 22(1), 27-34.—Suggests that the apparatus of vampire superstition in *Dracula* provides a detailed symbolic presentation of human sexual relationships. The sexual symbolism of blood, the vampires' attacks, and the methods used to combat and destroy the vampires (e.g., the wooden stake) are examined.

1116. Black, John W.; Singh, Sadanand & Janocosek, Elizabeth. (Ohio State U, Research Foundation) **Multidimensional analysis of the perceptual uniqueness of 31 English consonantal clusters.** Columbus, OH: Ohio State University Research Foundation, No 16, 1974. 14 p.—12 listeners responded to recordings of 18 nonsibilant and 13 sibilant "doublet" consonant clusters.

Results show that (a) 4-dimensional space provided the most efficient analysis for both sets, (b) clusters were perceived in terms of articulatory features of both members, and (c) frequency of cluster occurrence was a perceptual feature.

1117. Boons, Jean P. (U Paris VII & VIII, France) **Acceptability, interpretation and knowledge of the world: Remarks on the verb PLANTER (to plant).** *Cognition*, 1973, Vol 2(2), 183-211.—Transformational methods have made the acceptability test the instrument of measure and classification par excellence in linguistics. Of the various a priori possible parameters which can influence the result of this test, the factor of semantic interpretation is considered. The necessity is shown of dissociating an extralinguistic part of this interpretation (including the universe of discourse adopted by the informant, the culture to which he belongs, and the importance of certain factors of knowledge—or of ignorance—of the world) from a linguistically pertinent hypothetical interpretation which correlates very closely with questions of syntax or morphology. Extralinguistic semantic concepts are "natural," come immediately to the mind, and screen the research of much more abstract, unfamiliar, and probably unconscious linguistic semantic concepts. This is a boundary which it is necessary to draw in semantics between what is linguistic and what is not (i.e., between what must and what cannot appear in a generative grammar). The linguistic necessity of controlling, and thus of varying, the universes of discourse which can modify the acceptability of a given sentence is stressed. The argument centers around several uses of the French verb *planter* (to plant). (French summary) —*Journal abstract.*

1118. Bowler, James V. **Irma Injection flops.** *Psychiatric Quarterly*, 1973, Vol 47(4), 604-608.—Analyzes Freud's Irma Injection dream in accordance with the rules of dramaturgy, developing the dream as if it were a farce. It is suggested that, if the dream were enacted on a stage, both audience and critic would interpret it as showing Freud's lack of serious consideration for mental illness and as a denunciation of doctors.

1119. Boyanowsky, Ebor O.; Newton, Darren & Walster, Elaine. (Dalhousie U., Halifax, Nova Scotia, Canada) **Film preferences following a murder.** *Communication Research*, 1974(Jan), Vol. 1(1), 32-43.—Tested the suggestion that, under safe conditions of exposure, people may show a preference for potentially fear-inducing events. General attendance by 94 female undergraduates at a film depicting cold-blooded murder and at a control film were compared on the 2 days following the occurrence of a murder on the campus and on the same 2 days 1 wk prior to the murder. Attendance at the murder movie rose (89%) 2 days after the murder when compared with the same day a week before. Also, the 44 students in the victim's dormitory showed a greater preference for the murder movie 1 wk after the crime, whereas the 50 girls in a control dorm showed no preference.—*Journal abstract.*

1120. Chaitin, Gilbert D. (Indiana U) **Religion as defense: The structure of *The Brothers Karamazov*.** *Literature & Psychology*, 1972, Vol 22(2), 69-87.—Suggests that by viewing characters in a literary work as both real persons and as structural components of the

total psychological situation represented in the work, a comprehensive analysis of psychological conflict, theme, and structure can be achieved. This method is applied to Dostoyevsky's novel, *The Brothers Karamazov*, and the themes of parricide, self-sacrifice, and renunciation are detailed as both psychological components and stylistic devices.

1121. Clarke, Peter & Kline, F. Gerald. (U. Michigan) **Media effects reconsidered: Some new strategies for communication research.** *Communication Research*, 1974(Apr), Vol. 1(2), 224-240.—Presents arguments for looking at cognitive outcomes as dependent variables in communication research rather than placing emphasis only on affective realms. This approach also brings attention to the independent-dependent variable emphases found in the communication literature over the last few decades. The social context of media use and the motivations that spring from this contextual embeddedness are also discussed with regard to information use and distribution of information availability. (16 ref) —*Journal abstract.*

1122. Ehrlichman, Howard; Weiner, Susan L. & Baker, A. Harvey. (Educational Testing Service, Princeton, NJ) **Effects of verbal and spatial questions on initial gaze shifts.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 265-277.—Examined the direction of Ss' 1st gaze shift following questions designed to elicit verbal-linguistic or visuospatial processing in 3 experiments under video camera and face-to-face conditions. Ss were a total of 124 right-handed adults. In each experiment, verbal questions elicited significantly more downward gaze shifts than spatial questions. Previous findings that verbal questions elicited more rightward gaze shifts than spatial questions were not replicated. Results appear to be incompatible with theories linking direction of gaze shifts with the functional asymmetry of the cerebral hemispheres. It was also observed that trials on which no gaze shifts were elicited occurred more often for spatial than verbal questions. (French & German summaries) (26 ref)—*Journal abstract.*

1123. Faber, M. D. **Hermia's dream: Royal road to *A Midsummer Night's Dream*.** *Literature & Psychology*, 1972, Vol 22(4), 179-190.—Attempts to explain the total thematic meaning of *A Midsummer Night's Dream* by focusing on the psychological implications of the dream Hermia has while sleeping in the woods near Athens. It is suggested that the dream is primarily erotic and that Hermia's defenses against the dream parallel the play's concern with the problem of mastering and controlling those uncivilized movements which break through the "order" of the human personality. (15 ref)

1124. Falthzik, Alfred M. & Jolson, Marvin A. (U Maryland) **Statement polarity in attitude studies.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 102-105.—Studied whether there are differences in response to negatively and positively worded versions of the same attitude-eliciting statements in the context of a survey of 486 shoppers about attitudes toward unit pricing in grocery stores. For 7 out of 12 statements, intensity of agreement with positively posed statement was significantly higher than the intensity of disagreement with the negatively posed version; results indicate that the double agreement phenomenon prevails, but not



sufficiently to reverse the direction of attitudes drawn from any of the statements. A tendency was noted for statement polarity to be more significant when personalized (what a person says about himself) rather than when nonpersonalized (what he says about others) statements are used. It is concluded that a substantial number of the Likert-type or dichotomous statements currently used in marketing research are "loaded," in that they may lead some respondents to give different answers than they would give to another wording of what was intended to be the same issue. (19 ref)—*L. Gorsey.*

1125. Funkhouser, G. Ray & Maccoby, Nathan. (Field Research Corp., San Francisco, Calif.) **An experimental study on communicating specialized science information to a lay audience.** *Communication Research*, 1974(Jan), Vol. 1(1), 110-128.—Tested the effects of stylistic and rhetorical manipulations in specialized scientific writing on enjoyment, information gain, and attitudes of 3 different audiences (junior college students, university students, and professional scientists). Stylistic and rhetorical variables had some effects, but more with less-qualified audiences. Students and scientists held similarly favorable attitudes toward science and equally appreciated a simple writing style.

1126. Ginter, James L. (Ohio State U) **An experimental investigation of attitude change and choice of a new brand.** *Journal of Marketing Research*, 1974(Feb), Vol. 11(1), 30-40.—Investigated the relationships between changes in attitude toward a new brand and exposure to advertising for that brand, and the relationship between attitude, choice, and the use of the brand, stressing that the study combined attitude dynamics with choice behavior and advertising exposure at the individual level rather than with aggregate data. 453 housewives participated in a 4-wk study in which each week they viewed a different taped ¼-hr TV program with commercials for new brands of spray disinfectant and a common household cleaning product (HCP). The same commercials were used for each of the new brands. Ss also participated in simulated shopping trips each week, and completed pre- and postexposure attitude and preference questionnaires. Results show that attitudes change both before and after choice of the new brand; the postchoice attitude is greater in magnitude and correlated more highly with choice. Preference was a better predictor of choice than multi-attribute measures of affect. Attitude changes were not related to demographic variables, general product use characteristics, or the number of times the commercial was seen. (20 ref)—*L. Gorsey.*

1127. Groen, Guy J. (National Inst of Education, Washington, DC) **The representation of sequential concepts as locally testable events.** *Behavioral Science*, 1974(Jul), Vol. 19(4), 238-253.—Notes that theoretical accounts of the complexity of patterned sequences usually incorporate a notational scheme for representing the sequence and a classification of complexity derived from the representation. This paper examines (a) whether some modification of this notation can be applied to finite state languages and (b) the extent to which finite state languages and patterned sequences vary in complexity for common reasons. A notational system is developed on the basis of automata theory which allows

a classification of complexity based on properties of hypothetical pattern matching devices, and which can also represent aspects of the induction process. (19 ref)—*Journal abstract.*

1128. Grundy, Dominick E. (Rutgers State U) **Growing up Dickensian.** *Literature & Psychology*, 1972, Vol. 22(2), 99-106.—Discusses the thematic components of Dickens's use of childhood experiences in his novels, including the abandonment of the child and the question of development and identity. The themes of the search for maturity, the need to fulfill the expectations of others, and the child's struggle to fit into the adult world are detailed in 3 novels.

1129. Hadding, Kerstin & Studdert-Kennedy, Michael. (Lund U, Sweden) **Are you asking me, telling me, or talking to yourself?** *Journal of Phonetics*, 1974(Jan), Vol. 2(1), 7-14.—Required 22 graduate and undergraduate students to separate various fundamental frequency ( $f_0$ ) contours into 3 categories rather than 2 in order to establish the perceptual validity and linguistic function of the 3rd category. The fundamental frequency of a 700-msec vocoded utterance was systematically varied to produce 72 contours differing in  $f_0$  at the stress and over the terminal glide. The contours were recorded (a) carried on the speech wave and (b) as frequency modulated sine waves. Ss classified both speech and sine wave contours as terminally rising, falling, or level and classified speech contours as those of a speaker addressing a question to a listener, making a statement to a listener, or talking to himself. Results show that listeners can, with some reliability, separate terminally level from terminally rising or falling contours. If the level terminal glide is combined with an even, low-to-moderate pitch over earlier sections of the contour, listeners tend to judge the utterance as that of a speaker talking to himself. A new prosodic feature [+/-Listener] implemented by variations in fundamental frequency is proposed.—*Journal abstract.*

1130. Haggard, Mark. (Queen's U, Belfast, Northern Ireland) **Perceptual processing of coarticulation: A case study of /I/. *Journal of Phonetics*, 1974(Mar), Vol. 2(2), 117-123.**—Notes that spectrographic data show effects of both initial and postvocalic /I/ upon average vowel formant frequencies. The present 2 experiments (with 10 undergraduate Ss in each) investigated preference judgments for  $F_1$  and  $F_2$  in 3 vowels in /I/ context. In Exp I Ss were asked to choose the vowel of a pair that was more similar in quality to a preceding isolated vowel. Significant preferences were obtained chiefly on vowels preceding /I/ and only for  $F_2$  variations. Exp II showed poor discriminability of contextual differences in both  $F_1$  and  $F_2$  values during /I/ steady states. Data are interpreted as favorable to the proposition that perception can solve the problem of coarticulation in at least 2 different ways—by modeling it in detail (weak form of motor theory) or by applying an information-losing categorical strategy.—*Journal abstract.*

1131. Haltresht, Michael. (Indiana U) **The dread of space in Conrad's *The Secret Agent*.** *Literature & Psychology*, 1972, Vol. 22(2), 89-97.—Suggests that Joseph Conrad's documented feelings of restlessness assumed the form of a fear of open spaces which is thematically developed in his novel *The Secret Agent*.

The view that open spaces suggested emptiness or boundlessness to Conrad is detailed in terms of the circles which play an important symbolic role in the life of the main character, the death complex exhibited by other characters, and the novel's use of multiple characters and confusing leaps in time and action.

1132. Helms, Randel. (U California, Los Angeles) **Blake at Felpham: A study in the psychology of vision.** *Literature & Psychology*, 1972, Vol 22(2), 57-66.—Discusses autobiographical elements in William Blake's poem *Milton*, the nature of the poem's almost prophetic visions, and possible psychoanalytic interpretations of the imagery and content of the poem. The nature of Blake's "divine plan" is explicated and characteristics of the visionary experience are examined.

1133. Hess, Allen K. & Gossett, Dan. (Oakland U) **Nixon and the media: A study of non-immediacy in newspaper editorials as reflective of geographical attitude differences.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1055-1058.—Analyzed 7 Northern and 7 Southern newspaper editorials discussing President Nixon's 1969 speech on the "Vietnamization" of the Vietnam War for their attitude toward President Nixon and his proposals. Although manifest ratings indicated no difference between North and South editorials, nonimmediacy scores showed that Northern editorials were less favorable toward President Nixon.

1134. Hirata, Kenichi. (Aichi U of Education, Japan) **[Letter sequences varying in order of approximation to Japanese.]** (Japn) *Japanese Journal of Psychology*, 1974(Apr), Vol 45(1), 33-37.—Letter sequences of zero-through 2nd-order approximation to Japanese were computer-generated using tables of single-letter and digram frequencies. The single-letter and digram structures of the sequences were tested by calculating correlation coefficients between observed frequencies in each sequence of 10,000 letters and those of the original tables of the zero-order material, using the goodness-of-fit test with the uniformity hypothesis. Results confirm that the sequences were properly generated. 8 examples of 25-letter sequences of zero to 2nd-order material and 30 10-letter sequences of each type, selected with the restriction that no letter should appear more than once in the sequence are presented.—*English abstract*.

1135. Howitt, Dennis & Cumberbatch, Guy. (U. Leicester, Centre for Mass Communication Research, England) **Audience perceptions of violent television content.** *Communication Research*, 1974(Apr), Vol. 1(2), 204-223.—Investigated judgmental aspects of TV program content (e.g., the legitimacy of the violence depicted) and the relationships between different aspects of program content. British TV viewers were administered a 7-point bipolar rating scale on which they evaluated 37 TV programs across 50 potential attributes. 6-17 viewers rated each program. Attributes were determined from previous research and from open-ended interviews with a different sample of respondents. A factor analysis of rating scales for each program revealed 10 program content attributes—Realism, Violence, Social Status, Establishment (e.g., characters on the side of law and order), Conventionality, Women's Involvement, Identification (e.g., British vs American characters

and personal relevance), Emotional Interaction, Humor and Activity, and Justified Violence.—*L. Gorsey*.

1136. Hustad, Thomas P. & Pessemier, Edgar A. (York U., Toronto, Ontario, Canada) **Will the real consumer activist please stand up: An examination of consumers' opinions about marketing practices.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 319-324.—Data from a survey of 912 women in a midwestern industrial community, who had been divided according to attitudes about business and marketing practices, show that it is possible to describe differences between pro- and antibusiness groups in terms of a variety of personal and life-style characteristics. Antibusiness consumers cannot be dismissed as an insignificant dissident group, but rather are more accurately described as an activist, avant-garde segment of society with both the motivation and the ability to effect change.

1137. Jaarsma, Richard J. (Paterson State Coll) **The "Lear complex" in *The Two Gentlemen of Verona*.** *Literature & Psychology*, 1972, Vol 22(4), 199-202.—Suggests parallels between the father-daughter confrontation in *The Two Gentlemen of Verona* and the conflict between Lear and Cordelia in *King Lear*. The role of unconscious sexual motives as expressed in both the language and theme of the 2 plays is examined.

1138. Jacoby, Jacob; Speller, Donald E. & Kohn, Carol A. (Purdue U) **Brand choice behavior as a function of information load.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 63-69.—Used 153 undergraduates in a 3 (number of brands)  $\times$  3 (items of information for each brand) design in which Ss received either 2, 4, or 6 items of information for either 4, 8, or 12 fictitious brands of laundry detergent. 6 information dimensions each having any 1 of 7 values (very low-very high) were used. Ss were asked to indicate their laundry habits and how important each of the 6 dimensions were to them on a 5-point scale, and to describe their "ideal" brand of detergent using the 7-point scales. They were then given a list of different brands of detergent with varying items of information and asked to choose the one they liked best. Finally, satisfaction with the decision, the extent of confusion felt, and the extent of need for more information were assessed. Data indicate that increasing package information load tends to produce (a) dysfunctional consequences in terms of the consumer's ability to select the brand that is best for him, and (b) beneficial effects on the consumer's degree of satisfaction, certainty, and confusion regarding his selection (i.e., Ss felt better with more information but actually made poorer purchase decisions). (19 ref)—*L. Gorsey*.

1139. Johnson, William R. & Smith, Edward W. (Georgia State U) **Responsivity to incongruent verbal and non-verbal communications and A-B therapist type.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1066.—58 male undergraduates classified as either A or B therapist types rated videotaped scenes conveying incongruent verbal and nonverbal messages along the dimensions of happy-sad and superior-inferior, and completed a standardized paper and pencil test involving incongruent verbal and nonverbal messages. The hypothesis that As would be more responsive than Bs to the nonverbal channel in the incongruent messages was not supported.



1140. Klein, Helen A.; Klein, Gary A. & Hildum, Donald C. (Wright State U.) **Articulatory and constituent phrases as facilitators of word identification decisions.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 337-342.—Used a word-boundary task in 3 experiments to explore the role of phrase and sentence information in the processing of written language. Ss were a total of 304 undergraduates. Articulatory phrases (rhythmical patterns of spoken language) and constituent phrases (underlying syntactic analysis of the sentence) both provided strong and about equal facilitating effects on processing performance. Sentence cues as a function of sentence length were also evaluated. Results are discussed in terms of flexible strategies for imposing structure on linguistic sequences. (20 ref)—*Journal abstract*.
1141. Krulee, Gilbert K. & Ramsburg, Robert E. (Northwestern U) **Semantic anomalies and sentence recognition.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1275-1286.—34 college students and staff members read for immediate recall sentences which either were meaningful or were constructed to be anomalous in particular ways. 3 types of sentences were used: equational, transitive, and intransitive. There were also 3 types of anomalies which were either in the subject phrase of the sentence, in the predicate phrase, or in the relationship between the subject and predicate phrase. Results show that equational sentences can be processed most easily. For all types of sentences, the presence of an anomaly had a disruptive effect in that time to process a sentence was increased. However, the effect of a particular type of anomaly was a function of the type of sentence in which it occurred. A possible explanation for these findings, emphasizing the use and verification of the selectional restrictions associated with each sentence, is suggested. (29 ref)—*Journal abstract*.
1142. Ley, Ronald & Karker, Jürgen. (State U New York, Albany) **Pronunciability ratings of 319 CVCVC words and paralogues previously assessed for meaningfulness and associative reaction time.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 421-424.—Undergraduates rated the ease of pronunciability of each of 139 consonant-vowel-consonant-vowel-consonant (CVCVC) units in relation to the other units along a continuum. Results indicate that the pronunciability ratings of the CVCVCs assessed are reliable and valid measures.
1143. Locatelli, Françoise. (U Paris V—René Descartes, Lab of Experimental & Comparative Psychology, France) **[Use of verb tenses by adults.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 179-190.—Constructed sentences containing 2 blanks instead of verbs, with the infinitive form of each verb shown under the blank. The syntactic form of the sentence and the order in which the 2 events were mentioned varied. Ss were asked to fill in blanks so as to construct sentences which would express the sequence of the 2 actions. Use of coordinate clauses joined by "and" created fewer disagreements between verb tenses than the use of subordinate clauses. Past, present, and future were the tenses most frequently used, but a preference for beginning a sentence with the present tense was noted. When events were not mentioned in the order of their occurrence, the present tense was used for the 1st verb, and the past tense for the 2nd one.—*G. Rubin-Rabson*.
1144. McClure, Robert D. & Patterson, Thomas E. (Syracuse U.) **Television news and political advertising: The impact of exposure on voter beliefs.** *Communication Research*, 1974(Jan), Vol. 1(1), 3-31.—Studied the relationship between voter belief change and exposure to both political commercials and weeknight network news during the 1972 presidential campaign. While traditional media effected arguments adequately account for the minimal belief change, the direct and dramatic belief change consistently and systematically associated with voter exposure to political advertising cannot be accounted for.
1145. Olsen, Svend E. (Copenhagen U, Denmark) **[Linguistic psychology and psychopathology.]** (Danish) *Nordisk Psykologi*, 1973, Vol 25(2), 84-92.—Presents and defends a theory on the use of language and communication. Meaning is not acquired, as generally believed by psychologists, by a reproduction of reality. Linguistic competence cannot be discriminated from other cognitive processes. (English summary) (18 ref)
1146. Panagos, John M. (Kent State U) **String complexity increases phonemic interference.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1219-1222.—3 groups of 30 monolingual undergraduates who were native speakers of English attempted to pronounce a non-English phone embedded in 1-, 4-, and 7-syllable phonological strings. The number of phonemic errors made increased with syllable complexity, with 1-syllable Ss showing quick sound recognition, native phoneme inhibition, and phonetic approximations of the target sound. It is suggested that string complexity causes selective attention to shift away from the phonetic detail of the stimulus to a phrasal level of analysis.
1147. Pepper, Susan & Prytulak, Lubomir S. (U. Western Ontario, London, Canada) **Sometimes frequently means seldom: Context effects in the interpretation of quantitative expressions.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 95-101.—33 college students supplied numerical definitions for 5 quantitative expressions either embedded in 2 high-frequency contexts, 1 moderate-frequency context, or 2 low-frequency contexts, or with no context specified. Mean definitions differed significantly across contexts and expressions, and a Context  $\times$  Expression interaction effect was obtained ( $p < .01$ ). The variance in definition of an expression embedded in a context generally increased with the discrepancy between its no-context definition and the estimated frequency of the context event ( $p < .05$ ). Variance in the definitions of the sampled expressions gathered over diverse contexts increased with the expression's no-context definition. Thus, the mean and variance of an expression's numerical definitions depended upon both the expression and its context.—*Journal abstract*.
1148. Piotrowski, Zygmunt A. (Thomas Jefferson U) **The Piotrowski dream interpretation system.** *Psychiatric Quarterly*, 1973, Vol 47(4), 609-622.—Comments on J. V. Bowler's (see PA, Vol 53:Issue 1) analysis of Freud's Irma Injection dream and answers Bowler's inference that Freud showed little compassion for Irma's suffering, being motivated only by the desire to prove his theories

right. The author stresses the importance of dreams and discusses his system of 8 rules and 2 axioms for dream interpretation. This system is applied to Freud's dream and to an analysis of his inner conflicts, self-criticism, and self-education. It is noted that the dream preceded the most creative period in Freud's life. (18 ref)—*B. McLean*.

1149. Pratt, Branwen E. **The role of the unconscious in *The Eternal Husband*.** *Literature & Psychology*, 1972, Vol 22(1), 13-25.—Discusses the themes of dualism of human personality, the return of repressed conflicts, self-punishment, and the fascination with degradation in Fyodor Dostoevsky's novel, *The Eternal Husband*. The function of the unconscious in helping man cope with the pressures of reality is examined in terms of the escape from self-knowledge.

1150. Rintelmann, W. F. (Michigan State U) **Effects of amplitude compression upon speech perception: A review of research.** *Scandinavian Audiology*, 1972(Sep), Vol 1(3), 127-134.—Discusses the basic types of compression amplifiers, with emphasis on the primary features affecting the performance characteristics of compression amplitude controlling devices. A historical review of the application of amplitude compression for the hearing impaired is presented, with emphasis on studies concerning the effects of compression amplifiers upon speech perception. (Danish summary) (22 ref)

1151. Roland, Alan. **Imagery and symbolic expression in dreams and art.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 531-539.—Questions the basic assumption of psychoanalytic theory that the development of language historically and individually is from the metaphorical to the conceptual. The literature concerning language in psychoanalysis is reviewed. The symbolic expression of various internalized images in art has been insufficiently appreciated. The primary process mechanisms of displacement, condensation, and symbolization serve a dual function—childhood memories and defensive mechanisms. (38 ref)—*R. S. Albin*.

1152. Rose, Gilbert J. (Yale U, Medical School) **On the shores of self: Samuel Beckett's "Molly": Irredentism and the creative impulse.** *Dynamische Psychiatrie*, 1974, Vol 7(2), 73-90.—Offers an interpretation of Beckett's story as an immediate and symbolic presentation of the creative process. In the light of current research on primary narcissism and the early ego-state a close relationship is seen between creativity and the development of identity. (German summary)—*H. Brum*.

1153. Sandström, C. I. (School of Education, Stockholm, Sweden) **Proposals to phenomenological approaches in determining architectural spaces.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 81-88.—Presents arguments in support of phenomenological approaches to the analysis of space and time as central concepts in architecture. With the departure from an illustrative experiment on judgment, conducted with 152 university students, some basic shortcomings of a psychophysical scaling approach are discussed. The psychological meaning of the concepts "here" and "now" is clarified with several illustrations (e.g., the spatial character of a person's 1st recollections, and examples from everyday life and history). The optimal

psychological present space ("here") was revealed with special clarity in the field of sports.—*Journal abstract*.

1154. Schiavetti, Nicholas & Burke, John P. (Newark State Coll) **Comparison of males' and females' estimates of transition probability in speech.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1121-1122.—Data from male and female undergraduates who participated in transition probability estimation tasks under diverse and restricted conditions using either single-guess, continuous-guess, or cloze methods show that there were no sex differences in the estimates and that the single-guess method is easier and less time-consuming to administer.

1155. Sharon, Amiel T. (Educational Testing Service, Princeton, NJ) **What do adults read? Reading Research Quarterly**, 1973-1974, Vol 9(2), 148-169.—Surveyed a national sample of 5,067 adults to determine characteristics of their reading activities. It is concluded that American adults spend a considerable amount of time in reading—nearly 2 hrs/day for the average person—and that a wide variety of materials are read: (e.g., street signs, books and newspapers). The 5% of adults who do not read tend to be of low socioeconomic status, and depend upon others to read for them. (French & Spanish abstracts)—*E. J. Mason*.

1156. Smith, LeRoy W. **Daniel Defoe: Incipient pornographer.** *Literature & Psychology*, 1972, Vol 22(4), 165-178.—Discusses the development of pornographic literature in England and describes pornographic elements in the works of Daniel Defoe. The inclusion of super-permissive parent figures, incestuous relationships, lower-class characters who are sexually uninhibited, passionate and responsive female characters, and the easy accomplishment of seduction are themes which appear in most of Defoe's novels. The relation of pornographic literature to the social behavior of the 18th and 19th centuries is also discussed.

1157. St. Clair, Robert N. & Mural, Harold M. (U Louisville) **Code switching in Hawaiian Creole.** *Kansas Journal of Sociology*, 1974(Spr), Vol 10(1), 75-82.—Describes the phenomenon of code switching among Hawaiian Creole speakers, in which speech intonation, lexicon, and grammar rules are varied according to the social context of situations. Advantages for the sociolinguist of studying speech on the multilingual Hawaiian Islands are discussed.

1158. Stromnes, Frode J. (U Turku, Finland) **To be is not always to be: The hypothesis of cognitive universality in the light of studies on elliptic language behaviour.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 89-98.—To examine whether the cognitive base of natural language is universal, 2 preliminary studies of reportorial writing and speech were made, and an experiment was conducted with 73 native Finnish-speaking and 82 native Swedish-speaking high school students. It was theorized that, when a speaker or writer has too little time or space to use complete, grammatically well-formed sentences, he will first leave out the parts of speech which are least essential for the decoding process of the receiver. If, in 2 different languages, different parts are left out, the cognitive base of the languages cannot be the same. It was predicted that native Finnish-speaking Ss would be more prone to leave



out the verb from newspaper headings and from reports of sporting events than would native Swedish-speaking Ss. In addition, it was expected that Finnish Ss would rate sentences lacking verbs as more, and sentences lacking nouns as less, "language correct" than would Swedish Ss. The predictions were borne out exactly by the findings, which are strongly negative to the universality hypothesis.—*Journal abstract.*

1159. Svebak, Sven. (U Bergen, Psychological Inst, Norway) **A theory of sense of humor.** *Scandinavian Journal of Psychology*, 1974, Vol 15(2), 99-107.—Considers that humor is a strategem for relating the collective social reality of a group of persons (the rational world) to their personal imaginations of alternative social worlds, meanings, or identities (the irrational world). The humorist is committed to the rational world. At the same time he permits idiosyncratic fantasies to occur within the social context if they are accompanied by an explicit message saying that the performance is made for fun. The comical situation is composed of 3 essential elements: the message, the audience, and the target or content treated by the message. The message brings the target to the irrational level, where it is brought into disrespect in favor of the alliance between the humorist and his audience. A conceptual scheme is proposed for prediction of laughter, based on 3 dimensions of the comic situation: the humorous message, interpersonal likings, and permissiveness towards actual laughter. The corresponding personal dispositions are the habitual sensitivity to such messages, the habitual tendency to favor comical situations and persons, and the habitual need for emotional-impulse control. Suggestions are made for the modification of laughter by constellations of high and low values on these variables. (38 ref) —*Journal abstract.*

1160. Szybillo, George J. & Heslin, Richard. (Purdue U) **Resistance to persuasion: inoculation theory in a marketing context.** *Journal of Marketing Research*, 1973(Nov), Vol 10(4), 396-403.—Applied inoculation techniques from social psychology to a controversial issue (i.e., whether air bags should be installed as passive safety devices in all new cars) in a marketing context using 240 undergraduates. A  $4 \times 2 \times 2 \times 2$  factorial design was used, consisting of 4 levels of defense (supportive, refutational-same, refutational-different, and no defense), 2 levels of time to attack (immediate and 3 days), 2 levels of source attack (high and low credibility), and 2 levels of trials (pre- and postbelief measurement). 2 control groups—an external-events control and a no-pretest control—were also used; the external-events group was used to determine whether events which occurred during the experimental time period would influence results. Predictions from inoculation theory were confirmed—all defenses produced greater resistance to attack and the refutational defenses produced greater resistance than supportive defenses. Time to attack had no effect on resistance.—*L. Gorsev.*

1161. Taylor, Donald S. (U Oregon) **Chatterton: Insults and gifts to the Rev. Mr. Catcott.** *Literature & Psychology*, 1972, Vol 22(1), 35-43.—Discusses the ambivalent relationship between the writers Thomas Chatterton and Alexander Catcott in terms of father-son and oedipal conflicts. The role of religion and mythology

in Chatterton's work is explicated, and the final reconciliation which is suggested in the poem "The Death of Nicou" is considered.

1162. Terry, Roger L. & Ertel, Sarah L. (Hanover Coll) **Exploration of individual differences in preferences for humor.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1031-1037.—Correlated liking scores for hostile, sexual, and nontendentious cartoons with scores on the Sixteen Personality Factor Questionnaire of 20 female and 19 male undergraduates. Sexual cartoons were liked more by males, especially by those tending to be tough or group-dependent, than by females, especially by those with higher general intelligence. Nonsense cartoons were liked more by females, especially by those with lower general intelligence. (21 ref)—*Journal abstract.*

1163. Verstiguel, Jean C. (National Ctr for Scientific Research, U Paris VIII, Lab of Psychology, France) **[Acceptance and rejection of semantic properties: Influence of the degree of specificity.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 191-200.—In a true-false reaction-time (RT) task, Ss were presented with words and properties, and identified these properties as belonging or not belonging to the concepts underlying the words. Analysis showed that for true responses, RT was influenced by the degree of generality of the properties. However, RT for false responses was not influenced by the degree of generality of the properties. Results are discussed in terms of memory search mechanisms, with reference to Sternberg's self-terminating and exhaustive search hypothesis.—*G. Rubin-Rabson.*

1164. Vincenzo, Joe & Hendrick, Clyde. (Kent State U) **Impact of sound effects and dramatic speech style on speaker perception, attitudes, and speech recall.** *Bulletin of the Psychonomic Society*, 1974(Jun), Vol 3(6), 434-436.—Measures of undergraduates' moods, attitude, and recall of a tape-recorded speech reveal more persuasion for a serious than for a dramatic version of the speech. Serious-dramatic and sound-no-sound manipulations interacted in determining mood ratings, whereas overall attitudinal acceptance was independent of the affect expressed by Ss.

1165. Wartella, Ellen & Ettema, James S. (U Minnesota, School of Journalism & Mass Communication) **A cognitive developmental study of children's attention to television commercials.** *Communication Research*, 1974(Jan), Vol. 1(1), 69-88.—Studied the role of stimulus complexity in children's attention to TV commercials by observing 120 nursery, kindergarten, and 2nd-grade children's attention to 12 commercials varying in visual and auditory complexity. The largest difference in attention to high- vs low-complexity commercials occurred in nursery school Ss, although in 1 block of commercials the difference was not significant. (17 ref)

1166. Wilson, F. A. (Simon Fraser U, Burnaby, British Columbia, Canada) **Yeats's "a bronze head": A Freudian investigation.** *Literature & Psychology*, 1972, Vol 22(1), 5-12.—Suggests that W. B. Yeats's poem, "The Bronze Head," embodies his fullest expression of latent bisexuality and that his imagery amounts to a substitute language used to express deep psychological truths. Yeats's ambivalence to his feminine character is

detailed in the rhythm, dramatic transitions, and inverted images of the poem.

1167. **Wiseman, Frederick.** (Northeastern U.) **Factor interaction effects in mail survey response rates.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 330-333.—Investigated the relationships between 4 variables previously used to increase response rates in mail questionnaire surveys: small monetary incentives, nature of the return envelope, follow-up reminder, and offer of survey results. Data suggest that these variables operate independently and that there are few interaction effects.

## PERSONALITY

1168. **Attkinson, C. Clifford; Waidler, Valerie J.; Jeffrey, Paula M. & Lambert, E. Warren.** (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Interrater reliability of the Handler Draw-a-Person scoring.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 567-573.—Tested the method developed by L. Handler in 1967 for scoring the Draw-A-Person test (DAP); previous scoring systems had low levels of predictive validity. Drawings of human figures by 54 female undergraduates were scored on 21 variables. Reliability estimates indicated that Handler's procedures have high interrater reliabilities. The DAP indices had a median interrater reliability of .90, this being congruent with the median coefficient of .87 reported by Handler. (19 ref)—*Journal abstract.*

1169. **Barna, James D.** (U Dayton) **Invasion of privacy as a function of test set and anonymity.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1028-1030.—Administered the MMPI and the Barna-Rychlak Causal Construct Scale to 55 undergraduates under conditions of either anonymity or invasion of privacy. After 2 Ss refused to participate, only 3 Ss perceived 2, 3, and 5 MMPI items offensive, respectively; removal of these items only changed raw scores 1 point for 2 Ss on 1 and 2 scales. Results indicate that it is possible to follow American Psychological Association policy on the ethics of personality assessment in a standardized testing situation.

1170. **Becker, Reinhold.** (U Heidelberg, Psychiatric Clinic, W Germany) **["Inhibition": Its medical definition.]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 136-142.—Presents a theoretical discussion of the definition, inner meaning, and use of the term "inhibition" in medicine. The most important literature and research is briefly reviewed, with the criticism that most concepts reflect a causal way of thinking. Such an approach combines elements of observation with elements of conjecture and thus does not fulfil the requirement for a strict separation between hypotheses, phenomena, and interpretation. Other shortcomings of the causal approach are examined and an alternative—a new, causality-free approach to definition—is suggested. (29 ref)—*T. Fisher.*

1171. **Bendo, Audree A. & Feldman, Harold.** **A comparison of the self-concept of low-income women with and without husbands present.** *Cornell Journal of Social Relations*, 1974(Spr), Vol 9(1), 53-85.—Hypothes-

ized that (a) husband-absent women have a stronger self-concept and (b) husband-present women are more satisfied with their life circumstances. Stronger self-concept was defined as having higher self-esteem, lower second sex attitudes, a more instrumental self-concept, a feeling of greater optimism about the future, and an internal self-concept. Greater satisfaction was defined as experiencing more satisfaction with work, personal and traditional female areas of concern, health, and financial situation. Data from interviews with 1,325 low income women support the hypotheses. The research design was a  $2 \times 2 \times 2$  analysis of variance with 2 welfare groups (presently welfare and previously welfare), 2 employment groups (working and nonworking), and husband-present and husband-absent groups. (17 ref)—*Journal abstract.*

1172. **Bradshaw, Samuel L.** (Topeka VA Hosp, KS) **A psychoanalytic view of music composition.** *Confinia Psychiatrica*, 1973, Vol 16(3-4), 220-237.—Explores some of the implications of psychoanalytic theory for understanding the nature of music and music composition as human phenomena. Experience as a composer is used as the background in describing the process of composition and in speculating on the metapsychology of this phenomenological description. The major thesis is that the sets of experiences and models which go into developing a composer's style can be conceptualized as the development of a musical superego which bears some resemblance to the earlier developed superego of the artist.—*Journal abstract.*

1173. **Braithwaite, Ronald.** (Michigan State U) **A paired study of self-disclosure of black and white inmates.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 86-94.—Administered S. L. Brodsky and J. Twomey's 1967 version of the Self-Disclosure Questionnaire to 30 black and 30 white 20-44 yr old inmates in a federal penitentiary. The questionnaire assessed the degree to which Ss would disclose themselves to different target persons in the prison population (e.g., social worker, warden, or other inmates). Data show that both black and white Ss felt most comfortable in relating to their "closest inmate friend," followed by "expert in the field." Both groups exhibited dichotomies as to which staff personnel were viewed as unsafe confidants when compared to other inmates and family members. Both groups also exhibited feelings of distrust for members of the other race, although this was greater in the white group than in the black group. Implications for the rehabilitation process and personnel recruitment are discussed.—*L. Gorsey.*

1174. **Bryant, Brenda K.** (U California, Davis) **Reliability of the Interpersonal Perception Method modified for use with children.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1307-1311.—Adapted Liang's Interpersonal Method scale for use with children. Administration of the scale to 40 male 6th graders produced reliable data based on a measure of internal consistency. The reliability permits further use of the modified Interpersonal Perception Method with 10-yr-old children. Also considered were respondents' attitudes toward locus of control as indicated by the Intellectual Achievement Responsibility Questionnaire. The relationship between attitudes toward locus of control and



reliability of the Interpersonal Perception Method is discussed.—*Journal abstract.*

1175. Brzezińska, Anna & Kofta, Mirosław. (Mickiewicz U, Inst of Pedagogics, Poznań, Poland) **Stability of self-image tolerance to stress and anxiety.** *Polish Psychological Bulletin*, 1974, Vol 5(1), 3-10.—Hypothesized that there is a positive correlation between tolerance of stress and stability of self-image. A specially constructed measure of self-image and a standardized clinical interview to evaluate tolerance of stress were given to 50 female undergraduates. The self-image measure was administered twice—in an emotionally neutral situation and 2 mo later in a waiting situation. The relationship between anxiety and stability of self-image was also assessed using continuous and discontinuous self-reports of test anxiety. Results show that (a) in spite of the generally high level of anxiety in the entire sample, "stable" Ss displayed less anxiety than "unstable" Ss; (b) stress tolerance and stability of self-image were significantly positively correlated, and (c) among Ss with similar anxiety levels, stable and unstable Ss did not differ in stress tolerance. Results suggest that anxiety performs a mediating function between self-image and stress tolerance. (29 ref)—*L. Gorsey.*

1176. Burdsal, C. A. & Cattell, R. B. (Wichita State U) **A definitive second order factor analysis of the personality structure in high school age children.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 173-177.—Performed a factor analysis combining High School Personality Questionnaire (HSPQ) forms A and B scores for 1,504 male and 1,255 female high school students. 8 factors were extracted and rotated from each of the 2 groups. It was found that the resulting factor patterns were both clearer (had better simple structure) and more closely matched the 2nd-order factor structure found among adults than previous HSPQ structures. Results support the contention that (a) there are comparable 2nd-order personality factors between adults and high school students and (b) since the factor pattern was similar to patterns found previously, the primary factors tend to be stable.—*Journal abstract.*

1177. Cartwright, Rosalind D. (U Illinois, Chicago Circle) **The influence of a conscious wish on dreams: A methodological study of dream meaning and function.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 387-393.—Used a self-ideal-self trait discrepancy, identified from Q sorts for 19 college students, as a presleep stimulus. Ss were instructed to wish to change their trait so as to reduce the discrepancy. Dream reports were collected for each rapid eye movement period that followed. It was found that a blind judge rated the target trait as present in the dreams of a significant number of the Ss. 2 other nontarget control traits were not rated present in the dreams of a significant number of the Ss. Few Ss had dreams in which the ideal trait was ascribed to the self. Dreaming thought, while responsive to the instruction to attend to that trait, revealed a difference in emotional value from that stated in waking.—*Journal abstract.*

1178. Cegalis, John A. & Young, Robert. (Syracuse U) **Effect of inversion-induced conflict on field dependence.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 373-379.—Verbal reports of loss of control and

surrender to powerful visual changes, experienced during inversion of the visual world in previous studies, suggest changes in field dependence. In the present study with 40 undergraduates, field dependence (rod-and-frame test vertical was tested under conditions of inversion and noninversion. Significantly greater field dependence was observed for Ss exposed to complete inversion rotation of the rod-and-frame configuration in the experimental period than for Ss exposed to rotation without inversion, partial rod-and-frame inversion rotation, or inversion rotation without a frame. The change in field dependence was not significantly affected by 10 min of active experience with inversion, and no significant aftereffects were observed. Results are interpreted in terms of the effect of conflict on perceptual-cognitive decentering. Implications for perceptual adaptation and personality theory are discussed. (27 ref)—*Journal abstract.*

1179. Corder, Billie F. & Corder, Robert F. **A study of the relationship of IQ and cognitive and personality rigidity to performance on concept learning tasks.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 83-90.—Administered a concept-learning test to 113 college sophomores with an average-to-superior IQ range, who had been tested previously on 2 measures of cognitive rigidity, a measure of personality rigidity, and the Wechsler Adult Intelligence Scale (WAIS). The concept-learning test included simple, disjunctive, and relational types of problems which were randomly presented and required Ss to vary their approach from task to task. Scores on the Alternate Uses Test of cognitive flexibility were significantly related to concept-learning scores. The figural Adaptive Flexibility Test of cognitive flexibility, Rokeach Dogmatism Scale, and WAIS scores showed no significant relationship to concept learning on these tasks. It is hypothesized that cognitive flexibility, as measured by the Alternative Uses Test, may represent an important dimension of learning behavior which is not measured by a standardized IQ test composed of items emphasizing convergent thinking.—*Journal abstract.*

1180. Darden, William R. & Reynolds, Fred D. (U Georgia) **Backward profiling of male innovators.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 79-85.—Presents a multivariate conceptualization of male innovative behavior which calls for grouping consumers in the innovative behavior space for several product categories, and determining if consumer characteristics can differentiate between them. This methodology was applied to a survey of 154 male heads of household in 9 medium to upper middle-class suburban neighborhoods. Ss were interviewed about demographic, socioeconomic, activity, interest, and psychological (e.g., self-esteem, attitude toward change, and venturesomeness) variables that have been reported as significant in describing innovators. As predicted, results show that "natural" groups of innovators can be identified from innovative behavior measures of several product categories. Discriminant analyses suggest that consumers with different innovative behavior profiles have different consumer characteristics. 4 innovator groups, based on examination of group characteristics, readership, listening, and viewing habits, are described: suburban swinger, subur-

ban conservative, house-husband, and established suburbanite. (18 ref)—*L. Gorsey.*

1181. Delaney, James G. & Woodyard, Howard D. (U Windsor, Ontario, Canada) **Effects of reading an astrological description on responding to a personality inventory.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1214.—16–18 yr old high school students read astrological personality descriptions, presumably applicable to them, which had previously been rated as high or low on Dominance and Change. Ss then completed the Dominance and Change subscales of the Personality Research Form. As predicted, self-reports were influenced by the astrological personality description.

1182. Diener, Robert G. & Maroney, Robert J. (DC Dept of Human Resources, Institutional Care Services Div, Laurel, MD) **Relationship between Quick Test and WAIS for black male adolescent underachievers.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1232–1234.—Although the Quick Test underestimated Wechsler Adult Intelligence Scale (WAIS) IQs at the lower ranges of intelligence, it approximated WAIS IQs adequately as the average range was approached. It is recommended that a regression equation based on local norms be computed to minimize the risk of misclassifying black male adolescent underachievers.

1183. Dimsdale, Joel E. (Harvard U, Medical School, Boston) **The coping behavior of Nazi concentration camp survivors.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 792–797.—Reports on interviews with 19 survivors of Nazi concentration camps. The Ss, relatively healthy survivors who were not severely psychiatrically disabled, were interviewed in Jerusalem and the San Francisco Bay area. A classification of coping strategies in extreme stress situations—drawn from the interview data—are presented, and the long-term effectiveness of certain of these strategies is discussed.—*Journal abstract.*

1184. DiRenzo, Gordon J. (U Delaware) **Congruencies in personality structure and academic curricula as determinants of occupational careers.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1295–1298.—A total of 198 male undergraduates, categorized by their type of curricula (Behavioral Sciences, Liberal Arts, Business Administration, or Physical and Natural Sciences), were administered Form E of the Rokeach Dogmatism scale. Major curriculum-career areas could be distinguished by significant differences in personality structure, which is considered to serve as a channeling factor in determining broad areas of one's choices for occupational careers.—*Journal abstract.*

1185. Ebersole, Peter. (California State U, Fullerton) **Impact of literary works upon college students.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1127–1130.—Attempted to determine what type of impact, if any, is reported by college students concerning the reading of literary works they consider important. Ss were 56 students in a class on the psychological interpretation of literature. The effects Ss reported were grouped into 3 major categories: no effect, behavioral effects, and cognitive effects, the latter being the most frequently reported. Results provide support for both the aesthetic (style-oriented) and moralistic (content-oriented) interpretation of the value of literature. Justification of

literature might be most fruitfully approached via cognitive rather than behavioral impact.—*Journal abstract.*

1186. Farley, Frank H. (U Wisconsin, Madison) **Field dependence and approval motivation.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 153–154.—Administered the Marlowe-Crowne Social Desirability scale and Messick and Jackson's Hidden Figures Test to undergraduates. Contrary to P. R. Pearson's 1972 findings, no significant relationship was obtained between field independence and social desirability response set.

1187. Feather, N. T. & Raphelson, Alfred C. (Flinders U South Australia, Bedford Park) **Fear of success in Australian and American student groups: Motive or sex-role stereotype?** *Journal of Personality*, 1974(Jun), Vol 42(2), 190–201.—126 male and 88 female Australian and 83 male and 113 female American undergraduates wrote stories to a verbal cue in which either a male or a female succeeded. Half of the male and half of the female Ss wrote to the male cue, and the other half to the female cue. Stories were scored for fear of success as indicated by a concern that success might have negative consequences. Results indicate that both male and female Australian Ss and American males wrote a higher proportion of fear of success stories to the female cue than to the male cue. This difference was not evident among American females, who wrote a much lower proportion of fear of success stories to the female cue than did the Australian females. The proportion of fear of success stories to the female cue in both samples was lower than that reported by M. S. Horner in her 1968 study, and the proportion of fear of success stories to the male cue in both samples was higher. Results are discussed in terms of social stereotypes of male and female achievements, the effects of social movements (e.g., women's liberation) on redefinitions of sex roles, and whether the procedure tapped motives, stereotypes, or both.—*Journal summary.*

1188. Friedman, Ronald J. (Ontario Inst for Studies in Education, Toronto, Canada) **MMPI characteristics of mothers of pre-school children who are emotionally disturbed or have behavior problems.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1159–1162.—Compared the Minnesota Multiphasic Personality Inventory profiles of 33 mothers of preschool children who were emotionally disturbed or had behavior problems with those of a control group of mothers. Compared to controls, mothers of children with emotional problems had significantly higher scores on Depression, Psychopathic Deviate, Psychasthenia, Schizophrenia, and Hypomania scales. Mothers of children with behavior problems differed from controls only on the Hypomania scale. The significance of these results is discussed in terms of their contribution to the resolution of the question as to whether or not maternal maladjustment is a causative factor in deviant behavior in children or simply a reaction to a problem child.—*Journal abstract.*

1189. Ginsberg, Aniela M. (Catholic U São Paulo, Brazil) **A comparison of personality indicators across three cultural groups.** *Revista Interamericana de Psicologia*, 1974, Vol 8(1–2), 87–92.—Administered the Holtzman Inkblot Technique (HIT) to 186 university students



in 3 subgroups: Brazilians of the 4th generation or more, niseis or 1st generation Brazilians of Japanese descent, and Japanese studying in Tokyo. The groups were further subdivided according to father's educational level. Scores on 33 variables from the HIT were analyzed according to ethnic origin and father's education. Numerous statistically significant differences suggest that the HIT variables differentiated between ethnic groups with respect to precision and integration of perceptions, creative fantasy, anxiety, oppositional and disphoric affective attitudes, social adaptability, and special interests. (Portuguese summary)—*Journal abstract*.

1190. Good, Patricia K. & Brantner, John P. A practical guide to the MMPI: An introduction for psychologists, physicians, social workers, and other professionals. Minneapolis, MN: University of Minnesota Press, 1974. 102 p.—Provides individuals whose formal training did not include detailed information on the use of the Minnesota Multiphasic Personality Inventory (MMPI) with research results and clinical opinions about MMPI interpretation. The volume is also designed as a guide for test applications in specific circumstances.

1191. Grofman, Bernard & Hyman, Gerald. (State U New York, Stony Brook) The logical foundations of ideology. *Behavioral Science*, 1974(Jul), Vol 19(4), 225-237.—Demonstrates that 149 undergraduates' assignments of probabilities to a set of 15 interrelated propositions are highly consistent with a formal model of belief systems which satisfies the axioms of probability theory and propositional logic and which is based on the operation of symmetric difference. The model allows subjectively perceived truth-functional relationships between propositions in a belief system to be imputed to actors on the basis of their subjective probability assignments to these propositions and their pairwise conjunctions. The model also enables measures of the distance between sets of beliefs, of the congruence and consistency of belief systems, and of the degree of polarization of belief systems to be derived. (29 ref)—*Journal abstract*.

1192. Gupta, G. C. (U Delhi, India) Articulatness of the field and cognitive styles. *Journal of General Psychology*, 1974(Jul), Vol 91(1), 3-8.—Instructed each of 30 postgraduate students, seated in a chair in an upright posture in a dark room, to set a luminescent rod to the apparent vertical under 3 visual field conditions: Rod ONLY, Rod in Circle, and Rod in Square. In an analysis of variance of the deviations of the apparent from its objective position, significant effects were found for Initial Starting Positions of the Rod, Sex  $\times$  Positioning of the Rod being either Clockwise or Counterclockwise by Fields, and the error component of Within-group Ss  $\times$  Fields. Results suggest that in the event of nonexcitation or deficient adaptation to postural cues, articulateness of the field generates sex differences, taken to be an index of the presence of cognitive styles. A proposal for a new test of field dependence-independence is formulated.—*Journal abstract*.

1193. Halpin, Gerald; Halpin, Glennelle & Torrance, E. Paul. (U Georgia) Relationships between creative thinking abilities and a measure of the creative

personality. *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 75-82.—Studied the relationships between a creative personality measure, the What Kind of Person Are You? test, and 3 verbal and 4 figural creative ability measures derived from the Torrance Tests of Creative Thinking. Ss were 65 male and 164 female undergraduates enrolled in an introductory course in educational psychology. For the males, multiple coefficients of correlation were .57 for all 7 creative ability measures, .42 for the 3 verbal measures, and .51 for the 4 figural measures ( $p < .01$ ). For the females, multiple coefficients of correlation were .33 for all 7 measures, .22 for the 3 verbal measures, and .30 for the 4 figural measures ( $p < .05$ ).—*Journal abstract*.

1194. Hammer, W. M. & Tutko, T. A. (U California, Santa Barbara) Validation of the Athletic Motivation Inventory. *International Journal of Sport Psychology*, 1974, Vol 5(1), 3-12.—Correlated the Athletic Motivation Inventory (AMI) with the variables on the Cattell 16 Personality Factor (PF), Forms A and B. Of the AMI variables, emotional control, aggression, leadership, conscientiousness, tough-mindedness, trust, self-confidence, and guilt-proneness were considered to measure the traits similarly named on the 16 PF; i.e., Factor C, emotionally stable; Factor E, assertive; Factor G, conscientious; Factor I, tenderminded; Factor L, suspicious; Factor O, apprehensive; and Factor Q4, tense. The intercorrelations were very low, with the greatest amount of shared variation reaching only 30%. Of the 8 possible correlations, 7 were significant when Form A of the 16 PF and the AMI were intercorrelated. Guilt-proneness and emotional control were not found to be significantly correlated. When Form B was used, 8 of the 9 were significantly correlated.—*Journal abstract*.

1195. Heiman, Nanette & Grant, Joan. Else Frenkel-Brunswick: Selected papers. *Psychological Issues*, 1974, Vol 8(3, Mono 31), 333 p.—Publishes and discusses 7 of Else Frenkel-Brunswick's papers, emphasizing her contributions to theoretical psychology; her major empirical studies do not appear in this volume but are liberally quoted. The 7 papers are: "Psychoanalysis and Personality Research"; "Intolerance of Ambiguity as an Emotional and Perceptual Personality Variable"; "Personality Theory and Perception"; "Psychoanalysis and the Unity of Science"; "Interaction of Psychological and Sociological Factors in Political Behavior"; "Environmental Controls and the Impoverishment of Thought"; and "Some Theoretical and Empirical Aspects of the Problem of Values." A brief professional biography and a descriptive bibliography are included.—E. Coles.

1196. Hendry, L. B. (U Aberdeen, Scotland) Coaches and teachers of physical education: A comparison of the personality dimensions underlying their social orientation. *International Journal of Sport Psychology*, 1974, Vol 5(1), 40-53.—Studied similarities and differences in the personalities of coaches and physical education teachers. 63 coaches and 48 male physical education teachers in the United Kingdom completed the Dynamic Personality Inventory. Test scores were analyzed for significant differences between groups and for comparisons of "total" personality. Results indicate close similarities in only 2 factors—Dominance and Authoritarianism. A number of significant differences in

other personality dimensions were found, suggesting a quite separate "coach" and "physical education teacher" archetype. Comments on the differing approaches of the 2 types to social interaction are given. (23 ref)—*Journal abstract*.

1197. Houston, B. Kent & Holmes, David S. (U Kansas) **Effect of avoidant thinking and reappraisal for coping with threat involving temporal uncertainty.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 382-388.—Investigated the use of avoidant thinking as a means of coping with stress. The focus of the study was on stress under conditions of temporal uncertainty where threat was manipulated by telling 48 male undergraduates either that they would or would not receive electrical shocks sometime during the experimental period. The use of avoidant thinking during the experimental period was manipulated by instructing half of the threatened and half of the nonthreatened Ss to read an interesting story that kept them cognitively occupied. No distraction was provided for the remaining Ss. Contrary to the predictions, physiological measures of stress indicate that threatened Ss who used avoidant thinking showed more rather than less stress than threatened Ss who did not use avoidant thinking. Additional analyses revealed that threatened Ss who were not instructed to use avoidant thinking took the opportunity to reappraise the threat as less serious and thereby reduced their level of stress. Ss who used avoidant thinking were apparently unable to effect the reappraisal, and therefore their stress remained high.—*Journal abstract*.

1198. Jansen, Abraham. (U Amsterdam, Netherlands) **Validation of graphological judgments: An experimental study.** The Hague, Netherlands: Mouton, 1973. xiv, 189 p.—Describes a series of 4 related experiments which assessed the validity of personality judgments made by graphologists. The statistical calculations and analysis of outcomes are the results of both simple counts of hit results by graphologists and control groups—as against chance expectation—and of sophisticated psychometric techniques. (9 p ref)

1199. Johnson, Donald M. & Fogel, Max L. (Eastern Pennsylvania Psychiatric Inst, Philadelphia) **Creative aptitudes in a high intelligence population.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 93-104.—Analyzed scores from a multiaptitude test battery administered to 93 Ss (mean age = 35 yrs), all of whom had IQ scores within the top 2% on standard intelligence test norms. The battery contained 12 subtests. 5 were developed specifically to assess aptitudes which have been associated with creative thinking: 3 production (divergence) tests, a redefinition test, and a verbal sequencing test. Results demonstrate that the verbal battery discriminated reliably at high intelligence levels. Since only 12 of the 66 intercorrelations were higher than .30, a major test design objective of achieving subtest independence was satisfied. The low creativity subtest intercorrelations suggest infrequency of high creative aptitude combinations among high-IQ persons. This notion is supported by the aptitude combination frequencies obtained.—*Journal abstract*.

1200. Karabenick, Stuart A. & Marshall, Joan M. (Eastern Michigan U) **Performance of females as a**

**function of fear of success, fear of failure, type of opponent, and performance-contingent feedback.** *Journal of Personality*, 1974(Jun), Vol 42(2), 220-237.—279 female undergraduates performed a substitution task opposite a male, a female, or no opponent under achievement-oriented conditions. Ss were then given feedback indicating that they had either succeeded, failed, or performed the same as their opponents (or norms), followed by a 2nd performance trial. Fear of success (FS) was measured by a projective test in which Ss told stories in response to verbal cues, and fear of failure (FF) was measured by the Debilitating Anxiety scale of the Alpert-Haber Achievement Anxiety Test. Mean performance improvement was found to be related to individual differences in FS, FF, and type of opponent. Performance trends were consistent with data from M. S. Horner's 1968 study for Ss low in FF, but not for those high in FF. Low FF Ss improved more after failure than after success while high FF Ss improved more following success than failure, results which were previously found with males. Several self-ratings of affective reactions to performance were related to both personality and situational variables.—*Journal summary*.

1201. Katan, Anny. **The infant's first reaction to strangers: Distress or anxiety?** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 501-503.—Describes the pleasure reactions of the baby to the mother's face and the distress caused by a stranger's face. This attribution of anxiety to an infant may be a mistake made by adults, who cannot comprehend the undifferentiated feelings of a child. With the development of the secondary process and the establishment of object-constancy, feelings change not only in their quantity and intensity but in their quality. Only after object-constancy is fairly well established and the secondary process prevails, can it be assumed that the feelings of the small child—grief, anxiety, sadness, anger, etc.—are differentiated and experienced in approximately the same way as those of adults.—*R. S. Albin*.

1202. Koenig, Frederick & Seaman, Jerrol. (Tulane U) **Comparison of cognitive complexity of male and female subjects responding to male and female stimuli.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1345-1346.—Administered the Role Repertory Test to 172 undergraduates. Half of the right stimulus objects in the test were male and half were female. Results show that male stimulus objects elicited higher cognitive complexity scores and that male Ss were higher in cognitive complexity.—*Journal abstract*.

1203. Krovetz, Martin L. (Claremont Men's Coll) **Explaining success or failure as a function of one's locus of control.** *Journal of Personality*, 1974(Jun), Vol 42(2), 175-189.—Determined whether internal and external persons attribute different causes to success or failure on an experimental task. 60 undergraduates who were external and 60 who were internal, as measured by Rotter's Internal-External Control Scale, judged which of 3 African words had the same meaning as an English word for 70 trials. Ss were told by E whether their responses were correct or incorrect according to 1 of 5 reinforcement schedules. In 4 of the 5 reinforcement conditions, internal Ss stressed skill components of the task more than did external Ss. External Ss indicated that



chance was an important determinant of outcome. In the extreme success condition, internals used external attributes to explain their success while external Ss used internal attributes. Data suggest that the underlying cognitive processes for internals are quite different from those of externals.—*Journal summary*.

1204. Levenson, Hanna. (Texas A&M U) **Activism and powerful others: Distinctions within the concept of internal-external control.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 377-383.—Developed 3 new 8-item Likert-type scales to measure belief in chance (C), as separate from expectancy for control by powerful others (P), and perceived mastery over one's personal life (I). In Study 1, 96 adults completed the 3 scales in addition to an involvement activities checklist and a measure of knowledge about pollution. As predicted, only a belief in chance was differentially related to involvement and information on antipollution issues. In Study 2, a factor analysis of the responses of 329 male undergraduates to the 3 scales demonstrated the existence of the 3 main factors—I, P, and C. The validity and usefulness of the tripartite division in clarifying previous findings on the multidimensionality of internal-external control are discussed. (15 ref)—*Journal abstract*.

1205. Liebert, Robert M. & Spiegler, Michael D. (State U New York, Stony Brook) **Personality: Strategies for the study of man.** (Rev ed). Homewood, IL: Dorsey, 1974. xvi, 454 p. \$11.—Presents revised edition of a 1970 text (see PA, Vol 44:12) which introduces the student to theoretical and practical issues in psychology, applies psychology to important human concerns, and includes research examples which typify scientific methodology and investigation. Psychoanalytic, dispositional, phenomenological, and behavioral viewpoints are stressed. (19 p ref)

1206. Masling, Joseph; Johnson, Cynthia & Saturansky, Carol. (State U New York, Buffalo) **Oral imagery, accuracy of perceiving others, and performance in Peace Corps training.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 414-419.—Conducted 2 experiments to test the psychoanalytic theory that suggests that people with oral characteristics should be dependent on others and should develop skills in predicting the responses of others. Exp I used 32 male and 34 female previously unacquainted students. The Es found that males who reported many oral images were better than low-oral males at predicting male personality test responses. Orality was unrelated to accurate perception by males or females or to accuracy of females' interpersonal perception. To corroborate this finding, 33 male and 14 female undergraduate Peace Corps trainees, previously well acquainted, were studied. Results were identical: Orality was significantly related to accurate interpersonal perception for males predicting males but only in that case. The independent assessment of fitness for Peace Corps work was positively related to both oral imagery and accurate interpersonal perception. (18 ref)—*Journal abstract*.

1207. Medeiros, Elizabeth E. & McManis, Donald L. (Eastern Washington State Coll) **Assessment of introversion-extraversion in children: Brief report.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 429-430.—Attempted to replicate the results of J. Casey and D. L. McManis,

showing that high-extravert children salivated significantly less to lemon juice than did low-extravert children. Results were negative. Although group differences were in the predicted direction, the differences were nonsignificant, with the differences more marked for 18 girls than for 18 boys. A visual vigilance task also failed to produce significantly fewer correct responses by high-extravert children than by low-extravert children, as predicted by H. J. Eysenck's formulation. The prediction of faster but less accurate motor performance by high extraverts than by low extraverts was confirmed, although the results were significant only for the boys.—*Journal abstract*.

1208. Morf, Martin E. (U Windsor, Ontario, Canada) **The three levels of generalizability.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1139-1146.—Examined the theory of generalizability by L. J. Cronbach et al (1972) and J. Loewinger's (see PA, Vol 33:3850) analysis of construct validity in an effort to extend the concept of generalizability and to reformulate some aspects of Loewinger's analysis. 3 levels of generalizability emerged: generalizability from scale score to location on an unspecified personality dimension (reliability), from scale score to location on a vertically defined personality dimension (trait validity), and from scale score to location on a vertically and horizontally defined personality dimension (nomological validity). (26 ref)—*Journal abstract*.

1209. Morse, Stephen J. (Harvard U) **Structure and reconstruction: A critical comparison of Michael Balint and D. W. Winnicott.** *International Journal of Psychoanalysis*, 1972, Vol 53(4), 487-500.—Reviews and compares the theoretical approaches of 2 psychoanalysts, Michael Balint and D. W. Winnicott both of whom are provocative and unorthodox in theory and practice. It is suggested that despite their use of different terminology they have constructed similar conceptual frameworks to explain the essentially similar data found in their analyses of borderline and deeply regressed patients. Both speak of the mismatch between the psychobiological needs of the infant and the reality of his environment as the source of later problems. Balint and Winnicott are seen as having discovered data calling for fundamental reconstruction of psychoanalytic theory without fully carrying out the reconstruction themselves. (17 ref)—R. S. Albin.

1210. Moylan, Mary. (St Louis U, Columban Coll, Olongapo City, Philippines) **The happiness values of selected Filipino adolescent and young adult students in a provincial city.** *Saint Louis University Research Journal*, 1973(Mar), Vol 4(1), 1-121.—Attempted to discover the meaning framework and happiness values of 540 18-22 yr old Ss (½ male and ½ female) divided into 3 age levels. Perceived socioeconomic level and perceived academic ability were decided by each S. The Philippine Survey of Happiness Values was administered, and condensed into 70 statements in 10 major categories: spiritual outlook; personal freedom; physical health; physical ambition; emotional stability; family relationships; future; materialistic outlook; social relationships; and sex, drugs, and modern trends. Results indicate that no sex differences in happiness appeared among 18- or 22-yr-olds, nor between seniors in public and private high schools.

Spiritual outlook was the happiness value ranked highest. (31 ref)—*R. S. Albin*.

1211. **Mueller, Ernst F. & French, John R.** *Uric acid and achievement. Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 336-340.—Results of a study with male university professors indicate that (a) serum uric acid correlated .50 with achievement-oriented behavior, (b) neither of 2 measures of achievement motivation correlated with serum uric acid, and (c) serum uric acid was not related to either of 2 measures of actual achievement.

1212. **Muller, Douglas & Leonetti, Robert.** (New Mexico State U.) *Self-concepts of primary level Chicano and Anglo students. California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 57-60.—Compared the self-concepts of low-income Chicano and Anglo children in kindergarten through 4th grade, using the Primary Self-Concept Scale by R. Leonetti. The only difference between the 2 groups occurred at the kindergarten level, with Anglo Ss having significantly higher self-concepts ( $p < .05$ ).

1213. **Patrick, Audrey W.; Zuckerman, Marvin & Masterson, Fred A.** (U Delaware) *An extension of the trait-state distinction from affects to motive measures. Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1251-1258.—Explored the feasibility of using the Adjective Check List as a measure of motive states as well as of motive traits, using 37 undergraduates. Ss took the Adjective Check List as a trait test, 11 times as a state test, and again as a trait test. For all 23 scales, the mean of the states was a significantly better measure than a generalized trait of day-to-day states. Retest reliability was significantly higher for trait than state measures for all scales. Communalities, indicative of a trait component in a state measure, was present in all scales except Exhibitionism and Aggression scales. A sample of states (as few as 2) provided a reasonable estimate of the mean of states. (30 ref)—*Journal abstract*.

1214. **Phillips, Victor K. & Hudgins, Anne L.** (U Georgia) *Relationship between creativity, sex, and rule-orientation behavior. Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1163-1171.—Investigated how levels of rule-orientation behavior and sex relate to creative functioning. 30 male and 30 female undergraduates were given the Arrow-Dot task from the Id-Ego-Superego Test to derive high and low levels of 3 rule-orientations: rule-governed, rule-violation, and rule-overconformity. Ss were also administered the Circles task from the Torrance Tests of Creative Thinking to obtain indexes of originality and elaboration.  $6.2 \times 2$  factorial analyses of variance, with originality and elaboration as dependent variables, sex and level of rule-orientation behavior as independent variables provided tests of 3 hypotheses: (a) females high in rule-governed behavior will be more creative than males high in rule-governed behavior, (b) females high in rule-violation behavior will manifest less creative ability than males high in rule-violation behavior, and (c) females showing high rule-overconformity behavior will be more creative than males high in rule-overconformity. The 1st hypothesis was partially confirmed as reflected in the main effects for rule-governed levels but the other

hypotheses were not supported. (26 ref)—*Journal abstract*.

1215. **Roberts, Glyn C.** (U Illinois, Children's Research Ctr) *Effect of achievement motivation and social environment on risk taking. Research Quarterly*, 1974(Mar), Vol 45(1), 42-55.—Investigated the risk-taking choices of male undergraduate Ss performing a motor task. 50 achieve-success Ss and 50 avoid-failure Ss (selected by the French Test of Insight and Sarason's Test Anxiety Scale) practiced a modified shuffleboard task from which empirical probabilities of success were found for each S. Ss were randomly placed into 1 of 5 competitive treatment levels—alone, presence of others, interpersonal competition, intergroup competition, and interpersonal and intergroup competition. Each S was given 20 free-choice trials. Achieve-success Ss preferred intermediate risk choices to a significantly greater extent than avoid-failure Ss. Avoid-failure Ss preferred extreme-risk choices to a significantly greater extent than low- or intermediate-risk. No competitive treatment effects were noted. (30 ref)—*Journal abstract*.

1216. **Ross, Nathaniel.** (State U New York, New York City) *Man's struggle for freedom: A psychoanalytic inquiry into the individual and social dimensions of human autonomy. Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 209-221.—Discusses today's threats to freedom, which are so awesome in their magnitude that most people dread confronting them. Psychoanalysis takes a strong positive position on the issue of freedom; the aim of psychoanalytic therapy does not include acceptance of the status quo in the social order. The need for behavioral scientists to address themselves to current social, political, and economic phenomena is strongly voiced. (18 ref)—*J. Z. Elias*.

1217. **Ryckman, Richard M. & Malikiosi, Maria.** (U Maine, Orono) *Differences in locus of control orientation for members of selected occupations. Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1224-1226.—Administered a locus of control measure by H. Levenson (1972) to college students, workers, and professionals. Results support the predictions that professionals would believe they exercise more personal control over events and would perceive their reinforcers as occurring more predictably than would the other 2 groups. No group differences were found in perceived extent of control by powerful others.

1218. **Savastano, Helena & de Domini, Juliana.** (U São Paulo, Faculty of Public Health, Brazil) [The Visual Motor Gestalt Test in adults: Preliminary study.] (Port) *Revista de Psicologia Normal e Patológica*, 1970(Jul), Vol 16(3-4), 221-233.—Establishes a preliminary Index of Neuroticism in adults using the Bender-Gestalt Visual Motor Test. The objectives were (a) to verify the characteristics manifested in any emotional change in adults, using the Bender-Gestalt; (b) to obtain data discriminating difficulties in group adaptation; and (c) to construct an index of neuroticism. 27 items in 7 areas were used with 30 Ss in validating the index. (French & English summaries)—*N. T. Pinckney*.

1219. **Sell, John M. & Duckworth, Jane J.** (Ohio U) *Field-dependence, neuroticism, and extraversion. Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 589-590.—Used a multiple regression analysis to predict Mauds-



ley Personality Inventory extraversion scores from the rod-and-frame test (RFT), embedded-figures test, and Maudsley neuroticism scores of 66 undergraduate males. Results indicate that optimal weights of the neuroticism, embedded-figures, and RFT upright scores contributed to prediction.—*Journal abstract.*

1220. Sobel, Robert S. (Hunter Coll, City U New York) **The effects of success, failure, and locus of control on postperformance attribution of causality.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 29-34.—Measured valences for successful task performance and locus of control preference on Rotter's Internal-External (I-E) Scale, with 153 college students as Ss. The subjective probability of doing well on a task and reported success following performance of the task were manipulated within a factorial design. Following performance feedback, Ss scaled several internal and external factors in terms of their influence on task performance. As predicted, success produced attribution to internal factors, while failure produced attribution to external factors. External Ss tended to attribute their performance more to external and less to internal factors than did internals only in the failure condition. It is suggested that the overemphasis of failure-oriented items in the I-E scale could account for this effect.—*Journal abstract.*

1221. Stewart, Abigail J. & Winter, David G. (Harvard U) **Self-definition and social definition in women.** *Journal of Personality*, 1974(Jun), Vol 42(2), 238-259.—Developed a scoring system for Thematic Apperception Test (TAT) stories written by female undergraduates who planned full-time careers (with or without marriage) and those written by female undergraduates who planned marriage (without a career). The scoring system was hypothesized to measure self-definition vs social definition, was constructed with data from 1 sample of 49 Ss, and was cross-validated with data from a 2nd sample of 57 Ss. The measure was uncorrelated with intelligence, social class, and traditional measures of sex-role or sex differences (e.g., the Masculinity-Femininity scale of the Strong Vocational Interest Blank and the Femininity scale of the California Psychological Inventory). Self-defining Ss (a) tended to have working mothers and no older brothers; (b) reported a variety of instrumental actions; and (c) reported pleasures, fears, and secrets that suggested a pattern of thought, feeling, and behavior no less coherent than the pattern shown by the more "traditional" socially defined Ss. The advantage of the TAT over questionnaire procedures for measuring this dimension is discussed. (31 ref)—*Journal summary.*

1222. Strahan, Robert. (Iowa State U) **Situational dimensions of self-reported nervousness.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 341-352.—Administered the Stimulus Situation-Response Inventory of Anxiety to 149 undergraduate and graduate students and 68 17-18 yr old factory apprentices. Factor analyses of the responses revealed 3 broad nervousness dimensions, characterized by social situations, situations of physical discomfort or potential bodily harm, and situations of disorder or disruption. The 1st 2 of these dimensions have been reported previously. The 3rd has not been noted conspicuously and may merit further

study. 3 Nervousness scales constructed from the factor analysis data showed test-retest (intervals of from one to several weeks) reliability coefficients of from .87 to .88. Internal consistency coefficients ranged from .86 to .89 for the college student sample and from .86 to .88 for the factory apprentices. Moderately strong correlations between the 3 scales were obtained for the students and strong correlations for the factory group. Correlation data from 7 other personality measures are also reported. (21 ref)—*L. Gorsey.*

1223. Switzky, Harvey N. & Haywood, H. Carl. (George Peabody Coll, Inst on Mental Retardation & Intellectual Development) **Motivational orientation and the relative efficacy of self-monitored and externally imposed reinforcement systems in children.** *Journal of Personality & Social Psychology*, 1974(Sep), Vol 30(3), 360-366.—Compared behavior maintenance capability of self-monitored reinforcement to that of externally imposed reinforcement and to 2 noncontingent control conditions in 160 children in Grades 2-5. Half of the Ss at each grade level were intrinsically motivated and half were extrinsically motivated. Self-reinforcement Ss selected their own performance standards and rewarded themselves whenever they obtained their prescribed level; external-reinforcement Ss were yoked to them so that the same behavioral standards were imposed but the reinforcers were administered externally. Results show that intrinsically motivated Ss maintained their performance longer than did extrinsically motivated Ss under self-reinforcement, while extrinsically motivated Ss showed greater performance maintenance than did intrinsically motivated Ss under external reinforcement. It is concluded that individual differences in motivational orientation must be considered in order to predict patterns of self-reward behavior. (23 ref)—*Journal abstract.*

1224. Tarantino, Onofrio. [Sexual and anatomic responses on the Rorschach test.] (Fren) *Revue de Psychologie et des Sciences de l'Éducation*, 1973, Vol 8(3), 287-298.—Reports a study of Zaire university students to determine popular responses. Percentage of sexual responses was higher than those reported for European and American Ss in similar studies.

1225. Tittler, Bennett I. (Capital District Psychiatric Ctr, Albany, NY) **A behavioral approach to the measurement of openness-to-experience.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 335-340.—Used the miniature situations approach to measure the concept of openness-to-experience in 105 undergraduates. A 38-item measure of openness was developed from work in encounter and sensitivity techniques and from S. Santostefano's original work with the miniature situations method. Before the openness measure was administered, Ss completed the Rokeach Dogmatism Scale and Fitzgerald's Experience Inquiry. 101 other Ss completed the openness measure in a self-report format. A factor analysis of the 38 miniature situation items resulted in 9 openness factors, 4 of which showed evidence of concurrent validity. Openness scores were significantly higher among Ss who responded to the self-report format. (16 ref)—*L. Gorsey.*

1226. Vuchinich, Rudy E. & Bass, Barry A. (Indiana State U) **Social desirability in Rotter's Locus of Control**

**Scale.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1124-1126.—Although significant correlations were obtained between the scores of undergraduates on the Marlowe-Crowne Social Desirability scale and Rotter's Internal-External (I-E) Control Scale, the relationship was not consistent throughout the range of I-E Scale scores.

1227. Ward, William C. & Cox, Patricia W. (Educational Testing Service, Princeton, NJ) **A field study of nonverbal creativity.** *Journal of Personality*, 1974(Jun), Vol 42(2), 202-219.—Conducted 2 studies to examine creative products submitted in response to a contest to discover whether creativity was related to the sex or socioeconomic status (SES) of the respondent and whether characteristics of the objects could be specified which would predict their level of rated creativity. Judges were research assistants in Study 1 and graduate students' wives in Study 2. No sex differences were found, but SES was significantly associated with creativity for those objects to which at least a moderate amount of effort had been devoted. Ratings of the objects on several simple dimensions (e.g., originality, attractiveness, humor, complexity, and effort) proved effective in predicting rated creativity. Judges differed on which dimension best predicted their creativity ratings, but differences between subsets of the objects were of greater importance than individual differences among judges in determining the bases on which the ratings were made. (19 ref)—*Journal summary*.

1228. Warnes, H. & Hill, G. (McGill U, Montreal, Quebec, Canada) **Gender identity and the wish to be a woman.** *Psychosomatics*, 1974, Vol 15(1), 25-29.—Presents a view suggesting the primacy of the female gender and the basic woman-envy on the part of males. (16 ref)

1229. Waterman, Caroline K. & Waterman, Alan S. (State U New York, Albany) **Ego identity status and decision styles.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 1-6.—Hypothesized that the decision processes used in coping with the identity crisis would be related to more general decision styles in that identity achievers and moratorium Ss would tend to be reflective in their conceptual tempo while foreclosure Ss would typically be impulsive. No prediction was made about Ss with identity diffusions. 92 male undergraduates were given an identity status interview and the Matching Familiar Figures Test. Results support the hypotheses. It was also found that identity diffusions were generally impulsive. Since conceptual tempo has been found to be well established in childhood, results have implications for the early prediction of adult identity status.—*Journal abstract*.

1230. Webster, Murray & Sobieszek, Barbara. (Johns Hopkins U) **Sources of self-evaluation: A formal theory of significant others and social influence.** New York, NY: John Wiley & Sons, 1974. xxi, 189 p. \$12.95.—Reviews the main concepts and problems of early formulations on the self taken from classical, theoretical, and empirical literature, presents recent experimental data on the self, and demonstrates the building of formal theory using experiments in a step-by-step process. (4½ p ref)

1231. Weiss, A. A. (Hebrew U Jerusalem, Israel) **Equivalence of three alternative forms of Benton's**

**Visual Retention Test.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 623-635.—Analyzed the stimulus composition of the 3 alternative forms of Benton's Visual Retention Test. The 3 forms differed from each other in lateral distribution and vertical placement of peripheral details, in equality of chances for the elicitation of stabilizations, internal distortions, and mirror rotations. When 106 7th graders were randomly assigned to perform 1 of the 3 forms, their mean "correct" and "error" scores were very close to each other. No significant influence of individual Ss on means was observed, and the power of specific figures to elicit errors by individual Ss was spread evenly. However, the contribution of individual stimuli in each form to total error score was spread widely. Earlier findings as to differential frequency of the various error categories were confirmed for each form. Concentrations of certain errors in particular figures are discussed and tentative interpretations are advanced. Certain changes are proposed to equate the 3 forms qualitatively and increase the discriminative power of the instrument.—*Journal abstract*.

1232. Wilkinson, Gregg S. (Duke U, Medical Center) **Social psychological dimensions of resistance to psychiatric innovations.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1083-1085.—Attempted to isolate factors affecting staff resistance to innovations (e.g., adoption of the treatment team approach) in a state mental hospital. Results show that resistors had higher conservatism, dogmatism, and Machiavellianism scores and had less faith in people than did innovation acceptors.

1233. Zalesnik, Abraham. (Harvard U, Graduate School of Business Administration, Boston) **Charismatic and consensus leaders: A psychological comparison.** *Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 222-238.—Examines the personality traits of the 2 types of leadership. Charismatic leaders are inner-directed, and will identify with objects, symbols, and ideals connected with introjects. The psychopathology of such leaders may include megalomania, paranoia, and other massive psychic upheavals. Consensus leadership, which has deep roots in the American national character, presents the leader as brother or peer rather than as father. Any leader will act or react in ways consistent with his personal style and with his habitual modes of managing internal and external conflict. It is suggested that personality factors have been underestimated in their capacity to determine how a chief executive will respond to the constraints and opportunities available to him. (19 ref)—*J. Z. Elias*.

## PROFESSIONAL PERSONNEL

1234. ———. [Papers presented at 3rd Brazilian Congress on Mental Deficiency: June 28-July 2, 1972: 1.] (Port) *Revista Brasileira de Deficiência Mental*, 1972(Sep), Vol. 7(3), 51 p.—Presents 11 papers in Portuguese and 2 in Spanish, dealing with professional training in the treatment of mental deficiency; with linguistic, psychological, social, pedagogical, vocational, and medical aspects of deficiency; with neuropsychomo-



tor development and mental disability; and with other related topics.—N. T. Pinckney.

1235. **Arbuckle, Dugald S.** (Boston U) **Theoretical, professional, and ethical issues in counselor education.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses theoretical issues surrounding the functions of the counselor and the effect of the counseling process. Professional issues (e.g., the state certification of counselor education programs) are also considered. Ethical issues concerning client change, the alienation of the student counselor, and the values of the counselor are examined. (36 ref)

1236. **Barrett-Lennard, G. T.; Kwasnik, T. P. & Wilkinson, G. R.** (U Waterloo, Ontario, Canada) **Some effects of participation in encounter group workshops: An analysis of written follow-up reports.** *Interpersonal Development*, 1973-1974, Vol 4(1), 35-41.—6 mo or longer after participating in a 2-wk basic encounter workshop, 62 mental health professionals completed a follow-up questionnaire. Their responses implied a range of frequently experienced changes in behavior and attitudes evidently resulting from their participation in the workshop. A system devised for classifying the mentioned and implied changes yielded a high level of interjudge agreement. Using this system, the participants' responses to the open-ended questionnaire items were classified. A pattern emerged from the obtained classification data which strongly suggests that the workshop experience led to an enduring change in level of self-regard for most of the participants and that this change contributed to associated persisting changes in interpersonal behavior and attitudes.—*Journal abstract*.

1237. **Berenson, Bernard G.** (American International Coll) **Confrontation: Those who qualify and those who do not.** *Canadian Counsellor*, 1974(Apr), Vol 8(2), 121-125.—Contends that confrontation is an abused technique which is sometimes used irresponsibly and is never sufficient in itself. People who confront must possess high levels of understanding, deep and appropriately changing levels of regard and affect, a high level of physical energy, and a large and growing repertoire of helping skills.

1238. **Boehm, Ann E.; Duker, Jan; Haesloop, Maryanne D. & White, Mary A.** (Teachers Coll, Columbia U) **Behavioral objectives in training for competence in the administration of individual intelligence tests.** *Journal of School Psychology*, 1974, Vol 12(2), 150-157.—Considers that competency standards are important to school psychology training. A study conducted with 107 graduate education students is described to demonstrate, in the area of individual intelligence test administration, how competency standards can be implemented. The study set up behavioral objectives, determined what training was required for specified levels of mastery, and showed what specific training procedures contribute to the achievement of competency.—*Journal abstract*.

1239. **Bogdan, Robert; Taylor, Steven; deGrandpre, Bernard & Haynes, Sondra.** **Let them eat programs: Attendants' perspectives and programming on wards in state schools.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 142-151.—Describes aspects of

attendants' definitions of supervisors, their jobs, and residents of state schools that relate to the implementation of "innovative" programs designed by supervisory and professional staff to serve the needs of the residents. Data were obtained from participant observation studies of wards in state schools for the mentally retarded. (16 ref)

1240. **Bordin, Edward S.** (U Michigan) **Reflections on preparation for psychological counseling.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the influence of instrumental knowledge, personal motives and other characteristics, and setting on the counselor's functions. The level of preparation required for psychological counselors is discussed, and issues surrounding learning vs experiencing, diagnosis, and supervision in counselor trainee programs are examined.

1241. **Brodsky, Annette.** (U Alabama) **Status of women in the psychological community in the Southeast: Women as graduate students.** *American Psychologist*, 1974(Jul), Vol 29(7), 523-526.—Results of interviews with female and male psychology graduate students in southeastern institutions reveal little evidence of perceived "soft" sex discrimination in assignments, interpersonal relationships, and encouragement received. The sexes were similar in financial aid received and field of psychology pursued. However, females felt that they were not fully accepted as individuals by the faculty.

1242. **Cardon, Bertell W.** (U Pennsylvania) **Membership characteristics of the Division of School Psychology of the American Psychological Association.** *American Psychologist*, 1974(Aug), Vol 29(8), 632-638.—Provides statistics on the composition and characteristics of the American Psychological Association's Division of School Psychology. Information from membership records of the Division, the *American Psychological Association 1972 Membership Register*, and a questionnaire sent to approximately 150 members reveals that of the Division's total membership of 2,485, 49% have earned the doctorate (58% male and 33% female) and 51% hold the MA or BA degree. Approximately 75% of the members—68.2% male and 84.6% female—are employed principally in nonuniversity settings. Other findings show that 47.8, 48.1, and 4.1% of the female members are Associates, Members, and Fellows, respectively, while 36.3, 57.9, and 5.7% of the male members have the same roles. Although women represented less than 40% of Division membership in June 1973, they held more than half of the seats on the Executive Committee.—*M. Pounsel*.

1243. **Chartoff, Marvin B. & Bardon, Jack I.** (Rutgers State U) **Doctoral school psychology program graduates in the United States: The first seventeen years.** *Journal of School Psychology*, 1974, Vol 12(2), 102-113.—Surveyed graduates of all known doctoral school psychology programs in the US from the inception of school programs in 1953 through 1970 to determine their background, professional development and interests, and their concerns about training. Findings were based on a 78% return rate ( $n = 324$ ). It is concluded that separate doctoral programs in school psychology appear at present to be an efficacious way to ensure orientation,

commitment, and training for the application of psychology to school problems. (22 ref)—*Journal abstract.*

1244. Cody, John J. (Southern Illinois U) **Role playing with stimulated recall.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Describes the use of stimulated recall procedures and role-playing sessions in improving student counseling skills. How these techniques can increase the reality of the training experience, cautions in introducing role-playing procedures to beginning students, and the use of recall procedures for training evaluations are discussed.

1245. Cook, Daniel W.; Kunce, Joseph T. & Sleater, Susan M. (U Missouri, Columbia) **Vicarious behavior induction and training psychiatric aides.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 293-297.—Studied the effectiveness of various techniques in developing desired behaviors in psychiatric aides. 33 psychiatric aide trainees were assigned to 1 of 3 types of training: discussion group, didactic teaching and discussion group, or vicarious induction. Vicarious induction involves determining the specific behaviors and attitudes which are desired, selecting appropriate models to depict these behaviors in videotaped episodes, and having the trainees observe and discuss the meaning of the videotapes. All groups were given written copies of 9 lessons on appropriate and facilitative interpersonal skills (e.g., listening behaviors and giving and receiving help). Training effects were assessed immediately after the sessions and 6 mo after the trainee's actual work on a ward. Ss in the vicarious (modeling) group received the highest ward ratings, followed by the didactic-discussion group, and finally by the discussion-only group. (15 ref)—*L. Gorsey.*

1246. Cottingham, Harold F. (Florida State U) **Using case materials in counselor preparation.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Describes various types of written and taped case materials and presents illustrations of typical case data in each category. The application of case data to 3 aspects of counselor education (didactic, practicum, and experiential) is examined, and some problems associated with the use of case materials in theoretical, ethical, and practical teaching situations are discussed. (35 ref)

1247. de Rosis, Helen A. (Roosevelt Hosp, New York, NY) **Supervision of the first-year psychiatric resident.** *Psychiatric Quarterly*, 1973, Vol 47(4), 592-603.—Presents the 13th and 14th parts of a series of discussions on facets of psychotherapeutic technique for the novice. Part 13 suggests that the elemental essentials in a beginning therapist's relationship with a patient are the words *how, who, what, where, when*, and sometimes *why*. These will convey to the patient an interest in details of his life, help him clarify things he has not understood, provide him with opportunity to talk at length with someone not reluctant or exasperated with him, and enable him to air his feelings without fear of rejection. Part 14 discusses the therapist's feelings for and about the patient—recognizing the patient's suffering and desperate desire for help—and stresses the therapist's need to maintain continuing interest, acceptance, and care.—*B. McLean.*

1248. Evans, Ian M. & Nelson, Rosemary O. (U Hawaii) **A curriculum for the teaching of behavior assessment.** *American Psychologist*, 1974(Aug), Vol 29(8), 598-606.—Describes a curriculum for the teaching of behavior assessment to graduate students of clinical psychology in which an attempt was made to integrate, within the single-S research strategy, both experimental psychopathology and the observational methods employed in behavior modification. Various psychological assessment issues are discussed in the context of the organization of the required readings for the course.—*Author abstract.*

1249. Farwell, Gail F. (U Wisconsin, Madison) **Ethics and the helping professional.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents a series of basic questions for the counselor to consider when thinking about his functions and purpose as a helping professional. The code of ethics of the American Personnel and Guidance Association and of the American Psychological Association are appended to the article.

1250. Farwell, Gail F.; Gamsky, Neal R. & Mathieu-Coughlan, Philippa. (U Wisconsin, Madison) **The counselor's handbook.** New York, NY: Intext, 1974. x, 530 p.

1251. Fooks, Gordon M. (Pennsylvania State U) **Dilemmas of black therapists.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jul), Vol 1(4), 181-191.—Discusses some obstacles that may be encountered by black counselors and therapists in the course of training, client relationships, and practice. In their training, black counselors often receive white middle-class interpretations of research and are denied the opportunity to treat black patients. Training experiences with white patients cannot be automatically applied to the problems of black clients. Special issues involved when a black therapist treats a white client and a black client are identified, including transference, identification, race "consciousness," and guilt feelings. The attitudes of other therapists toward the black therapist are also examined. The necessity of developing new training models and conducting specific studies of the problems of the black therapist is stressed. (23 ref)—*L. Gorsey.*

1252. Gallessich, June. (U Texas, Austin) **Training the school psychologist for consultation.** *Journal of School Psychology*, 1974, Vol 12(2), 138-149.—Suggests and discusses several dimensions—value orientation, target, operational level, method, and consultant role—which are helpful in identifying differences among models of consultation. These dimensions are applied to the evaluation of major models: (a) consultation to transmit information, (b) medical model consultation, (c) mental health consultation, (d) program consultation, (e) process consultation—organizational humanization and renewal, and (f) advocacy consultation—social systems intervention. A school consultation training program is described, and related training issues are raised. (35 ref)—*B. McLean.*

1253. Geller, Jesse D. & Feirstein, Alan R. (Yale U) **Professional training in community mental-health centers.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York,



NY: Intext, 1974. x, 530 p.—Describes the development and characteristics of community mental health centers and the kind of training that they may be able to provide for students in the areas of comprehensive services and community responsiveness. Problems in developing a professional identity and system of values, and the nature of collaborative training are also examined. (35 ref)

1254. Gendlin, Eugene T. (U Chicago) **The role of knowledge in practice.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses possible misuses of knowledge about a client or a counseling process that can affect treatment outcome. 5 major misuses are identified (e.g., the substitution of concepts for experience). 7 criteria for using knowledge properly in the counseling process are discussed, and the importance of understanding the experiential aspects of a problem, rather than its theoretical implications, is emphasized.

1255. Goldstein, Marion Z. (St Francis General Hosp, Day Ctr Services, Pittsburgh, PA) **In-service training offered in a CMH/MRC interview technique seminar with use of videotape.** *Journal of Medical Education*, 1974(Aug), Vol 49(8), 789-791.—Describes a 14-wk videotape seminar series on interview techniques used as inservice training for community mental health/mental retardation center (CMH/MRC) nurses, staff members, and social workers. The seminar included videotapes of 7 psychiatrists and 7 patients representing different aspects of the interviewing process, group discussions of interview styles, and practice interview sessions.

1256. Gray, James J. (American U) **Methods of training psychiatric residents in individual behavior therapy.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 19-25.—Considers that the traditional lecture and supervision method of training psychiatric residents evolved for the teaching of nonbehavioral methods of therapy. 5 relatively underused training techniques (experiential learning, films and tapes, observation of models, microcounseling, and observation by supervisors) are suggested as more appropriate, since they utilize a nonaversive atmosphere, mainly positive control, direct observation, immediate specific feedback, and a gradual shaping of a complex therapeutic repertoire. Basic readings should be programmed while later readings should be problem-centered. (46 ref)—*Journal abstract*.

1257. Gross, Douglas R. (Arizona State U) **The supervisory process: Multiple-impact supervision.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Describes the concept of multiple-impact supervision and its application to counselor training. With this approach, supervisors with different theoretical orientations are paired with students so that the trainees can grasp the full dimensions of the counseling process. The approach also provides individual instruction and can be used to expand the traditional practicum and provide in-depth experiences for counseling students.

1258. Group for the Advancement of Psychiatry, Committee on Psychiatry & Law. (New York, NY) **Misuse of psychiatry in the criminal courts: Competency to stand trial.** *GAP Report*, 1974(Feb), Vol 8(89), 853-919.—Discusses the collaboration of psychiatrists in the system of criminal justice, particularly their neglected role in helping courts decide whether a defendant is competent to stand trial. Conflicting assumptions that cloud the issue of competency to stand trial are discussed, and historical standards of competency are reviewed. New procedures are recommended to correct the abuses of current procedures. (51 ref)

1259. Gust, Tim. (U Hawaii) **Contributions and limitations for professional counselor preparation: University counseling centers.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Describes the potential of university counseling centers as training facilities for professional counselors. The historical background of counseling internships is reviewed, and training standards, counselor-trainee relationships, staffing patterns, and evaluation procedures involved in a model counseling center training program are discussed. (26 ref)

1260. Gysbers, Norman C. & Ronnestad, Michael H. (U Missouri) **Practicum supervision: Learning theory.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Examines the implications for counselor practicum supervision of the following learning theory concepts: performance objectives, modeling, and types of reinforcement. Specific recommendations to facilitate counselor-trainee learning are made. (19 ref)

1261. Hardy, Kenneth R. (Brigham Young U) **Social origins of American scientists and scholars.** *Science*, 1974(Aug), Vol 185(4150), 497-506.—Developed a productivity index to determine the relative productivity of schools, states, and regions as the origins of scientists and scholars over a 40-yr period. Data suggest that variations in the production of scholarly and scientific doctorates in the US are associated with religious-ethnic group membership and certain beliefs and cultural values. (25 ref)

1262. Harshbarger, Dwight & Maley, Roger F. (West Virginia U) **Getting off the horns of the dilemma: Behaviorally based treatment systems.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Considers that concepts of deviance and therapeutic strategies aimed at treating deviance in mental health systems are strongly based in community values, and that therapists, as members of communities, act as agents of social control when they engage in what they perceive as helpful therapeutic endeavors. The issue of whether mental health professionals are actually doing harm to their patients and the fact that psychodynamic therapies themselves are value-oriented are discussed, and suggestions for behaviorally based treatments which would resolve this dilemma are presented. (25 ref)

1263. Hosford, Ray E. (U California, Santa Barbara) **Behaviorism is humanism.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's*

*handbook*. New York, NY: Intext, 1974. x, 530 p.  
—Discusses the role of a behavioral counselor in decision making, changing behavior, and preventing problems. The need to base counseling on scientific rather than philosophical foundations is emphasized, and the humanistic principles that are inherent in any aspect of changing behavior or solving problems are considered. (24 ref)

1264. Hunter, Carol P. & Lambert, Nadine M. (California State U, Long Beach) **Needs assessment activities in school psychology program development.** *Journal of School Psychology*, 1974, Vol 12(2), 130-137.  
—Presents needs assessment activities as a basis for gathering information essential to program development, revision, and evaluation. Needs assessment activities which are discussed include surveys of trends advocated by national authorities and consumers and identification of needs of trainees, graduates, and local school systems. These data form the basis for developing program objectives in a sequentially ordered multilevel program. (37 ref)—*Journal abstract*.

1265. Joesting, Joan. (Livingstone Coll) **Status of women in the psychological community in the South-east: Women in academe.** *American Psychologist*, 1974(Jul), Vol 29(7), 520-523.—Results of a survey of psychology departments in southeastern institutions reveal that women are underrepresented on the faculty and in doctoral programs. Women full professors receive substantially lower salaries than men, while the reverse is true for associate professors. Salaries are higher for both sexes in larger institutions.

1266. Johnson, Warner et al. (U Southern California, Medical School) **Applying principles of instructional design to a medical school course in psychiatry.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 822-824.—Describes a successful course in which a description of the program design and instructional techniques were presented to 2nd-yr medical students, emphasizing in a specific way the development and implementation of learning objectives. Results show that these instructional methods led both to increased perceived learning and to greater actual learning.

1267. Karasu, Toksoz B.; Plutchik, Robert; Herschenfeld, Philip & Siegel, Barbara. (Albert Einstein Coll of Medicine, Yeshiva U) **The effect of a psychiatric residency program on admission and discharge rates and patient disposition.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 918-921.—Examined the effect of a residency training program on the services delivered to patients on 2 psychiatric wards of a general hospital. Data obtained before and after the introduction of the program indicate that screening procedures and the relationship between ward and intake services improved, uninteresting cases were not "dumped," and treatment was focused on the more seriously ill patients.

1268. Karasu, Toksoz B.; Stein, Stefan P. & Charles, Edward S. (Albert Einstein Coll of Medicine, Yeshiva U) **A preliminary study of the elimination of the internship: A comparative study of performance of internship- and noninternship-trained residents in a psychiatric inpatient setting.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 269-272.—In 1970, the American Board of Psychiatry and Neurology eliminat-

ed the internship as a requirement for certification in psychiatry. This study compared the work on a psychiatric inpatient service of 14 internship-trained 1st yr residents with that of a matched group of 14 residents who entered the same program without an internship. A chart review comparison disclosed differences in patient care practices in the areas of length of stay, writing of progress notes, and use of the laboratory and medical consultants. Staff ratings of the residents differed significantly in 4 of 5 measured categories (maturity, ability to relate to staff, ability to handle medical problems, and ability to handle psychiatric patients in general).—*Journal abstract*.

1269. Kehas, Chris D. (Manchester Public Schools, NH) **Counseling.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the present status of training programs for school counselors. A proposed redirection of the functioning of counseling in schools is offered, research on training practices is examined, and the benefits of practicum experience are described. (16 ref)

1270. Kendell, R. E.; Pichot, Pierre & Von Cranach, M. (Royal Edinburgh Hosp, Scotland) **Diagnostic criteria of English, French, and German psychiatrists.** *Psychological Medicine*, 1974(May), Vol 4(2), 187-195.  
—Videotape recordings of brief diagnostic interviews with 27 patients newly admitted to a psychiatric hospital in London were shown to groups of English-speaking psychiatrists in London, Paris, and Munich. Comparison of the diagnoses made by the 3 audiences suggests that English, French, and German psychiatrists have similar concepts of schizophrenia, neurotic illness, personality disorder, and alcoholism, but differ markedly in their concept of affective illness, particularly manic-depressive illness. English psychiatrists have much broader concepts of both neurotic and psychotic depression and of mania than the French, with German psychiatrists in an intermediate position. Important differences in the use of other technical terms like agitation, perplexity, and thought disorder also emerged. The ratings of the English and German audiences were closer to one another than either was to the French.—*Journal abstract*.

1271. King, Paul T. & Wollersheim, Janet P. (U Missouri) **Training for the applied psychologist in a university psychological service center.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents recommendations regarding the education and training of applied psychologists. It is suggested that (a) the scientist-professional educational model could be better utilized, (b) students should receive broader training which includes preparation for behavioral and professional role expectations, and (c) teachers and supervisors should continue to see clients.

1272. Kirk, Barbara A. & Chin, Arnold H. (U California, Berkeley) **Utilization of university counseling centers for counselor preparation.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses selection, staffing, and treatment issues involved in using university counseling centers as training sites for counselors. Problems in maintaining the



service role of the center while providing comprehensive training are examined, and specific steps in facilitating trainee performance in interviewing, gathering occupational and educational information, and prescribing treatment are identified.

1273. Klein, Donald C. (NTL Inst for Applied Behavioral Sciences, Ctr for Macrosystem Change, Washington, DC) **Community change agents.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Discusses issues involved in the selection, training, and functions of mental health workers in community agencies. The heterogeneous backgrounds and skills of new workers and the resultant problems of classification, status, and utilization; staff roles in internal and external agencies (e.g., outreach programs); and the necessary development of linkage and problem-solving systems for training are analyzed. A classification scheme for change functions and settings is proposed. (27 ref)

1274. Krawiec, T. S. (Ed.). (Skidmore Coll) **The psychologists: II.** New York, NY: Oxford University Press, 1974. viii, 532 p. \$10.95 (cloth), \$6.95 (paper).—11 psychologists from various teaching and research areas present a technical account of their work and of their intellectual life-styles in essays that reflect their personalities, outlooks, and ideals.

1275. Kurpius, DeWayne J. (Indiana U) **Objectives, theories, and methodologies for video application in counseling and counselor training.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Identifies factors which contribute to the generally positive results of the use of videotape feedback in teaching, including the stimulus impact created by viewing a sample of one's own behavior and the nature of the playback processes and procedures which are followed. Technical aspects of recording individual and group sessions in laboratory settings, the role of nonverbal behavior and body language, simulation as a training aid, the use of recorded monologues in training, and computer-assisted videotaping are described. (31 ref)

1276. Kurz, Ronald B. (American Psychological Assn, Educational Affairs Office, Washington, DC) **Emerging issues in accreditation of training programs in school psychology.** *Journal of School Psychology*, 1974, Vol 12(2), 114-120.—Notes that accreditation is an important concept in school psychology training and is becoming a source of much controversy. There are definite reasons for accreditation of school psychology programs by the American Psychological Association, but the jurisdictional conflict has not been fully resolved. The matter of nondoctoral program accreditation and the role of social issues in accreditation are discussed. —*Journal abstract*.

1277. Lawlis, G. Frank & Barr, Alwyn. (Texas Tech U) **Some considerations in the education of minority rehabilitation counselors: A southwestern university.** *Rehabilitation Literature*, 1974 (Apr), Vol 35(4), 110-111.—Focuses on 3 aspects of graduate education in psychology for minority students. (a) Recruitment—the idea of minority students eager for admission is a

misconception; to recruit good students requires skillful and understanding recruitment techniques. (b) Teaching—substandard or culturally unique language need not be a deterrent; what is needed is willingness on the part of the faculty to accept unusual means of expression. (c) Placement—students may not want to return to their culture or to the ghetto; upon graduation, jobs should be sought that reflect individual interests rather than previous cultural ties.—S. L. Warren.

1278. Lederman, Selwyn. (Bronx State Hosp, NY) **Some ideas and gains in training paraprofessionals as group therapists.** *Journal of the Bronx State Hospital*, 1974 (Spr), Vol 2(2), 86-95.—Describes a theme-centered method which, by encouraging personal statements, using concrete examples, and emphasizing individual responsibility and group action, facilitates learning by both professionals and paraprofessionals. The types of supportive methods used to create this productive training situation are discussed.

1279. Lee, James L. (U Wisconsin, Madison) **Group counseling: From research to training and practice.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Reviews research on the efficacy of group counseling. A series of generalizations based on patterns in the literature are presented to specify the various settings and tasks in which group counseling is effective. An experiential model of training in group counseling is described, the roles of the counselor as both a group consultant and a psychological educator are discussed, and the need for further study on leadership and other group processes is noted. (23 ref)

1280. Levine, David. (U Nebraska) **The dangers of social action.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Cautions against the involvement of mental health professionals in planned social and political activities; this may lead to the establishment of a mental health power elite which is not accountable to the general public and not aware of the risks in community psychology. It is recommended that community psychologists receive broad, interdisciplinary training in history, sociology, law, and economics. (19 ref)

1281. Lipsey, Mark W. (Claremont Graduate School) **Research and relevance: A survey of graduate students and faculty in psychology.** *American Psychologist*, 1974 (Jul), Vol 29(7), 541-553.—Survey results indicate a strong trend toward increased social concern in psychology faculty and students and a weaker trend toward decreased reliance on experimental methods. Six identified 3 issues of major importance for psychology—relevance, research and theory, and therapy and humanism.

1282. Liston, Edward H. (U California, Neuropsychiatric Inst, Los Angeles) **Psychiatric aspects of life-threatening illness: A course for medical students.** *International Journal of Psychiatry in Medicine*, 1974 (Win), Vol 5(1), 51-56.—Describes a course on the psychiatric aspects of life-threatening illness. Techniques include seminar discussions and patient interviews. Few such courses are offered in medical curricula, but the

excellent student response suggests that medical education should be required to include this area of study.

1283. **Livers, David L.** (Illinois State U) **Theoretical, professional, and ethical issues in counselor education.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents a discussion of (a) theoretical issues concerning the enrichment of counselor training and the selection of counselor trainees; (b) professional issues dealing with the role, function, and evaluation of the counselor; and (c) the ethical issues of the counselor's responsibility and value system. (36 ref)

1284. **Lundberg, Craig C.** (Oregon State U, School of Business & Technology) **Toward explicating effective interventions: An emphasis on reducing incongruities.** *Interpersonal Development*, 1973-1974, Vol 4(1), 42-50.—Considers that, beyond the group context and minimal conditions of trust and openness, self-awareness, and acceptance, the trainer's behavior is the most crucial factor in a group member's learning. The conscious and deliberate efforts of the trainer are explicated, including interventions which promote conditions for learning (i.e., building trust, offering feedback, and disclosing self) and those interventions less well recognized, which directly facilitate learning (i.e., the focusing of incongruities and indicating ways of reducing them).—*Journal abstract.*

1285. **Malcolm, David D.** (California State U, San Diego) **A two-year program of counselor education.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the unique contributions of the school counselor (e.g., in promoting individuality) and the professional training required to meet counselor role expectations. Distinctions are made between elementary- and secondary-school counseling, and a 2-yr program for training secondary-school counselors is outlined.

1286. **McMurray, J. M.** (U Western Ontario, Althouse Coll, London, Canada) **Role perceptions of school psychologists: An empirical inquiry.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 10-15.—Analyzed responses by 144 Ontario school psychologists to the Psychological Services Inventory (PSI). Information requested on the PSI was of 3 types: (a) basic data regarding age, etc; (b) an indication of the 5 duties occupying the most and the least of the respondent's professional time, and his ideal 5 most and least; and (c) referral procedures and time spent on report writing, testing, and other common duties. Results indicated that the group's modal age was under 30 yrs, both sexes were equally represented, and most were nondoctorates. Ss' real and ideal duties differed considerably. Most spend a great deal of time in individual assessment, used written referrals, and gave written reports. The medical model seems entrenched.—*A. Krichev.*

1287. **Mearig, Judith S.** (St Lawrence U) **On becoming a child advocate in school psychology.** *Journal of School Psychology*, 1974, Vol 12(2), 121-129.—Considers that child advocacy is becoming an important concept among services for children. There are definite societal reasons for the evolution of formal advocacy mechanisms, not the least of which is the functioning of professionals. School psychology provides

an opportunity for many child-advocacy concepts to be implemented. However, the individual psychologists must have a personal commitment to see that children's needs are met. It is argued that child advocacy can be built into the school psychology training program in both philosophy and practice.—*Journal abstract.*

1288. **Merenda, Peter F.** (U Rhode Island) **Current status of graduate education in psychology.** *American Psychologist*, 1974(Aug), Vol 29(8), 627-631.—Surveyed chairmen of psychology departments in 32 state universities and 9 private universities offering doctoral-level programs in basic and applied psychology, to determine the extent to which education and training is available for graduate students in the applied areas of psychology, specifically clinical psychology. Results indicate the following: (a) For all practical purposes, the PhD degree is the only doctoral degree being awarded in both basic and applied psychology. (b) The majority of the departments offering advanced graduate work in psychology insist on a variable core of required courses. (c) The comprehensive examinations taken by students in these programs are largely broad and integrative and are more likely to be administered by either a departmental examining committee or the student's own program committee. (d) For those departments in which a core of courses is not required of all doctoral students, there are substitute requirements, including demonstration of competencies and knowledge in content areas through examinations, or in the successful completion of a minor academic area.—*M. Pounsel.*

1289. **Moses, Mabel S.** (Cook County Hosp, Chicago, IL) **Role of a medical social worker in the rehabilitation of the physically handicapped person.** *Indian Journal of Social Work*, 1974(Jan), Vol 34(4), 295-306.—Defines the components of rehabilitation, which involves restoration of physical, mental, social, vocational, and economic capacity. To this has been added the concept of creativity. The functions of the medical social worker are discussed with respect to casework services, work with the family, environmental manipulations, psychological and vocational services, and liaison and public relations.—*I. W. Kidorf.*

1290. **Mowlesian, Richard.** (U Texas, Austin) **Projected planning for innovative techniques in the counselor-preparation process.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Based on the belief that counselor education should be designed to develop more effective human interaction agents and that the goals of counselor preparation are similar to those of counseling itself, several variations in the supervision process are described. The view that counselor education is a never-ending process is stressed.

1291. **Naar, Ray.** (St Francis General Hosp, Pittsburgh, PA) **Personality changes and innovations in teaching counseling skills to undergraduates.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 52-57.—Describes a training program to increase the qualities of nonpossessive warmth, genuineness, and accurate empathy. A course was offered to senior psychology majors who were interested in a mental health career. Methods included didactic sessions, mock therapy sessions, feedback from students playing the role



of client, review of taped sessions, and exercises borrowed from psychodrama and encounter groups. The Personality Orientation Inventory, designed to measure self-actualization, was given to the training group before and after the course as well as to a control group of senior students in an abnormal psychology class. More changes in the direction of health and self-actualization were observed in the training group.—C. P. McCreary.

1292. Nazzaro, J. Russell. (American Psychological Assn., Educational Affairs Office, Washington, D.C.) **The two-year college instructor: A profile.** *American Psychologist*, 1974(Jul), Vol. 29(7), 554-557.—Surveyed psychology teachers in community or junior colleges concerning their educational training and their interest in activities proposed by the American Psychological Association (APA) for 2-yr college teachers. Ss were most interested in activities that would improve communication (e.g., APA-sponsored regional meetings and the development of a periodical).

1293. Nelson, Ronald H. (Herman M. Adler Ctr, Champaign, IL) **The crisis call center and its volunteers: A comparison of views with mental health professionals.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 237-241.—Studied the perceptions of a crisis call center (CCC) within the agency network of a community. Distance scores between concepts on a semantic differential rating scale were used to determine how close mental health professionals and 40 CCC volunteers perceived the CCC to be to the other mental health agencies in the community. The type of mental-health-related occupations with which the volunteers identified were also examined. Volunteers tended to identify with all the occupational concepts that were used (psychologist, psychiatrist, social worker, minister, and policeman), but to varying degrees. Mental health professionals included the CCC in their cluster of helping agencies. Implications of the findings for increasing understanding of the role of volunteers in community crisis efforts and the interrelationships among service agencies are discussed.—*Journal summary*.

1294. Patterson, Cecil H. (U Illinois) **Distinctions and commonalities between counseling and psychotherapy.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents definitions of counseling and psychotherapy. It is suggested that significant differences between the 2 disciplines have not been established. Their basic similarities are described, and implications for training counselors and psychotherapists are discussed. (31 ref)

1295. Pendergrass, Virginia E. **Women as clinicians in private practice.** *American Psychologist*, 1974(Jul), Vol. 29(7), 533-540.—Based on questionnaire data, personal characteristics, income level, and clientele of private clinicians in southeastern cities are described, with emphasis on sex differences. There were fewer females in private practice, and no female therapist reported adult males as the primary clientele. Females experienced less full-time work and economic growth than males.

1296. Piacente, Beth S. (U South Florida) **Status of women in the psychological community in the Southeast: Women as experimenters.** *American Psychologist*, 1974(Jul), Vol 29(7), 526-529.—Studied the evaluative

perceptions of undergraduate psychology majors regarding the performance of videotaped male and female Es. When Es were described as competent, Ss judged both sexes to be equally competent. When Es were described as incompetent, Ss (particularly males) perceived female Es as much less competent than male Es. Competent female Es were also perceived as less feminine.

1297. Prothero, Jon C. & Ehlers, Walter H. (Florida State U) **Social work students' attitude and knowledge changes following study of programmed materials.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 83-86.—Pre- and posttest data concerning the knowledge and attitudes of 46 social-work students indicate significant increases in performance (knowledge about retardation) but no differences in attitudes toward retarded persons. It is concluded that to change student attitudes something other than an increase in knowledge is necessary. (15 ref)

1298. Riccio, Anthony C. (Ohio State U) **The counselor as a social reconstructionist.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Suggests that counselors should, in addition to treating the problems of the individual, consider their clients as members of a complex societal situation with a demanding set of circumstances. Assumptions of the view of the counselor as an agent of social change and evidence of the effectiveness of this counselor role are examined.

1299. Roeber, Edward C. **Practicum supervision: Trait theory.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the supervisor's problem of evaluating counselor-trainees' readiness for and progress in practicum experience. The basic principles of trait theory are described, and hypotheses are presented concerning the traits of counselor trainees during practicum experience. (22 ref)

1300. Smith, Kenneth E. & DiBacco, John. (George Peabody Coll for Teachers) **The multidisciplinary training team: Issues and problems.** *Journal of School Psychology*, 1974, Vol 12(2), 158-167.—Notes that the need for interdisciplinary training and collaboration is well documented. Some of the issues and recurring problems in operating multidisciplinary training teams in school settings are recounted, and principles and procedures for dealing with such matters as initial attachment of the team to a school, problems within the training team itself, and modification of roles are discussed.—*Journal abstract*.

1301. Sophie, Joan. (U. South Florida) **Status of women in the psychological community in the Southeast: Women as scholars.** *American Psychologist*, 1974(Jul), Vol. 29(7), 529-532.—Administered a questionnaire to members of the Southeastern Psychological Association to examine sex and other variables as predictors of rate of publication in scientific and professional journals. While men published more than women, this difference was largely accounted for by differences in education and employment; women who rated as high as males on these variables published the same amount as males.

1302. Thrush, Randolph S. (U Wisconsin, Madison) **Literature as a sociocultural encounter.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the importance of books in understanding human behavior, specifically the contribution that contemporary novels may make to counselor education. An annotated bibliography of 113 fiction and nonfiction works that may be helpful in counselor training is included.

1303. Tiedeman, David V. (Northern Illinois U) **What the counselor needs to know, do and be.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the knowledge, professionalism, and guidance expertise required of the counselor. The necessity of developing a theory of guidance which utilizes the principles of science, applied science, and guidance is discussed, and a graduate program in counselor education is described.

1304. Tucker, Samuel J. (U Florida) **Action counseling: An accountability procedure for counseling the oppressed.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Oct), Vol 2(1), 35-41.—Describes an "action counseling" model to help eliminate biases of white counselors toward black clients. The approach is aimed at specifying the goals and commitments of the counselor by assessing specific levels of trust, needs, long- and short-term goals, and therapeutic strategies. This action approach was evaluated with 40 black disadvantaged undergraduates who received either action or traditional counseling. Ss completed a pre- and postcounseling inventory about specific problems and what they felt were adequate solutions to these problems, and also a 5-point rating scale of counselor effectiveness. Results indicate that the action model counselees differed significantly on pre- and posttest evaluation regarding the degree of satisfactory solutions to identified problems, and that action counselors were perceived as more helpful than traditional counselors.—*L. Gorsev.*

1305. Ullmann, Leonard P. & Kemp, Carolyn H. (U Hawaii) **Home intervention training programs.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Proposes a behavioral model of mental health intervention which emphasizes the fact that under many conditions nonprofessional intervenors are more effective than traditional therapists in producing significant changes. Contrasts and implications of this behavioral model and the traditional medical model are discussed, and the process of outcome evaluation and a home intervention seminar series for parents are described. (5 p ref)

1306. Walz, Garry R.; Roeber, Edward C.; Gysbers, Norman C. & Ronnestad, Michael H. (U Michigan) **Practicum supervision: Integrated theory of supervision.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents 13 propositions which integrate the authors' previous applications of learning theory, trait theory, and self-theory to practicum supervision of counselor trainees. The propositions deal

with the counselor trainee's self-development and learning experiences and the supervisor-trainee relationship.

1307. Walz, Gary R. (U Michigan) **Practicum supervision: Self-theory.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Reviews the principles of self-theory—the concept that the major determinants of behavior are the individual's perception of his self and environment. It is suggested that the use of self-theory by supervisors of counselor trainees would promote a better supervisor-trainee relationship and understanding of the trainee's self-perceptions and behavior.

1308. Werner, Arnold & Schneider, John M. (Michigan State U, Health Ctr) **Teaching medical students interactional skills: A research-based course in the doctor-patient relationship.** *New England Journal of Medicine*, 1974(May), Vol 290(22), 1232-1237.—Describes and evaluates the design, implementation, and results of a course conducted with 87 1st-yr medical students. Goals included identification of selected doctor-patient interactions, recognition and description of feelings and reactions to the interview, and learning new ways of responding in the interview setting. No prior knowledge of clinical medicine was required of the students, but they gained actual interview experience. By pre- and postcourse testing and by evaluating videotaped interviews, behavioral changes in student performance as a function of the course were examined. Results indicate that students became more aware of their responses to patients and of their impact on the doctor-patient relationship. (16 ref)—*Journal abstract.*

1309. Whitaker, Carl A. & Abrams, Gene M. (U Wisconsin, Madison) **New approaches to residency training in psychiatry.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Considers that the new approach to psychiatric residency training attempts to transcend provincialism and the use of single techniques by emphasizing a radical commitment to eclectic and existential values. Implications for supervision, case presentations, and team membership are discussed.

1310. Wolleat, Patricia L. (U Wisconsin, Madison) **What the counselor needs to know: Dimensions of counselor behavior.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Describes 4 fundamental functions of the counselor in assisting the development of the client. The counselor must (a) help the client establish desirable and feasible goals for behavior change; (b) set up a supportive environment; (c) design and implement strategies to accomplish goals; and (d) evaluate goals, processes, and outcomes.

1311. Zimbardo, Philip G. (Stanford U) **On the ethics of intervention in human psychological research: With special reference to the Stanford prison experiment.** *Cognition*, 1973, Vol 2(2), 243-256.—Presents a synopsis of the Stanford prison experiment, summarizes critical arguments against the experiment, evaluates unethical aspects of the study, and considers information relative to decisions of ethicality. In answer to criticisms leveled by H. B. Savin (see PA, Vol 53:Issue 1) the



absolute and relative ethical principles guiding research and human experimentation are considered. While acknowledging that the Ss in the prison experiment did suffer pain and humiliation, data are presented indicating that the Ss learned a number of things about themselves and that there were no persisting negative reactions. The indirect impact of the study through media coverage resulted in interest by legislative bodies and the public in discussions and proposals to modify or drastically change the prison system and other "prison-like" institutions (e.g., psychiatric hospitals and ghettos).—S. Knapp.

1312. **Zusman, Jack & Carnahan, William A.** (State U New York, Buffalo) **Psychiatry and the law: Changing the system through changing the training.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 915-918.—Proposes a new training approach involving both psychiatry and the law that would emphasize interactional problems of both professions and practical methods of bringing about change, thus improving the present system. The approach involves a 1-yr graduate program following psychiatric residency, the use of training change agents for cross-disciplinary performance, field placements, and attitudinal and problem-solving approaches to training. (15 ref)

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

1313. ———. **Bibliography of developmental medicine and child neurology: Selected books and articles received in 1973.** *Developmental Medicine & Child Neurology*, 1974, Vol 16(2, Suppl 31), 176 p.—Lists, without annotation, 259 books and 2,133 articles received in 1973, on genetics, cytogenetics, embryology and teratology, developmental abnormalities, neonatal studies, cerebral palsy, epilepsy, Down's syndrome, neurological disorders, disorders of communication, neurophysiology and neuroanatomy, developmental studies, orthopedics of malformations, metabolic disorders, muscular disorders, mental handicap, and psychology and psychiatry. A detailed subject index is included.

1314. **Blankenship, Dumont G.** **Social desirability and delinquent behavior in adolescent females.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 335-336.—Administered the Marlowe-Crowne Social Desirability Scale to 28 sexually delinquent, 23 nonsexually delinquent, and 34 normal females (median age, 15.7 yrs). Analysis of variance shows no significant differences among the groups and suggests that delinquents have the same need as normals for social approval but use only behaviors that are reinforced in their value system to satisfy this need.

1315. **Boll, Thomas J.** (U Virginia, Medical School, Div of Child & Adolescent Psychiatry) **Psychological differentiation of patients with schizophrenia versus lateralized cerebrovascular, neoplastic, or traumatic brain damage.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 456-458.—Results of this study indicate that 80 patients with significant neurological disorders (currently producing signs and symptoms that require evaluation, i.e., cerebrovascular and neoplastic

disease) were significantly more impaired on Parts A and B of the Trail Making Test than were 20 schizophrenics. They were also more impaired than 40 brain-damaged patients in whom the cerebral impairment did not represent a condition in current need of medical treatment.—*Journal abstract*.

1316. **Butters, Nelson & Cermak, Laird S.** (VA Hosp, Psychology Service, Boston, MA) **Some comments on Warrington and Baddeley's report of normal short-term memory in amnesic patients.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 283-285.—Contrasts A. D. Baddeley and E. K. Warrington's finding (see PA, Vol 44:13802) that amnesic patients have normal short-term memory (STM) with the present authors' previous finding of consistent and severe STM impairments in alcoholic Korsakoff Ss. Warrington's patient selection and test procedures are criticized.

1317. **Fuller, Renee N. & Shuman, Joyce B.** (Rosewood State Hosp, Owings Mills, MD) **Genetic divergence in relatives of PKU's: Low IQ correlation among normal siblings.** *Developmental Psychobiology*, 1974(Jul), Vol 7(4), 323-330.—The Stanford-Binet IQ frequency distribution of unaffected siblings of phenylketonuria (PKU) patients differed significantly from the normal population. The excessive number of superior IQs apparently was not a function of superior families. Intersibling correlations were low. A theory is presented on compensatory genetic mechanisms in genetic-recessive diseases. (52 ref)

1318. **Jones, Reginald L.** (U California, Coll of Education, Riverside) **Delivery of special services to young black children.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 61-68.—Argues that in planning special services for retarded, disadvantaged, or deprived black children, little attention has been given to the effects of these labels on the self-concepts and expectations of the children, and that many positive aspects of young black children's cognitive, affective, and life circumstances have not been fully recognized. Data on these issues are presented and the need to adjust the current deficiency-oriented view of black children is emphasized. (19 ref)—L. Gorsey.

1319. **Stierlin, Helm.** (Washington Psychoanalytic Inst, DC) **Separating parents and adolescents: A perspective on running away, schizophrenia, and waywardness.** New York, NY: Quadrangle/New York Times Book, 1974. xiv, 204 p. \$8.95.—Proposes a conceptual framework of the separation process in adolescence, based on the idea of transactional behavior modes which precipitate different forms of running and not running away. This conceptual model is applied to the problems of schizophrenia and delinquency, and the concepts of "mutual liberation" and the "loving fight" are related to the theme of psychological exploitation. (5% p ref)

## Mental Disorders

1320. **Ablon, Steven L.; Carlson, Gabrielle A. & Goodwin, Frederick K.** (McLean Hosp, Children's Ctr, Belmont, MA) **Ego defense patterns in manic-depressive illness.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 803-807.—Made a longitudinal study of 36 manic-depressive inpatients using the Ego Profile Scale

completed independently by 8 psychiatrists. Hypochondriacal and somatization defense patterns were more prominent in unipolar patients at times of stress, whereas in bipolar patients an increase in these defenses often signaled an imminent change in affective state—especially the switch out of mania. Increased tolerance of anxiety appeared to correlate with better prognosis.—*Journal abstract.*

1321. **Adler, Gerald.** (New England Medical Ctr Hosp, Boston, MA) **Current concepts: Acute psychosis.** *New England Journal of Medicine*, 1974(Jul), Vol 291(2), 81-83.—Describes the characteristics and possible precipitating stresses of acute psychotic episodes, and presents suggestions for the nonpsychiatric physician who must manage or evaluate these cases. Experiences that may determine the extent of psychotic reactions (e.g., loss or ambition) and possible central nervous system involvement are discussed. Direct, but tactful, questioning is considered to be the best method of both protecting the patient and determining the cause of the reaction. The patient's ability to form a relation or an alliance with the physician can play an important part in treatment planning, in addition to the availability and reliability of family and friends. Physician familiarity with antipsychotic drugs, temporary commitment laws, and family dynamics is recommended.—*L. Gorsey.*

1322. **Aleksandrowicz, Dov R.** (C. F. Menninger Memorial Hosp, Topeka, KS) **A familial psychosis.** *Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 263-267.—Presents a case study of an unusual distribution of a schizophrenic psychosis where all the male siblings in a family were diagnosed as schizophrenic. In addition to other explanations, a sex-linked genetic factor is suggested.

1323. **Allen, David W.** (U California, San Francisco) **The fear of looking—or Scopophilic-exhibitionistic conflicts.** Charlottesville, VA: University Press of Virginia, 1974. ix, 134 p. \$7.95.—Describes the historical background of scopophilia and exhibitionism in analysis, including a study of the relevant personal characteristics of Freud. Clinical data from 13 case histories exemplify the author's principal analytic formulations about and techniques of treating the 2 disorders. (4 p ref)

1324. **Amanat, Ebrahim.** (St Louis State Hosp, MO) **Contents of day and night dreams of emotionally disturbed adolescents.** *Child Psychiatry & Human Development*, 1974(Spr), Vol 4(3), 157-167.—Applied content analysis to reports of "night," "day," and "repetitive" day dreams of 3 groups of adolescents. Ss consisted of inpatients, outpatients, and matched controls, with 10 males and 10 females in each group. The analysis was performed by 2 raters using a combination of rating scales. Differences were found in contents of day and night dreams in the patient and control groups. Schizophrenic patients showed striking differences in dream reporting and contents compared with other clinical groups. Positive correlations between themes of "repetitive day dreams" and "night dreams" were greater in the inpatient group. (26 ref)—*E. S. Goodman.*

1325. **Asch, Stuart S. & Rubin, Lowell J.** (Mt Sinai School of Medicine, City U New York) **Postpartum reactions: Some unrecognized variations.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 870-874.

—Describes 4 cases of postpartum syndromes that are not often recognized, including infanticide and child battering, the grandmother reaction, and adoptive mother reaction, and the father reaction. These reactions derive from experiences involving the person's mental representations of pregnancy, parturition, and motherhood and are not confined to the biological mother. The phenomenon of successive generations of postpartum reactions in women is described and explained as being grandmother-oriented. Awareness of this sequence should aid in the anticipation of postpartum psychopathology. (21 ref)—*Journal abstract.*

1326. **Beck, Aaron T.; Rial, William Y. & Rickels, Karl.** (Philadelphia General Hosp, PA) **Short form of Depression Inventory: Cross-validation.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1184-1186.—Correlations between scores on the short form of Beck's Depression Inventory and clinicians' ratings ranged from .55 for hospitalized depressed patients to .67 for general medical outpatients. The correlation between scores on the short and long forms ranged from .89 to .97, indicating that the short form is a satisfactory substitute for the long form.

1327. **Beiser, M.; Burr, W. A.; Collomb, H. & Ravel, J.-L.** (Harvard U, School of Public Health, Boston) **Pobough Lang in Senegal.** *Social Psychiatry*, 1974(Jul), Vol 9(3), 123-129.—Examined the cultural context and pertinent biological, ethnographic, and historical literature on geophagia in order to study a West African folk illness, Pobough Lang, which is characterized by compulsive geophagia, pallor, weakness, edema, depression, anxiety, and social isolation. Some features of the disease are apparently related to a lack of iron and other nutritional deficiencies. Other features are related to the ambiguous cultural definition of, and negative response to, the manifest behavior. Determinants of the cultural response are examined, and other manifestations of geophagia are described. Implications for psychiatric definition, interpretation, and research are discussed, and it is suggested that the failure to disentangle the elements of complex processes of behavior, definition as disorder, and emotional reaction has led to great confusion, and that some of the controversy between geneticists, dynamic psychiatrists, and labeling theorists may be due to a failure to specify which level of the phenomenon is being discussed.—*Journal abstract.*

1328. **Berman, Emanuel.** (Bronx State Hosp, High-bridge Unit, NY) **Multiple personality: Theoretical approaches.** *Journal of the Bronx State Hospital*, 1974(Spr), Vol 2(2), 99-107.—Surveys attempts to explain multiple personality and discusses their current status. Little support has been found in recent years for supernatural and physiological explanations. A central role is played by theories of multiple personality as a bona fide phenomenon of psychogenic nature, and most of these emphasize unconscious sources of the splitting and the impact of childhood traumata. The psychoanalytic emphasis on Oedipal dynamics has been extended to pre-Oedipal identifications and to the role of internalized objects. It is suggested that W. R. Fairbairn's object relations theory (1952) provides the best available theoretical framework for the study of multiple personality, and that it could be supplemented by role theory and



other sociological and cultural perspectives. (33 ref)  
—*Journal abstract.*

1329. Beumont, P. J.; Friesen, H. G.; Gelder, M. G. & Kolakowska, T. (Groote Schuur Hosp, Cape Town, South Africa) **Plasma prolactin and luteinizing hormone levels in anorexia nervosa.** *Psychological Medicine*, 1974(May), Vol 4(2), 219-221.—Studied 5 emaciated women suffering from anorexia nervosa. Mean plasma prolactin levels, as measured by radioimmunoassay, were within the normal range, while mean plasma levels of luteinizing hormone were depressed. This association suggests that basal levels of circulating prolactin are not affected by the hypothalamic disorder found in patients with anorexia nervosa. (18 ref)—*Journal abstract.*

1330. Biersner, Robert J. & Ryman, D. H. (US Navy Medical Neuropsychiatry Research Unit, San Diego, CA) **Psychiatric incidence among military divers.** *Military Medicine*, 1974(Aug), Vol 139(8), 633-635.—Reports that the psychiatric incidence rate among those holding US Navy diving classifications was over twice that of a nondiving control psychiatric group. The proportion of psychosis, neurosis, and character and behavior disorders among 83 psychiatric divers was similar to that of 381 psychiatric controls, but significantly more divers were admitted for situational maladjustment. In addition, significantly more of the psychiatric divers, especially those diagnosed as having character and behavior disorders, were returned to duty for at least 6 mo than the psychiatric controls. Psychiatric divers were significantly lower than the over 4,000 normal divers on intelligence (measured by the general Classification Test) and measures of mechanical and arithmetic aptitudes, and took longer to make their present rate. This indicates that tests of aptitude and intelligence may be useful in screening for potential psychiatric cases prior to training and classification.—*Journal abstract.*

1331. Blanch, Andrea. (Cornell U) **The problem of feminine masochism: An approach through theory and literature.** *Cornell Journal of Social Relations*, 1974(Spring), Vol 9(1), 1-15.—Examines the existence and nature of the often postulated link between masochism and femininity. A review of some of the historically more important theoretical work on masochism is presented, as well as a look at the manner in which 4 prominent female authors (Mary McCarthy, Dorothy Parker, Colette, and Sylvia Plath) deal with the subject in their work. 2 common assumptions about masochism are questioned: that masochistic behavior is always self-destructive or at least self-defeating and that women display more "masochism" than men. The suggestion is made that it might prove more fruitful to treat masochism as a behavior strategy than as a stable psychologically or socially determined personality characteristic. (20 ref)—*Journal abstract.*

1332. Boeters, U.; Börner, J. & Grahmann, H. (U Kiel, Psychiatric & Neuroclinic, W Germany) **[The differential-diagnostic relevancy of pulse frequency in acute endogenous psychoses.]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 160-163.—Examined the pulse rate of 40 patients hospitalized for the 1st time with diagnoses of endogenous depressive, manic-depressive, schizophrenic, and affective psychoses. 5 men and 5 women, randomly selected Ss, were examined during the

1st 3 days before treatment, in order to avoid any distortion by administered drugs. 30 other patients with neurologic disorders not related to cardiovascular processes were used as controls. Results demonstrate than an increased pulse per second rate and distinct fluctuations can be statistically determined, particularly in cyclic affective disorders, and confirm the differential-diagnostic relevancy of the pulse rate. (17 ref)—*T. Fisher.*

1333. Bowers, Malcolm B. (Yale U, Medical School) **Retreat from sanity: The structure of emerging psychosis.** New York, NY: Human Sciences Press, 1974. 245 p. \$9.95.—Presents a collection of case studies and interview data to document the characteristic processes and states of developing psychosis. Specific types of psychoses discussed include those associated with heterosexual rejection, adolescent psychosexual development, psychedelic drug use, childbirth, and marital crisis. The idea of the altered state in psychosis and implications for theory and treatment of psychotic states are also examined. (9% p ref)

1334. Breidenbaugh, Barry; Brozovich, Richard & Matheson, Loks. (Oakland Schools, Pontiac, MI) **The Hand Test and other aggression indicators in emotionally disturbed children.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 332-334.—Suggests that the Acting-Out Score (AOS) derived from the Hand Test may be useful as a predictor of aggressive, acting-out behavior. Data are presented on (a) the stability of the AOS, (b) its relation to person drawings used to assess aggressive potential, and (c) its ability to predict teacher ratings of acting-out behavior among 36 male and 4 female emotionally disturbed 8-13 yr olds. Results indicate that for this group of Ss, the AOS lacked stability as a measurement construct, did not correlate with the person drawings, and was not a useful predictor of acting-out behavior.—*Journal abstract.*

1335. Corney, Robert T. & Horton, Frederick T. (Vanderbilt U, Medical School, Adult Psychiatric Outpatient Clinic) **Pathological grief following spontaneous abortion.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 825-827.—Describes a patient who developed acute, disturbing symptoms several months after a spontaneous abortion during early pregnancy. Anamnesis is revealed that her symptoms were not the usual ones of acute grief but were representative of pathological grief, a complication of mourning. It is felt that the recognition of pathological grief is important, because it may prove resistant to the usual treatment measures for depression.

1336. Cytryn, Leon & McKnew, Donald H. (Children's Hosp of the District of Columbia, Washington) **Factors influencing the changing clinical expression of the depressive process in children.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 879-881.—Conceptualizes a pattern of defense against the depressive process that changes with age. Several forces are suggested that oppose or promote these defensive operations, resulting in 3 levels at which the depressive process manifests itself: fantasy, verbalization, and mood and behavior. The shifting balance of these forces may explain the variability with which the depressive process manifests itself throughout the various phases of the life cycle.—*Journal abstract.*

1337. Degossely, M. (U Liege, Belgium) [The feeling of depersonalization.] (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 311-320.—Reviews the literature on depersonalization and concludes that this syndrome appears both with and without delirious symptoms. Nevertheless it should be seen as a unity. It can signify a defense against a psychosis, and its neurotic significance should not be overlooked. (Dutch, English, German, Italian & Spanish summaries) (27 ref)—E. Coché

1338. Delacato, Carl H. **The ultimate stranger: The autistic child.** Garden City, NY: Doubleday, 1974. 226 p. \$6.95.—Based on the author's own observation, research, and experiments, it is suggested that autism is a neurological, rather than a psychological disorder and that autistic children suffer from sensory distortions. The ways in which perceptually-oriented therapy can help autistic children are outlined, and case histories and suggestions for parents of autistic children are presented. (8 p ref)

1339. Diebold, K. (U Heidelberg, Psychiatric Clinic, W Germany) [Hereditary and environmental aspects of endogenous psychoses.] (Germ) *Nervenarzt*, 1972(Feb), Vol 43(2), 69-76.—Discusses the influence of hereditary and environmental factors on the origin, development, and transmission of endogenous psychoses, illustrated by the case of a 15-yr-old female patient with a history of suicide attempts and atypical dysphoric depression. The literature and research on the genetic and hereditary aspects of schizophrenic, manic-depressive, and atypical endogenous psychoses is reviewed, in particular that on the transmission of schizophrenia in monozygotic twins. It is stated that hereditary disposition is a necessary factor in endogenous psychoses but by itself is not, in many cases, a sufficient trigger for their manifestation (as evidenced by twin research). The study of the preventive or triggering effect of environmental factors and their etiological and pathogenetic significance is a task of the utmost urgency. A causal therapy must take into account the environmental factors and the somatic foundations of endogenous psychoses in order to be able to compensate for pathologic genetic influences. (1 p ref)—T. Fisher.

1340. Dieckhöfer, K. & Payk, Th. R. (Rheinischen Friedrich Wilhelms U Bonn, Neuroclinic, W Germany) [A casuistic contribution to the problem of episodic twilight states.] (Germ) *Nervenarzt*, 1972(Feb), Vol 43(2), 103-106.—Presents a detailed report on the case of a 35-yr-old male patient with episodic disturbances of consciousness and twilight states of predominantly endogenous or hysterical nature. The psychodynamic background, triggering factors, and reactions are described and analyzed and the frequent and serious difficulties of differential diagnosis are discussed. (27 ref)—T. Fisher.

1341. Donnelly, Edward F. & Murphy, Dennis L. (National Inst of Mental Health, St Elizabeths Hosp, Washington, DC) **Primary affective disorder: Bender-Gestalt sequence of placement as an indicator of impulse control.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1079-1082.—Compared Bender Gestalt Test protocols of 37 bipolar (depression and mania) and 30 unipolar (depression alone) patients hospitalized for depression for sequential patterns of placement on the

test paper. Of 11 Ss with an irregular sequence and 11 Ss with an overly methodical sequence, 9 were subsequently identified as bipolar and 10 as unipolar, respectively. When these 2 groups with contrasting sequences were compared on the Hypomania (Ma) and Psychasthenia (Pt) scales of the MMPI, the bipolar group had significantly higher scores than the unipolar group on the Ma scale and significantly lower scores on the Pt scale. Results suggest that irregular sequence of placement and lack of impulse control are more characteristic of bipolar depression and overly methodical sequence and impulse control are more characteristic of unipolar depression. —Journal abstract.

1342. Foa, E. B. & Chatterjee, B. B. (Temple U, Medical School) **Self-other differentiation: A cross-culturally invariant characteristic of mental patients.** *Social Psychiatry*, 1974(Jul), Vol 9(3), 119-122.—Studied perception of behavior toward self and toward significant others in psychiatric patients from 3 cultures (US, India, and Senegal) and compared it to normal perceptions in Ss from the same culture. The Role Behavior Test was used to assess the frequency of occurrence of 8 types of interpersonal behavior generated by combining elements of 3 interpersonal dimensions. It was hypothesized that schizophrenics would differentiate least between self and other, that normals would differentiate most, and that mildly disturbed individuals would occupy an intermediate position in their degree of occupancy. Results support the hypotheses for all 3 cultures and for different types of roles (e.g., wife-husband, daughter-father, or son-father).—L. Gorse.

1343. Freeman, Thomas. (Holywell Hosp, Antrim, Northern Ireland) **Childhood psychopathology and psychotic phenomena in adults.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 556-563.—Discusses similarities between aspects of childhood psychopathology and aspects of adult psychotic behaviors in the areas of delusions and fantasies, psychomotor phenomena, and disturbances of affect. 3 types of content in adult psychotic delusions are identified, and although delusions are not common manifestations of child disorders, it is important to recognize when they cease to be products of the imagination and assume a central role in personality. Hyperactivity appears to be a common concomitant of psychopathology in both children and adults and may be related to acting-out behaviors. Severe anxiety which frequently reaches a state of panic is also a similarity in child and adult mental disorders. The question of how much significance to attach to these similarities is discussed, along with the hypothesis that childhood phenomena may be precursors of the adult manifestations. (16 ref)—L. Gorse.

1344. Friedman, J. Henry. (Tufts—New England Medical Ctr, Boston, MA) **Woman's role in male impotence.** *Medical Aspects of Human Sexuality*, 1974(Jun), Vol 8(6), 8-23.—Reports several cases in which the role of the woman was influential in the development and maintenance of psychogenic impotence. Previous studies suggest that a high percentage of wives of impotent patients were sexually inhibited, extremely sensitive, narcissistic, and viewed sexual intercourse as a "gift" from a man. Clinical observations of impotent males indicate that they share important



characteristics, including limited sexual experience before marriage and a view of women as nonsexual persons. In relationships of this type, a woman may unconsciously discourage all sexual contact and deny the importance of her activity for an adequate male response. Suggestions for psychotherapy are presented, and it is concluded that the role of interpersonal factors in impotence has been underrated, that the woman's response may be a major component of male impotence, and that clinicians should intensively study the interpersonal dynamics of impotence.—*L. Gorsey.*

1345. **Gajago, Christine & Prior, Margot.** (Monash U, Clayton, Vic, Australia) **Two cases of "recovery" in Kanner syndrome.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 264-268.—Reports case histories of 2 children thought to be classical cases of Kanner syndrome (early infantile autism). Despite the severity of their symptoms in the preschool years, they are now functioning adequately both intellectually and socially and are progressing normally at local schools.

1346. **Gardiner, A. Q.; Petersen, J. & Hall, D. J.** (Royal Cornhill Hosp, Aberdeen, Scotland) **A survey of general practitioners' referrals to a psychiatric outpatient service.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 536-541.—Conducted structured interviews with 689 patients (mean age = 35 yrs) referred to a Scottish clinic for outpatient psychiatric consultation during 1965-1966 to obtain data on the patient's attitude toward the referral, characteristics of the referring general practitioner (GP), the type of prior treatment, and any unusual events experienced during the treatment period. Neurotic, character, and behavior disorders were the most common diagnoses. 68% of the patients had been prescribed psychotropic drugs by their GP, 55% failed to take the drugs as prescribed, and 50% reported unusual events. Women consulted GPs more frequently, were seen at home more often, and were referred to specialist treatment later than men. 67% were satisfied with the treatment they had received from the GP, and 62% welcomed psychiatric referral. (22 ref)—*Journal summary.*

1347. **Gjesdal, Knut & Stromme, Johan H.** (U Tromso, Inst of Clinical Medicine, Norway) **Multiphasic screening programme for somatic diseases among elderly long-term psychiatric patients.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 564-572.—Subjected 41 long-term (1-40 yrs) 38-91 yr old psychiatric patients in a Norwegian hospital to a multiphasic screening program consisting of hematological, clinical chemical, urine bacteriological, dental, and chest X-ray examinations. 15% of 1,230 laboratory results were abnormal. The screening procedure led to 36 previously unknown diagnoses, and 21 patients were subsequently treated for 1 or more disorders. Prior to the screening, somatic disorders were known to affect 66% of the patients; after screening, this was increased to 78%. The magnitude of somatic problems in this group of patients warrants the establishment of regular laboratory screening programs in psychiatric hospitals. A minimal laboratory profile is suggested which consists of 9 parameters that should be determined annually and 4 parameters that should be determined at admission. (45 ref)—*Journal summary.*

1348. **Glatzel, J.** (U. Mainz, Neuropsychiatric Clinic, W. Germany) **[Autochthonic asthenia.]** (Germ) *Fortschritte der Neurologie, Psychiatrie und ihrer Grenzgebiete*, 1972(Nov), Vol. 40(11), 596-619.—Discusses the development of autochthonic asthenia, a psychopathological syndrome characterized by disturbance of thought, dysphoria, and abnormal body sensations. The 4 typical stages are described. Stage 1 is the phase of simultaneous, separate, predominantly somatic discomfort and disturbance, with headaches, sweating, heart pains, weakness, exhaustion, etc. Stage 2 exhibits predominantly affective disorders: sadness, depression, and general vital dysphoria, with difficulty in concentrating, feelings of inertia, inactivity, loss of vitality, etc; the elements of this stage are not clearly separated. Stage 3 shows disturbed perception, alienation, derealization, depersonalization, changes in intensity and emphasis, and hypersensitivity. Stage 4 is a phase of coanesthesia and thought disturbance, poor concentration, memory, recall, discrimination, ideation, etc. For the time being the nosological definition of autochthonic asthenia remains unsolved. (English summary) (2 p ref)—*T. Fisher.*

1349. **Glatzel, J.** (U. Mainz, Neuro-Psychiatric Clinic, W. Germany) **[The concept of symptoms in psychopathology.]** (Germ) *Nervenarzt*, 1972(Jan), Vol. 43(1), 33-36.—Discusses the definition and concepts of symptoms, syndromes, and symptom clusters in clinical psychopathology and the importance of correct isolation, definition, classification, and diagnosis.

1350. **Goldberg, Lois S. & Meltzer, Gloria.** (Glassboro State Coll) **IES arrow-dot comparisons for drug addicts with neurotic and delinquent personalities.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 636-638.—Administered the Arrow-Dot subtest of the Impulses-Ego-Superego Test to 20 male 16-28 yr old Ss in a therapeutic drug community and 20 male 17-28 yr old Ss in a methadone maintenance program. The subtest discriminated significantly between the personality integration of Ss in the therapeutic community and delinquents or neurotics. The scores of the methadone Ss on some variables, however, were not significantly different from those of neurotics and delinquents.—*Journal abstract.*

1351. **Gomes de Araújo, H. A.** **[Neurosis and personality.]** (Germ) *Fortschritte der Neurologie, Psychiatrie und ihrer Grenzgebiete*, 1972(Nov), Vol. 40(11), 619-628.

1352. **Green, Arthur H.; Gaines, Richard W. & Sandgrund, Alice.** (State U New York, Downstate Medical Ctr, Div of Child & Adolescent Psychiatry, Brooklyn) **Child abuse: Pathological syndrome of family interaction.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 882-886.—Observed patterns of family interaction encountered in 60 cases of child abuse. The maltreatment syndrome is described as the end result of 3 potentiating factors: the abuse-prone personality of the parent, characteristics of the child that make him vulnerable for scapegoating, and current environmental stress. Role reversal was a prominent feature in the psychodynamic makeup of these families. The parents tended to endow the child with negative characteristics derived from their own experience with rejecting parents. 6 case examples are included. (16 ref)—*Journal abstract.*

1353. Gurland, Barry J.; Stiller, Pamela; Sharpe, Lawrence & Fleiss, Joseph L. (New York State Dept of Mental Hygiene, Biometrics Research, New York) **Alternative diagnoses as an aid to psychiatric classification.** *Psychiatric Quarterly*, 1973, Vol 47(4), 533-545.—6 research-team psychiatrists applied main and alternative diagnoses to 500 consecutive admissions in a New York state psychiatric hospital and a London area mental hospital. A group of patients was isolated with an affective disorder as the main diagnosis and schizophrenia as the alternative diagnosis. In symptoms and outcome this group was intermediate between groups of patients where there was no alternative diagnosis, or where the main and alternative diagnoses were both of an affective disorder or of schizophrenia. Further analysis showed that the use of alternative diagnoses made it possible to identify those diagnoses which were creating uncertainty and confusion between categories. Appropriate measures could then be taken to improve the use of these diagnoses.—*Journal abstract*.
1354. Guterman, Andrew. (U Miami, Medical School) **Manifest psychopathology and serum creatine phosphokinase: A correlational study.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 49-53.—Studied the relationship between psychopathology and abnormalities in creatine phosphokinase (CPK) activity in 20 psychotic and 3 nonpsychotic psychiatric inpatients. Double-blind enzyme determinations were compared to ratings on a brief psychiatric rating scale. There were significant positive correlations between CPK activity and degree of psychopathology, as determined from several subtests of the rating scale. Although there was no difference between psychotic and nonpsychotic groups, it is concluded that CPK activity and psychoses are intimately related. (21 ref)—*M. Oscar-Berman*.
1355. Hahn, Susanne & Müller, Heidrun. (Karl Marx U, Psychiatric Clinic, Leipzig, E Germany) **[A psychosociometrical procedure for objectivating the degree of psychiatric patients.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jan), Vol 26(1), 14-24.—Discusses statistically significant differences between normal Ss and psychiatric patients on the basis of an unpublished questionnaire dealing with psychosocial attitudes. Test items measure social communication, use of leisure time, social contacts at work, and attitudes toward marriage partner and family.—*K. J. Hartman*.
1356. Hart, James D. (VA Ctr, Wood, WI) **Physiological responses of anxious and normal subjects to simple signal and non-signal auditory stimuli.** *Psychophysiology*, 1974(Jul), Vol 11(4), 443-451.—In an attempt to assess orienting (OR) and defensive responses (DR) of 18 male anxious inpatients and 18 normal males, heart rate (HR) and skin conductance (SC) changes were measured in response to 3 intensities of signal and nonsignal tones. Anxious Ss significantly differed from normal Ss in the number of spontaneous SC responses emitted, but did not differ in either magnitude or rate of habituation of SC responses to the tones. An analysis of second-by-second changes in HR suggested that, relative to normal Ss, anxious Ss showed a deficit in OR and a greater tendency to respond with a pattern characteristic of a DR. This difference was particularly apparent under signal conditions.—*Journal abstract*.
1357. Heath, Robert G.; Cox, Aris W. & Lustick, Leonard S. (Tulane U, Medical School) **Brain activity during emotional states.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 858-862.—Reports that when a 41-yr-old female suffering from severe anxiety was prepared with deep and surface electrodes, correlations were demonstrated between activity at certain brain sites and pleasurable or painful affect. Moreover, a functional relationship was shown between these sites for emotional expression and some sensory relay nuclei. Findings substantiate previous observations made in the 1954 Tulane University depth electrode series and add meaning to anatomic and physiologic data from animal studies that have shown an integral relationship between brain sites involved in sensory perception and those for emotional expression.—*Journal abstract*.
1358. Hennessey, B. L. & Bruen, W. J. (Australian Dept of Health, Woden, ACT) **Youth in Canberra: Results and implications of a mental health survey.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 55-59.—Preliminary results of interviews indicate that adolescents in Canberra were more healthy than adults in terms of drug intake and psychiatric impairment. Adolescents cited career decisions as their major developmental problem, and disruption of family relationships as the major life stress. Implications for provision of adolescent psychiatric services are discussed.
1359. Horrobin, D. F. (U Newcastle upon Tyne, England) **Prolactin and mental illness.** *British Journal of Psychiatry*, 1974(May), Vol 124, 456-457.—Notes that many drugs used in psychiatry influence the level of prolactin secreted by the hypothalamus. Because of the known actions of prolactin, it may be responsible for stress and premenstrual tension effects, and the prolactin level may be associated with such diverse conditions as depression, mania, and schizophrenia.
1360. Humphrey, John A.; French, Laurence; Niswander, G. Donald & Casey, Thomas M. (U North Carolina, Greensboro) **The process of suicide: The sequence of disruptive events in the lives of suicide victims.** *Diseases of the Nervous System*, 1974(Jun), Vol 35(6), 275-277.—Reviewed the case histories of 160 completed suicides in an attempt to determine whether there were consistent patterns of problematic events in their lives which may have resulted in their self-destruction. Focus was placed on the sequential ordering of disruptions in social relations or loss of social roles. It was found that loss of roles in childhood and early adolescence, parents, home, siblings, close relatives, and student role tended to be followed by chaotic marriages, loss of occupational role(s), and loss of physical and/or mental health. In addition, parental roles tended to be lost through the death of a child. Results indicate that loss of social roles leads to high vulnerability to suicide.—*Journal summary*.
1361. Itil, T. M.; Hsu, W.; Saletu, B. & Mednick, S. (New York Medical Coll, Div of Biological Psychiatry, NY) **Computer EEG and auditory evoked potential investigations in children at high risk for schizophrenia.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 892-900.



1362. **Kedward, H. B. & Sylph, Judith.** (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **The social correlates of chronic neurotic disorder.** *Social Psychiatry*, 1974(Jul), Vol 9(3), 91-98.—Studied the social functioning and adjustment of 50 female patients suffering from a nonpsychotic psychiatric illness of at least 1-yr duration, and compared it with that of a demographically similar group of women free of psychiatric symptoms. After psychiatric screening, a specially designed social interview schedule was administered, covering a wide range of social circumstances and activities which were rated under material conditions, social functioning, and satisfaction. Results show that the index group, though matched for income level and family size, were less well-placed materially than control patients, functioned less well, and were markedly less satisfied with their lot. Implications of this finding for the medical services in the area are discussed, and the feasibility of a social service approach to the problems experienced by this type of patient is considered.—*Journal abstract.*
1363. **Kelleher, M. J. & Copeland, J. R.** (U London, Inst of Psychiatry, England) **Assessment of neurotic symptoms in Irish female patients.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 554-555.—Reports higher scores of Irish female Ss on the Cornell Medical Index (Sections M-R), Present State Examination, and the Leyton Obsessional Inventory in 3 separate comparative studies of Irish and British psychiatric patients. Results suggest caution in interpreting scores of Irish females on scales which were standardized with reference to different populations.
1364. **Kirk, Stuart A.** (U Kentucky) **The impact of labeling on rejection of the mentally ill: An experimental study.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 108-117.—Presented a questionnaire containing 1 of 3 case vignettes depicting either severely or moderately mentally ill persons or a normal person (actors) to 864 community college students. At the end of each case description was a sentence in which a particular person (labeler) offered an interpretation (label) of the behavior described. 4 levels of labeler variables were systematically altered in the descriptions; labelers were either a psychiatrist, the actor's family, the actor himself, or "some people." All Ss then completed a social rejection index to measure their reactions to the actor described. Results show that labels and labelers did not produce significant effects. Only behavior influenced social rejection—the greater the deviation, the greater the social rejection. Although labeling theory suggests that the use of labels radically alters the way people perceive and react to rule-breaking behavior, the present data do not support this idea. (42 ref)—*L. Gorsey.*
1365. **Koestenbaum, Peter.** (California State U, San Jose) **Managing anxiety: The power of knowing who you are.** Englewood Cliffs, NJ: Prentice-Hall, 1974. vi, 183 p. \$7.95(cloth), \$2.95(paper).—Describes an existential approach to handling anxiety which can help resolve many types of personal problems and increase self-awareness. Tests and exercises are included to evaluate personal development and to design programs for individual needs. The idea that pain underlies all negative experiences is examined within a philosophical context.
1366. **Krakowski, Adam J. & Langlais, Louis M.** (Champlain Valley-Physicians Hosp Medical Ctr, Div of Psychiatric Liaison & Research, Plattsburgh, NY) **Acute psychiatric emergencies in a geriatric hospital.** *Psychosomatics*, 1974, Vol 15(2), 72-75.
1367. **Kraus, Robert F.** (U Washington, Medical School) **Schizophrenia as a genetic polymorphism.** *Psychiatric Quarterly*, 1973, Vol 47(4), 546-558.—A brief review of the literature reveals convincing evidence for a genetic factor in the etiology of schizophrenia. This evidence suggests that a tendency toward development of the disease is inherited; its appearance and clinical features depend upon environmental and experiential factors. The question of the mechanism by which the genes responsible for schizophrenia maintain their levels in human populations in the face of the obvious selective disadvantage conferred by the disease is as yet unanswered. The works of L. L. Heston (1970) and of J. L. Karlsson (1968) suggest that a selective advantage may accrue to the heterozygote, a mechanism explainable in terms of the concept of genetic polymorphism as described by E. B. Ford (1965). (25 ref)—*Journal abstract.*
1368. **Lifshitz, Kenneth & Gradjan, Jack.** (Rockland State Hosp, Research Ctr, Orangeburg, NY) **Spectral evaluation of the electroencephalogram: Power and variability in chronic schizophrenics and control subjects.** *Psychophysiology*, 1974(Jul), Vol 11(4), 479-490.—Evaluated selected EEG parameters for their ability to discriminate between a group of 30 male chronic schizophrenic patients and 30 control Ss. For each S 150 random EEG segments were collected. Results confirm that the coefficient of variation of the absolute EEG potential recorded from the occiput is significantly smaller in schizophrenics than in controls. The power density spectrum was calculated for each EEG segment.  $\beta$  power was significantly higher in patients, markedly so in the  $\beta_2$  band. Coefficients of variation were calculated for the power in EEG frequency bands for each S. The most significant discriminator between schizophrenics and controls, considered to be artifact free, was the coefficient of variation of  $\beta$ , recorded from an anterior-posterior electrode pair at the vertex. (32 ref)—*Journal abstract.*
1369. **Marchant, Rosemary; Howlin, Patricia; Yule, William & Rutter, Michael.** (U London, Inst of Psychiatry, England) **Graded change in the treatment of the behaviour of autistic children.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol 15(3), 221-227.—Discusses a method of introducing slight and gradual changes into the autistic child's environment. The case histories of a 5-yr-old and a 7-yr-old boy are presented in which this technique was used to reduce the attachment to objects, at the same time working on increasing sociability and attachment to people. Theoretical implications of such attachments are discussed together with more general applications of such a treatment technique.—*Journal summary.*
1370. **Martin, William A. & Smith, Allen O.** (Tulane U, Medical School) **The evaluation of dementia.** *Diseases of the Nervous System*, 1974(Jun), Vol 35(6),

262-265.—Evaluated 11 patients with dementia of various etiologies. The results of EEGs, skull films, lumbar puncture, and brain scan were compared to results of pneumoencephalography, isotope, cisternography, and a constant infusion manometric test for measurement of cerebrospinal fluid absorption. The EEG proved to be the most effective screening procedure in establishing the organic basis of symptoms in early dementia. Pneumoencephalography was the most useful definitive contrast procedure in the demonstrating space occupying lesions, cerebral atrophy, and possibly normal pressure hydrocephalus. Results of the constant infusion manometric tests did not correlate with pneumoencephalography or cisternography. There was no consistent difference between patients with normal pressure hydrocephalus and dementia of other etiologies. It is concluded that the infusion test, at its current stage of development, is of dubious clinical value as a simple diagnostic procedure. (18 ref)—*Journal abstract*.

1371. Mattocks, Arthur L. & Jew, Charles C. (California Dept of Corrections, Medical Facility, Vacaville) **Comparison of self-actualization levels and adjustment scores of incarcerated male felons. Educational & Psychological Measurement**, 1974(Spr), Vol 34(1), 69-74.—Tested whether high scores on the Personal Orientation Inventory (POI) test of self-actualization are correlated with scores of the "well-adjusted person" as defined by the Q-Sort Adjustment Scale POI profiles of male prisoners who participated in group psychotherapy in a correctional psychiatric institution were examined: 25 high self-actualizing inmates and 31 low self-actualizing inmates were selected for comparison in terms of the Q-Sort Scale. Inmates who were higher in POI self-actualization also scored significantly higher on their Q-Sort adjustment than those who scored low on self-actualization. Thus, the study provides evidence of consistency between the concept of a well-adjusted individual and the concept of self-actualization. That is, the higher the level of self-actualization, the better the adjustment; the lower the level of self-actualization, the poorer the adjustment.—*Journal abstract*.

1372. Mazer, M. (Martha's Vineyard Mental Health Ctr, Edgartown, MA) **People in predicament: A study in psychiatric and psychosocial epidemiology. Social Psychiatry**, 1974(Jul), Vol 9(3), 85-90.—Presents a study of the entire population ( $N = 4,519$  residents) of an American island community at risk for a 5-yr period to the experience of a variety of human predicaments of psychiatric or psychosocial nature. Data show that females were more often aware of the presence of psychological distress than were males and sought psychiatric help more often. Males, on the other hand, were more likely to show their distress by coming to the attention of educational, legal, and social agencies. Adolescents and young adults had high rates of acting out and low rates of psychiatric consultation. Disorders in awareness tended to be a higher-class phenomenon and acting out a characteristic of those in the lower social-class positions. Data show that, though males were in predicament as frequently as females, they were more likely to come to the attention of nonpsychiatric agencies. Since females were apparently more aware of distress, they responded positively more often to the

instrument used in many total prevalence studies. It is suggested that total-prevalence surveys include items which will elicit the presence of parapsychiatric or psychosocial events and that psychiatric services be revised to be more inviting to those who express their psychological difficulties by acting out.—*Journal abstract*.

1373. McIntosh, James R. (Lehigh U) **Perspectives on marginality: Understanding deviance**. Boston, MA: Allyn & Bacon, 1974. xii, 314 p.—Presents both a textbook and a collection of readings on deviance, social disorganization, and social problems. Topics include the history and current status of the sociology of deviance, and discussions of the labeling, anomie, differential association, and subculture theories of deviance.

1374. Mendlewicz, J. (New York State Psychiatric Inst, Columbia U) [New genetic concepts regarding manic-depressive psychosis.] (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 209-232.—Investigated 13 families of patients with manic-depressive psychosis and other hereditary signs. A statistically significant link between this illness and 3 different genetic markers located on the X-chromosome was found. Findings support the hypothesis of a dominant X-linked factor in the genetic transmission of manic-depressive psychosis. Genealogical illustrations and a discussion of these results in the light of modern biochemical theories of manic-depressive illness are included. (Dutch, English, German, Italian & Spanish summaries) (22 ref)—E. Coché

1375. Merrill, Richard H. & Collins, James L. (Brooke Army Medical Ctr, Ft Sam Houston, TX) **Acute psychosis in chronic renal failure: Case reports. Military Medicine**, 1974(Aug), Vol 139(8), 622-624.—Presents 2 cases of acute psychoses which occurred in patients with chronic renal failure, but which were not felt to be primarily due to uremia. In both patients, a 38-yr-old and a 31-yr-old woman, the psychotic symptoms did not seem to be clearly attributable to metabolic disturbances, and there were no abnormal neurological signs. The pattern of mental disorder was more typical of a nonorganic psychosis. In each case the stress of a serious chronic illness was increased because of significant situational (e.g., financial and marital) conflicts. These factors, together with the acute stresses of surgery and peritoneal dialysis, were sufficient to precipitate a psychotic episode. Implications of psychosis in relation to chronic dialysis and transplantation are discussed.—L. Gorsey.

1376. Mitchell, Alexander R. (Fulbourn & Addenbrooke's Hosp, Cambridge, England) **Schizophrenia: The meanings of madness**. New York, NY: Taplinger, 1972. 158 p. \$6.50.—Briefly interprets the meanings of madness in history and in current thought and art, and discusses the import of madness to insanity and to psychiatry. The definitions and clinical features of schizophrenia and psychological tests for its diagnosis are described, as well as individual and community methods for the management of the disorder.

1377. Mombour, W. (Max Planck Inst of Psychiatry, Munich, W Germany) [International classification of mental diseases.] (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 256-271.—Introduces and discuss-



es the "Mental Disorders" category of the "International Classification of Diseases." The advantages of such a system for international comparisons and research is stressed. (Dutch, English, German, Italian & Spanish summaries) (22 ref)

1378. Montgomery, George K.; Paul, Gordon L. & Power, Christopher T. (U Wisconsin, Madison) **Influence of environmental contingency history on acquisition of new discrimination by chronic mental patients.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 339-347.—Evaluated acquisition of new discriminations on 2-choice and 2-dimensional (form and color) tasks under response-contingent reinforcement as a function of nearly 4 yrs' history of total-life environments of response-contingent vs noncontingent experiences. A total of 28 chronic mental patients, half from each history condition, were prescreened on component skills and presence of a manipulable reinforcer. Groups were equated on demographic variables and current level of functioning. No differences in acquisition were found as a function of contingency history. However, correlational analyses with multiple measures of current functioning and responsiveness to treatment showed that differential relations existed within groups. The latter relations suggest that the response-contingent environment resulted in greater attention to discriminative stimuli and greater consistency between task-related and extraneous behaviors. (27 ref)—*Journal abstract*.

1379. Mormont, C. (U Liege, Psychiatric Clinic, Belgium) **[Borderline cases in the light of Rorschach.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 321-331.—Presents a study of 25 Rorschach records of borderline personalities. It is concluded that there is no unified syndrome which permits easy identification of borderline cases but that the Rorschach provides a better understanding of individual cases. (Dutch, English, German, Italian & Spanish summaries) (24 ref)

1380. Naditch, Murray P. (Cornell U.) **Acute adverse reactions to psychoactive drugs, drug usage, and psychopathology.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 394-403.—Used a field survey method to examine the relationship between psychopathology and acute adverse reactions to psychoactive drugs. A paper-and-pencil measure of acute adverse reactions was developed and administered to 530 college students with drug-use experience. Acute adverse reactions were hypothesized to covary positively with regression, schizophrenia, and drug usage, and to covary negatively with adjustment and paranoia. These hypotheses were supported. The hypotheses that usage of LSD and mescaline would covary positively with regression and covary negatively with adjustment were also supported. A hypothesis that schizophrenia would positively covary with LSD and mescaline usage was not confirmed. Regression was also found to be related to marihuana usage. A recursive linear model was developed in an attempt to integrate and explain these results. (25 ref)—*Journal abstract*.

1381. Nagaraja, Jaya. **Psychiatric breakdown among students: A comparative study of the East and the West.** *Child Psychiatry Quarterly*, 1972(Apr), Vol 5(2), 11-27.—Describes the pressures on college students in India today. Sources of psychiatric breakdown include guilt

and insecurity following failure, choice of wrong career and subject, poor mental health in students' homes, transition from adolescence to adulthood, low socioeconomic status, the greater problems women face in attaining academic status, and conformity pressures. These problems are compared with those encountered by students at Western universities (specifically, at McGill University, Montreal, Canada), which are of 3 types: problems of youth and sex; problems of values; and problems of education, occupation, and immigration. Case studies to illustrate the effects of both societies on students are provided. (15 ref)—*R. S. Albin*.

1382. Narramore, Bruce. (Rosemead Graduate School of Psychology, Calif.) **Guilt: Its universal hidden presence.** *Journal of Psychology & Theology*, 1974(Spr), Vol. 2(2), 104-115.—Proposes that the emotion of guilt is to some degree involved in the etiology of all psychological maladjustments. A discussion of the Genesis record of the origin of guilt is followed by a discussion of the major defensive processes used to deny and distort the subjective experience of guilt. The psychological and theological implications of the failure to recognize the extent of involvement of guilt in the problems of adjustment is also considered.—*Journal abstract*.

1383. Neuringer, Charles. (U Kansas) **Attitudes toward self in suicidal individuals.** *Life-Threatening Behavior*, 1974(Sum), Vol 4(2), 96-106.—Studied data on attitudes toward the self and other people from 45 male 21-55 yr old suicidal, psychosomatic, and normal hospitalized patients using semantic differential ratings. Data were analyzed by comparing the ratings of "Myself" and "Other People" (and their divergencies) made by the 3 groups of Ss on the Evaluative, Activity, and Potency factors of the semantic differential. Suicidal individuals had the (a) lowest self-appraisal, (b) highest other appraisal, and (c) greatest self-other divergency among the 3 groups. The effect was greatest on the Potency factor, giving rise to the speculations that feelings of impotency may be extremely critical for the production of suicidal activity.—*Journal abstract*.

1384. Nunn, C. et al. (Knowle Hosp, Fareham, England) **Intelligence and neurosis in old age.** *British Journal of Psychiatry*, 1974(May), Vol 124, 446-452.—Tested elderly persons living in the community on a shortened Wechsler Adult Intelligence Scale, and assessed their physical, social, and psychiatric state. The sample was divided into normals and a group of 62 neurotics. With a 6-yr follow-up, a significant correlation was found between low intelligence and neurosis. Other variables associated with diagnosis as neurotic were somatic illness, few social contacts, deafness, and female sex.—*R. L. Sulzer*.

1385. Oishi, Katsuyo. (Ochanomizu U, Tokyo, Japan) **[A comparison of semantic structure among college students, junior high school boys and schizophrenic patients.]** (Japn) *Japanese Journal of Psychology*, 1974(Apr), Vol 45(1), 21-32.—Administered a semantic differential questionnaire to 111 undergraduates, 82 junior high school boys, and 73 schizophrenic patients. The same 3 dominant factors were extracted from the responses of all groups, and each of these factors accounted for the same proportion of the total variance. The concept *me* was separated from the other concepts

in terms of the locations of all concepts in 3-dimensional space. It is suggested that the isolation of the self-concept is reflected in disturbances of interpersonal relations and autism. 7 concepts (*teacher, sickness, doctor, God, peace, sex, and love*) significantly differentiated the schizophrenic and the undergraduate Ss. The distribution of categories checked also differentiated the undergraduate and schizophrenic Ss, a finding which indicates that scale-checking styles are related to personality variables.—*English abstract.*

1386. Overall, John E.; Henry, B. W. & Woodward, Arthur. (U Texas Medical Branch, Psychometric Lab, Galveston) **Dependence of marital problems on parental family history.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 446-450.—Examined the relation of marital complaints to family history in 1,624 psychiatric outpatients. Marital complaints were recognized to be an aspect of a broader "depressive spectrum disorder" with distinctive age, gender, alcohol, and neurotic depressive symptom characteristics. However, holding constant the depressive spectrum characteristics, a specific independent relation of marital complaints to family history of parental marital discord was verified. It is concluded that marital problems have 2 primary etiologies in the psychiatric population, one as part of a broader depressive spectrum disorder and the other a more specific familial behavior patterning.—*Journal abstract.*

1387. Overbeck, Gerd & Brähler, Elmar. (U Giessen, Psychosomatic Clinic, W Germany) **[Observations of speech behavior of patients with psychosomatic disturbances.]** (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(2), 100-108.—Observed 2 therapists and 4 patients and recorded their speech-pause behavior during 40-50 treatments of 1 hr/wk. The number of long pauses (more than 10 sec) followed by speech by the therapists was significantly greater with patients having psychosomatic disturbances.—*English summary.*

1388. Pfeiffer, Eric. (Duke U, Medical School) **Borderline states.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 212-219.—Considers the historical development of the concept of borderline state, the phenomenology of this state, and treatment methods used. The borderline patient is characterized by (a) a limited range of affects, with anger and anxiety predominating; (b) deficits in affective relationships; (c) lack of a definitive self-identity; (d) proneness to periods of depressive loneliness; and (e) lack of integration of the total personality. He may also overuse defense mechanisms and may be subject to "minipsychoses." The goal of therapy is to help the patient improve in interpersonal relationships and skills and integrate his total life experience, using an eclectic approach. (23 ref)—A. Olson.

1389. Pfeiffer, Kenneth & Maltzman, Irving. (U. California, Los Angeles) **Warned reaction times of sociopaths.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 64-75.—Employed a warned reaction time (RT) task with 8 male sociopaths and 8 normal males (mean age = 33 yrs). A warning light appeared at a variable interval preceding a light to which the S responded by pressing a key. All Ss received both a regular and an irregular series with warning intervals of

1, 2, 4, 8, and 16 sec. In the regular series, blocks of intervals were presented in an ascending order. In the irregular series each interval followed every other interval equally often. Sociopaths obtained reliably slower RTs than did control Ss, showing a constant decrement across all intervals in the 2 kinds of series.—*Journal abstract.*

1390. Pontius, Anneliese A. **Threats to assassinate the king-president while propitiating mother: Some aspects of dangerousness.** *Journal of Analytical Psychology*, 1974(Jan), Vol 19(1), 38-53.—Discusses 2 aspects of the unconscious motives for assassinating a king-president, as expressed in the delusional systems of 2 schizophrenics. 2 hypotheses are offered: the impersonal and suprahuman character of the threat to assassinate, and the constellation of the "great mother" in association with the king-president's assassination. Anthropological material and clinical examples are presented. (16 ref)—P. Federman.

1391. Reker, Gary T. (Trent U, Peterborough, Ontario, Canada) **Interpersonal conceptual structures of emotionally disturbed and normal boys.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 380-386.—Asked 24 disturbed and 24 normal boys (mean age = 10.5 yrs) to construe 12 persons known personally to them and 12 familiar inanimate objects on 2 sets of 12 5-point bipolar constructs. Ss were also asked to arrange the people and inanimate objects into personally meaningful groups. There was significantly lower differentiation and articulation, but not integration, in the interpersonal conceptual structure of disturbed Ss compared to normal controls. No differences were found in construing inanimate objects. Results are interpreted as indicating that disturbed boys are handicapped by a limited interpersonal conceptual structure for anticipating and predicting their social environment. (23 ref)—*Journal abstract.*

1392. Reynolds, E. H. & Travers, R. D. (Yale U, Medical School) **Serum anticonvulsant concentrations in epileptic patients with mental symptoms.** *British Journal of Psychiatry*, 1974(May), Vol 124, 440-445.—Examined the relationship of chronic anticonvulsant therapy and mental symptoms in 118 outpatients. Higher levels of anticonvulsant drugs were found in the blood of patients showing psychomotor slowing, intellectual deterioration, psychiatric illness, or personality change. Toxic effects of this kind may not be noticed in persons with brain damage or long-standing mental retardation. Hence, measurements of drug concentrations are valuable.—R. L. Sulzer.

1393. Roberts, Margaret A. & Schuham, Anthony I. (Florissant Valley Community Coll) **Word associations of schizophrenics and alcoholics as a function of strength of associative distracter.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 426-431.—L. J. Chapman's "response bias" theory of word association behavior (see PA, Vol 33:10697) predicts a hierarchy of responses in schizophrenic associations, whereas W. E. Broen's 1968 "response interference" theory does not. The existence of a "true hierarchy," (i.e., at least 3 ordered levels of responsiveness) was explored in 30 male chronic schizophrenics and 30 male alcoholic controls under conditions of high-, medium-, and low-associative



distraction. Schizophrenics manifested significantly more associative errors at successive levels of associative distraction, and their error curve almost precisely approximated a straight-line function. Results support the notion of hierarchical responding central to Chapman's theory as well as independently replicating earlier studies of schizophrenic word association behavior.—*Journal abstract.*

1394. Schildkraut, Joseph J. (Massachusetts Mental Health Ctr, Neuropsychopharmacology Lab, Boston) **Biogenic amines and affective disorders.** *Annual Review of Medicine*, 1974, Vol 25, 333-348.—Reviews recent studies, with emphasis on those predicting different responses to treatment and those likely to produce biochemical criteria for classifying types of affective disorders. Biogenic amines covered are 3-methoxy-4-hydroxyphenylglycol, homovanillic acid, 5-hydroxyindoleacetic acid, dopamine- $\beta$ -hydroxylase activity, catechol-O-methyltransferase activity, and monoamine oxidase activity. Among other conclusions is the predicted development of a nosology based not only upon clinical manifestations of affective disorders, but also upon knowledge of the underlying biochemical mechanisms. (119 ref)—*B. Gurel.*

1395. Schmidt, Chester W. (Baltimore City Hosp, MD) **Psychiatric problems of the aged.** *Journal of the American Geriatrics Society*, 1974(Aug), Vol 22(8), 355-359.—Discusses depression as the most important of the various psychiatric illnesses (including organic brain syndromes, schizophrenia, neuroses, and personality disorders) that may develop in old age. The symptoms and the relationship to suicide are discussed. Therapeutic efforts (e.g., chemotherapy, electroshock, and psychotherapy) may be directly affected by the physician's attitude. Drugs for the treatment of depression include the tricyclic antidepressants, monoamine oxidase inhibitors, amphetamines, phenothiazines, minor tranquilizers, and lithium. Electroshock is indicated for suicidal or medically endangered patients or for those who do not respond to chemotherapy. It is stressed that the psychiatric skills of the family practitioner are important in helping the patient to adjust to the crises of old age and in preventing mental illness.—*Journal abstract.*

1396. Schneider, Regine. [Borderline-syndrome in children.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(2), 109-126.—Discusses (a) therapy with children with a diagnosis of infantile borderline syndrome, (b) the disturbed family background regularly observed in such cases, and (c) the need to correlate this background with the infantile symptom formation. 3 cases are described, with particular attention to a typical "borderline mother" who suffered from severe identity anxiety about her role and function as mother. Sudden changes from a child-rejecting attitude to overprotective behavior caused severe guilt feeling. The behavior of the child, who exhibits marked oversensitivity, lack of frustration tolerance, sudden fits of rage, and clinging dependence on the unreliable mother may be the consequence of archaic ego-disturbance and age-specific ego immaturity. The infantile borderline syndrome is seen as the forerunner of the adult borderline syndrome.—*English summary.*

1397. Schuckit, Marc A. & Gunderson, E. K. (US Navy Medical Neuropsychiatric Research Unit, Epidemiology & Operational Psychiatry Div, San Diego, CA) **Psychiatric incidence rates for Navy women: Implications for an all volunteer force.** *Military Medicine*, 1974(Jul), Vol 139(7), 534-536.—Reports data from the records of 1,470 enlisted female psychiatric patients admitted to US Navy facilities during 1965-1968. Findings are compared with data from the records of 12,350 enlisted male psychiatric patients admitted during the same period. The change in hospitalizations with age was similar for men and women; however, the actual female rates were 2-4 times higher up to age 30, after which the incidence rates converged. The average female inpatient was younger, had less military experience or status, and was more often single than the average male inpatient. Diagnoses of personality disorder and alcoholism were assigned to men more often than to women (51 vs 37%), but women were given diagnoses of situational maladjustment more frequently than men. The finding that more men than women received disability separations or retirements (20 vs 9%) may indicate more severe cases among the male patients. Reasons for the higher prevalence rates among women are examined, and implications for Navy policy and psychiatric procedures are noted. (15 ref)—*L. Gorsey.*

1398. Schwab, John J.; Fennell, Eileen B. & Warheit, George J. (U Louisville) **The epidemiology of psychosomatic disorders.** *Psychosomatics*, 1974, Vol 15(2), 88-93.—Interviewed 1,645 households, randomly selected from a sample of 37,000. Psychosomatic symptoms during the previous year were recorded with sociodemographic characteristics. Weight changes were noted in 40% of the interviews, indigestion (35%), other gastrointestinal symptoms (22-26%), headaches (9%), hypertension (6%), and other symptoms. Differences by sex, race, income, etc., are reported. (17 ref)—*A. S. Kulkarni.*

1399. Shapiro, M. B. (U London, Inst of Psychiatry, England) **The role of conflict in the genesis and treatment of neurosis.** *British Journal of Psychiatry*, 1974(May), Vol 124, 458-459.—Pavlov demonstrated that conflict can produce disordered animal behavior, and Freudian theory emphasized the role of unresolved conflicts in producing neurotic behavior. If clinical psychologists are to be applied scientists, they should make more systematic use of the well validated theory of conflict in investigating and in treating neurotic disorders.

1400. Sherman, Mark. (Syracuse U) **Impression management: Patient perceptions of the efficacy of psychiatric self-presentation.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 459-462.—Studied the perceived efficacy of patients' attempts to influence discharge dates through psychiatric self-presentation as a function of the perceivers' own self-presentation inclinations and length of hospitalization. 40 male patients on an acute treatment ward and 40 on a chronic treatment ward heard 1 of 4 taped interviews on which an ostensible patient revealed that he planned to engage in either healthy or sick self-presentation and that the psychiatrist of this ostensible patient was either in favor of or opposed to discharge. Judgments about when the taped patient would be discharged were influenced by

the taped patient's plans but not by his psychiatrist's opinion. Ss' chronicity but not self-presentation inclinations were related to their judgments.—*Journal abstract.*

1401. Sherman, Mark; Sprafkin, Robert & Higgins, Kenneth. (Syracuse U) **Perceived efficacy and interpersonal impact of impression management among psychiatric patients.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 440-445.—100 hospitalized male psychiatric patients listened to 1 of 4 audiotapes on which an interviewed patient revealed his intentions to engage either in healthy or sick self-presentation. The taped patient also reported his psychiatrist to be either in favor of or opposed to early discharge. Ss predicted longer lengths of hospitalization for the taped patients, and found him to be less interpersonally attractive, when he intended to fake psychopathology. Predicted length of hospitalization was also longer when the taped patient's psychiatrist was reportedly opposed to early discharge.—*Journal abstract.*

1402. Simensen, Richard J. (Armstrong State Coll) **Correlations among Bender-Gestalt, WISC Block Design, Memory-for-Designs, and the Pupil Rating Scale.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1249-1250.—Administering the Bender Gestalt Test, the Block Design subtest of the WISC, the Memory-For-Designs Test, and the Pupil Rating Scale to 87 3rd, 4th, and 5th graders. The resulting correlation matrix and coefficients of determination indicate that these tests are measuring different variables; caution in their use as assessments of minimal brain dysfunction is advised.

1403. Singh, M. V.; Paliwal, T. R. & Gupta, S. (Maulana Azad Medical Coll, New Delhi, India) **Frustration reaction among emotionally disturbed children.** *Child Psychiatry Quarterly*, 1972(Apr), Vol 5(2), 3-10.—Compared the frustration reactions of emotionally disturbed and normal children in terms of type of reaction, direction of aggression, superego patterns, and group conformity ratings. Ss were 50 children with emotional problems (enuresis, hysteria, and anxiety reactions), 25 children selected randomly from an observation home for boys who were charged with stealing and running away from home, and 75 normal primary school children matched with these groups. The delinquent groups differed from the normal Ss in the type of reaction to frustration and in the direction of aggression. Enuretics and hysterics showed differences in their superego patterns. Group conformity ratings showed no differences among the groups.—*R. S. Albin.*

1404. Stamford, Bryant A.; Hambacher, William & Fallica, Anthony. (Woodville State Hosp, Carnegie, PA) **Effects of daily physical exercise on the psychiatric state of institutionalized geriatric mental patients.** *Research Quarterly*, 1974(Mar), Vol 45(1), 34-41.—Administered the Draw-A-Person Test, the Wechsler Adult Intelligence Scale (WAIS) Digit Span and Information subtests, and a specially developed ward activity and current events attitude measure to 9 male psychiatric inpatients (mean age = 71.5 yrs) who exercised 5 times/wk for 12 wks by walking on a motorized treadmill at workloads which elicited 70% of the age-adjusted, predicted maximal heart rate, 8 control patients (mean age = 65.2 yrs) did not exercise but received the same type of social stimulation as did the exercise Ss.

Physiological (treadmill and bicycle ergometer stress tests) and the psychological assessments were conducted before and after the 12-wk program. Exercise Ss showed significantly decreased heart rates and systolic blood pressure scores, and significant changes on the WAIS Information subtest and the attitude measure compared to the control Ss. (19 ref)—*L. Gorsey.*

1405. Stoller, Alan & Krupinski, Jerry. (Mental Health Authority, Melbourne, Vic, Australia) **Aspects of psychiatric morbidity in adolescents in Victoria, Australia.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 61-69.—Summarizes data obtained by the authors and other researchers on psychiatric morbidity in Australian adolescents related to drug-taking, alcoholism, suicidal behavior, delinquency, and car accidents. The psychiatric adjustment of adolescent migrants and Aborigines is discussed. (17 ref)

1406. Stolorow, Robert D. (Livingston Coll, Rutgers State U, New Brunswick) **Perspectives on death anxiety: A review.** *Psychiatric Quarterly*, 1973, Vol 47(4), 473-486.—A review of psychoanalytic and philosophical writings on death anxiety indicate that it is a multifaceted phenomenon which has been interpreted at several levels of analysis—including the level of infantile conflict and intrapsychic structural tensions, the level of primary instincts, the level of object relations, and the level of ontological givens. An attempt is made to group the defenses against death anxiety into 4 general modes: concretization, being-as-a-part, being-as-oneself, and absolute faith. The material presented supports a thesis that death anxiety and defenses against it are important factors in human development. (47 ref)—*Journal abstract.*

1407. Szasz, Thomas S. **The myth of mental illness: Foundations of a theory of personal conduct.** (Rev ed). New York, NY: Harper & Row, 1974. xvi, 297 p. \$8.95.—Posits that what is termed "mental illness" is, in fact, behavior disapproved of by the speaker—a stigmatizing moral judgment, not a medical diagnosis. It is stressed that only voluntarily sought psychiatric interventions can help people change their personalities or behavior. Semiotic, rule-following, and game-model analyses of behavior are discussed. (9 p ref)

1408. Thom, Achim & Weise, Klaus. (Karl-Marx-U, Leipzig, E Germany) **[Is the concept of the "psychiatric disease" a myth? The value and limitation of the medical model for psychiatry in our society.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 705-711.—Argues that most psychical disturbances are not diseases. The conventional medical model of the West is challenged by the Marxist-Leninist theory of consciousness. The traditional concept of disease still remains valid for a number of psychical disturbances which are unequivocally somatic in origin.—*K. J. Hartman.*

1409. Verma, S. K.; Shah, D. K. & Bhatia, S. C. **Enuresis in children: A psychological study.** *Child Psychiatry Quarterly*, 1972(Apr), Vol 5(2), 28-34.—Studied 26 cases diagnosed as enuresis. Among 200 emotionally disturbed children, these 26 were predominantly male, from an urban area, and from upper- and middle-class families. The group showed a high incidence of neurotic traits other than enuresis, family history of



mental illness, pathological parental attitudes, marital disharmony, sibling rivalry, and parental deprivation. These findings suggest that a long-standing maladjusted family interaction may have led to precipitation and/or continuation of enuresis. (21 ref)—*R. S. Albin.*

1410. Vogel, B. Frank. (Mental Health Inst, Clinical Services, Cherokee, IA) **The Capgras syndrome and its psychopathology.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 922-924.—Presents 5 case reports which indicate that the Capgras syndrome, a condition in which the patient believes that a person closely related to him is actually an imposter, is far less rare than has been commonly accepted. The psychodynamics of the syndrome are discussed, and it is suggested that it is a massive defense system against disintegrative intrapsychic conflicts.

1411. Vurdelja-Magljalic, Dada & Jordan, John E. (Pedagogic Academy, Osijek, Yugoslavia) **Attitude-behaviors toward retardation of mothers of retarded and non-retarded in four nations.** *Training School Bulletin*, 1974(May), Vol 71(1), 17-29.—Used the Attitude Behavior Scale-Mental Retardation (ABS-MR) to study attitudes of a total of 410 mothers of retarded and nonretarded in the US, Germany, Israel, and Yugoslavia. The Guttman facet-theory-derived ABS-MR measures attitudes on 6 levels of strength on an abstract-impersonal to concrete-behavioral continuum. As hypothesized, (a) attitudes toward retardation were more positive in the underdeveloped nations and/or samples of the study; (b) mothers of retarded were more positive than mothers of the nonretarded; (c) efficacy, (man's sense of control over his social and physical environment), was predictive of positive attitudes; (d) knowledge about retardation did not predict positive attitudes; (e) amount of contact did not predict positive attitudes unless accompanied by perceived voluntariness and enjoyment of the contact; and (f) the simplex order among the 6 scale levels of the ABS-MR was achieved. Data contain implications for teacher training and selection. (30 ref)—*Journal abstract.*

1412. Wagner, Edwin E. & Heise, Marion R. (U Akron) **A comparison of Rorschach records of three multiple personalities.** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 308-331.—Presents inter- and intra-protocol comparisons among the Rorschach Test responses of 3 authenticated cases of multiple personality—a 14-yr-old girl with 3 other personalities, a 28-yr-old woman with 7 different personalities, and a 34-yr-old woman with at least 2 other well developed personalities and fragments of others. Protocols were characterized by a large number of movement responses; human movement (M) decreased with the development of successive personalities. F and F+ percentages were relatively normal, and color responses, while not predominant, were labile. A tendency toward simplification and reintegration occurred with the emergence of new personalities for 2 of the cases. E. E. Wagner's structural analysis of personality is used to explain the results and specify the necessary conditions for the development of multiple personality.—*L. Gorsey.*

1413. Watson, Charles G. (VA Hosp, St Cloud, MN) **Effects of content verbalness and intangibility on schizophrenics' deficits in abstract thinking.** *Psychologi-*

*cal Reports*, 1974(Jun), Vol 34(3, Pt 2), 1115-1118.—Earlier research has suggested that schizophrenics' deficits on conceptual tasks could reflect special difficulties with verbal or intangible stimuli rather than inability to abstract correctly per se. In the present study the performance of 37 process and 32 reactive male schizophrenics on similarities tests varying in verbalness and intangibility of stimuli was compared to that of 35 nonschizophrenic psychiatric male patients. No special deficits associated with verbal stimulus presentation or stimulus intangibility appeared in either process or reactive samples.—*Journal abstract.*

1414. Weinstein, Raymond M. (John Jay Coll of Criminal Justice, City U New York) **Mental patients' perceptions of illness etiology.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 798-802.—Administered a questionnaire to 517 psychiatric inpatients to determine their perceptions of the factors contributing to their illness in terms of the economic, family, and social problems they experienced. Childhood problems of all types were reported and connected to illness less frequently than were adult problems. Patients often placed various difficulties concerning worries, failures, rejections, and interpersonal conflicts in an etiological context but not those difficulties which concerned deprivations and hardships. Statistically significant relationships were observed between the number of problems that patients believed were responsible for their illness and the patients' age, marital status, diagnosis, and length of hospitalization. Type of hospital commitment was related to a lesser extent; sex, social class, and prognosis were unimportant variables. (20 ref)—*Journal abstract.*

1415. Weise, Klaus. (Karl Marx U, Psychiatric Clinic, Leipzig, E Germany) **[Diagnosis of psychiatric diseases.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jan), Vol 26(1), 6-13.—Discusses a hypothesis relating psychopathological syndromes to etiopathic factors and psychopathic symptoms. Criticizes conventional diagnostic psychiatric concepts and the nonspecificity of psychopathological syndromes.

1416. Williams, C. L.; Henderson, A. S. & Mills, Janet M. (U Tasmania, Royal Hobart Hosp, Australia) **An epidemiological study of serious traffic offenders.** *Social Psychiatry*, 1974(Jul), Vol 9(3), 99-109.—Compared 100 persons who were found guilty of serious traffic offences with 99 controls matched for age, sex, residential district, and type of driver's license held. A demographic questionnaire, Raven's Progressive Matrices, the 16 Personality Factor Questionnaire, Hostility and Direction of Hostility Questionnaire, the General Health Questionnaire, and the Eysenck Personality Inventory were administered to all Ss. More offenders than controls had experienced recent adversity in their lives, had a greater evidence of nonpsychotic psychiatric disorder, and were more impulsive and lower in social conscience. This study represents an attempt to identify high-risk individuals in the driving population, and the implications of these findings for prevention are discussed. (44 ref)—*Journal abstract.*

1417. Wise, Thomas N. (Johns Hopkins U Hosp) **The pitfalls of diagnosing depression in chronic renal**

disease. *Psychosomatics*, 1974, Vol 15(2), 83-84.—Presents 5 case histories as examples.

1418. Wolkind, S. N. (London Hosp Medical Coll, Family Research Unit, England) **The components of "affectionless psychopathy" in institutionalized children.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol 15(3), 215-220.—Notes that classical "affectionless psychopathy" of institutionalization is no longer a commonly found syndrome in residential care. The individual clinical features which make up the syndrome, however, are each described as occurring very commonly. A psychiatric study of 92 5-12 yr old children in long-stay residential care suggests that the main features of the syndrome have a different etiology. Antisocial behavior was found to relate to aspects in the child's family, and relationship difficulties to an early admission to care. (17 ref)—*Journal summary*.

1419. Woodruff, Robert A.; Guze, Samuel B. & Clayton, Paula J. (Washington U, Medical School) **Psychiatric illness and season of birth.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 925-926.—Obtained data from a research clinic to test the hypothesis that patients with schizophrenia and manic-depressive illness are born early in the year more frequently than would be expected by chance. No evidence of seasonal variation of birth for patients with any specific diagnosis was found.

1420. Woodward, Christel A.; Roberts, Robin S.; Santa-Barbara, Jack & Johnson, Yvonne. (McMaster U, Hamilton, Ontario, Canada) **Discriminating externalizing from internalizing emotionally disturbed children with the Ottawa School Behaviour Checklist.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 277-289.—Examined the Ottawa School Behaviour Checklist responses of 73 latency-aged (mean age = 10 yrs) emotionally disturbed children to determine whether the checklist is equally effective in detecting children who experience various types of emotional difficulties. Results indicate that Ss using externalizing methods of coping scored higher than internalizing Ss. High scores are supposed to indicate more severe disturbance. Internalizing and externalizing styles were determined by independent psychiatric assessment. Discriminate function analyses were used to isolate those items that distinguished both externalizers from internalizers and psychotic from nonpsychotic Ss. Results indicate that the Ottawa School Behaviour Checklist item pool is more effective in screening emotionally disturbed troublesome children than in detecting equally disturbed troubled children. (French summary) (16 ref)—*Journal abstract*.

#### Behavior Disorders

1421. Arnon, Dan; Kleinman, Marc H. & Kissin, Benjamin. (State U New York, Downstate Medical Ctr, Div of Alcoholism and Drug Dependence, Brooklyn) **Psychological discrimination in heroin addicts.** *International Journal of the Addictions*, 1974, Vol 9(1), 151-159.—Tested 30 male and 31 female heroin addicts for field dependence using a portable rod-and-frame test. Scores were compared to results obtained by P. K. Oltman (see PA, Vol 42:11431) from a normal population. The addicts were more field-dependent than normals. The female addicts, however, were significantly more field-

dependent than male addicts who, conversely, appeared similar to normal males. Both addict samples were characterized by marked variability, suggesting that heroin addicts represent a strongly heterogeneous population and not a homogenous one as suggested by earlier studies. (19 ref)—*Journal abstract*.

1422. Babow, Irving & Babow, Robin. (California Polytechnic State U.) **The world of the abused child: A phenomenological report.** *Life-Threatening Behavior*, 1974(Spr), Vol. 4(1), 32-42.—Presents a verbatim interview of one 21-yr-old suicidal woman who had a long history of abuse by her mother. Some theoretical issues concerning the scientific and clinical usefulness of phenomenological reports in the understanding of child abuse (and other aberrant behavior) are briefly discussed.—*Journal abstract*.

1423. Baldwin, John. (U Birmingham, Inst of Judicial Administration, England) **Social area analysis and studies of delinquency.** *Social Science Research*, 1974(Jun), Vol 3(2), 151-168.—Argues that there are several fundamental conceptual and procedural problems in using E. Shevky and W. Bell's 1955 method of delineating urban social areas for analyzing delinquency rates. Those researchers who have used the method have done so uncritically; very often this approach has served to obscure rather than clarify the social patterning of delinquency. (45 ref)

1424. Barraclough, B. M. (MRC Clinical Psychiatry Unit, Graylingwell Hosp, Chichester, England) **Poisoning cases: Suicide or accident.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 526-530.—Used data from death certificates in England and Wales during 1968-1970 to show that the distribution of fatal drugs recorded for suicides, accidents, and undetermined deaths are similar. The possibility that real suicides are often misclassified is discussed, and differences between the actual and expected incidence of suicide are examined.

1425. Blath, Richard A.; McClure, James N. & Wetzel, Richard D. (Vanderbilt Hosp., Nashville, Tenn.) **Familial factors in suicide.** *Diseases of the Nervous System*, 1973(Feb), Vol. 34(2), 90-93.—Presents the case histories of 2 identical female 28-yr-old twins who both made serious suicide attempts within 2 yrs of each other. The literature on suicide in twins is discussed. It is suggested that further studies of the families of suicides be made, including studies of the transmission of traits affecting suicide risk. (19 ref)—*Journal summary*.

1426. Blumberg, Herbert H. et al. (U London, Inst of Psychiatry, Addiction Research Unit, England) **British opiate users: I. People approaching London drug treatment centres.** *International Journal of the Addictions*, 1974, Vol 9(1), 1-23.—Conducted interviews with 210 English narcotics addicts, all of whom had contacted outpatient drug treatment centers during a 1-yr period and who had had no significant previous clinic contacts. Descriptions of family and demographic backgrounds, current life-styles, illegal activities, initial and current drug use, periods of abstinence, and physical complications are presented. (27 ref)

1427. Buglass, Dorothy & Horton, John. (MRC Unit for Epidemiological Studies in Psychiatry, Edinburgh, Scotland) **A scale for predicting subsequent suicidal**



**behaviour.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 573-578.—Obtained data on 2,809 patients admitted to the Regional Poisoning Treatment Centre in Edinburgh after an act of attempted suicide in 3 successive years (1968-1970), and compared nonrepeaters with patients who were subsequently readmitted for further suicide attempts within 12 mo of their 1st attempt or who committed suicide. A scale predicting subsequent suicidal behavior was constructed on the 1968 data by allocating 1 point for each of the following symptoms: sociopathy, alcohol abuse, previous psychiatric inpatient or outpatient treatment, previous suicide attempt (resulting in hospitalization), and not living with a relative. The predictive power of the scale was tested by mean cost ratings (MCR). Data suggest that the scale validates reasonably well, and its applications to evaluative studies are discussed.—*Journal summary.*

1428. **Cahalan, Don & Room, Robin.** (U California, School of Public Health, Berkeley) **Problem drinking among American men.** New Brunswick, NJ: Rutgers Center of Alcohol Studies, 1974. xiv, 269 p. \$12.50.—Results of 2 national surveys and 1 community survey reveal that drinking problems are fairly common among 21-59 yr old males, particularly 21-24 yr olds. Types of problems related to alcohol are delineated, prevalence rates in various subgroups are presented, and the relationships between the problems and sociocultural and personality characteristics are discussed.

1429. **Calderon Narvaez, Guillermo.** (National Autonomous U Mexico, Faculty of Medicine, Mexico City) **Alcoholism among the pre-Hispanic peoples of Mexico.** *Foreign Psychiatry*, 1973-1974(Win), Vol 2(4), 78-92.—Discusses the use of pulque, a fermented drink made from the maguey plant, among the pre-Hispanic Mexicans, as described by Fray Bernardino de Sahagún in *History de las Cosas de la Nueva Espana*. The mythology, symbolism, and religious significance of the maguey and its goddess Mayahuel are described. Although Mexican peoples had many deities of drink and drunkenness, and although they believed that a man born under the sign "2 rabbit" of their fortune-telling calendar was predestined to alcoholism, they took a stern view of drunkenness. The problems of the drunkard, Fray Bernardino says, are poverty, illness, and crime. Social ostracism, strict discipline of the young, counseling, threats from the rulers, and harsh punishments—beatings, imprisonment, and death—did not solve the problem. Only old men, who had completed an active life and would not be a burden on society, were allowed the pleasures of drink. The Spaniards abolished the severe penalties as "inhuman," and a sharp increase in alcoholism followed.—*J. Davis.*

1430. **Christensen, Harold T.** (Purdue U) **Interview with a transsexual.** *Family Coordinator*, 1974(Jul), Vol 23(3), 243-250.—Presents a transcript of an interview between a professor of sociology and a 24-yr-old male transsexual. Topics discussed include sexual and emotional relationships, the effects of a confused sexual identity during childhood and adolescence, the experience of a sex change operation, and the psychological aspects of sex and role transition.

1431. **Cohen, Stuart L. & Fiedler, Joanne E.** (Suicide Prevention Research Project, Pittsburgh, PA) **Content**

**analysis of multiple messages in suicide notes.** *Life-Threatening Behavior*, 1974(Sum), Vol 4(2), 75-95.—Compared 220 persons who committed suicide and who left notes with 813 suicides who did not leave notes. Note writers were significantly more likely to be white, female, and if female, to have any other marital status than widowed. Note writers were also more likely to have committed suicide with drugs and less likely to have used other methods. In 195 notes available for analysis, the relative percentages of statements containing advice, instructions, and requests (31), other-directed positive affect (19), acknowledgement of wrongdoing (7), and hostile affect (5) were the same in the entire sample as in subsamples of age, sex, and marital status. Only for a few specific content categories did the relative frequency of content vary significantly with age, sex, or marital status. (20 ref)—*Journal abstract.*

1432. **Cox, Thomas J. & Longwell, Bill.** (Hope Ctr, Tucson, AZ) **Reliability of interview data concerning current heroin use from heroin addicts on methadone.** *International Journal of the Addictions*, 1974, Vol 9(1), 161-165.—In a methadone maintenance program with 110 heroin addicts, data concerning current heroin use from 175 interviews were correlated with the results of urinalysis for heroin. In 86% of the interviews, the patients truthfully reported the extent of their current heroin use to the interviewer.

1433. **Evans, Joseph H.** (Boys Town, NB) **Attitudes of adolescent delinquent boys.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1175-1178.—It has previously been suggested that the attitudes of juvenile offenders are qualitatively different from those of "normal" male adolescents. The present study attempted to assess quantitative differences in the attitudes of 20 13-15 yr old male offenders and 20 male nondelinquent controls toward disabled, retarded, aged, alcoholic, and mentally ill persons. Juvenile offenders exhibited significantly less favorable attitudes than did nondelinquent controls.—*Journal abstract.*

1434. **Ferrence, Roberta G. & Johnson, F. Gordon.** (Addiction Research Foundation, London, Ontario, Canada) **Factors affecting reported rates of self-injury.** *Life-Threatening Behavior*, 1974(Spr), Vol. 4(1), 54-66.—The magnitude of variation in reported rates of self-injury suggests that factors other than actual incidence affect these rates. Factors that relate to the scope of the reporting network and to the intensity of contacts within this network are examined in detail to determine their effect on the reporting process. Differences in study design and reporting procedures are felt to explain most of this variation and suggest the need for standardized techniques in studying the epidemiology of self-injury.—*Journal abstract.*

1435. **Gath, Ann.** (U Oxford, England) **Sibling reactions to mental handicap: A comparison of the brothers and sisters of mongol children.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Jul), Vol 15(3), 187-198.—Parents and teachers completed behavioral rating scales on 89 sisters and 85 brothers of 104 mongol children living at home. Disturbance in the boys, known to be not significantly more frequent than in controls, was related to family size and social class. Disturbance in the girls, known to be more frequent than

in controls, was related to type of school, birth order, and age in relation to the mongol child. It is concluded that the presence of a mongol child in the home is associated with deviant behavior as assessed by parents and teachers, and with educational failure in elder sisters, who are probably carrying a large share of the burden of care. (25 ref)—*Journal summary*.

1436. Gossop, M. R.; Stern, R. & Connell, P. H. (Bethlem Royal Hosp, Drug Dependence Clinical Research & Treatment Unit, London, England) **Drug dependence and sexual dysfunction: A comparison of intravenous users of narcotics and oral users of amphetamines.** *British Journal of Psychiatry*, 1974(May), Vol 124, 431-434.—Analyzed psychosexual histories for incidence of perversions and for evidence of diminished sexual functioning. Length of drug usage was not related to degree of dysfunction, and injection vs oral methods did not differ in frequency of perversions; but the intravenous users had greater reduction in sexual activity than the pill poppers among the men. In general, female drug users had greater reduction in normal sexual functioning than males. Since disturbed female adolescents often have sexual problems, and female drug offenders are likely to be more disturbed than males, drug dependence may be one manifestation of deviance among females.—R. L. Sulzer.

1437. Guggenheim, Frederick G. & Weisman, Avery. (Massachusetts General Hosp., Boston) **Suicide in the subway: Psychodynamic aspects.** *Life-Threatening Behavior*, 1974(Spring), Vol. 4(1), 43-53.—Investigated 51 cases of suicide attempts in the subway to determine whether the method used had psychodynamic significance or was merely adventitious. No single characteristic distinguished subway suicide from all other suicide modalities, although as a group the subway cases had a higher proportion of psychotic and previously suicidal patients than other series quoted in the literature. However, there were important differences between subway suicide cases seeking a "traumatic" death (jumping in front of a train; lying across the track awaiting destruction) and those seeking a "nontraumatic" death (electrocution on the live "third rail"). The traumatic group had histories of exposure to violence, other traumatic suicide attempts, hostile or destructive delusions, and many "destroy" words on psychological test protocols. The smaller nontraumatic group had no such history of exposure to violence. Their previous suicide attempts were nontraumatic; delusions, when present, were not menacing; and the psychological tests showed more "escape" than "destroy" words.—*Journal abstract*.

1438. Hawk, Sherry S. & Peterson, Rolf A. (U Illinois, Chicago Circle) **Do MMPI psychopathic deviancy scores reflect psychopathic deviancy or just deviancy?** *Journal of Personality Assessment*, 1974(Aug), Vol 38(4), 362-368.—Administered the *Pd*, *K*, and *L* scales of the Minnesota Multiphasic Personality Inventory (MMPI) and 4 of Kohlberg's Moral Judgment Situations to 15 institutionalized adolescent delinquents, 196 undergraduates, and 15 members of a therapy collective which provides free community services. More than 50% of both the delinquent and therapy collective Ss were classified as psychopathic (*Pd* + *K*T score > 70). The

3 groups obtained significantly different moral maturity scores, with the therapy collective Ss having the highest mean scores. Results of 2 stepwise regression analyses found no relationship between *Pd* scores and moral maturity scores. (20 ref)—*Journal abstract*.

1439. Jackson, George W. & Richman, Alex. (US DHEW, Ctr for Disease Control, Mount Sinai School of Medicine, City U New York) **Alcohol use among narcotic addicts.** *Alcohol Health & Research World*, 1973(Spring), Vol 1(1), 25-28.—Conducted an epidemiological study of 471 heroin addicts and their concomitant alcohol abuse. Data included the level of daily use, demographic factors, duration of heroin addiction, and previous hospitalizations. Alcohol use among addicts was strongly associated with an increased duration of heroin addiction. 53% of the Ss reported multiple drug abuse, an ever-increasing problem that needs to be considered in treating and rehabilitating narcotic addicts.—H. J. Freudenberger.

1440. Kiley, D. E. (Illinois Dept of Corrections, Juvenile VAST Program, Decatur) **The effect of the research expectancy on the activity level of institutionalized delinquents.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 242-247.—Conducted a field study of 14 16-19 yr old delinquents housed in a minimal security, treatment-oriented program to study the dynamics of "demand characteristics" when a new set of expectancies was introduced. The independent variable was the introduction of a research expectancy (i.e., Ss were told they would be observed). The dependent variable was the frequency of 12 different behaviors in 4 categories (without peers, with peers, accounted for, and unaccounted for) which were assessed during 4 observational periods. Results show that (a) peer interactions decreased dramatically during the 1st wk following the introduction of the expectancy, and then slowly increased during the next 3 wks; (b) as peer interactions decreased, Ss tended to be unaccounted for (i.e., whereabouts unknown); and (c) activities performed without peers remained constant throughout the observations.—*Journal summary*.

1441. Krieger, George. (VA Hosp, Palo Alto, CA) **The plasma level of cortisol as a predictor of suicide.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 237-240.—Reports that there is an urgent need for additional diagnostic instruments to differentiate the high-risk suicide patient from the low-risk patient. Results of a study with a suicidal risk group of hospital inpatients indicate that 13 Ss who later committed suicide tended to have a higher mean plasma cortisol level (measured at 8:30 AM) than the 39 low-risk suicides who were living 2 yrs later. It is recommended that if a suicide risk patient has a plasma cortisol level above 20 µg%, in the absence of other possible causes for such a high level, he should be recognized as having a high potential for suicide and be provided with more protective precautions, more frequent contacts with his therapist, and prolonged aftercare. (17 ref)—*Journal summary*.

1442. Linkenbaker, Dan D. & McCarron, Lawrence T. (Johnston Youth Community, Terre Haute, IN) **Computerized assessment programming (CAP): A prescriptive strategy for delinquents.** *Behavioral Science*,



- 1974(Jul), Vol 19(4), 254-259.—Describes a complex, trilevel computerized system designed for the generation of specific diagnostic statements, individualized prescriptive remedial plans, and data storage for research with a juvenile delinquent population. The system output is a comprehensive, timely, and accurate diagnostic report capable of identifying specific problem areas related to delinquency and capable of offering individualized intervention techniques for use by institutional staff, parents, and teachers. Standards used in the construction of this system are presented as guidelines for the development of other computer-assisted diagnostic programs. (15 ref)—*Journal abstract*.
1443. Luthé, R. (U Saarland, Inst for Forensic Psychology & Psychiatry, Homburg, W Germany) [Experience structure of self-destructive tendencies in a group of adolescent delinquents.] (Germ) *Nervenarzt*, 1972(Feb), Vol 43(2), 88-94.—Studied suicidal tendencies in adolescent delinquents and describes observations of 3 groups: (a) 15 19-29 yr old Ss, highly suicide prone on the Poldinger scale, held in jail for investigation; (b) a randomly chosen control group of 15 delinquents of the same age, also jailed for investigation; and (c) a 2nd control group of 15 slightly older 2nd offenders, convicted and sentenced to jail. The incidence, psychological and psychopathological nature, and epidemiological aspects of suicidal tendencies, the presuicidal syndrome, and the relations between suicide and violence are examined, compared, and discussed.—*T. Fisher*.
1444. Mann, Marty. *America's 150-year war: Alcohol vs. alcoholism*. *Alcohol Health & Research World*, 1973(Spr), Vol 1(1), 5-7.—Traces the history of the alcoholism movement in the United States from the Mayflower to the frontiersmen, the temperance movement, and prohibition. The development of government commitment to the problem and of the cooperation of scientists and reformed alcoholics are discussed.—*H. J. Freudenberger*.
1445. Marks, Alan & Abernathy, Thomas. (MacMurray Coll.) *Toward a sociocultural perspective on means of self-destruction*. *Life-Threatening Behavior*, 1974(Spr), Vol. 4(1), 3-17.—Examined the relationship between an individual's intent to die and choice of method. A sociocultural perspective is developed in an attempt (a) to explain the principal differences in choice of method by sex, (b) to explain regional variations over time by sex, and (c) to differentiate between regional and/or cultural areas in their use of firearms as a means of self-destruction. The concept of availability is examined and shown to consist of at least 2 dimensions: the physical presence of a method, and the sociocultural acceptability of that method. A concept of suicidal threshold is advanced as suggestive of a suicidal level that an individual must reach before a suicidal process develops and results in self-inflicted death. (27 ref)—*Journal abstract*.
1446. McDaniel, Clarence E.; Owens, David & Bolman, William M. (San Diego County Mental Health Services, CA) *Bromide abuse: A continuing problem*. *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 913-915.—Presents case material on 8 patients who abused bromide drugs and also, with 1 exception, alcohol. 6 were white housewives. The clinical manifestations, diagnosis, and treatment of bromism and the need for increased awareness of bromide intoxication and stricter control of these drugs are discussed.
1447. Parker, A. Morgan. *Suicide among young adults*. New York, NY: Exposition Press, 1974. xii, 164 p. \$8.—Combines personal experience with findings of authorities in discussing attempted and completed suicide cases. Descriptive categories and statistical information in occurrence factors; psychoanalytic and nonpsychoanalytic theories of causes, dynamics, and motivations; and symptoms, methods, clinical findings, treatment, and prevention of suicide are discussed. (10 p ref)
1448. Pohle-Haase, Heidi & Schraml, Walter J. [Family constellation and obesity in young boys: A contribution to psychologic-sociologic etiology.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(3), 249-278.—Discusses psychological and social factors influencing the development of obesity in young boys. The literature on the effects of family structure and background on the pathogenesis of obesity is surveyed and important theories and research are outlined briefly. 62 case histories of boys in institutions were examined but most were considered incomplete, too subjective, and unreliable. Only 23 were comprehensive enough to justify from them even limited and tentative conclusions about possible connections between family background and the patients' obesity. It is felt, however, that a correlation between obesity and an overorganized family structure is highly probable, and 2 case histories which appear to support this theory are presented. (English summary) (3 p ref)—*T. Fisher*.
1449. Pokorny, Alex D. & Jachimczyk, Joseph. (Baylor Coll of Medicine, Houston, TX) *The questionable relationship between homicides and the lunar cycle*. *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 827-829.—Studied 2,494 homicides that occurred in Harris County, Texas, over a 14-yr period in an effort to confirm a recent study suggesting that homicides are significantly related to phases of the moon. No significant relationship was found, although homicides did show strong day-of-week and hour-of-day cycles.
1450. Roe, Allan V.; Howell, Robert J. & Payne, I. Reed. (Utah State Prison, Draper) *Comparison of prison inmates with and without juvenile records*. *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1315-1319.—From a sample of 404 inmates at a state prison whose records were adequate and complete, 259 had juvenile records and 145 had none. These 2 groups were compared on 47 behavioral and personal characteristics (including scores on subscales of the Bipolar Psychological Inventory). The inmates with juvenile records were significantly different from those without juvenile records on 17 of the 47 dimensions studied. The inmates with juvenile records were more hostile, socially deviant, and less motivated. They were also less well educated, more frequently unmarried (never married or currently divorced), had a greater number of prison write-ups, more often had an escape record, had abused drugs, and were tattooed.—*Journal abstract*.
1451. Sabalis, Robert F.; Frances, Allen; Appenzeller, Susan N. & Moseley, Willie B. (William S. Hall Psychiatric Inst, Columbia, SC) *The three sisters:*

**Transsexual male siblings.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 907-909.—Presents case material on 3 male siblings with a transsexual syndrome. It is probably the first such case recorded in the US and may lead to the discovery of other such sibships, which could be of particular value in assessing the validity of some of the literature concerning the etiology of this disorder.

1452. Selby, Henry A. (Temple U) **Zapotec deviance: The convergence of folk and modern sociology.** Austin, TX: University of Texas Press, 1974. xviii, 166 p. \$8.50.—Presents an ethnographic study of the causes, effects, characteristics, and functions of deviance among the Zapotec Indians in the Valley of Oaxaca, Mexico. Topics include the interactionist approach to the study of deviance, values and social groups in the Zapotec community, deviance and the social structure, ideologies and the definition of sexual deviance, witchcraft and the process of labeling, and the origins of good and evil among the Zapotecs. (9 p ref)

1453. Selzer, Melvin L. & Vinokur, Amiram. (U Michigan, Medical School) **Life events, subjective stress, and traffic accidents.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 903-906.—Administered a questionnaire on the type and number of life changes, resultant adjustment required, subjective and physical stress, aggression, and alcohol abuse to 532 normal and alcoholic male drivers. Several significant correlations between traffic accidents and life and subjective stress were found. Aggression was the only personality variable to correlate significantly with accidents. (20 ref)

1454. Smithyman, Samuel D.; Plant, Walter T. & Southern, Mara L. (California State U, San Jose) **Locus of control in two samples of chronic drug abusers.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1293-1294.—Compared the mean scores of heroin and multiple-drug users on Rotter's Internal-External (I-E) Control Scale with those of Rotter's normative sample. Results do not support previous suggestions of investigator bias toward internality as being indicative of good psychological adjustment on the I-E Scale.

1455. Straub, William F. & Felock, Thomas. (Ithaca Coll, School of Health, Physical Education & Recreation) **Attitudes toward physical activity of delinquent and nondelinquent junior high school age girls.** *Research Quarterly*, 1974(Mar), Vol 45(1), 21-27.—Administered a demographic questionnaire and Kenyon's Attitudes Toward Physical Activity Inventory (ATPAI) to 20 delinquent and 60 nondelinquent junior high school girls from a small rural school, a large urban school, and a correctional institution for girls. Significant differences were found on only 1 of the 6 subscales of the ATPAI ( $p < .01$ ). Nondelinquent Ss valued physical activity as a social experience more than did the delinquent Ss. No significant differences were found on the Vertigo, Aesthetic, Catharsis, or Ascetic scales. Multiple discriminant function analyses, however, showed that there were significant differences in attitudes between Ss from rural schools and those from urban schools and between Ss who were institutionalized and those who were not.—L. Gorsey.

1456. Sutker, Patricia B. (VA Hosp, Charleston, SC) **Personality characteristics of heroin addicts: A response to Gendreau and Gendreau.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 463-464.—Demonstrating the effect of the volunteer factor on Minnesota Multiphasic Personality Inventory (MMPI) profiles of addicts and nonaddicts, P. Gendreau and L. F. Gendreau (see PA, Vol 51:5403) suggested that previously reported MMPI differences between these 2 subject groups might well be explained by the "volunteer" status of the addict group. The present article describes more thoroughly the unincarcerated addict sample, almost half of whom were compulsory candidates for treatment, and presents data from previous studies by P. B. Sutker and A. N. Allain (1973, 1974) to show that volunteer and nonvolunteer applicants were more similar than different on MMPI indices. Results of a follow-up investigation, however, point to the role of situational factors in elevating MMPI profiles of 82 unincarcerated addicts who, addicted to heroin and involved in the cycle of street activities at the time of testing, differed significantly from prisoner groups of 35 addicts and 87 nonaddicts on several important dimensions. Similarly, certain MMPI indices, particularly Scale 4, were found to be relatively stable over time and conditions, reflecting perhaps a basic dispositional pattern or constellation of personality traits.—*Journal abstract.*

1457. Wax, Douglas E. & Haddox, Victor G. (U Michigan, Medical School) **Enuresis, fire setting, and animal cruelty: A useful danger signal in predicting vulnerability of adolescent males to assaultive behavior.** *Child Psychiatry & Human Development*, 1974(Spr), Vol 4(3), 151-156.—Examined 6 institutionalized adolescent male delinquents whose recent history included a triad of behaviors (persistent enuresis, fire setting, and animal cruelty). Not only does the predictive validity of the triad appear to be supported, but the cases cited rank highest among overtly dangerous assaultive youth seen by the Southern California Youth Authority during the 12-mo observation period. A summary of case history data supporting the hypothesis that the triad is a useful clinical tool in the prediction of violent behavior is presented.—E. S. Goodman.

1458. Weis, Sandra & Seiden, Richard H. (U California, Berkeley) **Rescuers and the rescued: A study of suicide prevention center volunteers and clients by means of a death questionnaire.** *Life-Threatening Behavior*, 1974(Sum), Vol 4(2), 118-130.—Administered E. S. Shneidman's questionnaire on demographic characteristics and psychological attitudes toward and experiences with suicide, death, and mental status to 51 suicide prevention center volunteers and 31 suicide attempters. Volunteers were older, better educated, more affluent, more often Protestant and reported greater emotional stability, much less fantasy about suicide, almost no actual suicide attempts, and a tendency not to consider suicide as a justifiable problem-solving option when compared with the suicide attempters. (16 ref)—*Journal abstract.*

1459. Winthrop, Henry. (U South Florida) **The group as a surrogate for the individual.** *Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 239-249.—Analyzes in detail 3 forms of contemporary social behavior:



togetherness, conformity, and herd-mindedness. Each of these types of antiautonomous behavior functions chiefly to make the group a surrogate for the individual. The more a society relies on these modes of behavior the more pathological it becomes. When group behavior becomes a chronic surrogate for individual expression, the possibility that the individual will be able to find himself may be wholly lost.—J. Z. Elias.

### Learning Disorders & Mental Retardation

1460. ———. [Papers presented at 3rd Brazilian Congress on Mental Deficiency: June 28–July 2, 1972: II.] (Port) *Revista Brasileira de Deficiência Mental*, 1972(Jun), Vol 8(2), 119 p.—Presents 16 papers on vocabulary training, special educator training, occupational therapy, difficulties in rehabilitation and sex education of the mentally retarded, analysis of aspects of mental deficiency (an analysis of 1,000 cases), Rubenstein's syndrome, Montessori techniques with the retarded, anomalies of sex chromosomes, and related subjects.—N. T. Pinckney.

1461. Alcorn, Dewaine A. (U Nebraska) **Parental views on sexual development and education of the trainable mentally retarded.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 119–130.—Administered to 270 parents of 206 retarded persons a questionnaire on the sexual history of the trainable mentally retarded (TMR) children, attitudes toward sex education, and the possibility of married life for their children. Parents reported little evidence of sexual misbehavior or even interest in sexual matters but generally lacked confidence in their children's future sex behavior. Most believed that they had primary responsibility for sex education, although few felt comfortable about their ability to provide it. Nearly ½ of the parents favored voluntary sterilization of the trainable, but less than 1% of the retardates in the sample had undergone, nor were their parents seriously considering, sterilization. Relationships between the amount of sex information the parents perceived they themselves possessed and their own attitudes toward sex, marriage, and parenthood for the trainable are presented.—*Journal abstract*.

1462. Amado, Fany. (Fonoaudiológico Ctr de Habilidade, São Paulo, Brazil) [Phonaudiology and mental deficiency.] (Port) *Revista Brasileira de Deficiência Mental*, 1972(Mar), Vol 7(1), 19–22.—Describes the types of speech, language, and hearing problems seen in mentally deficient clinic patients. An outline of the development of language to age 7 yrs is given, and the education of the retarded is discussed.

1463. Beange, Helen & Caradus, Verne. (Grosvenor Hosp, Summer Hill, New South Wales, Australia) **The Prader-Willi syndrome.** *Australian Journal of Mental Retardation*, 1974(Mar), Vol 3(1), 9–11.—Observed 15 children with Prader-Willi syndrome who attended an Australian diagnostic and assessment clinic. Ss included 1 child of dull-normal intelligence, 5 mildly retarded children, and others who functioned at the upper part of the moderately retarded range. Some of the characteristics of the disorder, including high-pitched voice, emotional immaturity and obesity, are described, and problems of managing such children are discussed.—*Journal abstract*.

1464. Bucher, Bradley & Bowman, Elizabeth-Ann. (U Western Ontario, London, Canada) **The effects of a discriminative cue and an incompatible activity on generalized imitation.** *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 22–33.—Observed 4 noncompliant male 2–9 yr old retardates in a generalized imitation study. 2 variables were studied: provision of a competing reinforced activity, and use of a cue to aid discrimination between reinforced and nonreinforced imitations. Both variables increased the rate of discrimination between the 2 sets of stimuli. Greatest discrimination occurred when both cue and alternative task were present. Discrimination decreased when the variables were removed. Results imply that imitation of nonreinforced cues in generalized imitation procedures varies with the degree to which reinforcement is available for other activity, as well as with the complexity of the discrimination problem. Results help indicate conditions under which the generalized imitation effect may be observed in more naturalistic settings. (15 ref)—*Journal abstract*.

1465. Buin, Nissan; Rynders, John & Turnure, James. (U Minnesota) **Early maternal linguistic environment of normal and Down's syndrome language-learning children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 52–58.—Investigated the influence of linguistic data in the maternal environments of 6 Down's syndrome and 5 normal language-learning 24-month-old children. It was found that the Down's syndrome children received a different linguistic input than the "normal" children. The possibility of a relationship between the Down's syndrome children's different early maternal linguistic environment and later characteristics of their deviant-delayed language is considered. Various aspects of language development in general are discussed. (23 ref)—*Journal abstract*.

1466. Busby, Walter A.; Fillmer, H. T. & Smittle, Pat. (U Florida) **Interrelationship between self-concept, visual perception, and reading disabilities.** *Journal of Experimental Education*, 1974(Spr), Vol 42(3), 1–6.—Explored the relationship between self-concept, visual perception, and reading disabilities. Ss were 50 7th- and 50 9th-grade students selected randomly from an integrated and socially balanced senior high school. The Tennessee Self Concept Scale was used as a measure of self-concept; the Spatial Visualization section of the Multiple Aptitude Tests was used as a measure of visual perception; and the paragraph meaning, spelling, and language portions of the Stanford Achievement Test were used as measures of reading disabilities. The 24 variables yielded from the data were submitted to factor analysis and multiple correlation. The hypothesis that self-concept and visual perception are related to reading disabilities was not clearly supported by the data. Further replication is suggested using a measure of "reading" self-concept rather than "general" self-concept. (31 ref)—*Journal abstract*.

1467. Chan, Kenyon S. & Keogh, Barbara K. (U California, Los Angeles) **Interpretation of task interruption and feelings of responsibility for failure.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 175–178.—Administered the Intellectual Achievement Responsibility Questionnaire and a 6-item block design task to 30

educable mentally retarded (EMR) and 30 normally achieving boys (mean chronological age = 148.1 and 101.9 mo, respectively). Ss were matched for mental age. 3 designs were interrupted before completion, with interruption predefined as indicative of success, failure, or neutral. EMRs reported self-blaming reasons for interruption, regardless of the definition of interruption, whereas normal achievers were self-blaming only when interruption was predefined as a failure condition. A relationship was found between Ss' interpretation of interruption and feelings of responsibility for failure. Results suggest that EMR boys are more prone to accept responsibility for failures than for successes, and that self-blaming responses to neutral events such as interruption may be related to depressed educational performance.—*Journal abstract.*

1468. Deich, Ruth F. **Incidental learning and short-range memory in normals and retardates.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 539-542.—Tested and largely confirmed M. R. Denny's hypothesis of an incidental learning deficit in retardates. 18 normal kindergartners and 18 moderately retarded and organically impaired Ss, matched for MA, were given 2 tasks: (a) geometric shapes, requiring sorting according to shape and recalling and recognizing according to color (with color representing incidental learning); and (b) familiar objects, requiring naming the color of common, familiar, pictured objects and recalling and recognizing according to object name (with object name representing incidental learning). Normals showed more incidental learning on the objects task, significantly so for recognition. On the shapes task, retardates gave incorrect responses; normals did not. Thus, retardates learn incidentally but tend to be inferior to normal peers.—*Journal abstract.*

1469. Ennis, Bruce J. & Friedman, Paul R. **Legal rights of the mentally handicapped. Volume 1.** New York, NY: Practising Law Inst, Mental Health Law Project, 1974. 624 p.—Presents the first volume of a legal handbook covering basic facts about mental retardation and mental illness, the civil commitment process, and general rights of the mentally handicapped in mental institutions. Case citations are included, along with transcripts and interpretations of court decisions.

1470. Ennis, Bruce J. & Friedman, Paul R. **Legal rights of the mentally handicapped: Volume 2.** New York, NY: Practising Law Inst, Mental Health Law Project, 1974. 621-1144.—Presents the 2nd volume in a legal handbook on the rights of the mentally handicapped, covering the specific implications of the 1st, 6th, 8th, 13th, and 14th amendments for treatment, the rights of the mentally handicapped in the community, the right to the least restrictive alternative setting for treatment, and the rights of the mentally handicapped in criminal proceedings. Case summaries and interpretations are included.

1471. Ennis, Bruce J. & Friedman, Paul R. **Legal rights of the mentally handicapped: Volume 3.** New York, NY: Practising Law Inst, Mental Health Law Project, 1974. 1143-1538.—Presents the 3rd volume in a legal handbook on the rights of the mentally handicapped, focusing on litigation problems (e.g., jurisdiction, sovereign immunity, attorney's fees, and class

actions). Litigation strategies and techniques are described, and the viewpoints of a judge and an administrator and a summary article on the American Bar Association and the field of mental health are included.

1472. Fast, Irene & Chetnik, Morton. (Children's Psychiatric Hosp, Ann Arbor, MI) **Some aspects of object relationships in borderline Michael.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 479-485.—Argues that in borderline children neither self-representations nor object-representations have been integrated into coherent and relatively stable wholes. The child interacts with others largely in terms of his own projection rather than in terms of the other person's actual characteristics. This is seen as a failure to complete the transition out of narcissism into a firm commitment to external reality. Case examples are presented, and the relevant literature is reviewed.—R. S. Albin.

1473. Freire-Maia, Ademar; Freire-Maia, Dertia V. & Morton, Newton E. (Faculdade de Ciências, Médicas e Biológicas, São Paulo, Brazil) **Sex effect on intelligence and mental retardation.** *Behavior Genetics*, 1974(Sep), Vol 4(3), 269-272.—In a sample of 5,049 pairs of individuals from high-risk pedigrees, no evidence could be found for a uterine or socialization maternal effect on IQ or on the incidence of mental retardation. The observed excess of affected males and higher risk for children of affected females were fully consistent with all of 3 multifactorial threshold models.

1474. Friedrich, Douglas; Libkuman, Terry & Hawkins, William F. (Central Michigan U) **Response-stimulus interval performance of nonretarded and institutionalized retarded subjects.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 64-69.—Tested the expectancy and capacity explanations for the consistent finding of a psychological refractory period for nonretarded and retarded Ss. Results are inconsistent with previous dual reaction-time research, showing relative similar reaction times for both intelligence groups. Although the 12 35-yr-old male nonretarded Ss performed better than the 12 40-yr-old retarded Ss under all conditions, both groups indicated a psychological refractory period only at the 250-msec response-stimulus interval under the irregular procedure. Performance under all other conditions indicated that, regardless of presentation procedure, the 1st stimulus (or the 1st stimulus and the reaction to it) established an expectancy for the 2nd stimulus. This expectancy resulted in faster reaction time to the 2nd stimulus than to the 1st.—*Journal abstract.*

1475. Fritz, Janet J. (Colorado State U) **Reversal-shift behavior in children with specific learning disabilities.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 431-438.—Studied discrimination learning by 7-9 yr olds with specific learning disabilities, using the reversal and intradimensional shift paradigms. 3 groups of Ss included 20 normal controls, 20 Ss with learning disability receiving no drug treatment, and 10 Ss with learning disability receiving drug treatment. All groups given the intradimensional shift task performed significantly better than those given the reversal shift task, while the controls performed significantly better on both tasks than Ss with learning disabilities. The prediction



that shift performance by Ss who were receiving drug treatment would be better than that of the nondrug group was not substantiated. Results are discussed in terms of support for the D. Zeaman and B. House attention model of discrimination learning and the effects of drug therapy on attention for children with specific learning disabilities. (15 ref)—*Journal abstract*.

1476. Furby, Lita. (Yale U) **Attentional habituation and mental retardation: A theoretical interpretation of MA and IQ differences in problem solving.** *Human Development*, 1974, Vol 17(2), 118-138.—Offers a theoretical proposal concerning individual differences in cognitive processes. Mental retardation and the comparative problem-solving performance of normal and retarded children are examined. On the basis of W. E. Jeffrey's analysis of attention and cognitive development (1968, 1969), it is proposed that IQ and MA differences in problem-solving behavior reflect differences in (a) speed of orienting-reflex habituation and (b) ability to inhibit responding sufficiently. (51 ref)—*Journal abstract*.

1477. Gupta, S. & Singh, M. V. (Maulana Azad Medical Coll, New Delhi, India) **Marriage and sex education of mental retardates.** *Child Psychiatry Quarterly*, 1973(Jan), Vol 6(1), 15-17.—Discusses past and present practices in India of handling the sexual and reproductive life of mental retardates. Sterilization and segregation were once commonly practiced, but this is not recommended today. The new problems created by this approach are described. Guidelines for decisions about sterilization are presented. An individualistic approach, rather than a general one, is encouraged. Suggestions are made about adjusting the mentally retarded to the community. Recommendations are made for sex and marriage education.—R. S. Albin.

1478. Heilman, Kenneth M.; Watson, Robert T. & Schulman, Howard M. (U Florida, Medical School) **A unilateral memory defect.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jul), Vol 37(7), 790-793.—Several authors have suggested that arousal is an important component of learning. If the neglect syndrome is a unilateral defect of alerting (arousal) as recent studies have suggested, then patients with this syndrome should have a unilateral learning defect. To test these hypotheses, 8 patients with unilateral neglect were given consonant trigrams randomly to either ear and were asked to identify the auditory stimuli either immediately or after an 18-sec delay, during which time Ss were asked to count. All 8 Ss demonstrated that the number of errors between the delay and nondelay conditions was greater on the neglected side ( $p > .01$ ), thereby supporting these hypotheses. (32 ref)—*Journal abstract*.

1479. Holden, Edward A. & Appelbaum, Anat G. (Edward R. Johnstone Training & Research Ctr, Bordentown, NJ) **Effects of tone alternations on sequential information processed by educable retardates.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1107-1112.—16 educable retardates (mean age = 15.62 yrs; mean IQ = 60.31) reported pulse numerosity in varying length sequences under single- and alternating-tone conditions. It was hypothesized that due to anatomical differentiation greater frequency differences between the alternating tones would result in greater magnitudes of error. Ss made greater errors when

different tones were alternated than when the same tone was presented repetitively, but no significant differences were found between less disparate and more disparate alternating tones. Increases in error by retardates under the alternating tone conditions were predominantly underestimations. (20 ref)—*Journal abstract*.

1480. Hoyer, Frances W. & Cone, John D. (Hutchings Psychiatric Ctr, Syracuse, NY) **Child performance as a determinant of elderly caretaker behavior.** *Journal of Gerontology*, 1974(Sep), Vol 29(5), 534-542.—24 elderly female caretakers were observed interacting with their retarded foster grandchildren and were classified as permissive or restrictive according to frequency of commands during a 15-min structured play pretreatment assessment. Subsequently, each of the 24 caretaker-child pairs participated in a 10-min experimental task under 1 of 3 false feedback conditions concerning child performance on eye-hand coordination tests: correct, incorrect, or no feedback. A 15-min posttreatment assessment followed the task immediately, and pre-post comparisons were made on 5 behavior classes for both caretaker styles. For caretaker commands, a significant Caretaking Style  $\times$  Occasion interaction was obtained; permissive caretaker command frequencies remained stable from pre- to posttreatment, while restrictive caretaker command frequencies decreased markedly. There were no significant differential effects of the false feedback conditions for any behavior category. The failure to obtain specific treatment effects may be related to the operational definition of correctness used and to characteristics of the sample (e.g., caretaker age, caretaker cohort, and child ability level).—*Journal abstract*.

1481. Jackson, Erwin D. & Jackson, Roger L. (Western Illinois U) **Distribution of rewards by mentally retarded individuals in a cost and no-cost situation.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 77-82.—Examined how 50 male institutionalized severely mentally retarded adults divided rewards when they were placed in a cost and no-cost situation. The additional information of the amount of work completed by each member of the dyad was furnished. Ss at 3 different mental-age levels divided rewards in proportion to each member's work input. This style of distribution was used when rewards were divided between both themselves and a fictitious partner (cost) and between 2 other absent (actually fictitious) individuals (no cost). Results firmly support predictions made from equity theory.—*Journal abstract*.

1482. Jordan, John E.; Adis-Castro, Gonzalo & Zúñiga, Evenor. (Michigan State U) **[Construction of a crosscultural scale of attitude behaviors toward the mentally retarded on the basis of Guttman's facet theory.]** (Span) *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 1-24.—Constructed the Attitude-Behavior Scale: Mental Retardation (ABS-MR), a 5-facet, 6-level instrument based on Guttman's facet theory, to assess attitudes toward the mentally retarded. Attitude was defined as a "delimited totality of behavior with respect to something," each of the 6 levels or subscales of ABS-MR corresponding to 1 attitude so defined. For the purposes of test validation, ABS-MR was administered to 3 groups already known to differ with respect to attitudes toward the mentally retarded: primary school

teachers of British Honduras, candidates for an American MA degree in rehabilitation, and American students of education. Results support the utility of the facet-theory approach and the hypothesis of invariate cross-cultural structure of certain aspects of attitudes. Attitude behaviors were found to range from a cognitive-other-passive orientation to an affective-self-action orientation. (English summary) (61 ref)—*S. Slak*.

1483. Kryniski, Stanislaw, et al. (Ctr de Habilitação do APAE, São Paulo, Brazil) [The meowing cat syndrome: A multidisciplinary study of a case.] (Port) *Revista Brasileira de Deficiência Mental*, 1972(Mar), Vol 7(1), 23-34.—Examines the case of a severely retarded 8-yr-old boy from the psychiatric, physiological, genetic, and biological points of view. A detailed profile of this S is compared to 7 others exhibiting the meowing cat vocalization and to various scales of retardation. Specific criteria for diagnosing this syndrome are considered. (24 ref)—*N. T. Pinckney*.

1484. Lauten, Max H. & Birnbrauer, J. S. (U North Carolina, Chapel Hill) The efficacy of "right" as a function of its relationship with reinforcement. *Journal of Experimental Child Psychology*, 1974(Aug), Vol 18(1), 159-166.—Tested the effects of the relationship between the presentation of a verbal stimulus ("right") and an established reinforcer (candy) on the reinforcement efficacy of the verbal stimulus with 3 groups of 20 8-20 yr old retarded boys. Blocks of training and test trials alternated. During training of the discriminative group, "right" reliably preceded candy, and for the random group "right" and candy were programed independently. "Right" promoted learning in the discriminative group but did not in the latter 2 groups. Results support R. B. Cairns's analysis of the often found failure of approval to be an effective reinforcer in laboratory tests.—*Journal abstract*.

1485. Lei, Tzu-en-jen; Butler, Edgar W.; Rowitz, Louis & McAllister, Ronald J. (Neuropsychiatric Inst—Pacific State Hosp Research Group, Los Angeles, CA) Agency-labeled mentally retarded persons in a metropolitan area: An ecological study. *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 22-31.—Study results indicate that persons labeled mentally retarded by public agencies were predominantly the poor and/or ethnic minorities who lived in areas of deteriorated and older housing. Persons labeled mentally retarded by private clinical agencies were predominantly Anglo, middle- and upper-class, and resided in areas of better housing and neighborhood quality. (17 ref)

1486. Maksud, Michael G. & Hamilton, Lyle H. (U Wisconsin, Milwaukee) Physiological responses of EMR children to strenuous exercise. *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 32-38.—A battery of physiological tests administered to 62 10-13 yr old black and white educable mentally retarded boys resulted in no statistically significant physiological differences between the 2 racial groups. The maximal oxygen uptake for Ss appeared to be lower than data reported for nonretarded children; some rationale for this lower aerobic power is discussed. (24 ref)

1487. Miezieski, Charles M. (Rutgers State U, New Brunswick) Effect of white noise on the reaction time of mentally retarded subjects. *American Journal of Mental*

*Deficiency*, 1974(Jul), Vol 79(1), 39-43.—2 family retarded groups, a Down's syndrome group, and a nonretarded group (6 male and 6 female 17-19 yr olds in each) performed a simple visual reaction time (RT) task during white noise and no noise. It was predicted that via its arousing properties white noise would cause a decrease in RT for the family retarded group and an increase for the Down's syndrome Ss. The Down's syndrome group had slower RTs during white noise than no noise, whereas the other groups showed no differences. Data provide partial confirmation of an arousal hypothesis of mental retardation which, with respect to nonretarded persons, considers family retarded persons in a state of low arousal and Down's syndrome retarded persons in a state of high arousal. (17 ref)—*Journal abstract*.

1488. Moran, P. A. (Australian National U, Inst of Advanced Studies, Canberra, ACT) Are there two maternal age groups in Down's syndrome? *British Journal of Psychiatry*, 1974(May), Vol 124, 453-455.—While it has been shown that the age of mothers of Down's patients shows bitangentiality and occasionally bimodality, it does not necessarily follow that different causes are operating in the manner postulated by Penrose and Smith (1966). Older mothers have a higher rate of producing mongoloids, but further research is needed to decide whether there are 2 groups of causal factors or whether there may be some biochemical change that accelerates rapidly after the age of 30.—*R. L. Sulzer*.

1489. Mulhern, Thomas. (Albert P. Brewer Developmental Ctr, Mobile, AL) The problem oriented approach in clinics for the mentally retarded. *Training School Bulletin*, 1974(May), Vol 71(1), 49-51.—Presents a general description Ctr, Mobile, AL approach to medical records and endorses its application to the clinical records, IQ assignment, and consignment to institutions of the mentally retarded. This method is considered a means of further establishing the individual identity of clients and of insuring the appropriate attention to their particular difficulties.—*Journal abstract*.

1490. Neal, W. R. (U Georgia, Coll of Education) Verbal auditory screening with the educable mentally retarded. *Training School Bulletin*, 1974(May), Vol 71(1), 62-66.—Investigated the efficiency of the Verbal Auditory Screening for Children (VASC) compared to a pure-tone threshold test as a technique to identify hearing impairment among 97 6-15 yr old educable mentally retarded children. The VASC correctly identified 72.2% of the total Ss. Of the 36 Ss failed by the pure-tone threshold test, 75% were missed by the VASC. It is concluded that the VASC technique cannot identify all cases of hearing loss identified by a pure-tone threshold test when used with educable mentally retarded children.

1491. Peters, Edward N.; Pumphrey, Muriel W. & Flax, Norman. (New York State Dept of Mental Hygiene, Rochester) Comparison of retarded and nonretarded children on the dimensions of behavior in recreation groups. *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 87-94.—Placed 70 6-17 yr old educable mentally retarded (EMR) children in adult-led recreation groups of nonretarded children at a community center over a 4-yr period to investigate the extent to



which EMR children can participate in such groups. The 2 dimensions usually found in studies of child behavior were descriptive of the behavior of both the EMR and the nonretarded children. The EMR children scored lower on the dimension of Interest-Participation vs Apathy-Withdrawal than did the nonretarded children, but with some overlap of the distributions. No difference was found between EMR and other children on the dimension of Cooperation-Compliance vs Anger-Defiance. Individual differences in behavior of the EMR children on these dimensions were, in part, predictable and consistent over groups.—*Journal abstract.*

1492. Preston, Malcolm S.; Guthrie, John T. & Childs, Barton. (John F. Kennedy Inst, Baltimore, MD) **Visual evoked responses (VERs) in normal and disabled readers.** *Psychophysiology*, 1974(Jul), Vol 11(4), 452-457.—Investigated the possibility that reading disabled children exhibit abnormal visual evoked responses (VERs). Comparisons were made between a group of 9 9-yr-old disabled children and 2 control groups of 9 normal children each, one group matched on age and IQ, and the other on reading level and IQ. VERs were obtained for flashes of light and word stimuli. Results indicate that the reading disabled Ss showed a significantly smaller amplitude in the negative wave at 180 msec following stimulus onset, for an electrode placed in the region of the left angular gyrus, compared to the 2 control groups. All 3 groups showed significantly greater negative amplitudes at this latency for the word stimulus compared to the light flash. Results confirm earlier findings and suggest that a neurological origin of reading disability is likely.—*Journal abstract.*

1493. Rubin, Kenneth H. & Orr, R. Robert. (U Waterloo, Ontario, Canada) **Spatial egocentrism in nonretarded and retarded children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 95-97.—Examined the relation of chronological (CA) and mental (MA) ages to 2 spatial egocentrism tasks by comparing the performance of MA-matched nonretarded and retarded children, and CA-matched nonretarded and retarded children. 28 2nd graders, 30 6th graders, and 20 retarded children participated. Retarded children performed similarly to nonretarded Ss of the same MA but inferior to their nonretarded CA peers.—*Journal abstract.*

1494. San Martino, Mary & Newman, Morton B. (Mystic Valley Mental Health Ctr, Lexington, MA) **Siblings of retarded children: A population at risk.** *Child Psychiatry & Human Development*, 1974(Spr), Vol 4(3), 168-177.—Discusses guilt as a major factor underlying the symptoms of siblings of retarded children. The process of reparation is viewed as essential to the alleviation of guilt and anxiety and the assessment of the reparation efforts in diagnosis. Parental reaction to a retarded child is important as siblings develop fantasies and behavior as defenses against guilt and anxiety. 4 cases are presented to illustrate the ways families may deal with a retarded child.—*E. S. Goodman.*

1495. Silverman, Wayne P. (New York State Inst for Research in Mental Retardation, Staten Island) **High speed scanning of nonalphanumeric symbols in cultural-familially retarded and nonretarded children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 44-51.—Administered a task similar to that of S.

Sternberg (see PA, Vol 40:10810) to 36 2nd, 5th, and 8th graders and 12 retarded Ss (mean mental ages—MAs—9.9 yrs) with meaningless letter-like figures as the stimuli. Results show that performance increased with age for the nonretarded Ss. The retarded Ss performed above the level expected of their MA-matched nonretarded peers but below the level expected of nonretarded children of equal chronological age. Differences in group performance were due to "intercept" rather than "slope" differences in all instances. (16 ref)—*Journal abstract.*

1496. Sorel, F. M. (Mental Health Organization, Limburg, Netherlands) **Prevalences of mental retardation.** Tilburg, Netherlands: Tilburg U Press, 1974, vi, 148 p.—Discusses a specific study into the prevalence of mental retardation in Amsterdam, and presents a comparative, methodological analysis of 5 Dutch prevalence-studies and 12 studies from other countries. (5 p ref)

1497. Sperber, Richard D. (U. Connecticut) **Developmental changes in effects of spacing of trials in retardate discrimination learning and memory.** *Journal of Experimental Psychology*, 1974(Aug), Vol. 103(2), 204-210.—3-trial form discrimination problems were presented concurrently to 28 educable retardates (mean age = 18 yrs). The spacing interval separating Trials 1 and 2 was filled with either zero of 4 interpolated trials, while retention intervals between Trials 2 and 3 were zero interpolated trials, 8 interpolated trials, or 24 hr in length. Performance on all within-day retention tests was superior following massed presentations of Trials 1 and 2. Performance on test trials following 24-hr retention intervals showed a developmental trend; while a spacing interval facilitated long-term learning in more intelligent retardates (mental age > 7-8 yrs), the same interval proved detrimental to long-term learning in less intelligent retardates. Findings are discussed in reference to R. D. Sperber, D. B. Greenfield, and B. J. House's (1973) Markovian spacing model. The observed developmental change in the effects of spaced practice is interpreted as evidence that resistance to coding loss increases with intelligence.—*Journal abstract.*

1498. Stayton, Samuel E. & Ohwaki, Sonoko. (Oak Hill Youth Ctr, Laurel, MD) **Retardates' memory for contextually related words.** *Training School Bulletin*, 1974(May), Vol 71(1), 30-38.—Required 20 moderately and severely retarded Ss, with a mean chronological age of 25.2 yrs and a mean mental age of 6.2 yrs, to memorize a 20-word list composed of 4 categories, 5 words in each category. 2 categories contained words related to either an action or spatial context. The mean recall of these contextually related words was significantly greater than those in the remaining categories, which were words belonging to general classes. There was no evidence for facilitative effects of presenting words within the same category successively rather than randomly in the list of words to be recalled, which has been reported by previous researchers.—*Journal abstract.*

1499. VanderVeer, Beverly & Schweid, Edda. (U Washington) **Infant assessment: Stability of mental functioning in young retarded children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 1-4.—Administered the Bayley Scales of Infant Develop-

ment to 23 18-30 mo old patients suspected of being mentally retarded. Between 1 and 3 yrs later, these Ss were reevaluated using either the Bayley Scales of Infant Development or the Stanford-Binet Intelligence Scale. Of the 15 Ss initially found to be in the moderately-to-profoundly retarded range, 73% remained in that category at follow-up. None of the Ss initially functioning in any of the retarded ranges were normal at follow-up. Results are discussed in terms of the utility of the Bayley Scales of Infant Development in diagnosing mental retardation and the resistance to change of impaired intellectual ability. (18 ref)—*Journal abstract*.

1500. Weaver, Lelon A. & Ravaris, Charles L. (U Vermont) **Psychomotor test scores and rated functional impairment of mental retardates.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 487-490.—Administered a battery of 5 psychomotor tests to 258 retardates. Test results were used to assign Ss to mildly or moderately retarded categories. Comparison with the "functional" classification used by the training school showed agreement in  $\frac{1}{4}$  of the cases. Implications for clinical use and for mental dysfunction are discussed.—*Journal abstract*.

1501. Wiig, Elisabeth H. & Semel, Eleanor M. (Boston U) **Logico-grammatical sentence comprehension by adolescents with learning disabilities.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1331-1334.—Evaluated the comprehension of 50 logico-grammatical sentences by 30 12-16 yr old learning disabled adolescents. Performances were compared with data for normal age peers. Learning-disabled Ss exhibited quantitative reductions in comprehension. There were significant intercorrelations between performance and certain subtests of the Stanford Achievement Test and between age scores for the Psycholinguistic Age and Auditory Association and Auditory Association and Auditory Sequential Memory subtests of the Illinois Test of Psycholinguistic Abilities.—*Journal abstract*.

1502. Wilks, John & Wilks, Eileen. (Pembroke Coll, Oxford, England) **Bernard: Bringing up our mongol son.** London, England: Routledge & Kegan Paul, 1974. xv, 160 p.—Presents a detailed story, illustrated with photographs, of the development of physical and mental skills in a mongoloid boy from birth through his 14th yr. (7 p ref)

1503. Winters, John J.; Attlee, Leonard C. & Harvey, Frank. (Edward R. Johnstone Training & Research Ctr, Bordentown, NJ) **Paired-associate learning of EMR adolescents and nonretarded children as a function of methods of presentation and training.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 70-76.—32 nonretarded children and 64 noninstitutionalized and institutionalized retarded adolescents of equal mental age (7.9 yrs) learned an 8-pair list of pictures of common objects by the method of anticipation or the study-test method with or without training on each method. Overall, the study-test method was superior to the anticipation method for the 3 groups, and the hierarchy of efficient performance was nonretarded children, noninstitutionalized, and then institutionalized retarded adolescents. Preceiling analyses indicated that training was influential, but only with the institutionalized group. Differences in performance between methods are dis-

cussed in terms of relative confusability of the methods; differences among groups are attributed to the influence of training prior to ceiling performance and to differential verbal experiences prior to testing. (21 ref)—*Journal abstract*.

1504. Wolfensberger, Wolf & Kurtz, Richard A. (Syracuse U) **Use of retardation-related diagnostic and descriptive labels by parents of retarded children.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 131-142.—105 parents of retarded children completed checklists containing 57 terms used to describe mentally retarded persons, to assess their familiarity with and their reactions to these labels. Data suggest that parents have considerable difficulty in accepting any label for their own children, even terms which are relatively free of negative imagery. While practically all parents were familiar with the term "mental retardation," and while 93% indicated that the term is appropriate for the retarded in general, only 42% thought it appropriate for their own children. Findings also indicate that 2 forces operate in influencing parental reactions to retardation-related terms: the social desirability of a given term and the context in which the parents are asked to judge a label. Contrasting results from previous studies are discussed, and implications for counseling are examined. (43 ref)—*L. Gorsev*.

1505. Zachofsky, Toni; Reardon, Diane & O'Connor, Gail. (Neuropsychiatric Inst—Pacific State Hosp Research Group, Los Angeles, CA) **Response of institutionalized retarded adults to social pressure in small groups.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 10-15.—Studied responses to group pressure as related to sex and IQ of S and presence of an authority figure. Each member of 6 male and 6 female (IQ = 20-80; age = 20-50 yrs) 3-person groups was asked to report simple position judgments. Stimuli that the S member saw were inconspicuously shifted to conflict with the group's report. Results indicate (a) that IQ significantly affected yielding to group judgment, with lower IQ Ss yielding more often; and (b) that although neither sex of S nor presence of an authority figure affected yielding behavior significantly, males tended to yield more often than females. The relationship of IQ to the motivational variables of social reinforcement and achievement is discussed. (26 ref)—*Journal abstract*.

### Speech Disorders

1506. Heriot, James T.; Tavormina, Joseph B. & Vautrain, Robert L. (U Rochester, School of Medicine & Dentistry) **Correction factor for the PPVT as a reading test.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1098.—Presents a correction factor derived from regression analysis for using the Peabody Picture Vocabulary Test (PPVT) as a reading test. New correlations between the PPVT and the Wide Range Achievement Test are presented, and the usefulness of this modified PPVT as a substitute measure of oral reading for persons with expressive speech handicaps is noted.

1507. Kuper, Eolin C. (Johns Hopkins Hosp, Hearing & Speech Ctr, Baltimore, MD) **Speech training through musical ear-training for pitch deficient children having**



**articulatory defects.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 168-172.—Investigated whether training in musical interval recognition and rhythm can lead to improved articulation in speech-defective children. 19 8-13 yr old Ss, with articulation defects ranging from mild to severe, were matched for IQ and for pitch discrimination ability using the Kwalwasser-Dykema Tests of Musical Talent. Half of the Ss (experimental group) received musical training for 3 wks followed by 3 wks of standard speech-correction training. The remaining Ss (control group) received speech-correction training for the entire 6 wks. Speech was rated before and after training by having Ss read a standardized 175-word story. Both groups showed some improvement in speech articulation following training, and the equality of effects suggests that the musical training may have had as beneficial an effect on articulation as actual speech-correction training.—*M. B. Meikle.*

1508. **Okasha, Ahmed et al.** (Ain Shams U Hosp, Cairo, Egypt) **Electroencephalographic study of stammering.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 534-535.—Reports EEG data obtained from 54 6-12 yr old stammerers and 27 controls. Data suggest that neurological immaturity, low IQ, nonspecific EEG changes, and stammering are all part of a faulty developmental process which may be constitutionally determined but which are reinforced by environmental factors.

1509. **Okasha, Ahmed; Bishry, Z.; Kamel, M. & Hassan, A. H.** (Ain Shams U Hosp, Cairo, Egypt) **Psychosocial study of stammering in Egyptian children.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 531-533.—Obtained family history, neurological, personality, IQ, and verbal fluency data from 8,459 6-12 yr old Egyptian children, of whom 79 were stammerers. Results show that (a) the greatest number of stammerers were found in the 6-7 and 11-12 yr old groups, (b) at all ages there were more male than female stammerers, (c) emotional and physical precipitating factors were found in 18 cases, and (d) developmental delays were more common among stammerers than nonstammerers.

1510. **Rider, Barbara A.** (VA Hosp, Topeka, KS) **Abnormal postural reflexes in dysphasic children.** *American Journal of Occupational Therapy*, 1974(Jul), Vol 28(6), 351-353.—Tested the postural reflexes of 20 5-7 yr old children. The experimental Ss were 12 boys and 3 girls enrolled in speech therapy classes. No Ss with established neurological deficits or with observable motor problems were included in the study. The control group consisted of 4 boys and 1 girl with no speech defects. All Ss were enrolled in public schools. It was found that dysphasic Ss demonstrated significantly more abnormal reflex responses than nondysphasic Ss. 5 of the 15 dysphasic Ss were being treated for articulation problems only, while 10 were being treated for language disorders in addition to articulation problems. Ss who demonstrated language disorders had significantly more abnormal reflex responses than Ss who had only articulation problems. (16 ref)—*Journal abstract.*

1511. **Silverman, Ellen-Marie; Zimmer, Catherine H. & Silverman, Franklin H.** (Marquette U) **Variability of stutterers' speech disfluency: The menstrual cycle.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2),

1037-1038.—Studied whether women who stutter produce more speech disfluencies at premenstruation (when anxiety level has been reported highest) than at ovulation (when anxiety level has been reported lowest). 4 speech samples were collected from each of 4 Ss, one at ovulation and one at premenstruation for 2 consecutive cycles. Results show that Ss produced more disfluencies premenstrually.

### Physical & Toxic Disorders

1512. ———. **Coronary artery bypass operation: Psychological and medical problems.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 67-80.—Discusses relevant data and an interview with a patient who had undergone 2 coronary artery bypass procedures, with respect to his adaptation to the operation and his illness. The rehabilitation program is described.

1513. **Allen, David C.** (U. Houston, School of Optometry) **Vertical prism adaptation in anisometropes.** *American Journal of Optometry & Physiological Optics*, 1974(Apr), Vol. 51(4), 252-259.—To explore the phenomenon of prism adaptation, 20 anisometropic Ss with good binocular vision were examined at the reading level for the presence or absence of compensation to their induced vertical imbalance. Results show that the compensation was approximately equal to the prismatic imbalance and that there appeared to be a tendency for the compensation to lag behind the amount of prism generated for higher induced prism values. (21 ref)—*Journal abstract.*

1514. **Altamura, A. C. & Giordano, P. L.** (U Milan, Inst of Psychiatric Clinic, Italy) **[Neurochemical, immunological and ultrastructural aspects of experimental epilepsy: Critical review of actual data.]** (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 13-32.—Reviews the recent literature, pointing out especially that in considering the etiopathology of epilepsy as suggested by various experimental models, it is important to take into account the "dynamic" interaction among different pathological brain modifications. Such dynamic considerations do not exclude the existence of a main etiopathological event in the development of epileptic discharge, but it appears to be more important for the maintenance of electroclinical patterns of epilepsy. (110 ref)—*Journal summary.*

1515. **Aronow, Wilbert S. & Cassidy, John.** (VA Hosp, Cardiology Section, Long Beach, CA) **Effect of marihuana and placebo-marihuana smoking on angina pectoris.** *New England Journal of Medicine*, 1974(Jul), Vol 291(2), 65-67.—Evaluated the effect of smoking marihuana vs placebo marihuana on cardiovascular function and on exercise-induced angina in 10 patients with angina pectoris. With the S resting, smoking 1 marihuana cigarette (.05 mg of  $\Delta^9$ -tetrahydrocannabinol) increased the product of systolic blood pressure times heart rate and venous carboxyhemoglobin level and decreased the exercise time until angina 48%. Smoking 1 placebo marihuana cigarette increased the venous carboxyhemoglobin level, did not affect the product of systolic blood pressure times heart rate of resting Ss, and decreased the exercise time until angina 8.6%. Smoking marihuana significantly decreased the exercise time until angina more than smoking placebo marihuana ( $p < .001$ ).

Smoking marihuana probably increases the myocardial oxygen demand and decreases myocardial oxygen delivery, causing patients with angina to experience angina after exercise sooner, and with less work.—*Journal abstract.*

1516. **Aston, Carletta H.** (Mt Camel Guild, Hearing & Speech Diagnostic Ctr, Newark, NJ) **Hearing-impaired children's discrimination of filtered speech.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 162-167.—Tested the possibility that hearing-impaired children can learn to make compensatory use of durational and low-frequency cues in discrimination of phonemes. 10 severely hearing-impaired Ss (age 9-14 yrs) listened to taped lists of nonsense syllables (12 minimal pairs combined with /i/ or /a/). Half of the tapes were filtered to suppress frequencies above 700 Hz. Stimuli were presented at the most comfortable listening level (range, 108-126 db). Ss were given a form and instructed to circle the syllable they thought they heard. Tests for discrimination of filtered and unfiltered stimuli were given before and after training on 2 consecutive days. Training consisted of the same types of stimulus presentation, except that Ss were informed when their responses were correct. Results were analyzed in terms of Ss' ability to use place of articulation, manner of articulation, and presence or absence of nasality as discriminatory cues. Ss showed significant learning effects when minimal pairs involved differences in manner of articulation and presence or absence of nasality, but none when pairs differed only in place of articulation. Although all Ss could distinguish between the filtered and unfiltered speech, there was no difference in learning between the 2 conditions.—*M. B. Meikle.*

1517. **Azzi, Enzo.** (Santa Casa, School of Medical Sciences, São Paulo, Brazil) **[Occurrence of coronary disease: Psychological and sociocultural factors.]** (Port) *Revista de Psicologia Normal e Patológica*, 1970(Jul), Vol 16(3-4), 272-288.—Stresses that psychological factors and social conditions, as well as the physiological components usually considered, are important in coronary disease. Psychological stress, social stress, and the "coronary-prone" personality are discussed. (36 ref)—*N. T. Pinckney.*

1518. **Bartle, Stuart H. & Bishop, Louis F.** (Mount Sinai School of Medicine, City U New York) **Psychological study of patients with coronary heart disease with unexpectedly long survival and high level function.** *Psychosomatics*, 1974, Vol 15(2), 68-69.—Administered the Minnesota Multiphasic Personality Inventory (MMPI) to 18 patients with coronary heart disease who had unexpectedly survived long, despite grave prognosis, and a high level of function satisfactory to them. No elevation in various scales of MMPI was found. Denial was not seen.—*Journal abstract.*

1519. **Benton, Arthur L.; Levin, Harvey S. & Van Allen, Maurice W.** (U Iowa, Neurosensory Ctr) **Geographic orientation in patients with unilateral cerebral disease.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 183-191.—Studied the accuracy of geographic orientation in 50 patients with unilateral cerebral disease and 84 control patients without brain damage. The influence of educational background on performance

was also assessed. When educational background was controlled, the patients with brain disease performed more poorly than the controls on tasks requiring the localization of states and cities on a map of the US and on a verbal test requiring them to indicate the directional relations between places. Educational background showed both an overall influence on performance level and an interaction with diagnostic category, the less well educated patients with brain disease showing a larger difference from their controls than patients with better education. A "vector" score, reflecting a shift in localization toward the left or right part of the map, differentiated between patients with right and left hemisphere disease and suggested neglect of the visual field contralateral to the side of lesion in some of these patients. The relationship between directional bias in geographic orientation and unilateral neglect in simpler spatial localization tasks remains an open question. (French & German summaries)—*Journal abstract.*

1520. **Bergener, M.; Gerhard, L. & Husser, J.** (U. Düsseldorf, Psychiatric Clinic, W. Germany) **[Clinical and morphological investigations on familial old age hallucinosis.]** (Germ) *Nervenarzt*, 1972(Jan), Vol. 43(1), 18-33.—Discusses organic, endogenous, and multifactor origins of old age psychoses and possible connections between morphological findings and hallucinatory symptoms. A familial senile hallucinosis observed in 6 siblings of a family—3 with a fully developed disease, 2 with abortive symptoms, and 1 clinically healthy—is described, and the morphological findings on 2 of the 3 diseased Ss are presented and analyzed. (71 ref)—*T. Fisher.*

1521. **Berlá, Edward P.** (American Printing House for the Blind, Louisville, KY) **Tactual orientation performance of blind children in different grade levels.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 1-10.—Investigated the effects of stimulus complexity (3-, 4-, and 5-sided figures) and degree of rotation (90°, 180°, 270°) on tactual figural orientation performance, with 72 blind children in grades 2, 4, 6, and 8 as Ss. The overall performance was poor, but Ss in all grade levels were able to orient tactual figures at above-chance levels, and accuracy rose significantly as grade level increased. Complexity and degree of rotation had no effect on accuracy, but increasing complexity significantly increased task time. Differences in tactual search patterns appeared to be responsible for the differences in accuracy across grades. (15 ref)—*Journal abstract.*

1522. **Bethell, Martin F.** (South Western Regional Health Authority, Bristol, England) **A rare manifestation of fetishism.** *Archives of Sexual Behavior*, 1974(May), Vol 3(3), 301-302.—Presents a brief case report of a 20-yr-old male who exhibited infantile sexual behavior (e.g., dressing in a diaper, wearing a female wig, and sucking a bottle) associated with known brain damage. The patient suffered a right hemiplegia, caused by polyarteritis nodosa, at age 5, and had received steroid therapy from age 5-15.

1523. **Black, F. William.** (Fitzsimons Army Medical Ctr, Psychology Service, Denver, CO) **Cognitive effects of unilateral brain lesions secondary to penetrating missile wounds.** *Perceptual & Motor Skills*, 1974(Apr),



Vol 38(2), 387-391.—Examined the WAIS verbal and nonverbal subtest performance of 60 Ss with unilateral brain lesions secondary to penetrating missile wounds and compared it with that of 30 normal controls. The performance of matched right- and left-hemisphere lesioned Ss differed significantly on only 2 verbal measures and 1 nonverbal; however, all performance differences were in the direction hypothesized. The performance of right-hemisphere lesion and control Ss differed significantly on all measures, with consistently lower scores by brain-injured Ss, while the performance of left-hemisphere and control Ss differed significantly on the 3 verbal measures and WAIS Full Scale IQ. These results are in general agreement with previous reports using a similar research design and tend to support the hypothesis of differential impairment of verbal and nonverbal test performance in Ss with unilateral brain lesions.—*Journal abstract*.

1524. Blegvad, B. (State Hearing Ctr, U Hosp, Odense, Denmark) **Contralateral masking effect after transection of the efferent fibers to the cochlea.** *Scandinavian Audiology*, 1972(Sep), Vol 1(3), 115-118.—Examined the contralateral masking effect in a 55-yr-old female patient in whom, in all probability, the efferent fibers to the right cochlea had been severed. Masking of the left ear with white noise was found to influence the Békésy threshold curves obtained from the operated ear; a reduction of the tracing width was noted. The finding suggests that the effect of unilateral noise stimulation is due to central mechanisms rather than to an influence on the opposite cochlea, and that the anatomical substrate for a diminished tracing amplitude is not to be sought exclusively within the peripheral sense organ. (Danish summary)—*Journal abstract*.

1525. Boll, Thomas J. (U Virginia, Medical Ctr, Div of Child & Adolescent Psychiatry) **Right and left cerebral hemisphere damage and tactile perception: Performance of the ipsilateral and contralateral sides of the body.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 235-238.—60 patients with lateralized brain lesions were compared with respect to contralateral and ipsilateral tactile-perceptual difficulty as well as overall performance on such tasks. Results show that Ss with right hemisphere brain damage were more impaired on the contralateral and ipsilateral sides of the body than were Ss with lesions of the left hemisphere. Total errors were also greater in the right than in the left brain-damaged group. Findings suggest the right hemisphere is preeminent in subserving tactile perception on both sides of the body. (French & German summaries)—*Journal abstract*.

1526. Brooks, D. Neil. (Glasgow U, Southern General Hosp, Scotland) **Recognition memory, and head injury.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jul), Vol 37(7), 794-801.—Tested 34 severely head-injured adults on a recognition memory procedure involving the identification of 8 recurring shapes among a series of 160. Compared with a control group of 34 orthopedic outpatients, the tested patients showed many fewer correct responses. Their type of error was commonly a failure to recognize rather than a false recognition. The severity of the memory deficit was related to the length of posttraumatic amnesia (PTA) but not to the presence of neurological signs at the time of

memory testing or to the time after injury at which the patients were tested. The older patients showed a more significant relationship between PTA and memory score than the younger patients.—*Journal abstract*.

1527. Browne, Thomas R.; Penry, J. Kiffin; Porter, Roger J. & Dreifuss, Fritz E. (NIH, Bethesda, MD) **Responsiveness before, during, and after spike-wave paroxysms.** *Neurology*, 1974(Jul), Vol 24(7), 659-665.—In 26 5-20 yr old patients with absence seizures, 413 auditory reaction times were determined by a paroxysm detection device during 310 spike-wave paroxysms. All reaction times during the 1 sec before a paroxysm were within normal limits, but only 43% of reaction times at the onset of a paroxysm were normal, and after a delay of .5 sec into a paroxysm, only 20% were normal. After 4 sec of spike-wave discharge, 52% of reaction times were normal. Responsiveness was recovered quickly after a paroxysm. The degree of impairment of response to auditory stimuli markedly decreased when spike-wave discharge was fully generalized. The degree of maximal impairment of auditory responsiveness was the same in paroxysms of both long and short duration. Thus, any spike-wave paroxysm, regardless of duration, can impair consciousness, and therapy for absence seizures should aim at controlling all spike-wave paroxysms.—*Journal abstract*.

1528. Chen, Kathleen. (Rochester Inst of Technology) **Free recall learning of deaf and hearing subjects.** *Journal of General Psychology*, 1974(Jul), Vol 91(1), 155-156.—Found that normal-hearing Ss were superior to profoundly deaf Ss in learning free-recall lists of trigrams. The performance of Ss with lesser hearing loss was comparable to that of normal Ss. Differential performance depended on the level of trigram pronunciability, supporting the role of frequency of previous auditory experience in learning.

1529. Coet, Larry & Tindall, Robert C. (U Wyoming) **Definition of "handicap" as a function of age and sex.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1197-1192.—Male and female 17-81 yr old Ss ranked the 3 groups of people they felt would be labeled handicapped. Group differences were not significant but some sex and age differences on particular handicaps were marked. Results suggest that definitions of "handicap" may reflect societal values and age and sex of the person making the judgment.

1530. Cull, John G. & Hardy, Richard E. (Virginia Commonwealth U) **Language meaning (gender shaping) among blind and sighted students.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 275-276.—Administered the gender Association Survey to 22 blind and 64 sighted Ss. The groups differed significantly in assigning gender to 17 of 50 commonly used words.

1531. Daly, Richard F. & Matthews, Charles G. (U Wisconsin Hosp, Ctr for Health Sciences, Madison) **Impaired motor function in XYY males.** *Neurology*, 1974(Jul), Vol 24(7), 655-658.—10 13-56 yr old XYY males, most of whom are or have been in prison, showed a high frequency of hand tremor. Quantitative testing with a battery of coordination and steadiness tasks of 6 of these Ss showed impaired performance when compared with that of controls. These and previous data

suggest that XYY men in penal or mental institutions typically have impaired motor function. Socially unacceptable behavior may be another manifestation of their impaired brain function. Unexplained hand tremor in males is an indication for chromosome analysis.—*Journal abstract.*

1532. Davis, Floyd A.; Michael, Joel A. & Tomaszewski, Jerome S. (Rush-Presbyterian—St Luke's Medical Ctr, Chicago, IL) **Fluctuation of motor function in multiple sclerosis related to circadian temperature variations.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 33-36.

1533. Eliasson, Sven G.; Prenskey, Arthur L. & Hardin, William B. (Washington U) **Neurological pathophysiology.** New York, NY: Oxford University Press, 1974. xiii, 397 p.—Presents a series of studies which describe the pathological mechanisms behind clinical neurological disorders, including developmental disorders of the central nervous system; disturbances of autonomic and visceral function; trauma and demyelinating diseases of the nervous system; metabolic encephalopathies; and disorders of nerve and muscle, cortical function, cerebral circulation, and movement.

1534. Etchegoyhen de Lorenzo, Eloisa G. (National Council on Primary & Normal Teaching, Uruguay) **[Problems to be considered in the diagnosis of a child with minimum brain dysfunction.]** (Span) *Revista Brasileira de Deficiência Mental*, 1972(Mar), Vol 7(1), 11-17.—Describes the symptoms of minimum brain dysfunction and reviews research on diagnosis and the evaluation of intelligence of affected children. A program for special training and for family education is given, and an appendix presents a taxonomy of school behavior. (21 ref)

1535. Evans, N. J.; Baldwin, J. A. & Gath, Dennis. (Raddcliffe Infirmary, Oxford, England) **The incidence of cancer among in-patients with affective disorders.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 518-525.—Used data from the Oxford Record Linkage Study in an attempt to replicate the finding of T. A. Kerr et al (see PA, Vol 44:14921) that a characteristic form of depressive illness may be a precursor of cancer. 823 patients (10-85 yrs old) admitted to general or psychiatric hospitals during 1963-1964 with a principal diagnosis of depression were studied, and any hospital admissions or deaths were recorded for a standardized 4-yr follow-up period. As predicted from earlier studies, rates for deaths from natural causes and suicide were significantly higher than those for the background population. However, morbidity and mortality rates for malignant diseases diagnosed after the depressive illness were not above expected values. It is concluded that, although the hypothesized relationship is not disproved by the data, the findings of Kerr et al cannot be replicated using the Internal Classification of Diseases categories of affective disorder. (16 ref)—*Journal summary.*

1536. Gatehouse, R. Wayne & Cox, William. (U Guelph, Ontario, Canada) **Localization of sound by completely monaural deaf subjects.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 179-183.—Re-examined the ability of monaurally deaf Ss to localize sounds in space, using a very strict definition of "monaural deafness" (average hearing level for deaf ear, 87 db; for

good ear, 8 db). 8 monaural Ss and 8 normal-hearing Ss were tested in a 12 x 10 ft room. The sound source was a movable earphone which could be positioned at 1 of 40 different points on an imaginary 7-ft sphere surrounding S's head. Stimuli were white noise bursts (10/sec for 3 sec) at an average sound pressure level of 72 db measured at S's head. Ss were blindfolded during testing. Monaural Ss performed well above chance level on horizontal localization but no better than chance for vertical localization. Normal-hearing Ss performed better on both horizontal and vertical localization. The finding of good horizontal localization by monaural Ss contradicts the assumption that binaural processes (interaural phase, time, and/or intensity differences) are required in order to explain sound localization ability.—M. B. Meikle.

1537. Gianotti, Mariella & Pereira, Neide. **[Psychological approaches to the cerebral palsied child.]** (Port) *Revista Brasileira de Deficiência Mental*, 1972(Mar), Vol 7(1), 5-9.—Considers some of the effects of cerebral palsy on the perceptive, emotional, and especially the intellectual development of children. Evaluation of the intellectual level of cerebral palsied children is discussed. (English summary)

1538. Gordon, H. W. & Bogen, J. E. (Israel Inst of Technology, Aba Khoushy Medical School, Haifa) **Hemispheric lateralization of singing after intracarotid sodium amylobarbitone.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jun), Vol 37(6), 727-738.—Investigated hemispheric lateralization of singing in patients who had transient hemiplegia after intracarotid injection of sodium amylobarbitone. It was found that after right-carotid injection singing was markedly deficient, whereas speech remained relatively intact. Songs were sung in a monotone, devoid of correct pitch rendering; rhythm was much less affected. In contrast, singing was less disturbed than speech after left-carotid injection. These observations indicate a double dissociation; the right hemisphere contributed more for singing, whereas the left demonstrated its usual dominance for speech. A model is proposed that encompasses audible stimuli as well as tactual or visual stimuli in a scheme of functional lateralization wherein the right hemisphere specializes in processing a complete, time-independent stimulus configuration and the left in a series of successive, time-dependent units. (45 ref)—*Journal abstract.*

1539. Grant, I.; Kyle, G. C.; Teichman, A. & Mendels, J. (U California, San Diego) **Recent life events and diabetes in adults.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 121-128.—Studied fluctuations in diabetic condition and changes in life events in a group of 37 adult diabetic patients over a period of 8-18 mo. Evidence is presented suggestive of a relationship between life events, particularly "undesirable" ones, and changes in diabetic condition. (22 ref)—*Journal abstract.*

1540. Gunn, John. (U London, Inst of Psychiatry, England) **Social factors and epileptics in prison.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 509-517.—Obtained social class, occupational, and family background data from 158 epileptic prisoners, 66 hospitalized epileptics, and 180 nonepileptic prisoners. Data show that the epileptic prisoners exhibited a greater degree of depressive and suicidal pathology, especially in terms of



drinking behavior, than the other 2 groups, although all 3 groups shared several similar social characteristics. (16 ref)

1541. Hans, Michael A. (State U. New York, Albany) **Imagery and modality in paired-associate learning in the blind.** *Bulletin of the Psychonomic Society*, 1974(Jul), Vol. 4(1), 22-24.—13 congenitally blind Ss learned lists of 12 noun-noun word pairs in a paired-associates task, where the visual and auditory image-producing qualities of the stimulus and response terms of the pairs were varied. Performance on the paired-associates recall task was not affected by the imagery-producing quality of either the stimulus or response terms. However, the interaction of these qualities for the stimulus and response positions was significant, with Ss recalling more pairs when the imagery-producing qualities of the stimulus and response terms matched. Data are interpreted as a rejection of a modality-specific imagery hypothesis.—*Journal abstract.*

1542. Hartlage, Lawrence C. (Medical Coll Georgia, Atlanta) **Ten-year changes in attitudes toward different types of handicaps.** *Revista Interamericana de Psicologia*, 1974, Vol 8(1-2), 25-28.—Administered a questionnaire on employers' attitudes toward various types of handicapped workers to 1,220 employers in 1960 and to a 10% random sample ( $n = 122$ ) of employers in 1970 to check for any changes toward the handicapped in the last decade. The types of handicapped included amputees, mental retardates, former mental patients, juvenile delinquents, and epileptics. Attitudes were rated from favorable to unfavorable on a 5-point scale. Results indicate significant improvements in attitudes toward workers with physical or organic types of handicaps and nonsignificant improvements in attitudes toward workers with social or behavioral handicaps. The number of employers who had knowingly hired handicapped workers increased. (Spanish summary)—*S. Slak.*

1543. James, G. A. & Gill, J. M. (U. Nottingham, Blind Mobility Research Unit, England) **Mobility maps for the visually handicapped: A study of learning and retention of raised symbols.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 87-98.—25 visually handicapped children, 18 boys and 7 girls 7-17 yrs old, learned meanings of 14 tactual map symbols. 6 Ss did not reach learning criterion of 2 errorless trials. Retention, measured 3 wks later, showed 40.2% savings. Some symbols were learned with fewer errors than others. (19 ref)

1544. Jenkins, C. David; Rosenman, Ray H. & Zyzanski, Stephen J. (Boston U, Medical School, Div of Psychiatry) **Prediction of clinical coronary heart disease by a test for the coronary-prone behavior pattern.** *New England Journal of Medicine*, 1974(Jun), Vol 290(23), 1271-1275.—Results of a prospective study of 2,750 employed men who completed a computer-scored test questionnaire—the Jenkins Activity Survey—measuring the coronary-prone Type A behavior pattern show that high scorers had twice the incidence of new coronary heart disease as low scorers over a 4-yr period. Ss with different initial clinical manifestations of coronary disease did not differ in their Type A test scores. The double-blind design of these studies and the orderly relation of Type A scores to coronary-disease risk

suggest that the coronary-prone behavior pattern is prospectively linked to the pathogenesis of coronary heart disease. The findings indicate that the questionnaire used is a valid means of measuring some of the ways in which behavior contributes to coronary risk.—*Journal abstract.*

1545. Kelleher, Dennis E. (Yolo County Schools, Low Vision Program, Woodland, CA) **Educational background and considerations of low vision aids: Review of related literature.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 99-109.—Surveys general approaches to educating the visually impaired (residential school, itinerant approach, etc) and discusses development and use of bioptic glasses. (79 ref)

1546. Kinsman, Robert A.; Spector, Sheldon L.; Shucard, David W. & Luparello, Thomas J. (National Jewish Hosp & Research Ctr, Psychophysiology Research Lab, Denver, CO) **Observations on patterns of subjective symptomatology of acute asthma.** *Psychosomatic Medicine*, 1974(Mar), Vol 36(2), 129-143.—Notes that 5 symptom categories have previously been identified which describe the subjective symptoms experienced during asthma attacks: 2 mood symptom categories (panic-fear and irritability), describing affective states concomitant with asthma; 2 somatic symptom categories (hyperventilation-hypocapnia and airway obstruction) describing reports of more specific bodily symptoms; and fatigue, describing the reduced energy level accompanying asthma attacks. 15 patterns of asthma symptomatology based on reported frequency of the 5 symptom categories during asthma attacks were identified within a group of 51 male and 49 female 14-67 yr old inpatients with asthma. The relationships between scores on the individual symptom categories within patterns showed that (a) hyperventilation-hypocapnia symptoms were associated with generally high levels of the mood symptom categories, but not clearly related to the reported frequency of airway obstruction symptoms; (b) high fatigue symptom scores accompanied both high mood symptom and airway obstruction symptom category scores; and (c) high airway obstruction scores were not necessarily associated with high scores on the mood symptom categories. Ss who showed patterns with high mood symptom scores were prescribed higher steroid regimens upon discharge. Alternative explanations for the latter finding are discussed in some detail. (23 ref)—*Journal abstract.*

1547. Kirtley, Donald & Cannistraci, Katherine. (California State U, Fresno) **Dreams of the visually handicapped: Toward a normative approach.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 111-133.—Applied the Hall-Van de Castle system of quantitative content analysis to dreams of 7 visually handicapped Ss (5 adventitiously and 2 congenitally impaired) over a 2-4 mo period. There were wide individual differences between Ss (or groupings of Ss) and between the Ss and the normative groups on which the system is based. 5 factors are given particular attention: mobility, aggressive behavior, friendly interaction, self-perception, and perception of the physical environment. Conclusions are tentative because the sample was small. (15 ref)—*W. E. Collins.*

1548. Krant, Melvin J. **Dying and dignity: The meaning and control of a personal death.** Springfield, IL: Charles C Thomas, 1974. vii, 154 p.—Based on experiences with hospitalized terminal cancer patients, the author examines the possibility of achieving dignity and meaning in dying. Social and psychological characteristics of the dying experience are discussed, hospital and family practices in communication and support are reviewed, and issues surrounding euthanasia are considered.

1549. Kusumi, Yoshitaro & Prange, Arthur J. (U. North Carolina, Medical School, Chapel Hill) **Triple mosaicism of X-chromosomes with bipolar affective psychosis.** *Diseases of the Nervous System*, 1973(Feb), Vol. 34(2), 94-97.—Reports the case history of a 47-yr-old woman with bipolar affective disorder who was found to have triple mosaicism of X-chromosomes. Manic-depressive symptoms had been present intermittently for 22 yrs. Hereditary predisposition could not be identified. The possibility that the mosaicism of X-chromosomes may have predisposed the patient to affective psychosis is discussed. (43 ref)—*Journal summary*.

1550. Lackner, James R. (Brandeis U) **Observations on the speech processing capabilities of an amnesic patient: Several aspects of H. M.'s language function.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 199-207.—Reports that although the ability of a patient with severe amnesic syndrome to detect various kinds of linguistic ambiguity appeared essentially normal, his performance on a linguistic task involving the ongoing perceptual segmentation of speech was not normal. The constituent structure clause constituted the functional unit in his short-term for linguistic material. (French & German summaries)

1551. Lanyon, Richard & Giddings, John W. (Erich Lindermann Mental Health Center, Boston, Mass.) **Psychological approaches to myopia: A review.** *American Journal of Optometry & Physiological Optics*, 1974(Apr), Vol. 51(4), 271-281.—Reviews the literature on psychological or behavioral factors in the development and modification of myopia. A wide variety of topics in psychology are involved, and a number of potentially fruitful areas for further research are cited. With respect to the development of myopia, it is concluded that (a) axial length of the eyeball is a critical physiological variable; (b) heredity plays a definite though minor role; (c) there are personality and intellectual correlates of myopia; and (d) excessive visual near-work behavior is almost certainly a powerful, relevant factor. The demonstration of temporary changes in subjective acuity and refractive error by behavioral means supports a view of myopia as a behavioral-physiological disorder. (72 ref)—*Journal abstract*.

1552. Leisman, Gerald. (U Manchester, England) **The relationship between saccadic eye movements and the alpha rhythm in attentionally handicapped patients.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 209-218.—Investigated the relationship between electro-oculographic potentials (EOG) and the alpha rhythm in 36 spastic-hemiplegic Ss with attentional handicaps and in 28 normal controls. It was hypothesized that the alpha rhythm is temporally related to the EOG. Alpha rhythm

and the EOG were measured and experimentally varied by changes in illumination and by stabilized retinal image techniques. Results are consistent with the hypothesis and indicate that deviant patterns of scanning and fixation saccadic eye movements may be important components in attentional handicaps. (French & German summaries) (26 ref)—*Journal abstract*.

1553. Lucas, Alexander R. & Rodin, Ernst A. (Wayne State U., Medical School) **Electroencephalogram in Gilles de la Tourette's disease.** *Diseases of the Nervous System*, 1973(Feb), Vol. 34(2), 85-89.—Studied the EEGs of 18 children and adolescents with Gilles de la Tourette's disease, a syndrome involving generalized body tics, vocal tics, and coprolalia. EEG recordings were made during waking, sleeping, hyperventilation, and photic stimulation. 10 of the Ss manifested normal patterns, and 5 exhibited abnormal, nonspecific configurations. 2 patients showed generalized abnormalities. In none of the cases did surface EEGs show evidence of abnormal electrical activity during the occurrence of tics. Data support previous findings that there is no typical EEG pattern in patients with this disease. The possibility of a common metabolic aberration in the disease was supported by the finding that the disorder was transmitted from mother to son in 1 case. (16 ref)—*A. Olson*.

1554. MacDonald, Gregory. (Royal Danish School of Educational Studies, Inst. of General Psychology, Copenhagen) **The effect of retinitis pigmentosa on brightness and saturation under photic intermittency.** *American Journal of Optometry & Physiological Optics*, 1974(Apr), Vol. 51(4), 264-265.—Describes a study in which an observer with normal vision perceived brightness enhancement and desaturation when a visual target was presented intermittently. Another observer with retinitis pigmentosa (a degenerated scotopic system) saw brightness enhancement but was unable to detect desaturation under photic intermittency. Results suggest that desaturation involves a luminosity mechanism rather than, or as well as, a chromaticity mechanism.—*Journal abstract*.

1555. McManis, Donald L. & Roth, Gloria. (Eastern Washington State Coll) **Performance of brain-damaged and non-damaged retardates on the memory-for-designs.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 583-588.—Administered the Memory-for-Designs test to 20 brain-damaged and 20 nondamaged retardates matched for sex, IQ (57-83), and CA (20-51 yrs). 2 raters independently scored each protocol, with reliability between .93 and .97. Analysis of variance of pooled raw scores showed no significant variances for diagnostic category, sex, or their interaction. Diagnostic classifications by both raw and difference scores were nondiscriminating of brain-damaged from nondamaged Ss, reflecting 70% false positive rate for the nondamaged. Analysis of 3-point error scores showed significant variance for diagnostic category in the predicted direction. Classification by 3-point errors had accuracy levels of 80% for male and female nondamaged Ss, 70% for female brain-damaged Ss, but only 50% for male brain-damaged Ss.—*Journal abstract*.

1556. McManis, Donald L. & Roth, Gloria. (Eastern Washington State Coll, Child Development Ctr) **Social reinforcement effects on block design performance by**



**brain-damaged children of normal intelligence.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1059-1065.—12 male and 6 female 6-14 yr old cerebral palsied children of normal general intelligence (IQ range 80-127) were matched for IQ and WISC Block Design pretest performance accuracy and speed and assigned to experimental and control groups of 9 Ss each. Control Ss repeated the test under standardized conditions while experimental Ss received praise for each correct block placement on retesting. Experimental Ss decreased significantly ( $p < .05$ ), while control Ss increased slightly, in performance accuracy from pre- to posttest. Control Ss exceeded experimental Ss significantly in posttest but not pretest accuracy. Both groups showed nonsignificant increases in speed on the posttest. —*Journal abstract.*

1557. **McQ. Reynolds, Don & Jeeves, M. A.** (U St Andrews, Psychological Lab, Fife, Scotland) **Further studies of crossed and uncrossed pathway responding in callosal agenesis: Reply to Kinsbourne and Fisher.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 287-290.—Compared crossed and uncrossed response latencies to lateralized visual stimulation in an acallosal 12-yr-old girl. S's crossed pathway response latencies were significantly longer than the uncrossed latencies under a temporal stimulation 2-handed condition and a nasal stimulation single-handed condition. (French & German summaries)

1558. **Meads, Sue & McLemore, Thomas .** (US DHEW, National Ctr for Health Statistics, Div of Health Resources Utilization Statistics, Rockville, MD) **The National Ambulatory Medical Care Survey: Symptom classification.** *Vital and Health Statistics, Series 2*, 1974(May), No 63, 35 p.—Presents a classification specifically designed to code patients' expressions of their symptoms, complaints, and problems, as collected by the National Ambulatory Medical Care survey. The coding scheme consists of 197 rubrics grouped into 13 classes around an anatomical axis. (15 ref)

1559. **Naditch, M. P.** (Cornell U) **Locus of control, relative discontent and hypertension.** *Social Psychiatry*, 1974(Jul), Vol 9(3), 111-117.—Hypothesized, based on a means-end motivational framework, that the combination of high discontent and a perceived external locus of control would be related to hypertension. 408 21-45 yr old black men and women in 6 American cities, part of a national sample of urban blacks, were Ss. Discontent was measured by Cantril's Self-anchoring Striving Scale; locus of control was assessed with 4 items from Rotter's Internal-External Control Scale and 3 items used by Coleman et al in their 1966 study of educational opportunity. These measures were administered during the initial national sample survey, and blood pressure readings were taken during a 2nd interview. Results support the hypothesis for the entire sample and for men, but not for women when these were analyzed separately. (37 ref)—*Journal abstract.*

1560. **Paull, Andrew & Hislop, Ian G.** (Queen Elizabeth Hosp, Gastroenterology Unit, Woodville, South Australia) **Etiologic factors in ulcerative colitis: Birth, death and symbolic equivalents.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 57-64.—Documented the incidence of life crises before

the onset of symptoms in 50 patients with ulcerative colitis, and found it to be significantly higher than in a matched group of normal control Ss. The gain or loss of psychic object to the individual patient has been emphasized as relevant in the etiology of this illness. In 94% of the cases birth or death—actual, threatened, symbolic, or fantasied—had occurred within the 12 mo before the onset of illness. (24 ref)—*R. M. Cohen.*

1561. **Peel, Jennifer C.** (U Nottingham, Blind Mobility Research Unit, England) **Psychological aspects of long cane orientation training.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 159-186.—Presents a 4-part paper. Part 1 is a critique of psychological aspects of standard long-cane training. Part 2 reports an experiment which compared standard with alternative training techniques; qualitative but not quantitative differences were obtained. Part 3 describes an experiment to determine the ability of long-cane users to detect a drop below ground level; over half the Ss were able to detect a 4-cm drop 50% of the time and a 6-cm drop 80% of the time. Part 4 reports an experiment to determine the effect of augmented knowledge of results on the acquisition of skill in cane handling; Ss given only verbal instructions consistently overestimated the extent of the required cane movement and made generally larger errors than Ss who were given tactual knowledge of results or were trained by a response-restriction technique. (21 ref)—*W. E. Collins.*

1562. **Reimer, Donald R. & Nagaswami, Supramoney .** (Menninger School of Psychiatry, Topeka, KS) **Catatonic schizophrenia associated with cerebral arterial malformations and with membranous glomerulonephritis.** *Psychosomatics*, 1974, Vol 15(1), 39-40.—Presents 2 cases diagnosed as catatonic schizophrenia by board-certified psychiatrists. They were ultimately shown to have a diagnosis of organic brain dysfunction. Catatonic schizophrenia-like states have been described occurring with hyperparathyroidism, tuberous sclerosis, and akinetic mutism, and secondary to fluorides. Careful neurological and medical investigations of all patients presenting the clinical picture of catatonic schizophrenia is considered essential.—*A. S. Kulkarni.*

1563. **Richardson, Stephen A.; Ronald, Linda & Kleck, Robert E.** (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr, Yeshiva U) **The social status of handicapped and nonhandicapped boys in a camp setting.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 143-152.—Studied friendship and preference patterns of 193 8-13 yr old boys with and without physical handicaps who were attending a summer camp. The intensity of the social relations and the appearance of the disability were considered in analyzing the boys' interview responses. Visibly handicapped boys were the most socially disadvantaged, nonvisibly handicapped boys were in an intermediate position, and nonhandicapped boys had the highest social status. Nonvisibly handicapped boys were more positively evaluated by boys outside the primary social group than by those within. The need to closely examine the behavior patterns of these groups of boys and the relationship of behavior to social status among peers are discussed.—*Journal abstract.*

1564. **Ritter, Gerhard**. (U Göttingen, Neurological Clinic & Polyclinic, W Germany) [Epilepsy and social prejudice in the light of history.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 754-761.—Traces social prejudice toward epilepsy as depicted in medieval woodcuts and more modern paintings. Theological doctrines and social and political developments have always influenced the public image of the epileptic. Social prejudice has greatly receded since the discovery of anticonvulsants in the 1950s.—*K. J. Hartman*.

1565. **Robinson, Daniel N., & Berman, A. J.** (Georgetown U) **Biophysical assessments of diseases of involuntary movement.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1243-1247.—Describes some quantitative approaches to the study of diseases of involuntary movement based on data from simple tracking task in which the elasticity (*K*), electromagnetic damping (*B*), and inertia (*J*) of the control stick were systematically varied. 2 patients with Parkinson's disease, 2 with multiple sclerosis, and 1 with Huntington's chorea performed the tracking task; target velocities were either 5, 10, or 20 sec, and *K* was either 0, .024, or .042 lb/degree; *B* was 0, 5, or 10 v, and *J* was 0, 2, or 10 lb. Each S completed 3 trials at each combination of values over a 4-7 day period. Results show that patients with disease of involuntary movement do not respond similarly to spring, weight, and damping even when they exhibit essentially identical tremor rates and amplitudes.—*L. Gorsey*.

1566. **Sadoughi, W., & Bush, Irving M.** (Cook County Hosp, Div of Urology, Social Evaluation Clinic Section, Chicago, IL) **Urologic symptoms as a psychological crutch for underlying sex problems.** *Medical Aspects of Human Sexuality*, 1974(Jul), Vol 8(7), 130-143.—Based on the author's clinical observations, it is suggested that a strong emotional overlay is an integral part of many urologic disorders. This may occur in 3 situations in which either the patient experiences sexual difficulties because of the genito-urinary problem, the patient's inadequate sexual experience is a cause of the urologic complaint, or the sexual problems are increased by a lack of communication between physician and patient. It is recommended that physicians include sexual questions in history-taking to uncover the real problem. Suggestions for treating the most difficult patient of this type, the one who is convinced that his medical condition has caused his sexual inadequacy, are presented. Physicians should also be aware of the sexual effects of many common tranquilizers, hormones, or other medications prescribed for urologic conditions. Brief case illustrations are presented.—*L. Gorsey*.

1567. **Salonna, F., & Quaranta, A.** (U Bari, Italy) **Frequency discrimination under masking in normal and in pathological ears.** *Journal of Auditory Research*, 1972(Apr), Vol 12(2), 129-132.—Investigated the frequency difference limen (DL) at 2 kHz in 8 normal Ss and in 15 unilaterally hearing-impaired Ss (8 with Ménière's disease, 7 with sensorineural defects). Both the 2 kHz-standard tone and the test tones (slightly lower frequencies) were presented at 20 db sensation level (SL) with durations of .5 sec and interstimulus interval of 1 sec. In addition DLs were measured under 3 conditions

of masking: (a) with continuous homolateral white noise masking, both tone signals delivered at 20 db re the unmasked SL; (b) with the same masker, both tone signals at 20 db above their unmasked threshold; and (c) with continuous contralateral white noise at 30 db SL. Unmasked DLs for normal ears ranged from 4 to 20 Hz, while those for pathological ears ranged from 20 to 80 Hz. Masking condition (a) increased the DL in all Ss. Condition (b) did not alter the DL in normal Ss but in pathological ears produced results similar to condition (a). Condition (c) was very disruptive to frequency discrimination in all but 2 of the normal Ss but had no significant effect on DLs in the hearing-impaired.—*M. B. Meikle*.

1568. **Schechter, Paul J., & Henkin, Robert L.** (NIH, National Heart & Lung Inst, Bethesda, MD) **Abnormalities of taste and smell after head trauma.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jul), Vol 37(7), 802-810.—Studied abnormalities of taste and smell in 29 patients after head trauma. These abnormalities included decreased taste acuity (hypogeusia), a distortion of taste acuity (dysgeusia), decreased smell acuity (hyposmia), and a distortion of smell acuity (dysosmia). This syndrome can occur even after minimal head trauma and can begin months after the moment of injury. The patients exhibited a significant decrease ( $p > .001$ ) in total serum zinc concentration and a significant increase in total serum copper concentrations ( $p < .001$ ) compared with controls. It is noted that symptoms of hypogeusia, dysgeusia, and dysosmia are frequent sequelae of head injury and are important to the patients and to their care after trauma. (27 ref)—*Journal abstract*.

1569. **Shearn, Charles R., Berry, David F., & Fitzgibbons, David J.** (Inst of Living, Hartford, CT) **Usefulness of the Memory-for-Designs Test in assessing mild organic complications in psychiatric patients.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1099-1104.—Administered the Memory-for-Designs Test (MFD) to 3 matched groups of Ss aged 40 yrs or older: psychiatric patients suspected of organicity on initial clinical examination, patients not suspected of organicity, and nonhospitalized normals. No Ss had known brain damage. Patients suspected of organicity and normals differed significantly in mean MFD score. There were no other group differences. 4 mo later, the same patients were again classified as (currently) suspected or not suspected of organicity. Group means on the original MFD scores were compared. The reconstituted "suspected" group differed significantly from the other 2 groups, which did not differ from each other, suggesting that initial MFD score predicts more accurately later psychiatric classification than does initial psychiatric classification.—*Journal abstract*.

1570. **Smith, Eileen**. (National Hosp for Nervous Diseases, London, England) **Influence of site of impact on cognitive impairment persisting long after severe closed head injury.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Jun), Vol 37(6), 719-726.—Studied the cognitive abilities of 356 right-handed men who had sustained a severe closed head injury between 10 and 20 yrs earlier. Results show that a right-sided impact produced greater deficits than a left-sided impact in both



verbal and nonverbal skills. Results are interpreted as reflecting left-hemisphere damage due to contrecoup injury. Some evidence that a left frontal impact was apt to result in defective visual-spatial functioning is presented. These observations accord with some theories on the mechanics of head injury and with observations on the predictability of sites of cerebral contusion in brain injury uncomplicated by dural penetration, intracranial infection, or cerebral infarction. The roles of the duration of posttraumatic amnesia, the level of neurological responsiveness at the time of admission to hospital, and the age at which the injury was sustained are discussed. (39 ref)—*Journal abstract*.

1571. Spencer, Roger F. & Raft, David D. (U North Carolina, Medical School, Consultation Service, Chapel Hill) **Adaptation and defenses in hypopituitary dwarfs.** *Psychosomatics*, 1974, Vol 15(1), 35-38.—Presents 3 case histories. Little evidence was found to support the contention that pituitary deficiency results in a lowering of aggressive drive. Some persistence of grandiose fantasies, in preference to more active coping mechanisms, was observed. The formation of sexual and work identities was uncompleted in these patients.

1572. Stromberg, J. et al. (World Health Organization, Div of Strengthening of Health Services, Geneva, Switzerland) **Predicting participation in a screening examination for ischaemic heart disease risk factors: Experience from the Zagreb preliminary study.** *Social Science & Medicine*, 1974(May), Vol 8(5), 275-286.—Data from a study of 601 males in Zagreb, Yugoslavia, who were interviewed before they volunteered to participate in a screening examination for ischemic heart disease show that the item which most accurately predicted participation in the screening examination was one which directly assessed the S's willingness to have a thorough physical examination to determine his physical status. Health-related attitudes were not related to participation, and educational and occupational background were only slightly related to participation. (37 ref)

1573. Tumba, A. (U Louvain, Div of Human Genetics, Belgium) **[The anatomoclinical parameters of XXXY phenotype: Study of a case and review of the literature.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 233-255.—Presents a case study of a patient with a XXXY syndrome and compares findings in this individual with others reported in the literature. (Dutch, English, German, Italian & Spanish summaries) (2 p ref)

1574. Tuttle, Dean W. **A comparison of three reading media for the blind: Braille, normal recording, and compressed speech.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 217-230.—104 braille readers 14-21 yrs old took the Reading Versatility Test, Intermediate Level, in 3 equivalent forms: braille, normal recording, and compressed speech. Comprehension scores were the same for the 3 forms of presentation. Compressed speech was more efficient than normal speech, which in turn was more effective than braille. Braille reading took about twice as long as listening to normal speech and almost 3 times as long as listening to compressed speech. 4 classifications of Ss were identified on the basis of comprehension scores: high braille, high listeners; high braille, low

listeners; low braille, high listeners; low braille, low listeners. For each group, compressed speech was the most efficient medium. Compressed speech materials are recommended, but individual differences in ability to use them efficiently are noted. (140 ref)—*W. E. Collins*.

1575. Tuxen, I. (Vocational & Social Guidance Office for the Hard of Hearing, Copenhagen, Denmark) **Educational and vocational problems in adolescents with slight and medium loss of hearing.** *Scandinavian Audiology*, 1972(Sep), Vol 1(3), 111-114.—Notes that the occupational and social problems facing the slightly and moderately hard-of-hearing are often more or less ignored. However, experience shows that it is often necessary for this group to be supervised by experts who have up-to-date knowledge of the benefits available from the relevant social services and insight into the different occupational demands on hearing. Without such help young people with a hearing handicap may easily develop massive handicaps and fail because of their defective hearing. (Danish summary)—*Journal abstract*.

1576. Van Putten, Theodore & Menkes, John H. (U California, Medical School, Los Angeles) **Huntington's disease masquerading as chronic schizophrenia.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 54-56.—Presents 3 case histories of patients with Huntington's disease masquerading first as schizophrenia and then as schizophrenia with a phenothiazine-induced motor disorder. Such cases demonstrate the difficulties encountered in diagnosing Huntington's disease. It is suggested that complete family histories and careful neurological examinations be obtained before prescribing phenothiazine therapy for apparent schizophrenics. (21 ref)—*M. Oscar-Berman*.

1577. Ware, Colin & Mitchell, Donald E. (Dalhousie U, Halifax, Nova Scotia, Canada) **On interocular transfer of various visual aftereffects in normal and stereoblind observers.** *Vision Research*, 1974(Aug), Vol 14(8), 731-734.—Measured tilt, threshold-evaluation, and spiral-motion aftereffects in 2 strabismic and 2 normal Os. In contrast to normal Os, both strabismic Ss failed to show any appreciable interocular transfer in any of the 3 aftereffects, consistent with the suggestion that Ss without stereopsis lack binocular neurones. (24 ref)

1578. Warrington, Elizabeth K. & Baddeley, A. D. (National Hosp, London, England) **Amnesia and memory for visual location.** *Neuropsychologia*, 1974(Mar), Vol 12(2), 257-263.—Studied short-term memory (STM) and long-term memory (LTM) for visual stimuli not readily verbalizable in 7 amnesic patients and 6 neurological patients matched on age and IQ. Decay functions for recall of the location of a single dot stimulus over retention intervals of 1-60 sec were measured. Recall of the location of 5 randomly positioned dots after 10 learning trials was tested using a 2-min retention interval. It was found that the amnesic patients' performance was not significantly worse on the former task (the STM task) but showed a significant deficit on the latter (LTM) task. In addition, 3 patients with a selective impairment of auditory verbal STM were tested. Findings are discussed in relation to comparable tasks of verbal STM and LTM. (French & German summaries) (17 ref)—*Journal abstract*.

1579. Waxman, Stephen G. & Geschwind, Norman. (Harvard U, Medical School, Boston) **Hypergraphia in temporal lobe epilepsy.** *Neurology*, 1974(Jul), Vol 24(7), 629-636.—Describes the phenomenon of hypergraphia, or the tendency toward extensive and, in some cases, compulsive writing in temporal lobe epilepsy in 7 patients, in each of whom there was EEG evidence of a temporal lobe focus. Unusually detailed and strikingly copious writing was evidenced in each patient. 6 patients provided documentation of their extensive writing, which often was concerned with religious or moral issues. A 7th patient claimed to have written extensively, but refused to exhibit his writings. Aggressiveness, religiosity, and changes in sexual behavior in temporal lobe disorders have been described previously. The hypergraphia of temporal lobe epilepsy appears to be part of a specific behavioral syndrome of special interest because of its association with dysfunction at specific anatomic loci. (27 ref)—*Journal abstract.*

1580. Webb, Nancy C. **The use of myoelectric feedback in teaching facial expression to the blind.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 231-262.—Employed biofeedback to help 5 blind Ss gain skill in controlling facial muscles, thus producing facial expressions at will. Ss were provided with an auditory "mirror" of their facial activity by transducing myoelectric signals from facial muscles into sound. Expressions of happiness, surprise, and anger were defined by involvement of the zygomaticus, the frontalis, and the corrugator muscles, respectively. These muscles were connected through separate voltage-controlled oscillators to loudspeakers, each muscle activating a different speaker. Motion pictures of each S producing the 3 expressions before and after training were assembled in random order and were shown to preselected judges who attempted to identify the expressions. The judges were correct significantly more often on the posttraining expressions. Appropriateness and adequacy of expressions, as rated by the judges, also improved significantly as a result of training. (93 ref)—*Journal abstract.*

1581. Webb, Thomas E. & Oski, Frank A. (U Pennsylvania) **Behavioral status of young adolescents with iron deficiency anemia.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 153-156.—Teacher ratings on the Behavior Problems Checklist failed to discriminate male junior high school students with iron deficiency anemia from nonanemic students in terms of personality disturbances of inadequacy-immaturity. Consistently more conduct problems were reported for anemic students than for nonanemic controls, with a significant age factor also involved.

1582. Wunderlich, Ray C. **Allergy, brains, & children coping.** St Petersburg, FL: Johnny Reads, 1974. ix, 170 p. \$7(hardback), \$5(paper).—Considers the relationship between allergy, brain dysfunction, and coping with environmental tasks. The neuroallergic syndrome is discussed as a broad entity which frequently interferes with a child's coping ability and which requires communication and cooperation between parent, teacher, and physician to ensure the child's proper development.

## TREATMENT AND PREVENTION

1583. ———. Philadelphia's Center House: Inpatient treatment program for the "pre-skid-row man." *Alcohol Health & Research World*, 1973(Spring), Vol 1(1), 8-11.—Presents a short-term (4-mo) rehabilitation program combining social and vocational help for the "pre-skid-row" alcoholic. The major approaches are group therapy, part-time work assignments, encounter therapy, and antabuse medication.—H. J. Freudenberger.

1584. Barton, Anthony. (Duchesne U) **Three worlds of therapy: An existential-phenomenological study of the therapies of Freud, Jung, and Rogers.** Palo Alto, CA: National Press, 1974. x, 271 p. \$8.95(cloth), \$4.95(paper).—Describes the views of the patient held by Freud, Jung, and C. Rogers. The methods of psychoanalysis, Jungian therapy, and client-centered therapy are discussed, and the treatment received by 1 hypothetical client under each approach is used to illustrate these methods.

1585. Blum, Henrik L. (U California, Berkeley) **Planning for health: Development and application of social change theory.** New York, NY: Human Sciences Press, 1974. xvi, 622 p.—Applies planning theory to such basic health concerns as heredity, environmental factors, and behavior patterns. The environment for planning and the achievement and evaluation of the improvements desirable and obtained through planning are detailed.

1586. Coburn, David & Pope, Clyde R. (U Toronto, Ontario, Canada) **Socioeconomic status and preventive health behaviour.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 67-78.—Developed a predictive model for socioeconomic status (SES) and preventive health behavior which included variables relating to childhood socialization, social participation, work self-direction, work constraints, powerlessness-planfulness, and health knowledge. Together, education, age, income, and social participation (in that order) provided the most parsimonious set for predicting general preventive health behavior. (18 ref)

1587. Daniels, Robert S. (U Cincinnati) **Some observations about psychiatric services in the U.S.S.R.** *Hospital & Community Psychiatry*, 1974(Aug), Vol. 25(8), 533-535.—Reports observations made by the author during a trip to the USSR in 1972 on the Soviet system of psychiatric care, which emphasizes outpatient and day treatment as opposed to hospitalization. Workshops are widely used for severely disturbed patients.

1588. Foudraire, Jan. **Not made of wood: A psychiatrist discovers his own profession.** (Trans Hubert H. Hoskins). New York, NY: Macmillan, 1974. 414 p. \$9.95.—Presents an account of the author's discovery of how he could help people labeled as schizophrenic and of his subsequent rebellion against his training in psychiatry. The steps that led to his conclusion that psychotics and schizophrenics can teach us most about the human condition are described, and the theory that schizophrenia is an intricate defense system erected in response to a destructive social environment is presented, along with suggestions for new treatment methods for schizophrenics (e.g., open wards and expansion of the role of the paraprofessional).



1589. Kagan, Aubrey R. & Levi, Lennart. (World Health Organization, Div of Strengthening of Health Services, Geneva, Switzerland) **Health and environment—psychosocial stimuli: A review.** *Social Science & Medicine*, 1974(May), Vol 8(5), 225-241.—Describes a model of psychosocial factors and diseases in terms of 6 subsystems (psychosocial stimuli, psychobiological pattern, physiological mechanisms, precursors of disease, the disability of disease itself, and interacting mental or physical variables), and reviews the literature on the interrelationships of these 6 systems. The importance of monitoring and early appraisal of risk of disease from psychosocial factors and evaluating the effects of preventive health actions is discussed. It is concluded that the causation of disease by psychosocial stimuli is still unproven but remains at a high level of probability. The action of such stimuli on the mechanisms and precursors of disease is better understood, and there is some probability that interacting psychosocial factors and physical factors may prevent some diseases. Implications for health planning are discussed. (183 ref)—*Journal abstract.*

1590. Kraus, A. (U Heidelberg, Psychiatric Clinic, W Germany) [The relationship between sex role and sex body: A case history of psychosis after a sex change in congenital adrenogenital syndrome with pseudohermaphroditismus femininus.] (Germ) *Nervenarzt*, 1972(Feb), Vol 43(2), 78-88.—Describes the case of an S who, after a suicide attempt at age 19, had both ovaries removed and underwent testosterone treatment. Married 10 yrs later, he developed a psychosis after 9 yrs of marriage and committed suicide at age 41. The medical and psychological aspects are described in detail and analyzed in the light of contemporary intersex research and theory. The problems, techniques, and results of sex role change in pseudohermaphroditismus femininus are discussed. (40 ref)—*T. Fisher.*

1591. Lipton, Helen L. & Svarstad, Bonnie L. (Albert Einstein Coll of Medicine, Yeshiva U) **Parental expectations of a multi-disciplinary clinic for children with developmental disabilities.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 157-166.—Social scientists and health professionals have contended that consumer compliance with professional advice is related to the fulfillment of their expectations. The present study investigated this hypothesis by identifying the content of parental expectations of a diagnostic clinic for children so that in subsequent research these expectations could be related to the parents' subsequent attitudes and behavior. Data from 21 parents, regardless of socioeconomic status and ethnicity, lacked specific and firmly held expectations regarding the kinds of specialists, evaluations, and therapies they desired. Possible sources of this uncertainty, including exploration of parents' medical knowledge, perception of their role as health consumers, and the nature of their prior help-seeking experience were also studied in structured interviews with the parents. The issues and implications generated by these findings, particularly as they relate to the dynamics and outcomes of parent-professional interaction, are discussed.—*Journal abstract.*

1592. Macioszek, Gisela. (U Hamburg, Inst of Psychology, W Germany) [On delayed auditory feed-

back in stutterers with various levels of stuttering severity.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(4), 278-299.—Studied 72 12-15 yr old male stutterers, divided into 3 groups according to the severity of their affliction, and a control group of 24 nonstutterers. Ss were tested under conditions of synchronous and delayed (.17-sec) auditory feedback. 4 variations of volume intensity were used to produce a continuous increase in the blocking of bone conduction. The controls made the greatest number of mistakes under conditions of delayed feedback, and medium-severity stutterers made the fewest. All stutterers made at least the same number of mistakes under delayed feedback conditions as under synchronous feedback, and sometimes more mistakes, but never fewer. Blocking of bone conduction under conditions of delayed feedback did not by itself produce a decrease in the number of mistakes made by all stutterers. The changes in volume intensity caused the expected changes only in the case of light-severity stutterers; when the blocking of bone conduction was increased they made fewer mistakes. (English summary) (21 ref)—*T. Fisher.*

1593. Rabin, David L.; Kalimo, Esko & Mabry, John H. (Georgetown U. Medical School) **The World Health Organization international collaborative study of medical care utilization: A summary of methodological studies and preliminary findings.** *Social Science & Medicine*, 1974(May), Vol 8(5), 255-262.—Presents preliminary results from a household survey and assessment of characteristics of health service systems in 12 areas in 7 countries. Data indicate that there are similar health-related attitudes in various countries, that patterns of physician use vary according to location and the degree of urbanization, and that the availability of resources does not generally correlate with use. (18 ref)

1594. Seabra-Dinis, Tito. **Antipsychiatry—an ideology of confrontation: Its origins and significance.** *Foreign Psychiatry*, 1973-1974 (Win), Vol 2(4), 3-21.—Specifies problems and practices in psychiatry which gave rise to the antipsychiatric movement: the segregation and restraint of patients, their forced irresponsibility (entailing deprivation of human rights), denial of information, and the meagreness of funds available. The theoretical bases of antipsychiatry as presented by its various exponents in Europe and America are discussed, and its links with sociology, existentialism, and political thought are outlined. For the antipsychiatrist, "mental illness" is merely a label invented by society and the psychiatrist to control deviance; it is not the patient who needs treatment but the society against which he is struggling. Experiments which attempted to put antipsychiatric principles into practice are described, particularly those at Kingsley Hall in London. It is contended that the desire of the antipsychiatrists to "treat society" reflects poverty of thinking, oversimplification, and an outmoded political viewpoint.—*J. Davis.*

1595. Silverman, Franklin H. & Trotter, William D. (Marquette U) **Bibliography related to use of instrumental aids in stuttering therapy: Supplement 2.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1329-1330.—Presents a 41-item supplement to the author's bibliography (see PA, Vol 50:11869) of published and unpublished research reports and theoretical papers on

the influence of masking noise and rhythmic stimulation on stuttering.

1596. Sundberg, Norman D.; Tyler, Leona E. & Taplin, Julian R. (U Oregon) **Clinical psychology: Expanding horizons.** (2nd ed). New York, NY: Appleton-Century-Crofts, 1973. xix, 656 p.—Uses general systems theory as the organizing framework of this 2nd edition on the work of clinical psychologists. Major topics include the conceptual framework of clinical psychology, the design and implementation of improvement programs, and the professional development of the clinician. Suggested readings and research summaries are provided.

1597. Timsit, M. & Sabatier, J. (Medical Psychology & Psychosomatic Medicine Service, Liege, Belgium) [The use of computers in the psychiatric clinic.] (Fren) *Acta Psychiatrica Belgica*, 1973(Mar), Vol 73(2), 272-301.—Reports on procedures and results in the use of computers in psychiatric practice. Techniques and difficulties encountered in coding patient history data are described. Computer usefulness is demonstrated in some noteworthy correlations obtained from 733 cases. (Dutch, English, German, Italian & Spanish summaries) (19 ref)—E. Coché

1598. Travis, Terry A.; Noyes, Russell & Brightwell, Dennis R. (Southern Illinois U, Medical School) **The attitudes of physicians toward prolonging life.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 17-26.—Analyzes answers to a questionnaire sent to all Iowa physicians; 50% of the questionnaires were returned. Attitudes of the respondents toward omitting life-prolonging procedures, based on their experience with terminal patients, are discussed. Reported opinions also deal with the effect of sharing the decision about prolonging life and with social attitudes which would permit the physician to hasten death.—R. M. Cohen.

1599. Woody, Robert H. (Ohio U) **Forms of mental health consultation.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 283-285.—Mental health consultants who were trained in and identified with behavioral and process models reported differences regarding the form of consultation in which they practice and prefer to engage. It is concluded that consultation research should specify the form preferred and used by the consultant, and training in consultation should be tailored to these preferences.

### Psychotherapy & Psychotherapeutic Processes

1600. Adam, Wolfgang & Wendt, Harro. (Regional Neuropsychiatric Hosp, Uchtspringe, E Germany) [Dispensary treatment of outpatient schizophrenics.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 748-753.—Describes successful experience in dispensary treatment of schizophrenics. Length of stay and overutilization of hospital facilities were drastically reduced by providing low-cost outpatient treatment. The expression "psychiatry without a bed" has gained wider acceptance in Germany since 1967. Psychotic episodes are successfully controlled by medication supplied to outpatients on their regularly scheduled visits to the dispensary.—K. J. Hartman.

1601. Ahsen, Akhter. **Basic concepts in eidetic psychotherapy.** New York, NY: Brandon House, 1973.

xviii, 434 p.—Examines eidetic imagery, which differs from ordinary imagery in that it stands midway between imagination and physiological after-image. Since the eidetics circumvent the patient's prevalent intellectual resistances, they have an advantage over verbal approaches. Aspects of personality can be changed by a repeated process involving the deliberate projection of certain crucial eidetics until the affect associated with them is exhausted. In this manner aspects of the problematic experience, as well as unexpressed fantasies related to these experiences, can be undone. The areas of hysterias, psychosomatics, acute neurosis, and schizophrenias are covered.

1602. Allen, Robert D. & Wolfe, Thomas F. (California State U, Sacramento) **Psychotheatrics.** Sacramento, CA: Psychotheatrics, 1974. 72 p.—Describes a theory technique which combines the use of psychology and theater. Environmental, playwright, and spectator elements of psychotheatrics are discussed, the differences between psychodrama and psychotheatrics are outlined, and facilities and workshops are described. (23 ref)

1603. Ammon, Karin. (Free U Berlin, W Germany) [A contribution to the use of countertransference in psychoanalytic treatment.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(3), 138-150.—Discusses 2 views of countertransference. It can be seen either as a disturbing factor in the analytic process that should be eliminated or as a help in structuring the analytic situation. The active application of countertransference as a central function in therapy for patients with archaic ego-illnesses is illustrated by a description of the treatment of a borderline patient.—H. Bruml.

1604. Bach, Otto; Grüss, Ursula & Hirsch, Cornelia. (Karl Marx U, Psychiatric Clinic, Leipzig, E Germany) [Relationships between somato- and sociotherapy of endogenic psychoses.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 741-747.—Speculates regarding the correlation between socio- and somatherapeutic variables. Sociotherapies (e.g., group sessions, occupational therapy, and music therapy) have beneficial effects on endogenous psychoses such as depression and schizophrenia. Somatherapy, specifically medication, seems enhanced by being combined with sociotherapy.—K. J. Hartman.

1605. Barrett, Carol J.; Berg, Pamela I.; Eaton, Elaine M. & Pomeroy, E. Lisa. (U Southern California) **Implications of women's liberation and the future of psychotherapy.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 11-15.—Presents a brief review of personality theories and psychotherapeutic activities to point out how such theories and practices have contributed to the myth of the inferiority of women. Traditional therapy is portrayed as having served to bring woman to accept her oppressed condition rather than encouraging active striving toward self-satisfying goals. Recommendations include training to increase the awareness of sources of oppression in therapists, the education of more female therapists, and such things as assertion training for women and consciousness-raising groups.—C. P. McCreary.

1606. Barron, Jules. **Poetry and therapeutic communication: Nature and meaning of poetry.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr).



Vol 11(1), 87-92.—Suggests an analogy between poetry as a creative process and the communication that takes place in psychotherapy. Both processes represent man's efforts to express and integrate the deeper levels of the person. Psychopathology, e.g., schizophrenia, represents symbolic creations of unique personal meaning but the disturbed person is not able to experience his separateness without being threatened with loss of identity. Poetry may be helpful in communicating the therapist's understanding of the patient's unique struggles involving hope, despair, loneliness, life, and death. Poems that have contributed to communication are noted.—C. P. McCreary.

1607. Calhoun, Karen S.; Adams, Henry E. & Mitchell, Kevin M. (U Georgia) **Innovative treatment methods in psychopathology.** New York, NY: John Wiley & Sons, 1974. xii, 429 p. \$16.95.—Presents a collection of 9 theoretical and experimental papers on the treatment of specific psychopathological disorders, including stuttering, depression, sexual deviation, delinquency, alcoholism, psychophysiological problems, schizophrenia, and psychosomatic disorders.

1608. Cochrane, Carolyn T. (Family Service & Mental Health Ctr, Chicago Heights, IL) **Development of a measure of empathic communication.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 41-47.—Developed a measure of empathic communication and related it to a measure of empathic inference. Previous research had shown inconsistent relationships between these 2 approaches to measuring empathy. The newly devised measure for rating communication had 6 elements (internal, separation, accuracy, concrete, energy, and caring). 18 graduate students in psychology underwent therapy analogue procedure. An experienced therapist rated their responses according to a specified criterion for each element. R. Dymonds's Empathic Inference Index was also administered. Interrater reliability of the empathic communication measure was adequate and a negative relationship was found between this measure and empathic inference. Sex-type differences were noted. The 2 measures apparently reflect different processes.—C. P. McCreary.

1609. Coetzee, A. L. **Making your own personality: Human modelling: A new method in psychotherapy.** Pretoria, South Africa: J. L. Van Schaik, 1974. 222 p.—Describes the technique of human modeling, a method which can be used to overcome deadlocks in psychotherapy, in which the psychotherapist requires the patient to construct a person with his own identity, life experiences, problems, and expectations and then to help this "modeled" person to overcome his problems. Uses of the method for diagnosis and communication are described.

1610. Cox, Richard H. & Esau, Truman G. (United States International U, Program of Marriage, Family & Child Clinical Services) **Regressive therapy: Therapeutic regression of schizophrenic children, adolescents and young adults.** New York, NY: Brunner/Mazel, 1974. xiv, 154 p. \$8.50.

1611. Dlin, Barney M.; Stern, Andrew & Pollakoff, Steven J. (Temple U, Health Sciences Ctr) **Survivors of cardiac arrest: The first few days.** *Psychosomatics*, 1974, Vol 15(2), 61-67.—Discusses the psychological state of patients who have seemingly witnessed their own death.

Most of them recalled their hearts stopping. All were disturbed by the experience. A few continued to believe that they were dead after resuscitation. Such an experience requires psychiatric assistance as well as cooperation of the patient's family and attending medical staff. Patients could put fragmented memories into realistic perspective, thereby relieving the existent fear and confusion. (18 ref)—A. S. Kulkarni.

1612. Dolliver, Robert H. & Woodward, Bruce T. (U Missouri) **Giving and taking in psychotherapy.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 66-70.—Presents a theoretical discussion and review of the difficulties involved in "giving" and "taking" in therapy. Ethical questions about acting in the client's best interest; considerations of loss and gain for the client; and personality characteristics of therapists which influence the way they structure therapy relationships are identified as the major issues.—C. P. McCreary.

1613. Fink, Paul J. (Eastern Virginia Medical School, Norfolk) **Concern about variations in coital frequency.** *Medical Aspects of Human Sexuality*, 1974(Jun), Vol 8(6), 171-172.—Presents a brief guide for counseling patients who evidence a concern about the frequency of sexual intercourse. Specific attention should be directed to the specific complaint about frequency, the nature of the relationship, the intensity of the person's sexual drive, the kind of excuses given for not having sex, and the presence of a specific dysfunction (e.g., premature ejaculation).

1614. Fischer, Roland. (Maryland Psychiatric Research Ctr, Baltimore) **Visions, hallucinations, consciousness, hemispheres, symbols.** *Journal of Altered States of Consciousness*, 1974(Spr), Vol 1(2), 145-151.—The gradual transformation of perceptions into hallucinations (and dreams) on a continuum of increasing central nervous system arousal, impaired reality testing, and preferential right cerebral hemispheric activity is discussed as being relevant to both normal behavior and the realm of clinical psychiatry. The changing interpretation or meaning attached to the words *reality*, *vision*, and *hallucination* illuminates the significance of "vivid audiovisual imagery" in the (therapeutic) process of disintegration and rebirth through symbolic experiences. (23 ref)—*Journal abstract*.

1615. Gillum, Richard F. & Barsky, Arthur J. (National Heart & Lung Inst, Bethesda, MD) **Diagnosis and management of patient noncompliance.** *JAMA: Journal of the American Medical Association*, 1974(Jun), Vol 228(12), 1563-1567.—Considers that patient noncompliance with medical regimens is one of the major unsolved therapeutic problems confronting the medical profession today. Physicians have great difficulty identifying and dealing with noncompliers. A critical review of the literature is presented which indicates that the factors most consistently related to noncompliance are (a) psychological factors, (b) environmental and social factors, (c) characteristics of the therapeutic regimen, and (d) properties of the physician-patient interaction. Based on this information, a strategy for the improved diagnosis and management of noncompliance is feasible. (40 ref)—*Journal abstract*.

1616. Herz, Marvin I. et al. (New York State Psychiatric Inst, Washington Heights Community Serv-

ice, NY) **Individual versus group aftercare treatment.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 808-812.—Tested the relative efficacy of minimal individual contact vs group therapy, given an equal amount of therapist time allocated to each treatment. 144 aftercare patients were randomly assigned to either group or individual therapy conducted by 12 incoming 1st-yr residents. Results at the end of 1 yr showed no significant differences in outcome measures for either group. However, the therapists greatly preferred the group method, and the group patients seemed more enthusiastic about treatment. Greater use of group treatment in aftercare clinics is recommended.—*Journal abstract.*

1617. **Hobson, Robert F. Loneliness.** *Journal of Analytical Psychology*, 1974(Jan), Vol 19(1), 71-89.—Examines the following aspects of loneliness: psychotherapy, the difference between loneliness and aloneness, the language of loneliness, love and loneliness, and friendship and imagination. (26 ref)

1618. **Howells, J. G. & Townsend, D. Puppetry as a medium for play diagnosis.** *Child Psychiatry Quarterly*, 1973(Jan), Vol 6(1), 9-14.—Describes play diagnosis as the discovery through play of clinically interesting facts concerning a child's interpersonal relationships. In puppetry the child is able to present his own side of the picture freely instead of being limited to verbal expression, which he probably finds difficult. Puppets can be used both for diagnosis and as a medium of play therapy for the neurotic child. It is a way for the child to act out his fantasies and aggression through catharsis, and it provides a medium through which support can be offered. Relevant literature on play diagnosis is summarized and the establishment of a puppet theater is described. Case examples are provided.—*R. S. Albin.*

1619. **Kemper, Kattrin A. [Countertransference as the deciding factor in establishing communication with a 3-4 yr old girl.]** (Port) *Estudos de Psicanálise*, 1973, No 6, 21-32.—Records the unusual case of a World War II orphan abandoned in Berlin in 1945. The child, an autistic mute whose estimated age was 3-4 yrs, received psychotherapy utilizing maternal countertransference. A traumatic incident triggering uninhibited maternal emotions from the therapist brought about a breakthrough in verbal communication. Therapy terminated 10 mo later (total duration 16 mo) with typical age-level behavior. (English summary) (23 ref)—*N. T. Pinckney.*

1620. **Lenzner, Abraham S. Psychiatry in the coronary care unit.** *Psychosomatics*, 1974, Vol 15(2), 70-71.—Describes events and efforts leading to the unanimous passing of a resolution by the Academy of Psychosomatic Medicine proposing that a psychiatrist and a psychosocial team be an integral part of the Coronary Care Unit for every patient.

1621. **Levy, Linda L. (U Pennsylvania Hosp) Movement therapy for psychiatric patients.** *American Journal of Occupational Therapy*, 1974(Jul), Vol 28(6), 354-357.—Discusses the developmental approach to treatment of severely disorganized psychotic patients. It is postulated that these patients function at a primal learning stage in which learning takes place through movement, and that this primitive cognitive level must be

transcended before higher-level thought processes can evolve. Movement activities thus assume a role in the preliminary stages of psychiatric rehabilitation. Piaget's learning theory and S. Arieti's developmental postulates are cited.—*Journal abstract.*

1622. **Lopez, Agustin D. (U Oklahoma, Health Sciences Ctr, Oklahoma City) Reflections on psychotherapy.** *Biological Psychology Bulletin*, 1973(Dec), Vol 3(2), 68-74.—Deals broadly with the subject of psychotherapy, presenting a brief historical overview and conceptualization of the term, and a discussion of its current status and significance among other psychiatric directives. The use and misuse, indications and contraindications of this form of therapy are considered.—*Journal abstract.*

1623. **Markowitz, Irving. (Family Service & Child Guidance Ctr, Orange, NJ) The immorality of morality.** *Psychiatric Quarterly*, 1973, Vol 47(4), 559-570.—Considers that many human interactions which are inherently immoral masquerade as morality (e.g., polarization of power in a society; discriminatory religious, legal, and moral codes; control of wealth by families who gained it illegally; and the glorification of some forms of violence). It is argued that immorality also exists in those who deliver mental health services when they preach freedom but practice the "shrinking" of individuals to conform to the standards of an immoral society. True morality relates an individual fairly to his enemies as well as to his friends. Moreover, making all individuals in a society moral does not guarantee the morality of the whole society. It is suggested that the mentally healthy are those who can accept some alienation from the values of society. Psychotherapy must cease to support existing social norms and must support only that conformity necessary for self-preservation.—*B. McLean.*

1624. **McCabe, O. Lee. (Maryland Psychiatric Research Ctr, Baltimore) Psychedelic (LSD) psychotherapy: A case report.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 2-10.—Presents a case history illustrating how LSD-induced peak experiences are used as adjuncts to brief, intensive psychotherapy. A 20-yr-old hospitalized college student gave a phenomenological account of the effects of 2 high doses of LSD. Both clinical observations and psychometric assessment (Minnesota Multiphasic Personality Inventory) showed substantial improvement in the patient's functioning and outlook.—*C. P. McCreary.*

1625. **McDowell, David J. (U Maine, Orono) Ego-building in schizophrenia: Activity treatment of an acute psychotic patient.** *Bulletin of the Menninger Clinic*, 1974(May), Vol 38(3), 257-262.

1626. **Patterson, Lewis E. (Cleveland State U) The strange verbal world.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 95-101.—Discusses ways in which Ctr can be facilitated between white counselors and disadvantaged black students and how the search for equal opportunities for blacks has obscured the importance of individual development. Racist and nonracist modes of counseling behavior are described, and the necessity of eliminating the parent-child relationship between whites and blacks is stressed.



1627. Peles, Uri . (Long Island Jewish—Hillside Medical Ctr. New York, NY) **The extremely inhibited woman.** *Medical Aspects of Human Sexuality*, 1974(Jun), Vol 8(6), 41-52.—Presents a brief guide for physicians who counsel extremely inhibited women in the course of sex therapy, including suggestions for identifying her characteristic type of clothing, body language, and verbal behavior. 8 steps in an appropriate counseling procedure for these patients are described.

1628. Persons, Roy W.; Persons, Marilyn K. & Newmark, Irene . (Antioch Coll, Counseling Ctr) **Perceived helpful therapists' characteristics, client improvements, and sex of therapist and client.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 63-65.—Studied judgments of improved clients who were asked to list the helpful or nonhelpful characteristics of their paraprofessional therapists. Therapists and clients were undergraduates in their late teens and twenties. Women clients rated women therapists as more helpful while men were more responsive to male therapists.

1629. Rosenzweig, Stanley P. & Folman, Rina . (VA Outpatient Clinic, Boston, MA) **Patient and therapist variables affecting premature termination in group psychotherapy.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 76-79.—Contends that previous research has not examined premature termination sufficiently in a multidimensional design. Personality variables and demographic data of 26 male Veterans Administration patients were examined, and the judgments and attitudes of 2 male staff psychologists. Early terminators were defined as patients who left treatment before 16 wks. Education was the only demographic variable that differentiated the groups (remainders were more highly educated). Therapist attitudes and predictions were predictive, but psychological tests failed to differentiate remainders from terminators.—C. P. McCreary.

1630. Schulz, Clarence G. [The place of psychotherapy in the treatment of schizophrenic patients.] (Port) *Estudos de Psicanálise*, 1973, No 6, 9-20.—Summarizes the present situation regarding the treatment of schizophrenia resulting from changes over the past 20 yrs. These changes are of 2 kinds: those occurring outside of psychiatry—i.e., sociological, sociopolitical, and economic changes; and those occurring within psychiatry, including the advent of tranquilizing medications, changes in theory, and changes as a result of clinical observations. The main effect of the interaction of theory and clinical observation has been to emphasize psychotherapy as only 1 aspect of the total treatment of the patient. The development of self-differentiation and object—as conceptual tools in understanding some of the clinical phenomena, the importance of countertransference, and the need to use the patient's positive healthy capacities are discussed.—*Journal summary*.

1631. Snaith, R. P. (Stanley Royal Hosp, Wakefield, England) **A method of psychotherapy based on relaxation techniques.** *British Journal of Psychiatry*, 1974(May), Vol 124, 473-481.—Points out that since genuine therapeutic potential may be found in a variety of techniques with widely differing underlying assump-

tions, the psychotherapist needs to be conversant with many methods and the clinical indications for each. One cure will not fit all. A particular amalgam of behavior therapy, hypnosis, and autogenic training is described which may have diverse applications, as illustrated by 5 cases. The patient is given an explanation of his disorder that he can readily understand, and the process and plan of treatment are explained to him in broad outline. He is assigned an active role in treatment, often with planned exercises, and understands the role of the therapist. Before starting treatment, agreement is reached as to realistic and acceptable goals of symptom relief. It is stressed that confidence in what is being done is more important than minute attention to theory.—R. L. Sulzer.

1632. Steinkirchner, Albert V. **Self psychotherapy: I.** Venice, CA: Aquin, 1974. 159 p. \$1.95.—Presents a program of self-psychotherapy which is based on the technique of "spontaneous introspection," in which the images that appear across the "mind's eye" may be used to consciously relive and resolve conflicts that were formerly held in the unconscious memory. The development of this technique, the procedure of opening emotions, and the effects of self-psychotherapy on development and maturation are described. Both clinical cases and examples from the author's own experiences are included.

1633. Tyler, Leona E. (U Oregon) **Commonalities and distinctions between counseling and psychotherapy.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses academic, traditional, and practical bases for distinguishing counseling from psychotherapy. It is suggested that the movement to define all counseling as psychotherapy has had a beneficial effect upon training in that it has focused attention on the importance of the counselor-client relationship.

1634. Walker, Valerie . (Tavistock Clinic, London, England) **The word association sentence method as a predictor of psychotherapeutic outcome.** *British Journal of Social & Clinical Psychology*, 1974(Jun), Vol 13(2), 219-221.—Investigated whether scores on J. D. Sutherland and H. S. Gill's word association sentence (WAS) method could be used to predict the outcome of therapy for psychiatric clinic patients. Data from Sutherland and Gill's original study (1970) were reanalyzed to show that there was some correspondence between predictions of psychotherapeutic outcome based on psychiatric interviews and predictions based on WAS scores. 12 clinic therapists were then asked to designate patients they considered definite successes or failures, and WAS and Shipley-Institute of Living Scale for Measuring Intellectual Impairment scores from these patients were obtained. Scores of the success group were significantly more "normal" than of the failures; additional data indicate that WAS scores classified 90% of the Ss correctly. Scores of the success group were also significantly different from a nonpatient sample.—L. Gorsev.

1635. Weil, Pierre & Schützenberger, Anne A. [Philobacy, ocnophilia and intrauterine regression systems.] (Port) *Estudos de Psicanálise*, 1973, No 6, 57-76.—Compares M. Balint's concepts of philobacy

and ocnophilia with observations of the intrauterine and birth regression techniques. The "rock and roll" procedure identified with the Esalen Institute is considered to be a regression technique, and the "balance activity" involved repeats the 1st intrauterine ocnophil-objectal relationship in contrast to the child-mother umbilical unity, hypothesizing this as one of the possible origins of the schizophrenic split. (French & English summaries) (15 ref)—*N. T. Pinckney.*

1636. Weiner, Myron F. (U Texas, Southwestern Medical School, Dallas) **The psychotherapeutic impasse.** *Diseases of the Nervous System*, 1974(Jun), Vol 35(6), 258-261.—Discusses the causes of the psychotherapeutic impasse, in which the patient reaches a point of no progress or his psychological state worsens. An impasse can arise when the therapist's treatment goals differ from those of the patient, when the therapy prescribed is inappropriate, when there is failure of rapport, or when an antitherapeutic alliance arises. Countertransference, adverse transference reactions, and transference gratification can also stalemate therapy. For resolution, the cause of the impasse must be diagnosed and the appropriate treatment measure applied. Treatment measures include clarification, confrontation, interpretation, transfer, or some form of splitting the transference. Splitting of the transference is useful in the treatment of severely regressive transference reactions and allows for expression of the hostile feelings which were previously acted out or defended against by regression. Some impasse situations require consultation, ongoing supervision, or therapy for the therapist. —*Journal summary.*

1637. Wenegrat, Anne. **A factor analytic study of the Truax Accurate Empathy Scale.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 48-51.—Investigated the linguistic form of therapist responses in order to define the type of information criteria used by raters in producing Accurate Empathy (AE) scores. 268 tape segments from psychoanalytically oriented sessions conducted by 12 psychology interns with 30 adults were rated separately by 3 undergraduates trained in the use of the AE scale. Interrater  $r$  was .64. 60 tape segments were randomly selected from the total and scored on 22 additional measures of form. AE correlated most significantly with the number of responses in which the therapist makes a statement in a specific manner about the client's emotion. Results of a rotated factor analysis revealed that AE loaded heavily on a factor which seemed to reflect the therapist's assertiveness in approaching his client's emotions. Thus, it appears that raters using the AE scale focus on verbal indications of therapist assertiveness in dealing with client emotions. —*C. P. McCreary.*

1638. Wilson, William P. (Duke U., Medical Center) **Utilization of Christian beliefs in psychotherapy.** *Journal of Psychology & Theology*, 1974(Spr), Vol. 2(2), 125-131.—Past evidence has indicated that strong religious faith has had therapeutic effects on individuals suffering from a variety of problems. It is recommended that Christian beliefs should be used in therapy rather than being ignored or attacked. The treatment of 18 patients with the use of Christian maneuvers of commitment or rededication, confession (uncovering), forgiveness, and

fellowship to supplement conventional psychiatric methods is described. Symptomatic relief was obtained in 16 patients when Christian maneuvers were used. Previous therapy had been unsuccessful in 14 cases. —*Journal abstract.*

### Drug Therapy & Drug Rehabilitation

1639. ———. **Experiment at Coatesville: A study of drinking decisions in a treatment environment.** *Alcohol Health & Research World*, 1973(Spr), Vol 1(1), 14-17.—Conducted a 6-wk investigation with volunteer patients in a closed ward of a Veterans Administration hospital. During weeks 2-5 each patient could either be abstinent or drink 1 or 2 oz alcohol/hr for 12 hrs. The results of follow-up and criteria for determining the patients' self-images in their success or failure are presented.—*H. J. Freudenberger.*

1640. Akiskal, Hagop S.; Beard, James D.; Fink, Robert D. & Knott, David H. (U Tennessee, Medical School, Memphis) **Diuretic-antidepressant combination in alcoholic depressives: Preliminary findings.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 207-211.—6 patients suffering from primary affective illness and habitual excessive drinking, who had not responded to tricyclic antidepressant and/or electroconvulsive therapy, were treated with a combined diuretic-tricyclic (furosemide-amitriptyline) regimen. The Ss acted as their own control. 2 unipolar and 2 bipolar depressives had complete remissions, while the other 2 Ss with chronic depression showed symptomatic improvement. Implications of sodium retention for the pathogenesis of depression and alcoholism are discussed, and a hypothetical positive feedback system which maintains depression and alcoholism in alcoholic depressives is proposed. (37 ref)—*Journal abstract.*

1641. Amitai, M.; Dickhaut, H. H. & Hasenkopf, P. (Friedberg-Hessen District Burghof-Clinic & Sociopsychiatric Ctr, Bad Nauheim, W Germany) **[Treatment of the withdrawal syndrome of "fixers" (drug abuse by adolescents using injection).]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 157-160.—Tested the therapeutic possibilities of apomorphine for softening the withdrawal symptoms of 19 17-24 yr old drug-addicted fixers treated at the Nauheim clinic. The doses administered, the time and method of administration, results obtained, and side effects are described. Results of the therapy are said to be very positive, and the side effects—dizziness and vomiting—minor. After 7-8 days of treatment, the apomorphine can be gradually phased out and group-therapy treatment can be initiated. The new treatment method is encouraging and will be continued and expanded.—*T. Fisher.*

1642. Angrist, B.; Lee, H. K. & Gershon, S. (New York U, Medical Center) **The antagonism of amphetamine-induced symptomatology by a neuroleptic.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 817-819.—Haloperidol, a specific blocker of dopamine in the dose used (5 mg intramuscularly), was effective in antagonizing amphetamine-induced symptoms in 8 patients. This finding suggests that dopaminergic mechanisms play an important role in amphetamine psychosis and that these mechanisms may be important in other psychotic states.



1643. Appelt, M. & Floru, L. (Psychiatrische Universitätsklinik Düsseldorf, W Germany) [Clinical experiences with cyproterone acetate: Influence on sexuality.] (Germ) *International Pharmacopsychiatry*, 1974, Vol 9(2), 61-76.—Administered doses of 100-250 mg cyproterone acetate over a period of 6-18 mo to 18 patients suffering from oligophrenia, schizophrenia, or abnormal personality development. The rating scale was developed for the present study, and treatment was always performed with the consent of the patient or his guardian. Cyproterone acetate proved to be an efficient clinical, home, or ambulatory treatment, provided that the patient collaborated with it. Fear of punishment was the main cause why sexually abnormal oligophrenes took cyproterone acetate. Neurotic patients also showed a good response to the treatment. Encouraging results were noted in schizophrenics suffering from sexual delusions as the main symptomatology. (20 ref)—*English abstract*.
1644. Aung, Maung H. (U California, San Diego) **Electroencephalographic activation with methohexital in an epileptic population.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 246-248.—Presents a study which demonstrates that although methohexital is a safe agent, it is not an effective EEG activator for epileptics. The drug activated only 7% of epileptics with normal records or minimal and nonspecific EEG abnormalities and only 33.3% of epileptics who had previously demonstrated a specific paroxysmal epileptiform discharge in routine recording.
1645. Baloch, N. (Severalls Hosp, Colchester, England) **"Steroid psychosis": A case report.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 545-546.—Reports the case of a 41-yr-old man admitted to a psychiatric hospital exhibiting restlessness, hyperactivity, impaired attention, delusions of grandeur, visual and auditory hallucinations, and other symptoms of organic psychosis. 3 wks prior to admission, he had been taking prednisolone for rheumatoid arthritis. Treatment with chlorpromazine was effective in reducing the "psychosis" symptoms.
1646. Beumont, P. J. et al. (U Cape Town, South Africa) **The effects of phenothiazines on endocrine function: II. Effects in men and post-menopausal women.** *British Journal of Psychiatry*, 1974(May), Vol 124, 420-430.—Conducted a study of 12 schizophrenics on long-term treatment with psychotropic drugs which revealed increased plasma prolactin and suppressed plasma testosterone. It is concluded that the phenothiazines may have selective effects on the hypothalamus and on peripheral glands.
1647. Bender, A. Douglas. (Smith Kline & French Lab, Research & Development Div, Philadelphia, PA) **Pharmacodynamic principles of drug therapy in the aged.** *Journal of the American Geriatrics Society*, 1974(Jul), Vol 22(7), 296-303.—Indicated precautions to be taken when prescribing a therapeutic regimen for the elderly. With aging, functional changes occur in many of the systems that control the way a drug is metabolized and the response that it evokes. Apparently it is these changes which underlie the modified effect seen clinically in geriatric patients. Age tends to reduce and delay the absorption of substances from the gastrointestinal tract, impair and delay drug clearance and excretion by the kidneys, and reduce the rate of enzyme destruction. The plasma half-life of penicillin, digoxin, antipyrine, or phenylbutazone is extended significantly in the aged so that higher circulating concentrations are maintained for longer periods. Other age-related changes influence the effect of a drug once it has combined with its receptor. These include an altered number of receptor sites, a decrease in the transmitter content of affected tissues, an increase in the rigidity of responsive tissues, and an overall decline in homeostatic capability. (72 ref)—*Journal abstract*.
1648. Bergamasco, B.; Chiusano, M. & Asteggiano, G. (Agnelli State Hosp, Neuropsychiatric Div, Pinerolo, Italy) **[Retrospective investigation of treatment of endogenous depressions with Anafranil.]** (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 93-101.—Investigated the effects of Anafranil (chlorimipramine) treatment in 138 episodes of endogenous depression in 107 patients over a 2-yr period. Besides the known antidepressant effect in 84% of the Ss and an anti-anxiety effect in 80%, significant relationships were found between the improvement of depressive episodes and the combined treatment in hospital and at home, the type of follow-up therapy, and the dosage. No difference in improvement could be detected between Ss treated with Anafranil alone and those under combined Anafranil and electroshock therapy. Type, frequency, and severity of side effects were of the same order as those reported in the literature. The interval between depressive episodes, considered in 33 Ss, was not related to the type of depression, to the type of treatment, to dose schedule, or to association with electroshock.—*Journal summary*.
1649. Beumont, P. J. et al. (U Cape Town, South Africa) **The effects of phenothiazines on endocrine function: I. Patients with inappropriate lactation and amenorrhoea.** *British Journal of Psychiatry*, 1974(May), Vol 124, 413-419.—Demonstrated that clinical treatment with phenothiazines and related drugs affects circulating levels of various hormones. This would explain the inappropriate breast secretion and abnormalities of menstruation observed in 15 female psychiatric patients.
1650. Birkmayer, W. & Neumayer, E. (Ludwig Boltzman Inst for Neurochemistry, Vienna, Austria) **[The treatment of Dopa-psychoses with L-Tryptophan.]** (Germ) *Nervenarzt*, 1972(Feb), Vol 43(2), 76-78.—Discusses the levodopa treatment of parkinsonism and the most serious and frequent vegetative, motor, and psychic side effects. The transitory psychotic syndrome following levodopa treatment is described in great detail. 3 case histories are presented in which the psychotic side effects were successfully eliminated by the administration of levotryptophan. It is stated that the great usefulness of levotryptophan treatment of levodopa psychoses lies in the fact that it not only cures the psychotic phase but after the psychic recompensation has been accomplished it also enables the patient to continue with a combined levodopa plus levotryptophan treatment without suffering psychotic side effects.—*T. Fisher*.
1651. Block, C.; Borendal-Jansson, B. & Carlsson, C. (Lillhagen Mental Hosp, Sweden) **A double-blind cross-over comparison between clothiapine and diazepam in the treatment of mental symptoms in chronic alcoholics.** *International Journal of Clinical Pharmacology*,

*Therapy & Toxicology*, 1974(Jun), Vol 9(4), 321-325.—In a double-blind crossover study, clothiapine and diazepam were compared with regard to their effects on anxiety, tension, irritability, and depressive conditions in chronic alcoholics. The duration of treatment was 1 wk with each preparation. In a pilot study, patients were treated with 15 mg of clothiapine 3 times/day and 10 mg of diazepam 3 times/day. These dosages proved to be too high, causing tiredness. In the main trial, 12 patients received 15 mg of clothiapine and 10 mg of diazepam 2 times/day (medium dose) and 10 received 5 mg of both drugs 3 times/day (low dose). The results of global scores on a questionnaire showed that the majority of patients improved with both products. No significant differences between clothiapine and diazepam were observed, and there were no significant side effects.—*Journal abstract*.

1652. **Booker, Harold E.** (U Wisconsin, Ctr for Health Sciences, Epilepsy Ctr, Madison) **Clorazepate dipotassium in the treatment of intractable epilepsy.** *JAMA: Journal of the American Medical Association*, 1974(Jul), Vol 229(5), 552-555.—Administered clorazepate dipotassium to 59 patients whose epileptic seizures were intractable to treatment with standard antiepileptic drugs. Excellent results were obtained in 20 patients, principally those with generalized minor attacks. No benefit was seen in 14 patients with typical psychomotor attacks.

1653. **Burrows, Graham et al.** (U Melbourne, Royal Melbourne Hosp, Vic, Australia) **A sequential trial comparing two plasma levels of nortriptyline.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 21-23.—20 pairs of depressed patients matched for age, sex, and severity of depression were treated for 4 wks with nortriptyline so that plasma levels of below 49 ng/ml and above 140 ng/ml were obtained. Pairs of patients were compared with regard to improvement of depression, using a sequential skew restricted design. No significant difference between the 2 treatment regimes was found.—*Journal abstract*.

1654. **Butterworth, Alfred T. & Watts, Robert D.** (East Louisiana State Hosp, Jackson) **Double-blind comparison of thiothixene, trifluoperazine, and placebo in chronic alcoholism.** *Psychosomatics*, 1974, Vol 15(2), 85-87.—Reports improvements in anxious, depressive alcoholics on the Brief Psychiatric Rating Scale (BPRS), the Self-Rating Scale by R. S. Lipman and K. Rickels, W. W. K. Zung's Self-Rating Depression Scale, and Global Evaluation. The 2 active drugs and placebo showed significant pre- to postimprovement on the BPRS. Active drugs appeared superior to placebo on the Lipman-Rickels Scale but there was no significant difference between the 2 drugs. Placebo and thiothixene showed a significant pre- to postimprovement on the Zung Scale, but trifluoperazine did not. On Global Evaluation the drugs were not significantly superior to placebo.—*A. S. Kulkarni*.

1655. **Calderon Narvaez, Guillermo.** (National Autonomous U Mexico, Faculty of Medicine, Mexico City) **Psychiatric concepts in Aztec medicine contained in the 16th century Codex Badianus.** *Foreign Psychiatry*, 1973-1974(Win), Vol 2(4), 93-104.—Describes a manuscript containing information attributed to Aztec physicians, written after the Spanish conquest of Mexico.

Illustrations in color show medicinal plants, and the text describes their use in the treatment of "heat and cold in the head," fractured skull, the fatigue experienced by government administrators, "black blood" (melancholy), epilepsy, fear and faintheartedness, and mental stupor, as well as the narcotic and analgesic properties of some and their use in witchcraft. Remedies also included animal and mineral ingredients. Despite some magical elements, the manuscript gives evidence of a considerable degree of sophistication in medical matters (e.g., 2 forms of epilepsy were recognized which seem to conform to the modern types of petit mal and grand mal). Some of the herbs and treatments remain part of the folk medicine of Mexico today.—*I. Davis*.

1656. **Chase, Thomas N.** (NIH, Clinical Ctr, Neurology Unit, Bethesda, MD) **Fusaric acid in Parkinson's disease.** *Neurology*, 1974(Jul), Vol 24(7), 637-639.—Conducted a single-blind therapeutic trial of fusaric acid in 15 patients with idiopathic parkinsonism. At doses that appeared to modify the central metabolism of both norepinephrine and serotonin (600-1,000 mg), fusaric acid failed to alter the severity of parkinsonism in otherwise untreated patients and had no consistent effect on the ability of levodopa to ameliorate parkinsonian signs or to induce dyskinesias. (25 ref)

1657. **Cohen, Sidney & Dittman, Keith S.** (U California, Neuropsychiatric Inst, Los Angeles) **Gerovital H3 in the treatment of the depressed aging patient.** *Psychosomatics*, 1974, Vol 15(1), 15-19.—Treated 41 depressed, aging Ss showing lack of energy, impotence, insomnia, memory impairment, and pain and discomfort from chronic illnesses such as arthritis. Some were psychiatrically normal, 17 had psychiatric symptoms, and 7 were classified as medical. Dosage was 100-200 mg 3 times/wk intramuscularly for 4 wks, a total of 12 injections. Psychiatric interview, a mood scale, and a modified Zung depression scale were used to evaluate improvements. 85% of the Ss reported some improvement. Response was prompt and dramatic but it was mainly subjective. Most patients reported a greater sense of well-being and relaxation and slept better at night. Many obtained some relief of depression. Of the 9 cases showing hypercholesterolemia, 8 showed a lowering of blood cholesterol. Relief of chronic pain was reported by the medical patients suffering from arthritis, multiple sclerosis, Parkinson's disease, or Reiter's syndrome. In 1 case, muscular aches and lightheadedness were reported and in another, depression; both of these Ss were apprehensive and unhappy. 1 other S reported dry mouth.—*A. S. Kulkarni*.

1658. **DeFlaum, Robert B. & Boniface, Kay.** (Narcotics Addict Rehabilitation Act Program, Cincinnati, OH) **The role of a NARA counselor.** *Journal of Applied Rehabilitation Counseling*, 1974(Sum), Vol 5(2), 87-91.

—Discusses the multiple roles that a Narcotics Addict Rehabilitation Act (NARA) counselor must fulfill in relationship to his clients. Although these roles are largely positive (therapist, provider, and intermediary), certain negative (e.g., authority) components may result in an ambivalent counselor-client relationship.

1659. **Donlon, Patrick T. & Rada, Richard T.** (U California, Davis) **High dosage piperacetazine (Quide) in ambulatory schizophrenic patients: Therapeutic**



**efficacy and toxicity.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 231-236.—Notes that although indications for high-dosage neuroleptics have become increasingly more debatable with recent emphasis on outpatient community management of the severely ill schizophrenic patient, early studies suggest that high-dose neuroleptics have greater effectiveness with some schizophrenic patients while remaining low in toxicity. As part of the present rater-blind study, 16 patients with the diagnosis of either chronic undifferentiated or chronic paranoid schizophrenia were placed on a standard dose of piperacetazine following a washout period. The dosage was then gradually increased until the S achieved maximal effect with a minimum of side effects. 8 Ss required the standard dose (25-160 mg/day) while the remaining 8 required a high dose (160-400 mg/day). The 2 clinical groups were compared for therapeutic efficacy and toxicity. High-dose piperacetazine was found to be effective in 7 Ss refractory to low dosage. Although the incidence of side effects was higher with the high-dose Ss, toxicity (liver, blood, and renal) was not increased in Ss requiring high-dose medication. Indications for high-dose neuroleptics are briefly discussed. (17 ref)—*Journal summary*.

1660. **Donnelly, Edward F. & Chase, Thomas N.** (NIMH, Bethesda, MD) **Intellectual and memory function in parkinsonian and non-parkinsonian patients treated with L-dopa.** *Diseases of the Nervous System*, 1973(Feb), Vol 34(2), 119-123.—13 parkinsonian patients and 9 patients with other central nervous system disorders, hospitalized for therapeutic trials of levodopa, completed the Wechsler Adult Intelligence Scale and the Wechsler Memory Scale during an initial period of placebo administration and again after about 1 mo of drug treatment. There was a significant increase in Full Scale IQ, reflecting a marked rise in Performance IQ and a lesser gain in Verbal IQ. The memory quotient (MQ) was also substantially augmented. Psychological test results for the parkinsonian patients did not differ significantly from those obtained from the nonparkinsonian patients. Results from parkinsonian patients, retested a 2nd time after an average of 17 mo of continuous levodopa treatment, were similar to those found at the time of the 1st retest. No correlation could be discerned between degree of motor change and amount of IQ or MQ increment. Data support the contention that the influence of test-retest artifact cannot be excluded as the major determinant for the reported improvement in intellectual and memory functioning attending levodopa treatment. (15 ref)—*Journal summary*.

1661. **Flemenbaum, Abraham**. (Texas Tech U, Medical School) **Does lithium block the effects of amphetamine? A report of three cases.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 820-821.—Presents 3 reports supporting the hypothesis that lithium therapy inhibits the effect of amphetamine. It is suggested that the pharmacologic mechanisms of action of lithium and amphetamine are directly opposite and that lithium could be prophylactic for cases of amphetamine abuse.

1662. **Frances, Allen**. (Fort Jackson, Columbia, SC) **A comprehensive military drug and alcohol program.**

*International Journal of the Addictions*, 1974, Vol 9(1), 137-144.—Describes one of the US Army's drug and alcohol rehabilitation programs located at Fort Jackson, South Carolina. The physical plant, specific services, goals of rehabilitation, community relations programs, staff training, and rationale of the center are discussed, and comparisons with civilian drug abuse treatment facilities are presented.

1663. **Freeman, Joseph T.** **Some principles of medication in geriatrics.** *Journal of the American Geriatrics Society*, 1974(Jul), Vol 22(7), 289-295.—Discusses the special problems of medication of the elderly. Inappropriate and incorrect use of drugs is reflected in a higher percentage of untoward effects than with younger patients. Most reactions are identified readily but some are lost in the induced disturbances of physiologic balance that occur more readily in the aged. Improper dosage, injudicious methods of administration, and lack of awareness of drug interactions are common and are associated with failure to quantitate the reactive capacities of aging body resources. The paucity of didactic instruction and the difficulty for aged patients of observing a medical regimen add to the problems of therapy. Because aging alters drug effects and drug effects alter senescent functions, the physician must be familiar with confirmed pharmacologic data. Medication schedules must be in line with recognized levels of normality in senescence. These precautions will reduce the chances of initiating primary or sequential mishaps when drugs are administered to the elderly. (19 ref)—*Journal abstract*.

1664. **Glick, Burton S.** **Comparison of doxepin and thioridazine in outpatients.** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 37-39.

1665. **Gottheil, Edward; Crawford, Harold D. & Cornelison, Floyd S.** (Jefferson Medical Coll., Philadelphia, Pa.) **The alcoholic's ability to resist available alcohol.** *Diseases of the Nervous System*, 1973(Feb), Vol 34(2), 80-84.—Studied and treated volunteer alcoholic patients during a 4-wk experimental program where they could elect to drink 0, 1, or 2 oz of 80 proof ethyl alcohol each hour on the hour from 9:00 AM to 9:00 PM on Monday through Friday. Of 45 patients, 19 did not drink at all, 12 began drinking and stopped, and 14 drank throughout the program. Historical information and weekly scores on discomfort, sleep disturbance, self-esteem, and withdrawal of 4 cases who were able to stop drinking while on the program are described. There was little support for the concepts of "craving" or "loss of control." The patients did not drink all of the alcohol available, they voluntarily stopped drinking while others continued, and they did not show more discomfort, sleep disturbance, withdrawal, and lowered self-esteem after they stopped drinking. Observations during the program of drinking behavior in relation to interpersonal relationships and personality variables were more consistent with outcome at a 6-mo follow-up than were historical data or expressed motivation. (21 ref)—*Journal summary*.

1666. **Gram, Lars F.; Overo, Kerstin F. & Kirk, Lars**. (Psychochemistry Inst, Copenhagen, Denmark) **Influence of neuroleptics and benzodiazepines on metabolism of tricyclic antidepressants in man.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 863-866.

—Tested the pharmacokinetic interaction between benzodiazepines and nortriptyline in 54–60 yr old female schizophrenics. Each patient was tested during 2 series of 3 tests for 6 mo with neuroleptics, diazepam, and chlorthalidopoxide, and in a drug-free control period. Neuroleptics (haloperidol and perphenazine) caused changes indicating inhibition of metabolism of <sup>14</sup>C-nortriptyline. Neither of the 2 benzodiazepines caused a significant change in the pharmacokinetic measurements of <sup>14</sup>C-nortriptyline. In 21 male Wistar rats, the metabolism of <sup>14</sup>C-nortriptyline was inhibited by pretreatment with chlorthalidopoxide, but only when given in a dose of 60 mg/kg a short time before the administration of <sup>14</sup>C-nortriptyline. (16 ref)—*Journal abstract*.

1667. Greenblatt, David J.; Koch-Weser, Jan & Shader, Richard I. (Massachusetts General Hosp, Clinical Pharmacology Unit, Boston) **Multiple complications and death following protriptyline overdose.** *JAMA: Journal of the American Medical Association*, 1974(Jul), Vol 229(5), 556–557.—Presents the first published case of fatal protriptyline hydrochloride (Vivactyl) poisoning in a 28-yr-old man who had been taking the drug for depression. Complications included repetitive grand mal epileptic seizures, decreased body temperature, sinus tachycardia, and hypotension. Death occurred within 30 hrs after admission.

1668. Haase, H. J.; Floru, L. & Ulrich, F. (Psychiatrische Universitätsklinik Düsseldorf, W Germany) [A clinical-neuroleptic study of N-[(1-äthyl-pyrrolidin-2-yl)-methyl]-2-methoxy-5-sulfamoyl-benzamid-neuroleptikums sulpirid (Dogmatil) in acute schizophrenia cases.] (Germ) *International Pharmacopsychiatry*, 1974, Vol 9(2), 77–94.—Treated 26 acute, 1st-time, or repeatedly disordered schizophrenic patients with sulpiride in a psychiatric ward using a single-blind technique. Results show that sulpiride (200 mg/day) had a mood-clearing and stimulating effect. The average dose necessary to reach the neuroleptic threshold was 399 mg. An average dose of 593.3 mg daily produced, in an average time of 11.5 days, an evident antipsychotic effect. A good indication for sulpiride therapy seemed to be the inhibited and withdrawn patients, but the restless, highly productive psychotic cases also showed good results. Extrapyramidal side effects were slight and could easily be kept under control. Only a certain drowsiness after very high doses was registered. (25 ref)—*English abstract*.

1669. Hurtig, Howard L. & Dyson, William L. (U Pennsylvania) **Lithium toxicity enhanced by diuresis.** *New England Journal of Medicine*, 1974(Mar), Vol 290(13), 748–749.—Presents the case of a 72-yr-old manic depressive woman who showed lithium toxicity after years of successful lithium treatment, in support of the contention that it is important to adjust lithium carbonate dosage in patients whose sodium intake and excretion patterns change for some reason.

1670. Isenberg, Phillip L.; Mahnke, Mark W. & Shields, Walker E. (McLean Hosp, Outpatient Clinic, Belmont, MA) **Medication groups for continuing care.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 517–519.—Describes an outpatient clinic in a community setting which uses medication groups to monitor and improve the effectiveness of psychotropic drugs adminis-

tered to chronic patients with strong dependency needs. The functions of the psychiatric resident, staff nurse, intake team, and group members are discussed, and 3 case histories are presented.

1671. Jacobson, Gary; Baldessarini, Ross J. & Manschreck, Theo. (Massachusetts General Hosp, Eric Lindemann Mental Health Ctr, Boston) **Tardive and withdrawal dyskinesia associated with haloperidol.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 910–913.—Reports 4 cases of dyskinesia attributable to treatment with 4–20 mg of haloperidol daily for more than 1 yr. 2 cases involved temporary oral-facial dyskinesias and the others a more persistent complex mixture of neurological features. The possibility that tardive dyskinesia may be associated with the butyrophenones in addition to other antipsychotic agents should be considered. (29 ref)

1672. Kerry, R. J.; McDermott, C. M. & Orme, J. E. (Northern General Hosp, Sheffield, England) **Bromazepam, medazepam, chlorthalidopoxide in treatment of neurotic anxiety.** *British Journal of Psychiatry*, 1974(May), Vol 124, 485–486.—Evaluated a new benzodiazepine, bromazepam, used with outpatients. Such tests of new tranquilizers are difficult, often in the past having produced initial enthusiasm followed by disappointment. Results were highly variable between patients, suggesting that phobics may respond best to medazepam or bromazepam, while chlorthalidopoxide may be less successful.

1673. Klerman, Gerald L. (Harvard U, Medical School, Boston) **Pharmacotherapy of schizophrenia.** *Annual Review of Medicine*, 1974, Vol 25, 199–217.—Reviews classes of compounds currently used in the pharmacotherapy of schizophrenia. 3 are of major importance and are treated in detail: the phenothiazines, thioxanthenes, and butyrophenones, with the emphasis on the 1st group, since these compounds are the most numerous and most widely used. The general finding to date is that among the 3 major classes the therapeutic similarities are greater than the differences. Adverse effects of the drugs, their modes of action, and their effects on the extrapyramidal nervous system and dopamine metabolism are summarized. The prediction is made that although these drugs are only palliative, they will be used increasingly in years to come, with treatment shifting further from hospitals to the community. Greater evaluational and methodological sophistication is also forecast. (40 ref)—*B. Gurel*.

1674. Koufen, H. & Conbruch, Ursula. (U Freiburg, Psychiatric & Neuroclinic, W Germany) [Lithium intoxication: Study of 6 cases.] (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 145–152.—Examined the records of 846 patients who received lithium therapy, 1968–1971, to study the side effects of lithium intoxication. Only 14 Ss had excessive lithium levels and only 6 of the 14 (4 women and 2 men) had symptoms of acute intoxication with consciousness disturbances and amnesic intervals of 1–4 wks. In 5 of these cases lithium treatment had to be abandoned completely and in 1 decreased dosage was sufficient to eliminate the intoxication. After treatment and cure of the acute, delirious-soporific and hyperkinetic stages, there were no noticeable permanent side effects other than a temporary (up to 3 mo) syndrome in



combination with gradual normalization of the slowed-down basic EEG frequency. Only 1 S required a longer treatment for cerebral-ataxic disturbances. (43 ref)—*T. Fisher.*

1675. **Leuner, Hanscarl.** (U Göttingen, Psychiatric Clinic, W Germany) [**Acute psychiatric complications due to drug abuse, and their treatment.**] (*Germ Nervenarzt*, 1972(Mar), Vol 43(3), 142-145.—Reports on drug abuse by adolescents and the consequent acute toxic complications, posttoxic psychoses, and postpsychotic syndromes. The symptoms and their treatment are described. The treatment of these acute, mostly psychotic disturbances in juvenile drug abusers is reported to be relatively simple and the prognosis favorable. (16 ref)

1676. **Looney, Maryanne & Metcalf, Suzanne.** (Hall-Brooke Hosp, Westport, CT) **The "fatigue factor" in drug addiction: Insufficient motivation for treatment.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 528-530.—Describes the "fatigue factor," the physical and emotional exhaustion often reported by drug addicts as resulting from the pressures of their addiction. Although such internal motivation has been highly valued by psychotherapists, data from the authors' 2-yr experience in a drug treatment program suggests that it rarely leads to successful treatment unless it is supplemented by external pressures from families and the courts.

1677. **Malpas, Ann; Legg, N. J. & Scott, D. F.** (London Hosp, Medical Coll, England) **Effects of hypnotics on anxious patients.** *British Journal of Psychiatry*, 1974(May), Vol 124, 482-484.—Conducted tests to determine the persistence of effects from a 7-day course of hypnotic drugs. The EEG, digit symbol substitution and card sorting tasks, and ratings of symptoms using the visual analogue scale were repeated. Overall, the sedative effects seemed to be less persistent with these anxious female outpatients than with a previous group of normals. Patients consistently rated their symptoms worse than did the psychiatrist.—*R. L. Sulzer.*

1678. **Man, Pang L.** (Northville State Hosp, MI) **Long-term effects of haloperidol.** *Diseases of the Nervous System*, 1973(Feb), Vol 34(2), 113-118.—An attempt was made to evaluate the effectiveness of haloperidol in 64 acutely ill hospitalized psychotics and to determine the optimal dosage, incidence of side effects, control measures, and long-term effects. All patients were rated periodically with the Ward Behavior Rating Scale and the Brief Psychiatric Rating Scale and were interviewed daily to determine individual dosage adjustment. The starting dosage was 2 mg or 5 mg 3 times/day, and dosage was increased if the patient did not improve. Final dosages ranged from 2 mg to 145 mg daily. As a result of treatment, 59 patients were discharged. These Ss were followed-up for a 2-yr period in a haloperidol outpatient clinic. It was found that acute paranoid and manic patients improved considerably, whereas chronic patients improved less. Readmission rate over the 2 yrs was 17.3%. A positive relationship was found between the development of extrapyramidal symptoms and improvement. No abnormalities in blood chemistry or other laboratory tests were found.—*Journal summary.*

1679. **Maskin, Michael B.; Riklan, Manuel & Chabot, David.** (California State Coll, San Bernardino) **Effects of**

**"short-term" versus "long-term" L-dopa therapy in parkinsonism on critical flicker frequency.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 455-458.—Investigated short- and long-range effects of levodopa (L-dopa) therapy in parkinsonism on critical flicker frequency (CFF) scores. 3 equated groups, each of 15 Ss, were selected: short-term and long-term L-dopa patients and a control group. Binocular CFF thresholds were obtained twice for each S. The control group scored significantly higher on CFF than either of the L-dopa groups, indicating superior neural integration. The short-term L-dopa Ss scored significantly higher than the long-term Ss, demonstrating better cerebral efficiency. The evidence suggests that a peculiar clinical state interfering with neural transmission may develop in parkinsonian patients on L-dopa therapy prolonged 2 yrs or more.—*Journal abstract.*

1680. **Mauro, A. L. & Shapiro, M.** (Misericordia-Fordham Hosp, Bronx, NY) **A double-blind study to assess the efficacy of oral tilidine hydrochloride (W5759A) among a group of post-operative orthopedic and trauma patients.** *Current Therapeutic Research*, 1974(Jul), Vol 16(7), 725-733.—Administered a single oral dose of 50 mg tilidine to 25 hospitalized postoperative orthopedic and/or trauma patients experiencing moderate to severe pain. 24 additional patients were given a single dose of placebo and 26 others a single dose of 100 mg of meperidine. Analysis of data indicates tilidine analgesic activity in moderate to severe pain comparable to meperidine. Both drug groups showed a higher incidence of pain relief than with placebo, the greatest difference occurring  $\frac{1}{2}$  hr after medication. The difference between tilidine and placebo at  $\frac{1}{2}$  hr could be considered "possibly significant" ( $p < .06$ ). Principle side effects occurring in all groups were drowsiness, lightheadedness, and headaches. There were no significant differences between groups in terms of side effects, blood pressure, and pulse. There were no significant changes or trends in laboratory data.—*Journal abstract.*

1681. **Miller, Jerome S.; Sensenig, John & Raymond, Jonathan S.** (NIDA Clinical Research Ctr, Lexington, KY) **Value structure as a predictor of type of discharge among residential addicts.** *International Journal of the Addictions*, 1974, Vol 9(1), 127-136.—Compared scores on the Rokeach Value Survey among 125 addicts categorized as not suitable for treatment (NST) in a drug research and treatment clinic, 28 elopee addicts (i.e., those who independently chose to leave the program), 49 addicts not suitable for aftercare (NSAC), and 89 addicts suitable for aftercare (AC). The largest number of significantly differing values occurred between the NST and the AC groups; in general the AC group reported more concern with values related to self-understanding, inner direction, and task orientation, while the NST group was more concerned with values only superficially related to treatment (e.g., "polite," "clean," and "obedient"). There were no significant differences between the NST and NSAC groups. Data (a) indicate a definite progression from a hedonistic, carefree pattern of values among the NST and NSAC groups to a serious-minded, task-oriented pattern of values and priorities in the AC group; and (b) suggest the use of values assessment as predictors of addicts' response to treatment.—*L. Gorsej.*

1682. Moffett, Arthur D.; Bruce, James D. & Horvitz, Diana. (Medical Coll Pennsylvania, Section on Drug & Alcohol Abuse) **New ways of treating addicts.** *Social Work*, 1974(Jul), Vol 19(4), 389-396.—Discusses the need for redefining social work goals in treating drug addicts and bridging the "perceptual gap" between traditional treatment and the needs of the addicts. Eliminating the idea that rehabilitation is synonymous with abstinence and that reliance on a drug is incompatible with progress may be the first step in facilitating communication between social workers and addicts. Implications for social work training programs are discussed. (24 ref)
1683. Neff, N. H. & Yang, H. Y. (NIMH, St Elizabeths Hosp, Lab of Preclinical Pharmacology, Washington, DC) **Another look at the monoamine oxidases and the monoamine oxidase inhibitor drugs.** *Life Sciences*, 1974(Jun), Vol 14(11), 2061-2074.—Reviews the literature which discusses the possible mechanisms of action of monoamine oxidase (MAO) inhibitor drugs and the implications of these drugs for the treatment of hypertension and depression. The facts (a) that there are multiple forms of MAO which metabolize different amines and (b) that sympathetic neurons contain Type A enzyme, are essential factors to be considered in therapy. (60 ref)
1684. Ossofsky, Helen J. **Amenorrhea in endogenous depression.** *International Pharmacopsychiatry*, 1974, Vol 9(2), 100-108.—Details the cases of 5 patients in whom reproductive abnormalities and depression were both reversed with imipramine. It is noted that, although much clinical and experimental work lies ahead before the relationship of hypothalamic hormones and depression is understood, current research pertaining to hypothalamic releasing factors provides clues which fit well with both clinical observations and current theories regarding a neuroendocrinological pathogenesis of depression. It is suggested that gross menstrual irregularities in a healthy woman are often pathognomonic for endogenous depression. (15 ref) —*Journal abstract.*
1685. Pearce, Larry A. & Waterbury, L. David. (Wake Forest U, Bowman Gray School of Medicine) **L-methionine: A possible levodopa antagonist.** *Neurology*, 1974(Jul), Vol 24(7), 640-641.—Placed 14 patients under treatment with levodopa for idiopathic Parkinson's disease on a restricted methionine diet, 5 gm daily, for 8 days. Levomethionine, 1.5 gm 3 times/day, or placebo (lactose) was administered in a randomized, double-blind technique to 7 patients. 7 Ss on the low methionine regimen received placebo and 3 subjectively improved. 5 of 7 receiving a high methionine intake became worse. One patient exhibited a hypersexual, aggressive behavior without changes in clinical signs, and another became severely depressed. Patients regressed in gait, bradykinesia, tremor, and rigidity but returned to baseline when levomethionine was discontinued. One patient deteriorated rapidly to a state even worse than that before levodopa therapy. It is concluded that levomethionine may reverse the clinical effectiveness of levodopa in parkinsonism.—*Journal abstract.*
1686. Perkins, Richard & Hinton, John. (London Hosp, England) **Sedative or tranquilizer? A comparison of the hypnotic effects of chlordiazepoxide and amylobarbitone sodium.** *British Journal of Psychiatry*, 1974(May), Vol 124, 435-439.—At the doses at which the 2 drugs have been found equally effective in relieving anxiety, chlordiazepoxide was less effective than amylobarbitone sodium in promoting sleep. Moreover, increased dosage did not depress consciousness or reduce rapid eye movement sleep as would increased barbiturate doses. Earlier work has indicated overlapping actions of the drugs, barbiturates acting primarily in the reticular formation and benzodiazepines mainly in the hippocampus.—R. L. Sulzer.
1687. Raynes, A. E.; Climent, C.; Patch, V. D. & Ervin, F. (Boston Dept of Health and Hospitals, MA) **Factors related to imprisonment in female heroin addicts.** *International Journal of the Addictions*, 1974, Vol 9(1), 145-150.—Presents family history, demographic, drug use, and employment data for 46 female narcotics addicts currently at a Massachusetts correctional institution for drug-related offenses. Comparisons are made with data from 49 female addicts who voluntarily entered a hospital detoxification program.
1688. Rickels, Karl et al. (U Pennsylvania) **The Self-Rating Depression Scale (SDS) as a measure of psychotropic drug response.** *Diseases of the Nervous System*, 1973(Feb), Vol 34(2), 98-104.—Factor analysis of the SDS scores of 831 depressed outpatients yielded 4 factors: Retarded Depression, Anxious Depression, Appetite Disturbance, and Performance Difficulty. To assess the sensitivity of the newly derived SDS factors, data from 3 antidepressant drug studies with a total of 300 patients were subjected to analyses of covariance yielding main drug effects for (a) the SDS factors and total score and (b) the Physician Depression Scale (PDS) clusters and total score. In 2 of the 3 studies, the PDS proved more sensitive to drug effects than either the SDS factors or total score. In Study 3, however, the PDS was considerably less sensitive than the SDS, and main drug effects were particularly marked in the SDS Retarded Depression and Performance Difficulty factors. This discrepant result may have reflected the fact that a stimulatory agent (methylphenidate) was used in Study 3, whereas Studies 1 and 2 involved purely antidepressant agents (e.g., amitriptyline). In addition, Study 3 included only private practice patients; greater sensitivity of the SDS has previously been observed in private patients compared to clinic patients. It is hypothesized that patients in lower socioeconomic classes are likely to encounter reality-based and attitudinal obstacles to reporting change on health-oriented items. (16 ref) —*Journal summary.*
1689. Rickels, Karl & Downing, Robert W. (U Pennsylvania) **Predicting relief from anxiety with phenobarbital.** *Psychosomatics*, 1974, Vol 15(1), 30-34.—Compared placebo to phenobarbital in a 4-wk double-blind placebo controlled trial with 183 anxious, neurotic patients. Phenobarbital induced significantly more improvement than placebo. (18 ref)
1690. Roman, Yoram M.; Pinto, Michael & Gay, George R. (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Rites of passage: A ritual of detoxification.** *Journal of Altered States of Consciousness*, 1973(Fal), Vol 1(1), 81-92.—In the authors' extensive work with



heroin addicts, it was observed that the rituals associated with heroin became an integral part of the usage. A method of ritualistic detoxification through ceremonies called "rites of passage" is outlined. This method offers to the ritual-oriented addict a place and time where he can detoxify without any medication, but instead through special detoxification rituals designed to replace the heroin rituals. Participants undergo 6 days of rituals and ceremonies and simultaneous individual and group therapy.—*Journal abstract.*

1691. Ruben, Harvey L. (Connecticut Mental Health Ctr, New Haven) **Rehabilitation of drug and alcohol abusers in the U.S. Army.** *International Journal of the Addictions*, 1974, Vol 9(1), 41-55.—Reviews guidelines developed by the US Army for the establishment of rehabilitation programs for drug and alcohol abuse and methods of program evaluation. Various types of actual programs are described, including halfway houses, Alcoholics Anonymous groups, and groups based on behavior modification principles. It is concluded that civilian programs can benefit from the Army's experiences, because in spite of various difficulties, the programs have generally been successful.

1692. Rutigliano, G.; Chieppa, M. & Leonetti, S. (U Bari, Inst of Psychiatric Clinic, Italy) **[Comparison between the excretion curves of two lithium salts preparations: Carbonate and "slow release" sulphate.]** (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 77-92.—Studied 2 groups of 14 patients each, of both sexes and various ages. Higher concentrations of lithium serum persisted longer after ingestion of the sulphate than the carbonate. (32 ref)

1693. Saarma, J.; Saarma, M.; Sild, L. & Tikk, P. (Tartu State U, Lab of Psychopharmacology, USSR) **Effects of thiothixene upon the higher nervous activity in chronic schizophrenics.** *International Pharmacopsychiatry*, 1974, Vol 9(2), 109-117.—Used a battery of 6 tests reflecting higher nervous activity (HNA), and a psychiatric rating scale, to assess the clinical effects of thiothixene and its action upon HNA in 22 chronic schizophrenic inpatients (mean duration of the disease 9.6 yrs). 3 patients showed good results, and in 9 patients there was a moderate, clinical improvement. There was a marked improvement of the stability of excitatory process, of the equilibrium of excitatory and inhibitory processes, and of internal inhibitions in these patients. Some of the HNA parameters reflecting the intensity of trans marginal inhibition were of prognostic value. (26 ref)—*Journal abstract.*

1694. Salvadorini, F.; Saba, P.; Galeone, F. & Tognetti, G. (Volterra Interprovincial Psychiatric Hosp, Pisa, Italy) **[Gonadotropic anterior pituitary activity in subjects with mongolism (Langdon-Down syndrome).]** (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 73-76.—Employed 5 male mongoloids 18-42 yrs old as Ss in a study of the bioanthropologic deficit that accompanies the clinical picture of the Langdon-Down syndrome. Gonadotropic activity was investigated by the radio-immunologic method in blood samples taken in the morning and at various intervals after the administration of levodopa. It is concluded from this small sample that the gonadotropic anterior pituitary hypofunction is not

an essential and constant element of the Langdon-Down syndrome. (15 ref)—*M. J. Stanford.*

1695. Savage, Charles; McCabe, O. Lee; Kurland, Albert A. & Hanlon, Thomas. (VA Hosp, Baltimore, MD) **LSD-assisted psychotherapy in the treatment of severe chronic neurosis.** *Journal of Altered States of Consciousness*, 1973(Fal), Vol 1(1), 31-47.—Assessed the overall effectiveness of LSD therapy vs conventional institutional treatment of 96 chronic, severe neurotics. Within the LSD model, the relative effectiveness of a high vs low dose administration was also assessed. Data suggest that LSD therapy, particularly that involving high dose, had a superior short-term impact over conventional treatment in terms of objective adjustment criteria. Except for certain sex-dosage factors, differential long-term effects were either negligible or inconclusive. (40 ref)—*Journal abstract.*

1696. Sbarbaro, V. (Main General Hosp, Neurological Div, Verona, Italy) **[Electroclinical effects of taurine in some epileptic patients: Preliminary results.]** (Ital) *Acta Neurologica*, 1974(Jan), Vol 29(1), 33-37.—Followed up the research by Derouaux, Puil, and Naquet with patients with different forms of epilepsy. 13 Ss were given 300 mg/kg of taurine by phlebotomy and 7 received 100 mg/kg daily. EEG results, clinical data, and subjective reports by the patients were used to evaluate treatment effects. Because of the preliminary nature of the results no statistical analysis was attempted. Although it is believed that taurine is effective, particularly in generalized photosensitive epilepsy and temporal epilepsy, it would be premature to speak of it as an antiepileptic drug.—*M. J. Stanford.*

1697. Serafetinides, E. A.; Willis, D. & Clark, M. L. (VA Hosp, Brentwood, CA) **The EEG effects of zinc in geriatric psychiatric patients.** *International Pharmacopsychiatry*, 1974, Vol 9(2), 95-99.—Conducted EEG studies in 24 geriatric psychiatric inpatients who participated in a double-blind, placebo-controlled trial of zinc. It was found that medication as such was associated with no obvious EEG differences. On the other hand, patients could be differentiated on the basis of slow rhythms present. Great abundance of slow EEG rhythms was associated with mental deterioration of an organic type, whereas better-scoring patients had more normal-looking EEGs.—*Journal abstract.*

1698. Silsby, Harry & Tennant, Forest S. **Short-term, ambulatory detoxification of opiate addicts using methadone.** *International Journal of the Addictions*, 1974, Vol 9(1), 167-170.—21 young opiate addicts entered an ambulatory, low-dose methadone detoxification program which lasted 7 days. 8 (38%) did not successfully complete detoxification. At the end of 6 mo only 2 (9.5%) addicts were free of opiate drugs. The high relapse rate indicates that this procedure should only be attempted with selected, motivated individuals.

1699. Spring, Carl; Greenberg, Lawrence; Scott, Jimmy & Hopwood, John. (U California, Davis) **Electrodermal activity in hyperactive boys who are methylphenidate responders.** *Psychophysiology*, 1974(Jul), Vol 11(4), 436-442.—Randomly divided 9-10 yr old hyperactive males into 2 groups. In Group 1 ( $n = 18$ ) methylphenidate was withheld for 72 hrs before testing. 20 Ss in Group 2 continued to take their

usual daily doses of methylphenidate. 20 normal matched controls formed Group 3. Electrodermal measures (i.e., basal resistance, frequency of nonspecific responses, specific response amplitude to an auditory signal, and number of trials to habituation) were taken. Normal and off-drug groups differed significantly on specific response amplitude and trials to habituation, and difference in nonspecific responses approached significance. Off-drug and on-drug hyperactive groups differed significantly on frequency of nonspecific responses, and difference in trials to habituation approached significance. These differences indicate lower reactivity in the off-drug hyperactive group.—*Journal abstract.*

1700. Vista Hill Psychiatric Foundation. (San Diego, CA) **Alternatives to adolescent drug abuse.** *Drug Abuse & Alcoholism Newsletter*, 1974(May), Vol 3(3), 4 p.

—Considers that the selection of appropriate alternative activities in drug rehabilitation requires the individual's active participation and meaningful interest in, and attraction to, these activities. Several psychological alternatives to the drug experience are described, including physical, sensory, psychological, and interpersonal awareness; learning; aesthetic appreciation; and social and political activism. It is stressed that successful alternatives will not be accomplished by a passive, spectator-type involvement. Alternative options can be used early to prevent heavy involvement in drugs as well as later to offer the person a new life-style or more varied leisure opportunities.—*Journal summary.*

1701. Vista Hill Psychiatric Foundation. (San Diego, CA) **Heroin maintenance: A solution or a problem?** *Drug Abuse & Alcoholism Newsletter*, 1974(Jul), Vol 3(4), 4 p.—Discusses arguments for and against heroin maintenance programs (i.e., providing or administering heroin to long-term addicts who have been failures in other treatment programs). Several different perspectives on this issue are noted, including those of legislators, drug treatment facility administrators, and those who believe that a person has a right to take whatever drug he wishes. The British system of heroin maintenance is described, and data which indicate that it has not been successful in reducing the number of addicts or the number of illicit drug sales are presented. Possible indications for a heroin maintenance program are considered, although it is concluded that a large scale maintenance program in the US could be catastrophic and that other treatment options should be developed instead.—*L. Gorsev.*

1702. Werry, John S. & Sprague, Robert L. (U Auckland, School of Medicine, New Zealand) **Methylphenidate in children: Effect of dosage.** *Australian & New Zealand Journal of Psychiatry*, 1974(Mar), Vol 8(1), 9-19.—Results of a clinical trial with 20 US and 17 New Zealand hyperactive-aggressive children (mean age = 8.9 yrs) show that methylphenidate was superior to placebo for about ⅓ of the Ss, but that there was little difference in effectiveness between different dosage levels, especially once .3 mg/kg was attained. Mild side effects were common at higher dosages. Of a variety of physician, parent, teacher, and psychological test and behavioral measures, teacher and physician ratings were the most sensitive to drug effects. No measures, including neurological ones, discriminated between

responders and nonresponders. It is concluded that methylphenidate is a useful treatment for hyperactive-aggressive children but that current doses may be too high and side effects more common than stated. (26 ref)—*Journal abstract.*

1703. Wilson, John T. & Wilkinson, Grant R. (Vanderbilt U, Medical School) **Delivery of anticonvulsant drug therapy in epileptic patients assessed by plasma level analyses.** *Neurology*, 1974(Jul), Vol 24(7), 614-623.—Used plasma levels of anticonvulsants (diphenylhydantoin and phenobarbital) and medical record reviews to assess the drug delivery system (compliance), appropriate dosage, and utilization of plasma level data in 94 6-16 yr old institutionalized epileptic children and adults (age range 21-56 yrs). A 2-phase study design was used, with the introduction of plasma level data marking the onset of the 2nd phase. Unexpectedly, the availability of plasma level data on 2 occasions did not produce appropriate changes in compliance or dosage adjustments (based on chemical criteria) that were clearly needed. It is concluded that the overall drug delivery system is inadequate, that inappropriate anticonvulsant doses are used, and that plasma level information on anticonvulsants is underutilized for many institutionalized epileptics. (17 ref)—*Journal abstract.*

1704. Winkler, Gerald F. & Young, Robert R. (Harvard U, Medical School, Boston) **Efficacy of chronic propranolol therapy in action tremors of the familial, senile or essential varieties.** *New England Journal of Medicine*, 1974(May), Vol 290(18), 984-988.—Reports a double-blind, cross-over study of oral propranolol vs placebo in 24 patients with action tremors of the familial, senile, or essential varieties which showed propranolol to be very useful in the treatment of at least 75% of these patients. It was particularly helpful in relieving disability produced by tremor of the upper limbs. Even if tremor cannot be totally suppressed, propranolol may benefit the patient if the amplitude of tremor is decreased to the point where it no longer interferes with writing, eating, drinking, or the other activities of daily living. It was more effective than alcohol in some patients and is the first agent to produce satisfactory suppression of severe action tremor without undue sedation or the risk of addiction. Finally, in no case was it necessary to discontinue therapy because of adverse reactions. Propranolol was not effective against nonaction tremors. (27 ref)—*Journal abstract.*

### Behavior & Group Therapy

1705. Abse, D. W. (U Virginia) **Clinical notes on group-analytic psychotherapy.** Charlottesville, VA: University Press, 1974. ix, 192 p.—Defines group-analytic psychotherapy, outlines its history and present position in the field of mental health, suggests methods for determining the ideal group, and discusses the nature of the general pattern for conducting group sessions. It is stressed that group therapy is specifically valuable for treatment of psychoneurotic patients who have difficulty with interpersonal relationships. (13 p ref)

1706. Akin, Clifford & Kunzman, Glen G. (Calgary Div of Mental Health, Alberta, Canada) **A group desensitization approach to public speaking anxiety.** *Canadian Counsellor*, 1974(Apr), Vol 8(2), 106-111.



—Outlines a program designed to behaviorally reduce symptoms of public speaking anxiety in university students. Program evaluation with 84 student participants shows that a mixed behavioral format emphasizing practice situations produced results similar to traditionally operant or desensitization formats, with less attrition in attendance. Statistically significant changes on fear inventory scores was the measurable objective outcome of the program. Results suggest that individual desensitization as a supplement to the group program may be clinically helpful for the exceptionally distressed. S. D. Meichenbaum et al's 1971 finding that "anxiety specific" Ss respond more positively to a behavioral approach than do globally anxious Ss was supported, although not at a statistically significant level. (French summary) —*Journal abstract.*

1707. Bancroft, John . (U Oxford, England) **Deviant sexual behaviour: Modification and assessment.** Oxford, England: Clarendon, 1974. ix, 256 p.—Surveys ethical and sociological problems involved in the treatment of sexual deviance, and traces the historical development of behavioral techniques. Modern theoretical and empirical methods, evaluation, and measurement of change in behavioral techniques are discussed, and clinical findings and prognoses for such deviations as homosexuality, exhibitionism, and sado-masochism are delineated. (17 p ref)

1708. Barrett, Thomas J. & Sachs, Lewis B. (Bethesda Community Mental Health Ctr, Denver, CO) **Test of the classical conditioning explanation of covert sensitization.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1312-1314.—In 4 variations of the covert sensitization procedure, smokers were given different orders of the presentation of the aversive scene and the smoking scene. Although there was a significant reduction in smoking, none of the 4 variations differed in effectiveness. The classical conditioning explanation is discarded in favor of cognitive, motivational, or nonspecific factors.

1709. Bellack, Alan S.; Rozensky, Ronald & Schwartz, Jeffrey. (U Pittsburgh, Clinical Psychology Center) **A comparison of two forms of self-monitoring in a behavioral weight reduction program.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 523-530.—37 overweight Ss were recruited for a behavioral weight-reduction program incorporating self-monitoring of food intake. Prebehavioral monitoring (PM) was compared with postbehavioral monitoring (PTM), a nonmonitoring condition (NM) and a waiting list control condition (WL). The PM group lost the most weight, followed by the NM, PTM, and WL groups in that order. The PM and NM groups continued to lose weight after treatment ended. Every S in the PM group lost weight. The PTM group did not differ from the WL group at the end of treatment or at follow-up. The parameters of self-monitoring behavior are discussed and suggestions made for research and clinical usage of self-monitoring. (15 ref)—*Journal abstract.*

1710. Blay Neto, Bernardo . (São Paulo Pontifical Catholic U, Brazil) **[Scotomization of group fantasies.]** (Port) *Revista de Psicologia Normal e Patológica*, 1970(Jul), Vol 16(3-4), 320-326.—Describes a therapist's

use in group therapy of fantasies originated by him and their effects on group fantasies and preconceptions.

1711. Blechman, Elaine A. (Drug Dependence Unit, New Haven, CT) **The family contract game.** *Family Coordinator*, 1974(Jul), Vol 23(3), 269-281.—Describes a programmed board game, the Family Contract Game, which can be used to guide family members through the basic steps of interpersonal problem solving. Families can also, in 15 min, write a contract which identifies a problem behavior, a suitable replacement behavior, and appropriate reinforcement and recording of the appropriate replacement. The clinical use of the game with families who usually fail in therapy is discussed. (31 ref)

1712. Boš, Petr . (Child Psychiatric Hosp, Dubí bei Teplice, Czechoslovakia) **[The application of projective methods in studying family communication.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 736-740.—Reports on the feasibility of applying projective techniques in treating family groups. Zullinger's Diapositiv Z-Test was administered to an entire family. Taped recordings of the responses revealed information concerning communication and communication disturbances among the family members.—K. J. Hartman.

1713. Branham, Lee & Katahn, Martin . (Nebraska Psychiatric Inst, Omaha) **Effectiveness of automated desensitization with normal volunteers and phobic patients.** *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 234-245.—Compared the effects of live and automated desensitization on 21 clinical patients and 21 college students reporting various fears. Taking the sample as a whole, those subjected to live and to automated desensitization improved more than controls but were not significantly different from each other. Further analysis showed, however, that the 2 treated groups of college students improved more than student controls under both treatment conditions; neither of the treated groups of patients differed significantly from the patient control group. It is noted that the difference between live and automated treatment may be less than the difference between the time-limited, single-technique approach used in analog studies and the more varied, responsive treatment employed by clinical behavior therapists. (French summary) (27 ref)—*Journal abstract.*

1714. Brown, Robert S. (Hope Coll) **A note on body readiness in encounter groups.** *Interpersonal Development*, 1973-1974, Vol 4(1), 58-61.—Studied the observable effects of instructional relaxation (IR)—induced body readiness exercises—prior to an encounter experience, in an exploratory inquiry with college students. The apparent differences between the groups are reported, and suggestions for further investigation of IR effects on personality measures are noted.

1715. Burt, Vasanti; Whitlock, Doris & Franks, Violet . (California School of Professional Psychology, Los Angeles) **Modification of low self-esteem in women alcoholics: A behavior treatment approach.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 36-40.—Describes a pilot study of a behavior modification program to increase the coping skills of women alcoholic patients. A lack of attention to the low self-esteem of such patients may have accounted for their low probability of maintaining sobriety after termination of

inpatient treatment. 16 women were given a variety of behavioral treatments: relaxation, desensitization, assertive training, and several innovative procedures. 10 Ss demonstrated either total or improved abstinence after a 16-wk follow-up. Black women seemed to be more successful than white women and young Ss more successful than older Ss. Several evaluative measures—the Taylor Manifest Anxiety Scale, the Internal-External Locus of Control Scale, and the Tennessee Self Concept Scale—tended to show a pattern of gains after treatment, followed by decline after 16 wks in the community.—C. P. McCreary.

1716. Cautela, Joseph R.; Flannery, Raymond B. & Hanley, Stephen. (Boston Coll.) **Covert modeling: An experimental test.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 494-502.—Compared the effects of covert modeling, overt modeling, and attention placebo in the reduction of fear of rats in a laboratory situation with 30 female undergraduates. There was no difference between the overt and covert groups on 3 behavioral (approaching, stroking, and holding the rat) or 2 subjective measures (Fear Intensity Scale and a fear of laboratory rat survey). The overt group was superior on 1 subjective measure. This supports other experimental and anecdotal evidence that covert and overt modeling are equally effective. (22 ref)—*Journal abstract.*

1717. Cohen, Rudolf et al. (U Konstanz, Div of Psychology, W Germany) **[Behavioral therapy.]** (Germ) *Nervenarzt*, 1972(Mar), Vol. 43(3), 113-124.—Presents a study of the history, theory, techniques, objectives, and results of behavioral therapy. Classic operant conditioning, reinforcement, punishment, extinction, operant conditioning of schizophrenics, systematic desensitization, and aversion therapy are described. The merits of behavior modification therapy, present and future areas of research and application, and new trends and goals are discussed. (1 p ref)—T. Fisher.

1718. Cohen, Rudolf et al. (U Konstanz, Div of Psychology, W Germany) **[Three years of experience with a token economy in a psychiatric ward for extremely inactive schizophrenic patients.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol. 2(4), 243-277.—Describes a behavior modification program aimed at the rehabilitation of 20 passive and socially withdrawn chronic schizophrenics in a psychiatric ward. Ss were 9 female and 11 male 34-67 yr old patients hospitalized for an average of 20 yrs. A token pay system was used for operant conditioning of work and social behavior, and Es recorded the resulting changes and improvements and whether they were maintained after the gradual removal of the reward system. Significant improvements took place, particularly in work behavior, and were maintained even after the end of the applied reinforcement techniques. The same improvements were obtained under several experimental conditions. It is concluded that the positive changes were based less on the reward incentive than on a new and clearer understanding of the staff's expectations and reactions. (English summary) (45 ref)—T. Fisher.

1719. Denholtz, Myron S. & Mann, Edward T. (New Jersey Medical School, E Orange) **An audiovisual program for group desensitization.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol. 5(1),

27-29.—Used the responses of 102 20-69 yr old volunteers to 160 scenes, 80 fearful and 80 pleasant, to develop audiovisual hierarchies of 27 fearful and 27 pleasant scenes related to flying. A film was made presenting these scenes in pairs for automated treatment, each pair being preceded and followed by relaxation instructions. The possible use of this and similar films by nonprofessionals is noted.—*Journal abstract.*

1720. Edwards, K. Anthony. (Minot State Coll) **Physical restraint as time-out in therapy.** *Psychological Record*, 1974(Sum), Vol. 24(3), 393-397.—Studied the use of physical restraint as time-out for aggressive behavior. Nonsystematic use of physical restraint and drugs failed to eliminate violent outbursts and foul language for a 29-yr-old male in a state mental hospital. Subsequently, behavior free from violence and foul language was followed by progressively longer periods of freedom from restraint and increased access to reinforcing activities. 19 days were required to reduce the aggressive behaviors to zero. Checks made 17 and 380 days after the program was terminated indicated continued absence of aggressive behavior.—*Journal abstract.*

1721. Engel, Bernard T.; Nikoomanesh, Parviz & Schuster, Marvin M. (Baltimore City Hosp, Gerontology Research Ctr, MD) **Operant conditioning of rectosphincteric responses in the treatment of fecal incontinence.** *New England Journal of Medicine*, 1974(Mar), Vol. 290(12), 646-649.—Taught 6 patients (1 6-yr-old girl and 5 40-54 yr old adults) with severe fecal incontinence and manometric evidence of external-sphincter impairment to produce external-sphincter contraction in synchrony with internal-sphincter relaxation. These responses were induced by rectal distention. During follow-up periods ranging from 6 mo to 5 yrs, 4 of the patients remained completely continent, and the other 2 were definitely improved. One patient who was trained to relax her internal sphincter as well as to contract her external sphincter not only was continent but also regularly had normal bowel movements, which she had not had before. The training technique was relatively simple to apply, and learning occurred within 4 sessions or less. Findings highlight the importance of synchronized rectosphincteric responses in the maintenance of fecal continence, and they show that these responses can be brought under voluntary control in patients with chronic fecal incontinence, even when the incontinence is secondary to organic lesions. (17 ref)—*Journal abstract.*

1722. Epstein, Leonard H. & Hersen, Michel. (VA Ctr, Jackson, MS) **A multiple baseline analysis of covert control.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol. 5(1), 7-12.—Used covert control procedures, assessed in a multiple baseline design, to modify 3 high rate, target behavior problems (finger-picking, lip-biting, and cigarette-smoking) in a 28-yr-old male psychiatric patient. An additional target behavior (mood) remained untreated to serve as a control. Successful control and maintenance were obtained by covert techniques; however, instructional or self-monitoring effects could not be discounted. (18 ref)—*Journal abstract.*

1723. Epstein, Leonard H.; Hersen, Michel & Hemphill, Diana P. (VA Ctr, Jackson, MS) **Music feedback in the treatment of tension headache: An**



**experimental case study.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 59-63. —Conducted 2 experiments with a 39-yr-old male patient to evaluate the effects of biofeedback (music presented contingent on low electromyogram levels) on tension headaches during inpatient and outpatient phases. Dependent variables included frequency and intensity of headaches in both phases, and antiheadache medication as needed in the outpatient phase. Results indicate that the patient's headache levels and medication requirements were low during biofeedback but increased when biofeedback was terminated. Antitension exercises involving deep breathing and stretching of neck muscles introduced during a clinical follow-up were associated with a sustained decrease in headaches. —*Journal abstract.*

1724. Evans, Ian M. (U Hawaii) **A handy record-card for systematic desensitization hierarchy items.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 43-46. —Describes a card for recording progress in systematic desensitization. The card has space for writing the hierarchy item and for recording various elements of the client's response. Allowance is made for a number of procedural variations that have become common in clinical desensitization.

1725. Finlay, Donald G. (U British Columbia, Vancouver, Canada) **Alcoholism: illness or problem in interaction?** *Social Work*, 1974(Jul), Vol 19(4), 398-405. —Discusses the concept that excessive drinking may be a symptom of a person's faulty interaction with his family and significant others. Studies using this social systems approach (i.e., in which the family is regarded as the basic unit for treatment) are evaluated. Data suggest that (a) rehabilitation workers who viewed alcoholism as an illness did not have as great a success in working with alcoholic patients as did workers who held interaction orientations and (b) group counseling may be more effective than individual counseling in decreasing drinking. The need for further study of this explicit interactional approach toward alcoholism is emphasized, and the limitations of individualistic and illness-oriented models of alcoholism are noted. —*L. Gorsey.*

1726. Florin, Irmela; Cohen, Rudolf & Meyer-Osterkamp, Susanne. [A study of operant conditioning of social behavior in chronic schizophrenics.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Suppl 1, 76 p.

1727. Fodor, Iris E. (New York U) **Sex role conflict and symptom formation in women: Can behavior therapy help?** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 22-29. —Reviews case histories of women, noting that sex-role conflicts were often a core issue underlying the presenting symptoms. Fears of achieving, depressions, rigid acceptances of the feminine stereotype, and sexual and delinquency problems reflect conflicts over the feminine role. Behavioral techniques such as desensitization, assertive training, role modeling, and positive reinforcement for behavior change seem suitable for women struggling with sex-role conflict. —*C. P. McCreary.*

1728. Frankel, Fred H. (Harvard U, Medical School, Boston) **Trance capacity and the genesis of phobic behavior.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 261-263. —Discusses the reported increased effec-

tiveness in the therapy of phobic behavior when hypnosis is combined with the treatment, or when it is used as the vehicle for treatments such as suggestion, desensitization, or insight-oriented psychotherapy. 2 cases which demonstrate the similarity between a phobic panic state and the trance experience are presented. The knowledge that marked hypnotizability can contribute to the production of unusual clinical syndromes suggests the need to study how smaller degrees of hypnotic capacity could be responsible for the production of other symptoms, such as phobic behavior. In traditional psychodynamic terms, it is suggested that the trance or hypnotic experience is involved spontaneously as a defense mechanism against intolerable anxiety, and the accompanying social situations, or important aspects of them, are then perceived in a distorted fashion. In behaviorist terms, this is then learned and reinforced by repeated perceptually distorted experiences. —*Journal abstract.*

1729. Gerlinghoff, Monika & Schwarz, Dieter. (Max Planck Inst for Psychiatry, Munich, W Germany) **[Behavior modification in the treatment of hospitalized patients with obsession psychoses.]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 124-129. —Presents and discusses 3 case histories: the desensitization treatment of a 37-yr-old male with contact phobia and wash ritual compulsion; the treatment of a 31-yr-old male with a disturbed day-night sleep rhythm caused by imaginary worries, dangers, and responsibilities, and compulsive activities at night to avert and control dangerous situations; and treatment of a 29-yr-old male with an obsessive preoccupation with numerous unimportant details, compulsive and pedantic daily rituals, and wash rituals. Results of the treatment are described, analyzed, and compared with similar cases in the literature. Special aspects discussed include treatment of the conditioned motor reactions and of the conditioned autonomic drive, the method of response prevention, modification of expectations, token economy reinforcement, and the techniques used to progress from outside direction of behavior by the therapist to internal control by the patient. (27 ref) —*T. Fisher.*

1730. Gershman, Louis & Clouser, Randall A. (Villanova U) **Treating insomnia with relaxation and desensitization in a group setting by an automated approach.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 31-35. —Exposed 20 undergraduate insomniacs with average sleep onset times of 65 min to group relaxation or group desensitization treatments via automated tape-recorded directions for a 4-wk period. Both experimental groups exhibited significant improvement ( $p < .005$ ) while 2 control groups (poor sleepers and normal sleepers) showed no changes. Desensitization treatment was also associated with changes on the 16 Personality Factor Questionnaire in the direction of greater emotional self-confidence. Ss who received muscle relaxation instructions showed significant changes in the direction of greater stability on the Eysenck Personality Inventory. Follow-up data 12 mo later showed significant retention of short-term gains for both groups. Clinically, it appears feasible to make use of both techniques by a group automated approach as safe alternatives to drugs and electrosleep methods.

which in the past have been frequently associated with undesirable side effects. (19 ref)—*Journal abstract*.

1731. Goldfried, Marvin R. & Trier, Christine S. (State U New York, Stony Brook) **Effectiveness of relaxation as an active coping skill.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 348-355.—Notes that the status of relaxation training as an effective treatment procedure is unclear. A possible reason for inconsistent findings may be the way in which the training procedure is presented, or at least the way in which the S or client may construe it. The present study with 27 speech-anxious college students used public-speaking anxiety as the target behavior and presented relaxation training in 2 ways. In Condition 1, Ss were told that the relaxation exercises would more or less automatically reduce their anxiety level. In Condition 2, relaxation was presented within a self-control context in which Ss were told that they were learning an active coping skill. A 3rd condition involved group discussion and was included as a means of controlling for attention-placebo factors. On a variety of different measures, within-group changes consistently favored the self-control relaxation condition. This was true of the speech anxiety measures as well as indicators of anxiety in other types of situations. The finding that Ss in the self-control relaxation condition continued to improve even after termination was interpreted as being consistent with a view of self-control that involves a learned skill which improves with repeated practice. (35 ref)—*Journal abstract*.

1732. Greenspan, Stanley I. (National Inst of Mental Health, Adelphi, MD) **The clinical use of operant learning approaches: Some complex issues.** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 852-857.—Considers that the clinical use of operant learning approaches demands a full understanding of a patient's behavioral organization and the many experiences that constitute reinforcement. This involves considering the appropriate functional response classes, the "core" functional response classes, the integration of precursor and end goal behaviors (as seen in the natural development of complex behavior patterns in children), program flexibility, and the variety of stimulus configurations a patient may experience as reinforcing. The value of changing behaviors vs changing the patient's experience of reinforcement is examined.—*Journal abstract*.

1733. Hallam, R. S. (Maudsley Hosp., London, England) **Extinction of ruminations: A case study.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 565-568.—Describes the case of a 15-yr-old girl whose main obsessional ritual consisted of persistent questioning. When she was placed on a 24-hr extinction schedule during which no reassurance was provided, questioning was eliminated in 3-4 wks, and there was marked improvement in intellectual functioning and socialization.

1734. Hand, I.; Lamontagne, Y. & Marks, I. M. (U Hamburg, Psychiatric Clinic, W Germany) **Group exposure (flooding) in vivo for agoraphobics.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 588-602.—Treated 25 patients with chronic agoraphobia in 6 groups of 4-5 patients each. The 1st 4 groups were led by 2 therapists, and the other 2 groups by 1 therapist. Each patient received 12 hrs of exposure (flooding) in vivo for 3 days, 4 hrs/day. 3 groups were structured to increase

social cohesion during exposure, while the other 3 were unstructured so that members were exposed to a minimum of group influence. Structured groups became significantly more cohesive than unstructured groups, although cohesion developed spontaneously in all groups. Therapists found it easier to lead cohesive groups. On behavioral tests, the outcome for all groups was at least as good as in previous trials with individual patients. Patients from structured groups felt less overall immediate improvement during the treatment week, but contrary to prediction, all groups improved similarly on phobic anxiety scales 3 days after treatment. Structured groups were significantly more improved than unstructured groups 3 and 6 mo later on phobic and global improvement scales. Concomitant personality problems of the patients are noted, and the feasibility of behavioral avoidance tests as measures of phobia are discussed. (22 ref)—*Journal summary*.

1735. Haynes, Stephen N.; Woodward, Sam; Moran, Robert & Alexander, Douglas. (U. South Carolina) **Relaxation treatment of insomnia.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 555-558.—14 insomniac undergraduates received either relaxation training or placebo therapy. Following a 2-wk baseline self-observation period, Ss underwent 6 1/2-hr sessions of either group relaxation or group placebo treatment. Both groups demonstrated significant improvement in their sleep patterns, but the relaxation group demonstrated significantly greater improvement than the placebo therapy group. It is concluded that relaxation can be an effective treatment method for insomnia, but expectation and demand characteristics are contributing factors.—*Journal abstract*.

1736. Jeffrey, D. Balfour. (Emory U) **A comparison of the effects of external control and self-control on the modification and maintenance of weight.** *Journal of Abnormal Psychology*, 1974(Aug), Vol 83(4), 404-410.—In an experimental study of weight reduction, 62 obese men and women were administered a pretreatment questionnaire and randomly assigned to 3 experimental treatment groups: (a) an external control group with a nonrefundable contingency, (b) a self-control group with a refundable contingency, and (c) a self-control group with a nonrefundable contingency. Results indicate that the self-control and external-control treatments were equally effective in producing reduction in weight. However, both self-control interventions were more effective than the external-control intervention in promoting maintenance of weight loss. (23 ref)—*Journal abstract*.

1737. Keegan, David L. (U Saskatchewan, Saskatoon, Canada) **Adaptation to visual handicap: Short-term group approach.** *Psychosomatics*, 1974, Vol 15(2), 76-78.—Presents short-term group therapy for visual disability as an approach to adjustment and rehabilitation during the life-crisis of blindness. The group process, leader's reaction, and certain suggestions to modify the group approach are discussed.

1738. Kehrer, Hans E. (U Münster Neuroclinic, Div of Child & Juvenile Psychiatry, W Germany) **[Treatment of anorexia nervosa by behavioral therapy.]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 129-136.—Reports typical cases of anorexia nervosa in 3 girls 18, 15, and 12



years old and describes their treatment through operant conditioning, behavior modification, and environmental changes. Positive changes in eating behavior, physical health, and psychic attitudes were achieved in 2-4 mo. The concepts and methods of behavior modification therapy are discussed.—*T. Fisher.*

1739. Ladouceur, Robert. (Clinique Psychiatrique de Bel-Air, Geneva, Switzerland) **An experimental test of the learning paradigm of covert positive reinforcement in deconditioning anxiety.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 3-6.—Tested J. Cautela's (see PA, Vol 47:9068) learning paradigm for covert positive reinforcement (CPR) by comparing 2 treatment groups—a CPR group as described by Cautela and a reversed-CPR group—with a no-treatment control group. Ss were 30 rat-fearful college students. A behavioral avoidance test revealed no significant differences between the 2 treatment groups, but both showed greater improvement than the no-treatment control group. Findings contradict Cautela's hypothesis and favor a reciprocal inhibition explanation.—*Journal abstract.*

1740. Lain, Margaret E. & Schoenfeld, Lawrence S. (Trinity U) **Effects of three conditioning paradigms on visual attention to alcoholic stimuli.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 409-410.—Randomly assigned 36 male alcoholics to 1 of 3 aversive conditioning paradigms or to a control group to determine the paradigm most effective in modifying visual attention to alcoholic stimuli. An outcome criterion of corrected difference scores was a combination of visual attention in seconds to viewed alcohol and nonalcoholic slides. An analysis of covariance with age as the covariate on the criterion yielded a statistically nonsignificant *F*.—*Journal abstract.*

1741. Larson, Donna; Easter, Polly & Ward, Barbara. (Boulder County Mental Health Ctr, Longmont Branch Clinic, CO) **A group treatment program for masochistic patients.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 525-528.—Describes a group treatment program conducted by 3 women therapists for 11 extremely dependent masochistic female patients who had been previously treated and had not improved. The patients identified behaviors they wanted to change, and the therapists designed tasks to help them reach their goals. 5 stages in the treatment of masochistic patients identified by the therapists during the course of the program are outlined.

1742. Lazarus, Arnold A. (Rutgers State U., New Brunswick) **Multimodal behavioral treatment of depression.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 549-554.—Multimodal behavior therapy emphasizes the need to pay direct attention to the correction of deviant behaviors, unpleasant feelings, negative sensations, intrusive images, irrational beliefs, stressful relationships, and possible biochemical imbalance. In treating depressed persons, especially those in whom suicide is probable, it is imperative to enjoin the patient to recognize and use a variety of positive reinforcers. Durable results usually call for a new range of interpersonal skills, the elimination of self-depreciation, time-projected images in which the client sees himself engaging in future rewarding activities, a "sensate focus"

of enjoyable events, a repertoire of adaptive affective reactions, and a behavioral pattern characterized by daily sampling of personally reinforcing activities.—*Journal abstract.*

1743. Leon, Gloria R. (U Minnesota) **Case histories of deviant behavior: A social learning analysis.** Boston, MA: Holbrook, 1974. vi, 293 p.—Presents a collection of 16 case histories of childhood, adolescent, and adult disorders to illustrate reinforcement and modeling influences in past and present social environments. Topics include severe speech deficits, habit disturbances, and minimal brain damage in children and phobic behavior, anxiety neurosis, psychotic depression, and schizophrenia in adolescents and adults.

1744. Leonhard, Karl. (Humboldt U Berlin, E Germany) **[Is individual therapy a behavior therapy?]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1973(Dec), Vol 25(12), 726-735.—Speculates that individual therapy is most closely related to behavior therapy in the treatment of situational phobias. Individual therapy interrupts the interplay of emotions producing the neurotic effect and thereby reduces the pathological fear. Individual therapy is seen as having the possibility of more lasting effects.—*K. J. Hartman.*

1745. MacDonald, Marian L. & Bernstein, Douglas A. (U Illinois) **Treatment of a spider phobia by in vivo and imaginal desensitization.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 47-52.—Describes the use of in vivo and imaginal desensitization procedures in the treatment of a spider phobia in a 24-year-old female graduate student. A diversity of in vivo programs, following a thematic hierarchy paradigm, are discussed in detail to encourage more frequent attention to and utilization of easily arranged, controlled exposures. (25 ref)—*Journal abstract.*

1746. Marshall, W. L.; Boutilier, J. & Minnes, P. (Kingston Psychiatric Hosp., Ontario, Canada) **The modification of phobic behavior by covert reinforcement.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 469-480.—Compared the ability of covert reinforcement procedures and experimental desensitization to reduce subjective distress and increase approach behavior to a harmless snake. 48 female undergraduates were assigned to 1 of 6 groups: (a) experimental desensitization (ED), (b) covert positive reinforcement (CPR), (c) covert negative reinforcement (CNR), (d) noncontingent covert positive reinforcement (N-CPR), (e) placebo controls (PC), and (f) no-treatment controls (NT). Results indicate that CPR and ED were equally effective, and both showed greater improvement than either of the control groups. CNR Ss also did better than the controls, but after treatment the combined CPR and ED group showed a greater increase in approach behavior than the CNR Ss. Thus CPR appears to be an equal alternative to ED and may be more economical of time, whereas CNR may only be useful when the other 2 procedures are not appropriate. (30 ref)—*Journal abstract.*

1747. McLachlan, John F. (Donwood Inst, Toronto, Ontario, Canada) **Social competence and response to group therapy.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 248-250.—Studied the relationship between person perception and group therapy outcomes by developing a modified semantic differential version of

R. Harrison's Person Description Instrument (PDI). Ss were 87 alcoholic inpatients in 11 psychotherapy groups (mean age = 45.7 yrs). Following detoxification, all Ss participated in 26 hrs of group therapy for 3 wks. Based on Harrison's factor analysis results, 10 semantic differential items were constructed from the PDI interpersonal and noninterpersonal dimensions. Ss completed this "social competence" scale after 3 days (4½ hrs) of therapy and again after the end of 3 wks; in addition, the Barron Ego-Strength scale was administered. Initial social competence ratings of self and others predicted S's perception of his improvement during therapy, and both staff and peer ratings of S's initial level of social competence predicted staff ratings of therapy outcome.—L. Gorsev.

1748. McPherson, Lynne & Joachim, Ron. (Challinor Ctr, Ipswich, Queensland, Australia) **The use of electric shock to reduce head-banging in a mentally retarded boy: A case study.** *Australian Journal of Mental Retardation*, 1974(Mar), Vol 3(1), 20-24.—Describes procedures by which the incidence of head-banging was decreased significantly in a 9-yr-old retarded boy. The behavior did recur on isolated occasions and possible reasons for this action are suggested.

1749. Mills, Gary K. & Solyom, Leslie. **Biofeedback of EEG alpha in the treatment of obsessive ruminations: An exploration.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 37-41.—Gave 5 ruminating obsessives (mean age = 32 yrs) 7-20 biofeedback training sessions to learn control of EEG alpha waves. Results indicate that (a) some obsessives learned EEG control; (b) special augmented instructions seemed no better than standard, minimal instructions in aiding Ss to produce alpha; (c) subjective states during alpha were reported as relaxed, daydreaming, and not thinking; and (d) although difficult to generalize beyond the feedback situation, virtually no ruminations occurred during alpha regardless of the amount of alpha produced. Further study is indicated before a treatment program can be considered. (16 ref) —*Journal abstract.*

1750. Navarro A., Roberto. (U Iberoamericana, Mexico City, Mexico) **[New therapeutic techniques of counter-conditioning: Skin consciousness and visceral awareness.]** (Span) *Revista Interamericana de Psicologia*, 1974, Vol 8(1-2), 69-85.—Compared the effectiveness of skin consciousness, visceral awareness, and J. Wolpe's Muscular Relaxation techniques, using 3 independent groups of 12 women each (average age 28 yrs). Ss evaluated the techniques on a 9-point scale for each of the following variables: degree of muscular relaxation, degree of skin relaxation, degree of visceral relaxation, intensity of feelings of joy, intensity of feelings of well-being, degree of sexual excitement, tranquility, and degree of self-confidence. Results indicate some differences between the 3 techniques but not much difference in their global effectiveness in neutralizing anxiety. It is concluded that the new techniques of skin consciousness and visceral awareness are usable for experimental purposes in counterconditioning of anxiety symptoms. (English abstract)—S. Slak.

1751. Neff, Richard. (Unitarian Universalist Church, Farmington, MI) **The group constellation.** *Psychothera-*

*py: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 80-82.—Suggests a technique to facilitate a group member's articulation of feelings about his role in the group and his relationship to other group members. The member is asked to "sculpt" the human environment in the group. This procedure fits into a variety of "closed" therapeutic and encounter models.

1752. Ohno, Yoshiteru et al. (Kyushu U, Faculty of Medicine, Fukuoka City, Japan) **The treatment of hysterical blindness by behavior therapy.** *Psychosomatics*, 1974, Vol 15(2), 79-82.—Presents 3 case reports of hysterical blindness and discusses the use of behavioral therapy for this disorder. Some general rules are outlined. It is suggested that the original anxiety-provoking situation should be ameliorated, and manipulation of the environment and social conditions as a positive reinforcement should be used. Operant conditioning or behavior modification by suggestion and desensitization is also considered helpful.—*Journal abstract.*

1753. Paulson, Morris J., et al. (U. California, Los Angeles) **Parents of the battered child: A multidisciplinary group therapy approach to life-threatening behavior.** *Life-Threatening Behavior*, 1974(Spr), Vol. 4(1), 18-31.—Reports the demographic findings and the experience of a 3-yr, multidisciplinary group psychotherapy program with 31 child-abusing families. No predictive demographic characteristics were identified. The abuse of children ranged from mild bruising to severe brain damage and multiple fractures. Group therapy as an intervention procedure had its successes and failures. The dynamics of male-female cotherapists, the peer group sharing, and the capacity to ultimately verbalize inadequacies in the parenting role were crucial factors in therapy. As an experiential encounter the study gives an insight into the personal and family pathology of parents who abuse their children.—*Journal abstract.*

1754. Petzold, Hilarion. (St Denys Inst, Paris, France) **[The diagnostic and therapeutic possibilities of psychodrama in the "tetradic system."]** (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(3), 151-181.—Describes how the triadic concept of J. L. Moreno and the French School, combining psychodrama, group dynamics, and analytic group psychotherapy, has been enlarged by the concept of "behavior drama." This tetradic system, which attempts to combine concepts from psychoanalysis and learning theory, is structured in 4 phases: (a) The diagnostic-amnesic phase reveals the areas of conflict. (b) The "acting out" of conflict obtains catharsis for the protagonist. (c) The members of a group share experiences with the protagonist. (d) Conclusions are drawn from the preceding phases in order to modify undesired behavior patterns or build up new ones through behavior drama (i.e., role-playing that applies the principles of learning theory).—H. Bruml.

1755. Pollak, Michael H. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Biofeedback of blood pressure changes: A treatment for essential hypertension?** *Biological Psychology Bulletin*, 1973(Dec), Vol 3(2), 49-56.—Reviews studies which have attempted to show that with the aid of external feedback or "biofeedback" human Ss can learn to control their blood pressure (BP). Experimental results are discussed in terms of the possible use of biofeedback in the treatment of essential



hypertension. Normotensive Ss trying to decrease their BP are more successful than those trying to increase it; but the magnitude of the BP differences has not, in general, been clinically significant.—*Journal abstract.*

1756. **Pratarotti, Antonio R.** (Santa Casa, Medical School, São Paulo, Brazil) **Group play therapy with autistic children.** *Revista de Psicologia Normal e Patológica*, 1970(Jul), Vol 16(3-4), 305-312.—Recounts an attempt to reach 6 8-13 yr old hospitalized boys with diagnoses of childhood schizophrenia or infantile autism. All had prior hospitalization and none were communicating verbally. During 3 mo of group play therapy all Ss responded to some degree, with attempts at communication and some decreases in self-destructive behavior; but when the transfer of 1 therapist resulted in a 2-wk pause in the sessions, the apparent progress was lost.—*N. T. Pinckney.*

1757. **Purinton, Michael; Healy, Jim & Whitney, Bill.** (Province of Manitoba Dept of Education, Winnipeg, Canada) **Layers of self: A group fantasy technique.** *Psychotherapy: Theory, Research & Practice*, 1974(Spring), Vol 11(1), 83-86.—Suggests a fantasy exercise based on the self theories of Rouke and Perls to be used as a group therapy technique. The exercise is designed to help each person on a trip through his superficial outer layers and his negative inner layers until he finally gets in touch with his unique inner self.

1758. **Raths, Otto N.; Bellville, Titus P.; Bellville, Carol J. & Garetz, Floyd K.** (U Minnesota, Medical School) **The counterphobic mechanism as a force in mate selection and marital stability.** *Family Coordinator*, 1974(Jul), Vol 23(3), 295-301.—Defines counterphobia (i.e., the actual preference of a person for the very situation he is afraid of) and suggests that it is one of the major causes of marital conflict. This choice may be unconsciously motivated and its source may lie in parental behavior (e.g., authoritarian family structures, the child's overdependence on his parents, or double-blind family conflicts). Examples of counterphobic behaviors in mate selection are presented, and the ways in which these behaviors can distort marital equilibrium are examined. It is considered that therapy should be focused on promoting a more successful relationship (either a successful marriage or a divorce) and resolving the phobia through a variety of experiences which increase mastery and self-esteem. The possibility of spontaneous resolution in counterphobic marriages is examined, and therapeutic strategies are discussed.—*L. Gorsey.*

1759. **Rehm, Lynn P. & Rozensky, Ronald H.** (U Pittsburgh) **Multiple behavior therapy techniques with a homosexual client: A case study.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 53-57.—Describes the case of a 21-yr-old male whose homosexuality and heterosexual avoidance were modified by education, self-management, desensitization, covert sensitization, aversive conditioning, aversion relief, orgasmic reconditioning, and assertive training. It is suggested that the analysis of an individual's homosexual behaviors may lead to the application of multiple techniques. Dimensions of analysis and problems in sequencing are discussed.—*Journal abstract.*

1760. **Ribes-Iñesta, Emilio & Guzmán, Eleazar.** (U Veracruz, Xalapa, Mexico) **Effectiveness of several suppression procedures in eliminating a high-probability response in a severely brain-damaged child.** *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 29-39.—Used successively 3 types of punishment—time-out, electric shock, and slaps—to suppress the undesirable high-frequency behavior of placing nonedibles in the mouth by a 14-yr-old girl with extended and deep brain lesions. All 3 punishments were effective in suppressing the behavior, but the suppression did not generalize to conditions other than those for which the punishment was administered. With punishment by electric shock, the undesired behavior even increased beyond the initial baseline level when punishment was discontinued. Results suggest limitations in the use of punishment for behavior suppression. (Spanish summary)—*S. Slak.*

1761. **Rickard, Henry C. & Dinoff, Michael.** **Behavior modification in children: Case studies and illustrations from a summer camp.** University, AL: U Alabama Press, 1974. 174 p. \$6.75.—Discusses the application of behavior modification, in the milieu of a therapeutic camp, to such problems as (a) soiling, clean-up, and orderliness behaviors; (b) the development of self-control and working in a group; and (c) classroom management and remedial instruction.

1762. **Rimm, David C. & Masters, John C.** (Southern Illinois U) **Behavior therapy: Techniques and empirical findings.** New York, NY: Academic Press, 1974. xvi, 513 p. \$11.95(cloth), \$5.75(paper).—Discusses the nature and origins of behavior therapy, and includes theoretical and empirical data on systematic desensitization, assertive training, modeling procedures, contingency management, operant methods in self-control, extinction procedures, and cognitive methods. (40 p ref)

1763. **Romanczyk, Raymond G.** (State U. New York, Binghamton) **Self-monitoring in the treatment of obesity: Parameters of reactivity.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 531-540.—Assigned 70 overweight Ss to 5 groups to assess the reactive nature of self-monitoring procedures. The groups were (a) no-treatment control; (b) self-recording daily weight; (c) self-recording daily weight and daily caloric intake; (d) behavior management and stimulus control instruction; and (e) behavior management, stimulus control, and self-recording of daily weight and daily caloric intake, with the initial treatment phase lasting 4 wks. Results show no significant difference between self-recording of daily weight and no-treatment control. Self-recording of daily weight and daily caloric intake, without therapist contact, was as effective as the behavior management and the behavior management and self-recording groups, both of which had weekly therapist contacts. Follow-up evaluations at 4 and 13 wks, respectively, indicated that the behavior management and behavior management and self-recording groups were not significantly different, although both showed a substantial weight loss that was maintained over the follow-up period. (26 ref)—*Journal abstract.*

1764. **Schutz, William C.** **Elements of encounter.** Big Sur, CA: Joy Press, 1973. 118 p.—Traces the history of the encounter movement, including group psychotherapy, T groups, psychodrama, and gestalt methods;

discusses the principles and psychological and physiological bases of encounter; details the theory of group development and of leader technique; and presents applications of encounter to psychotherapy, industry, education, religion, society, and daily life. (7 p ref)

1765. Sharpe, Robert. (Ctr for Behavioural Psychotherapy, London, England) **Behaviour therapy in a case of blepharospasm.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 603-604.—Describes the successful treatment of nonorganic blepharospasm in a 51-yr-old man. Relaxation and reinforcement strategies were used to reduce the spasms and enable the patient to keep his eyes open, and exercises were designed to increase the patient's repertoire of eyelid movements. At the end of 14 wks, about 3-4 periods of spasms occurred daily which were effectively controlled by the patient.

1766. Sirota, Alan D. & Mahoney, Michael J. (Pennsylvania State U) **Relaxing on cue: The self regulation of asthma.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 65-66.—Gave a 41-yr-old woman with severe asthmatic difficulties brief training in muscular relaxation as a means of avoiding and reducing bronchospasm. A portable timer was used to cue naturalistic self-monitoring of muscle tension and self-relaxation. Client records of medication frequency indicated a dramatic improvement in respiratory functioning and excellent maintenance at a follow-up assessment. The encouraging results of this self-management strategy, when contrasted with years of unsuccessful medical treatment, suggest the need for more controlled research on applications of behavior therapy to respiratory disorders.—*Journal abstract*.

1767. Stegat, Harry. (U Münster, Neuroclinic, W Germany) **[Study of conditioning therapy in enuresis.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 4(1), 306-322.—Investigated enuresis and its treatment by therapeutic conditioning in 60 male and 27 female 5-15½ yr old enuretics. Ss had a bedwetting frequency average of 9 times/wk. Es made thorough anamneses and administered a series of psychodiagnostic tests, EEGs, X-rays, and urologic examinations. A modified Mowrer waking apparatus was used for treatment. The treatment was successful with 52 males and 23 females, unsuccessful with 8 males and 4 females. 20 mo after completion of the treatment, the rate of relapse was investigated in 73 of the 75 cured Ss. 37 (25 males and 12 females) had relapsed and 36 (25 males and 11 females) had not. (English summary)—T. Fisher.

1768. Steinhauer, Jean C. (Texas Tech U, Counseling Ctr) **Tacit knowing as methodology for evaluating an encounter group.** *Interpersonal Development*, 1973-1974, Vol 4(1), 1-20.—Applies principles derived from M. Polanyi's (1968, 1969) "tacit knowing" in developing a methodology for evaluating an encounter group. The researcher as knower is the primary instrument for the study, which took place in a pre-, post-, and final testing and interviewing sequence with a 30-yr-old female S. The method is a rich source of data for understanding the diversity of outcomes for participants and of the way in which the experience of the group has settled into their lives. Based on single case studies, it is concluded that

the encounter group is an authentic experience of human sharing. (25 ref)—*Journal abstract*.

1769. Suinn, Richard M. (Colorado State U) **Desensitization therapy to establish self-confidence and social competency.** *Psychiatric Quarterly*, 1973, Vol. 47(4), 586-591.—Reports the case of a 36-yr-old male mathematician whose therapy involved desensitization both to reduce his anxiety in interpersonal relationships and to promote feelings of confidence and social competency. Treatment was characterized by (a) relaxation training, (b) reliance on accelerated desensitization, and (c) use of visualization to stimulate the desired feelings. Therapy was terminated after 9 sessions, with marked improvement in the client's condition. Results support the value of accelerated desensitization as short-term outpatient therapy. It is noted that the client's strong motivation and interest in behavior therapy was a meaningful factor in his progress.—B. McLean.

1770. Trautner, Hanns M. (U Mainz, Psychological Inst, W Germany) **[How good is behavior therapy? Observations on the evaluation of therapies.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(4), 300-323.—Discusses the development of a system for criticizing and evaluating therapeutic methods and techniques of various types, using behavior therapy as a model. The 5 main aspects to be evaluated regarding any therapy are its goals, its method of selecting and defining those goals, its treatment methods, its efficacy, and its theoretical foundations. Subdivisions and interrelationships among these aspects are discussed. Behavior therapy must prove its superiority in terms of its efficacy and theoretical foundations rather than in terms of its treatment methods, treatment goals, and goal definitions. Psychotherapy research should put less emphasis on comparing rates of success, and more on a close examination of the processes which occur during the various types of psychotherapy. (English summary) (48 ref)—T. Fisher.

1771. Vachon, Michel; Pitre, Edgard; Malcuit, Gérard & Routhier, Serge. (St-Michel-Archange Hosp, Quebec, Quebec, Canada) **[Application of the experimental analysis of behavior to a remotivation situation.]** (Fren) *Canadian Journal of Behavioural Science*, 1974(Jul), Vol 6(3), 246-257.—In an experiment with 2 groups of 4 schizophrenics, the efficiency of a group discussion run according to the principles of the experimental analysis of behavior was compared with the traditional approach to remotivation. 2 target behaviors were chosen for study: speaking (intervention) and S-to-S interaction (social interaction). The number and length of interventions as well as the number of social interactions were used as the basic measurements. The experiment was divided into 2 parts with 2 Es. Group 1 held the usual group discussion in Part 1 and Part 2 after the leader was instructed. Group 2 used the behavioral approach in both parts of the experiment. Results show that the behavioral approach increased both the length of interventions and the number of social interactions, even though the leaders themselves actually spoke less. The principles of experimental analysis are discussed in relation to their application in a remotivation situation.—English summary.



1772. **Wehman, Paul H.** (Lincoln State School for Mentally Retarded, IL) **Effects of token reinforcement on maintaining oral hygiene skills in geriatric retarded women.** *Training School Bulletin*, 1974(May), Vol 71(1), 39-40.—A token reinforcement "star" program aimed at increasing the regularity of oral hygiene skills being performed was implemented in a cottage of 15 44-68 yr old moderate to severely retarded women. Results were generally successful with most residents taking more care in personal hygiene habits.

1773. **Wright, Shelle & McDonald, Claudia.** (Baylor U) **Review of behavioral treatment of depression.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1335-1341.—Behavioral treatments of depression are reviewed and categorized according to J. Wolpe's (see PA, Vol 48:3361) description of 3 types of circumstances in which pathologic reactive depression is observed. Theoretical conceptions of depression as a result of extinction and experimental support for this view are presented. Research implications include more adequate control groups, objective pre- and postassessment, further explanation of therapeutic procedures, and adequate follow-up evaluations. (23 ref)—*Journal abstract*.

1774. **Wynne, Louis.** (Bernalillo County Mental Health Ctr, Albuquerque, NM) **Synthesis of appropriate patient behavior in an aversive dental environment.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 519-524.—Describes in vivo desensitization of a patient with dental phobia, following earlier failures to treat the case with drug therapy. 12 30-min sessions over a period of 6 wks culminated in the patient's undergoing local anesthesia by hypodermic injection (the most feared aspect of the dental situation) and having a tooth cavity filled.—*Journal abstract*.

1775. **Zaffuto, Anthony A. & Zaffuto, Mary Q.** (Alphagenic Ctr, Santa Barbara, CA) **Alphagenics: How to use your brain waves to improve your life.** New York, NY: Doubleday, 1974. xviii, 245 p. \$6.95.—Demonstrates methods of training for self-induction of the alpha state in order to regulate behavior consciously through autosuggestion. Techniques for overcoming tension, anxiety, insomnia, overeating, alcoholism, and sexual difficulties are included. (12 p ref)

### Psychoanalysis

1776. **Barnes, Robert H.** (St Luke's Hosp Medical Ctr, Mental Health Div, Phoenix, AZ) **"The tyranny of words": Revisited.** *Dynamische Psychiatrie*, 1974, Vol 7(2), 91-99.—Attempts to increase the usefulness of verbal symbols by developing more precise meanings for them. It is suggested that biofeedback psychophysiology may be a further major break from dependence on verbal symbols. The biofeedback technique may be applicable to overcoming resistance in testing and therapy, and may help to attain more effective access to unconscious or heavily guarded feelings and thoughts. (German summary)—*Journal summary*.

1777. **Biran, S.** [The crisis of psychoanalysis and the position of psychoanalysis in modern psychiatry.] (Germ) *Nervenarzt*, 1972(Jan), Vol. 43(1), 9-17.—Considers that examining the "what" and the "how" of normal and pathological mental processes leads to the

same result: acceptance and confirmation of psychoanalysis as the only possible approach to an understanding of psychology and psychiatry. However, many of the specific statements and theories of psychoanalysis must be rejected or revised.—*T. Fisher*.

1778. **Edelweiss, Malomar L.** [Lay psychoanalysis: A recurrent topic.] (Port) *Estudos de Psicanálise*, 1973, No 6, 33-56.—Argues the case for lay psychoanalysis, citing Freud's opinions extensively. The need for lay analysts and the advantages of using them are discussed, and the efforts of the medical profession to exclude them are condemned. The arguments of a prominent Brazilian psychiatrist on the National Health Council, who favors lay psychoanalysis, are included. (English summary)(18 ref)—*N. T. Pinckney*.

1779. **Fordham, Michael.** **Jung's conception of transference.** *Journal of Analytical Psychology*, 1974(Jan), Vol 19(1), 1-21.—Critically examines Jung's writings on transference. Although Jung attributed to Freud the discovery of the therapeutic importance of transference, the theory here is that the therapeutic effect of psychoanalysis should be attributed to its development of awareness of the unconscious rather than to transference. Transference is interpreted as the ability to reveal all stages of the individuation process, projecting them into the analyst, who through his own experience of individuation becomes involved in an emotional dialectic with the patient. (21 ref)—*P. Federman*.

1780. **King, P. H.** **Notes on the psychoanalysis of older patients: Reappraisal of the potentialities for change during the second half of life.** *Journal of Analytical Psychology*, 1974(Jan), Vol 19(1), 22-37.—Sees the aging patient as threatened with disintegration and his inability to adjust to the changes demanded by the aging process. The following causes are discussed: diminution of sexual potency and capacity to have children, threat of displacement in work roles by younger persons, fear of retirement, illness or death of parents, onset of illness and dependence on others, and the possibility of the individual's own death. (51 ref)—*P. Federman*.

1781. **Reider, Norman.** **Metaphor as interpretation.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 463-469.—Presents the detailed history of the 4-yr psychoanalysis of a married woman in her 30's. The analogy which came up early in the analysis was the metaphor of the body for the house: the patient's rage and discontent over the redecoration of a house was, in reality, distress directed toward her own body. The progress of her treatment is described. A summary of the use of metaphors in psychoanalysis is provided.—*R. S. Albin*.

1782. **Rosenfeld, H.** **A critical appreciation of James Strachey's paper on the nature of the therapeutic action of psychoanalysis.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 455-461.—Discusses in detail a journal article of James Strachey (1934) which attempts a scientific approach to the central idea of the therapeutic function of psychoanalysis: the problem of interpretation. The meaning of these interpretations to both patient and analyst is outlined. The increase in knowledge since 1934 is presented. A lengthy discussion of the process of "working through" is included. Transference,

countertransference, and nonverbal communication are discussed. (20 ref)—R. S. Albin.

1783. Sarnoff, Charles A. **The vicissitudes of projection during an analysis encompassing late latency to early adolescence.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 515-522.—Reviews the case of a 9-yr-old girl in psychoanalysis for 5 yrs. Projection is defined and subdivided into projection associated with repression and projection associated with denial. The change from the repressive to the denial type is illustrated. It is seen that through projection the ego ideal is opened to influences from the peer group and the environment, providing a stepping-stone in the progress from childhood to adulthood through adolescence.—R. S. Albin.

1784. Weiss, Stanley S. (Franklin Medical Ctr Denver, CO) **Some thoughts and clinical vignettes on translocation of an analytic practice.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 505-513.—Summarizes the literature on early termination of psychoanalytic cases. The initial response of several patients to the news of the relocation of their analyst is discussed. In the safety of the analytic situation the patient can experience the painful effects in full force without being overwhelmed. Through appropriate and well-timed interpretations, especially transference interpretations, control and ego-strength can be gained. Therefore, a move of the analyst that interrupts an analysis prematurely can become one of those "special events" that at times intrude into the analysis but can be used effectively to assist analytic progress.—R. S. Albin.

1785. Williams, Mary. **Before and after the flood.** *Journal of Analytical Psychology*, 1974(Jan), Vol 19(1), 54-70.—Examined the flood dreams of 3 patients as these represent the interplay between unconscious fantasy on the infantile level and mythological themes. The 3 patients had a hatred for their mothers, accompanied by an urge toward a self-destruction Judeo-Christian myths played an important part in their lives. The Biblical flood myth lends itself to fantasy, and symbolizes death and rebirth.—P. Federman.

#### Counseling & Community Mental Health & Crisis Intervention

1786. ———. **Gay couple counseling: Proceedings of a conference.** *Homosexual Counseling Journal*, 1974(Jul), Vol 1(3), 88-139.—Presents the introductory address on perspectives for counseling homosexuals involved in paramarital relationships, edited transcripts of panel discussions between therapists and homosexuals on the problems of male and female couples, and summaries of small group discussions which were part of the counseling conference sponsored by the Homosexual Community Counseling Center in May 1974.

1787. Atthowe, John M. (Rutgers State U, Medical School) **Behavioral innovation: An all-encompassing system of intervention.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Argues that treatment alone does not go far enough in solving problems that patients bring to the treatment setting, and

that a reconceptualization of mental health and illness in an all-encompassing structural framework is needed. Problems associated with assumptions about the goal of treatment, and the need for comprehensive mental health services and a new technology of behavioral intervention are examined. (49 ref)

1788. Baker, Frank & Broskowski, Anthony. (Harvard U, Medical School, Boston) **The search for integrality: New organizational forms for human services.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Because community mental health centers have taken on responsibilities for specific catchment areas and have developed functions necessary to implement relevant programs, staff members are often involved in a bureaucratic maze of human service systems, agency structures, and organizational relationships. Suggestions for alternative strategies in human services that can more realistically deal with multiproblem families without elaborate referral procedures and that can improve resource and program allocation and effectiveness are presented. (40 ref)

1789. Baker, Frank. (Harvard U, Medical School, Boston) **Are community mental health centers organizing for continuity and efficiency?** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Reviews definitions of the concepts of continuity of care and efficiency, related measurement problems, and recent evidence of the extent to which community mental health centers are accomplishing these goals. Patterns of center organization and administrative subsystems which greatly affect operations and goals are examined. (20 ref)

1790. Broskowski, Anthony & Smith, Terence P. (United Community Planning Corp, Boston, MA) **Manpower development for human service systems.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Discusses the necessity of having human service systems respond to changes in the social, political, and economic environments. Recent changes, including alterations in population, new social policies, and recent conceptual approaches to planning and administration, are examined for their effects on service systems, and statewide systemic approaches to service delivery and training are reviewed. (43 ref)

1791. Browning, Philip L. (Ed.). (U Oregon) **Mental retardation: Rehabilitation and counseling.** Springfield, IL: Charles C Thomas, 1974. xvi, 447 p.—Considers the definition, classification, etiology, and prevalence of mental retardation, and comprehensively discusses the areas of rehabilitation and counseling as they affect the practitioner and researcher in the mental retardation field.

1792. Christiansen, Charles H. & Davidson, Donald A. (US Air Force Hosp, Lakenheath, England) **A community health program with low achieving adolescents.** *American Journal of Occupational Therapy*, 1974(Jul), Vol 28(6), 347-350.—Describes an experience with a group



of about 12 children of US Air Force personnel at an Air Force hospital overseas. Low-achieving adolescents from the local school system for Air Force dependents were seen in the occupational therapy clinic on a regular basis. Using behavior modification techniques to manage the group, activities were then structured to meet the various needs of the students. Results of the program after its 1st year indicate that community intervention programs can be successfully implemented in hospital clinic settings. —*Journal abstract.*

1793. **Chu, Franklin D. & Trotter, Sharland.** (Yale U, Law School) **The madness establishment: Ralph Nader's Study Group Report on the National Institute of Mental Health.** New York, NY: Grossman, 1974. xxiv, 232 p. \$7.95.—Analyzes the reasons for the failure of the 1963 Community Mental Health Center Act, focusing on the ineffectiveness of the National Institute of Mental Health bureaucracy, the self-interest of the psychiatric profession, and the 2-tiered program of treatment, one for the rich and another for the poor. Recommendations and conclusions on the nature of bureaucratic and political manipulation in the field of public mental health are presented. (14 p ref)

1794. **Clarke, James & Horrigan, Jack A.** (Denver General Hosp, Mental Health Clinic, CO) **Outcome measurement and system modeling for managerial control and accountability.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs.* Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Describes an experimental approach to treatment-program outcome measurement—a quantitative method for assessing program quality which involves measuring the actual results of treatment for different types of clients. The method involves a multidimensional questionnaire based on the belief that there are linear functions that express outcome as a function of processing and input variables. Statistical and computer procedures for the system are outlined.

1795. **Cowan, Margie L. & Caldwell, H. Stephen.** (Oklahoma State U) **Agency sample and community population expectancies: Age, sex, problem, client-therapist characteristics.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 289-293.—Results of a survey of therapists in mental health agencies indicate significant age, sex, and presenting-problem patterns in persons who contacted these agencies. There were consistent client differences between campus and community mental health agencies. More females made contacts with mental health agencies. There was no relationship between age, sex and client-therapist pairing.

1796. **du Mas, Frank M.** **Medical, nonmedical, or antimedical models for mental health centers?** *American Journal of Psychiatry*, 1974(Aug), Vol 131(8), 875-878.—Describes 3 models for mental health centers—medical, nonmedical, and antimedical—in terms of personnel, administration, professionalism, and scientific method. It is suggested that a multistage transition through these models may occur, ending in a heterogeneous compromise model. A returning emphasis on the medical model as the nonmedical mental health professions reach maturity is predicted.

1797. **Ford, Donald H.** (Pennsylvania State U, Coll of Human Development) **Mental health and human development: An analysis of a dilemma.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs.* Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Suggests that complex terminology, definitions, and labels used in the delivery of mental health services has restricted professional insight and placed limitations on potential services. Consequences of the continued separation of the concepts of mental health and mental illness may be serious, and conceptually integrative approaches to human development and service design need to be formulated. (15 ref)

1798. **Gittelman, Martin; Dubuis, Jacques & Gillet, Michel.** (New York School of Psychiatry, Ward's Island) **Recent developments in French public mental health.** *Psychiatric Quarterly*, 1973, Vol 47(4), 509-520.—Discusses the advantages accruing to comprehensive public mental health services from sectorization—the provision, in a relatively small geographic area, for all the facilities and services required for patient care. These services and facilities include geriatric centers; child guidance clinics; foster home placement; day, night, and weekend hospitalization; vocational and rehabilitation centers; halfway houses; an inpatient hospital; and crisis intervention services. The successful implementation of this plan of "sector psychiatry" in the 13th arrondissement of Paris is described. It is noted that, despite budget cuts for personnel, programs, and new construction, the administrative structure of sectorization offers a viable solution to the problem of delivering adequate mental health services.—*B. McLean.*

1799. **Harshbarger, Dwight & Maley, Roger F.** (West Virginia U) **Behavior analysis and systems analysis: An integrative approach to mental health programs.** Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.

1800. **Hirschowitz, Ralph G.** (Harvard U, Medical School, Lab of Community Psychiatry, Boston) **Mental health consultation: The state of the art.** *Psychiatric Quarterly*, 1973, Vol 47(4), 495-508.—Notes that through consultation, mental health professionals have become links between human service agencies and have changed traditional modes of thought and practice. 6 specific roles of the psychiatrist in community mental health practice are outlined, and G. Caplan's (1970) 4 categories of mental health consultation—client-centered case consultation, consultee-centered case consultation, program-centered administrative consultation, and consultee-centered administrative consultation—are discussed in detail. Significant aspects of the consultation process are delineated, and qualities of intelligent questioning, listening, and communication in the language of the consultee are stressed.—*B. McLean.*

1801. **Holding, T. A.** (MRC Unit for Epidemiological Studies in Psychiatry, Royal Edinburgh Hosp, Scotland) **The B.B.C. "Befrienders" series and its effects.** *British Journal of Psychiatry*, 1974(May), Vol 124, 470-472.—Reports that following broadcast of an 11-episode TV series portraying the Samaritans as a suicide prevention service, an increase in Samaritan clients was noted in Edinburgh. No reduction in attempts to commit suicide was noted at the hospitals. It is concluded that perhaps

the Samaritans function more as a crisis intervention service than as a parasuicide prevention agency.—R. L. Sulzer.

1802. Iscoe, Ira . (U Texas, Austin) **Community psychology and the competent community.** *American Psychologist*, 1974(Aug), Vol 29(8), 607-613.—Traces the rapid emergence of community psychology and stresses the need for the generation of new knowledge on communities. The competent community is defined as one that is involved in the development and utilization of resources by community members and one in which there is increased sophistication in coping with problems and issues. The suggested role for community psychology in such a setting is (a) to foster growth and be prepared for the consequences of increased growth of hope and power (e.g., the rejection of the helpers); and (b) to facilitate dialog between those in power and those seeking it thus eliminating failures in community growth programs that may be brought on by a lack of built-in feedback mechanisms and a philosophy of those in power that fosters anticompetence and dependency. —Author abstract.

1803. Kantor, Owen; Hiller, Anne & Thuell, Jenifer . (Columbia U, School of Social Work) **Developing an activity program in a welfare hotel.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 520-524.—Describes a part-time activity program conducted by 2 occupational therapists for the middle-aged and elderly male residents of a welfare hotel in New York City. Obstacles encountered in setting up the program and its accomplishments are discussed, emphasizing the need to build the self-images of the residents, most of whom were discharged state hospital patients, alcoholics, addicts, and ex-offenders.

1804. Klerman, Gerald . (Harvard U, Medical School, Boston) **Current evaluation research on mental health services.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 783-787.—Cites the evident need for better administrative and fiscal supervision of community-based mental health service units as well as for professional assessment of such centers. Unless extra-governmental financial support is increased, making possible the gathering of evaluative data, social and professional growth may be stifled. (20 ref)

1805. Krapfl, Jon E. (West Virginia U) **Accountability through cost-benefit analysis.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Analyzes the principle of accountability and some of the problems in developing cost-benefit measures of human service programs. Different levels and types of cost analyses are described, in addition to how they relate to the basic problem of creating a public reporting system which will contribute to the development of a more efficient human service system.

1806. Levy, Leo . (U Illinois, Medical Ctr) **The use of evaluative research in creating accountability.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Discusses issues in the evaluation of social programs, including whether the planners of the program

should also function as evaluators, the advisability of evaluating effectiveness with the same criteria used in the theoretical model or delivery system, the composition of policy-making groups and their functions, and the optimal use of program evaluation results. Problems in regulating the power of institutions whose purpose is to act on behalf of the public are examined.

1807. Maley, Roger F. & Harshbarger, Dwight . (West Virginia U) **The integration of behavior analysis and systems analysis: A look at the future?** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Discusses the need for behavior analysts and systems analysts to recognize that they are dealing with different aspects of the same problem—the delivery and evaluation of human services systems. The problems of defining goals, organizing functions, and evaluating results represent the largest obstacles; however, the integration of behavior and systems analyses appears most promising for overcoming these issues.

1808. Marmorale, Ann M. & Brown, Fred . (Staten Island Community Coll, City U New York) **Mental health intervention in the primary grades.** *Community Mental Health Journal Monograph Series*, 1974, No 7, 63 p.—Reports on a 4-yr program conducted in a New York City school. Experimental Ss were 145 1st-graders (at the start of the program): 42% Puerto Rican, 31% Caucasian, 22% Negro, and 3% Latin American. The control group of 133 Ss was similar. All Ss underwent an extensive battery of tests. The experimental group and their families had access to psychiatric, medical, psychological, sociological, anthropological, social work, and remediation experts. Counseling, group work, remedial reading, medical treatment, case work, and consultation formed the core of the program. At the end of the 3rd grade there were no meaningful differences between the scores attained by the two groups on the Wechsler Intelligence Scale for Children, Bender-Gestalt, the Wide Range Achievement Test, Children's Apperception Test, Peabody Picture Vocabulary Test, and the Goodenough-Harris Drawing Test. (22 ref)—H. Silverman.

1809. Overs, Robert P.; O'Connor, Elizabeth & Demarco, Barbara . **Avocational activities for the handicapped: A handbook for avocational counseling.** Springfield, IL: Charles C Thomas, 1974. xxvii, 178 p.—Presents descriptions of activities for use in avocational counseling by recreation and occupational therapists, social workers, and counselors. The phenomenological and psychological dimensions, interpersonal relationships, and social settings of each activity are described.

1810. Pyke, S. W. . **Counseling and the feminist.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 45-48.—Describes several types of stress and strain unique to modern feminists. To be most effective, counselors must be cognizant of these pressures and even sympathetic with them. Counseling programs specifically designed for the struggling feminist may be useful.

1811. Richard, Wayne C. (Dede Wallace Ctr, Nashville, TN) **Crisis intervention services following natural disaster: The Pennsylvania recovery project.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 211-219.—Describes a human service flood recovery



program established by mental health authorities in Pennsylvania after the severe floods of 1972. The 1-yr project was based on a crisis intervention model using 63 trained paraprofessional human service counselors working in neighborhoods and homes across the state. During the 1st 8 mo of the project, over 1,500 cases were handled involving individuals, families, and groups with a wide range of problems. These problems included consumer complaints, alcohol abuse, emotional disturbances, family crises, financial and medical problems, unemployment, and substandard temporary living conditions. The project was an example of a disaster relief program which emphasized the psychological and psychosocial effects of tragedy.—*Journal summary.*

1812. Rodman, Doris H. & Collins, Malcolm J. (Walter E. Fernald State School for the Mentally Retarded, Social Service, Waverley, MA) **A community residence program: An alternative to institutional living for the mentally retarded.** *Training School Bulletin*, 1974(May), Vol 71(1), 52-61.—Describes the experiences of 62 mildly and moderately mentally retarded men and women, demonstrating the validity of the concept that, given a fairly normal environment, the mentally retarded can function in the community. Results suggest that emphasis should now be given to experimentation with similar programs for the severely and profoundly retarded as well as the multiply handicapped.

1813. Sarason, Seymour B. (Yale U) **The psychological sense of community: Prospects for a community psychology.** San Francisco, CA: Jossey-Bass, 1974. xii, 290 p. \$12.50.—Contends that community psychology has failed in its efforts at social reform. The adverse consequences of segregating the mentally ill, aged, and others in residential institutions are discussed. A new community psychology is proposed which emphasizes a sense of belonging and responsibility among community members.

1814. Shochet, Bernard R. (Sinai Hosp, Psychiatric Liaison Service, Baltimore, MD) **The role of the mental health counselor in the psychiatric liaison service of the general hospital.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 1-16.—Describes the role and function of the mental health counselor. Specific functions—e.g., screening new admissions and case findings—are documented by case examples. Numerical analyses further illustrate the utilization of the counselor in a general hospital.

1815. Spaner, Fred E. (NIMH, Community Mental Health Consultation Section, Bethesda, MD) **New directions in community mental health center programs.** In D. Harshbarger & R. F. Maley (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Describes the general concepts, objectives, rationale, and current trends of the 1963 Community Mental Health Centers Act, in the areas of inpatient and outpatient services, partial hospitalization, programs for the continuity of care, and means of insuring accessibility and equity of services, community involvement, and accountability. Recommendations for further evolution of these processes are presented.

1816. Teegen, Frauke; Kranz, Dorothee & Fittkau, Bernd. (U Hamburg, Psychological Inst, W Germany)

[Investigation of the effectiveness of psychotherapeutic counseling by telephone.] (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 4(1), 323-334.—Examined the success factors of telephone counseling as they were exhibited in 36 10-min telephone conversations. Ss were 12 telephone counselors and 3 female clients who had prior instruction concerning the problems to be discussed. The performance of the counselors was recorded and judged by 18 neutral Os. Factor analysis produced 2 independent factors of significance: Empathy and Verbal Facility, both of which were highly correlated with the success of the counseling sessions as expressed by the clients' voiced satisfaction with the results and by their wish to contact the same counselor again in the future. (English summary)—T. Fisher.

### Physical Treatment

1817. Anoshian, Linda J.; Warren, David H. & Apkarian-Stielau, Pat. (U California, Riverside) **Progress after visual restoration: Two preliminary case reports and a request for communication.** *American Foundation for the Blind, Research Bulletin*, 1974(Apr), Vol 27, 310-312.—The literature on effective techniques of postoperative perceptual training and on psychological treatment of cases of visual restoration is limited. 2 case reports are reviewed and communication about other cases is requested.

1818. Briones, David F. & Rosenthal, Saul H. (U Texas, Medical School, San Antonio) **Changes in urinary free catecholamines and 17-ketosteroids with cerebral electrotherapy (electrosleep).** *Diseases of the Nervous System*, 1973(Jan), Vol 34(1), 57-58.—Studied changes in hormones and biogenic amines in 6 adult males as a result of cerebral electrotherapy (CET). Increases were found in total free catecholamines of urine taken over a 5-day course of CET; results with urinary 17-ketosteroids were mixed. It is hypothesized that these observations may be unrelated to amelioration of clinical symptoms following CET, but may result from hypothalamic or pituitary stimulation concomitant with CET therapy.—M. Oscar-Berman.

1819. Edwards, Allan E. & Hart, George M. (US Naval Hosp, Long Beach, CA) **Hyperbaric oxygenation and the cognitive functioning of the aged.** *Journal of the American Geriatrics Society*, 1974(Aug), Vol 22(8), 376-379.—20 healthy outpatients (average age, 67.9 yrs) suffering from memory lapses were given hyperbaric oxygen (100% at 2 atmospheres pressure) for 15 daily sessions of 2 hrs each. Comparison of pre- and posttest results on the Wechsler Adult Intelligence Scale revealed substantial improvement, particularly in tests concerned with short-term memory and visual organization. Ss who benefited most were those whose pretest Wechsler Memory Scale Quotients were between 70 and 110. There was no indication that the improvement reached a plateau after 15 sessions.—*Journal abstract.*

1820. Flemenbaum, A. (Texas Tech U, Medical School) **Cerebral electrotherapy (electrosleep): An open-clinical study with a six month follow-up.** *Psychosomatics*, 1974, Vol 15(1), 20-24.—Administered 5 electrosleep treatments to 25 patients with target symptoms of anxiety, depression, and insomnia, using Electrosone-50, a portable table-sized battery-powered apparatus mod-

eled after a Russian machine. Voltage was 15-25 volts. The group as a whole showed significant improvement as evaluated by psychiatric interviews, clinical global impressions, Zung depression scale, and self-rating on IDAM (Insomnia, Depression, Anxiety, and Miscellaneous) scale. Patients with previous psychotic episodes seemed to improve the most, contrary to previous reports. (19 ref)—A. S. Kulkarni.

1821. Miller, Michael B. (Nursing Home & Extended Care Facility of White Plains, NY) **Advanced occlusive arterial disease (gangrene) in the aged, and decision-making for amputation.** *Journal of the American Geriatrics Society*, 1974(Jul), Vol 22(7), 321-328.—Presents 4 case histories to illustrate how the decision regarding amputation of a gangrenous limb, which may be crucial to the patient's survival, can be influenced by the subjective attitudes of the patient's physician and family. It is felt that ethical values in the treatment of the mentally ill patient are in need of correction.

1822. Philpott, William H. (Fuller Memorial Hosp, S Attleboro, MA) **Sedac treatment, post sedac, response interference and electric shock.** *Diseases of the Nervous System*, 1973(Feb), Vol 34(2), 105-109.—Discusses the author's experiences in the use of Sedac treatment with neurotics, psychotics, and alcoholics. Long Time Sedac has been found useful for many types of responses, including insomnia, addictions, neuroses, and psychoses; Short Time Sedac (STS) treatments are often more effective than standard electric shock treatments. When electroconvulsive therapy (ECT) is used it is best to immediately follow it with a Sedac treatment, since this is more anxiety-relieving and to some degree clear of side effects of ECT. Either STS or ECT can be used as a pretreatment for orientation response inhibition therapy. ECT can also serve as the aversion (orientation response treatment itself. Both types of treatments raise the pain threshold and reduce the anticipation orientation. The treatment of choice for maximum value is a combination of STS followed by orientation response interference of verbally cued responses at the rate of 4 times/min for several minutes, followed by STS to insure anxiety inhibition at the end of treatment.—*Journal summary.*

### Social Casework & Rehabilitation

1823. Bauman, Gerald & Grunes, Ruth. (Lincoln Community Mental Health Ctr, New York, NY) **Psychiatric rehabilitation in the ghetto: An educational approach.** Lexington, KY: D.C. Heath, 1974. xx, 177 p.—Describes and evaluates the effectiveness of the Household Project, a 3-yr demonstration-research project aimed at developing services for former mental patients and their families in the inner city of New York. The nature of this educational approach to psychiatric rehabilitation and the special problems created by instituting a new human service program in a deprived and increasingly militant community are examined. (35 ref)

1824. Bender, Leonard F. (U Michigan, Medical School) **Prostheses and rehabilitation after arm amputation.** Springfield, MA: Charles C Thomas, 1974. xv, 179 p.—Presents comprehensive information about modern upper-extremity prostheses, and discusses causes of arm amputation, pre- and postoperative care and

rehabilitation, training for and with a prosthesis, and vocational and special considerations. (69 ref)

1825. Cohen, Charles. (Pittsburgh Public Schools, PA) **Rehabilitation counselors as needed school employees.** *Journal of Applied Rehabilitation Counseling*, 1974(Sum), Vol 5(2), 67-72.—Describes the utilization of 13 rehabilitation counselors hired by a public school system to give vocational counseling support to educable mentally retarded students attending vocational training courses. Steps in the counseling process are discussed, and the financial advantages of the program are examined.

1826. Friedlander, Walter A. & Apté, Robert Z. (U California, Berkeley) **Introduction to social welfare.** (4th ed). Englewood Cliffs, NJ: Prentice-Hall, 1974. xv, 560 p.—Presents a comprehensive description of the field of social welfare and social work, including the historical development of social welfare, social work processes, and social welfare programs and practices. Also discussed are the history of voluntary and public social services in the US; social work with groups; housing and the social environment; social work and correctional medical and mental health services; and professional education, practice, and issues in social work.

1827. Hafemann, Sarah F. & Chilman, Catherine S. (Milwaukee County Dept of Family Conciliation, WI) **Implications of vasectomy for social work practice.** *Social Casework*, 1974(Jun), Vol 55(6), 343-351.—Discusses medical, psychological, and social aspects of vasectomy. The medical procedure is relatively simple but a later reversal is difficult. Psychological aspects are important both in motivation and aftereffects. Vasectomy does not seem to be useful in treating frigidity, impotence, or premature ejaculation. Infidelity, divorce, and separation are likewise unaffected by the operation. Men do not appear pressured into the procedure. Public attitudes have steadily become more accepting of this birth-control method, but professionals now caution against its unadvised use. Implications for social workers include program planning and development, education, and pre- and postcounseling. Professionally prepared workers are important in providing quality services.—M. W. Linn.

1828. Hardy, Richard E. & Cull, John G. (Virginia Commonwealth U) **Severe disabilities: Social and rehabilitation approaches.** Springfield, IL: Charles C Thomas, 1974. xi, 317 p.—Discusses the problems of mentally retarded, epileptic, cerebral palsied, speech handicapped, blind, mentally ill, spinal cord injured, deaf, and diabetic persons, as well as rehabilitation work with those suffering from cancer, rheumatoid arthritis, heart disease, and pulmonary disability.

1829. Ince, Laurence P. (Ctr for Learning Disabilities, Briarwood, NY) **The rehabilitation medicine services.** Springfield, IL: Charles C Thomas, 1974. xvi, 576 p.—Discusses the roles and functions of the treatment disciplines which comprise the rehabilitation team. Among the topics detailed are the disorders and disabilities of rehabilitation patients; physical, occupational, and recreation therapies; speech and language therapy and auditory training; psychology, social work, and nursing, and vocational counseling.



1830. Lang, Judith . (Jewish Family Service, New York, NY) **Planned short-term treatment in a family agency.** *Social Casework*, 1974(Jun), Vol 55(6), 369-374.

—Discusses crisis intervention in a family service setting. Quick-response casework units offer immediate service using flexible modalities for treatment. A maximum 6-wk treatment period can effect change while families are motivated to resolve problems. Early, realistic goal-setting sharpens worker performance and supports family reintegration. The approach can reach clients who otherwise might be frustrated by longer, more traditional intake procedures.—*M. W. Linn*.

1831. Schlesinger, Lawrence E. & Frank, Donald . (National Children's Rehabilitation Ctr, Leesburg, VA) **From demonstration to dissemination: Gateways to employment for epileptics.** *Rehabilitation Literature*, 1974(Apr), Vol 35(4), 98-106.—Summarizes the procedures and results of a pilot project sponsored by the US Department of Labor in 1967-1968, which successfully demonstrated the positive outcomes of an intensified rehabilitation program for epileptics. Moribund for several years because of lack of interest, funds, or sponsorship, the concepts and techniques developed by the project have now been resurrected and are being applied in 5 Texas cities. A concerted effort to install such programs nationally is strongly advocated. (21 ref)—*S. L. Warren*.

1832. Weikel, William J. & Johnson, Richard H. (U Florida) **A simple model for identifying probable failures in a rehabilitation program.** *Journal of Applied Rehabilitation Counseling*, 1974(Sum), Vol 5(2), 106-111.—Describes a 9-step procedure for identifying potential client failures in any type of rehabilitation program. The 9 steps result in the assignment of predictive weights to various client variables (e.g., age, sex, and diagnosis). Examples of failure profiles are presented.

1833. Weisberg, Lillian M. **Casework with the terminally ill.** *Social Casework*, 1974(Jun), Vol 55(6), 337-342.—Discusses theory and relationships in casework with the terminally ill. Individuals are often left alone to face death. Professionals must involve themselves in this final crisis. Kubler-Ross has defined the stages of dying as denial, anger, bargaining, depression, and acceptance. A case history illustrating the process is presented. Catastrophic illness is regarded as an important social concern demanding new approaches in management. The interdisciplinary team is suggested as one type of management.—*M. W. Linn*.

#### Hospital Programs & Hospitalization & Institutionalization

1834. Alexander, E. R.; Hall, D. J. & Little, J. Crawford . (Ross Clinic, Aberdeen, Scotland) **Non-diagnostic prediction of behaviour and outcome in male psychiatric admissions.** *British Journal of Psychiatry*, 1974(Jun), Vol 124, 579-587.—Described preadmission personal and social characteristics and immediate precipitants of admission of 213 15-64 yr old male admissions to a psychiatric hospital. Both cooperative behavior while in the hospital and outcome are related to these preadmission nondiagnostic variables (e.g., employment history, marital status, criminal record, drinking problems, and living circumstances). It is suggested

that males who can statistically be predicted to behave badly and make little progress in the hospital should not be imposed on other patients and nurses in a general acute male admission ward.—*Journal summary*.

1835. Allekian, Constance . (Triton Junior Coll) **Intrusions of territory and personal space: An exploratory study of anxiety-inducing factors in hospitalized patients.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 27-39.—Defines territory as "an area of the hospital room which is claimed by the patient" and personal space as "an area extending outward to a distance of four feet from the person's body." According to a questionnaire administered to patients, intrusions on territory caused feelings of anxiety, but intrusions on personal space did not. Implications and limitations of the findings are discussed. (17 ref)—*R. M. Cohen*.

1836. Berman, Richard . (Bronx State Hosp, Williamsbridge-Fordham Unit, NY) **The social center: An experiment in aftercare.** *Journal of the Bronx State Hospital*, 1974(Spr), Vol 2(2), 82-85.—Describes a social center set up as an integral part of an outpatient clinic and designed to achieve a redevelopment of social skills and meaningful human relationships in its clients. The types of programs being used to assist outpatients in dealing with emotional difficulties encountered upon reentering the community are discussed.

1837. Black, Bertram J. & Chapple, Eliot D. (Albert Einstein Coll of Medicine, Yeshiva U) **Rehabilitation through productive participation: A stance for mental health services in the 1970's.** *Psychiatric Quarterly*, 1973, Vol 47(4), 521-532.—Argues that, just as the advent of the psychotropic drugs in the 1950s changed the emphasis in state hospitals from custodial care to an active treatment regimen, so the current experiments with therapeutic milieu approaches and community mental health practices can be brought to fruition in the 1970s by adoption of the principle of rehabilitation through "productive participation." It is stressed that mental hospitals must become rehabilitation enterprises as well as medical institutions, providing a whole spectrum of specialized services as part of the treatment regimen. Widespread demonstration programs to this effect are urged.—*Journal abstract*.

1838. Clark, David H. (Addenbrookes & Fulbourn Hosp, Cambridge, England) **Social therapy in psychiatry.** Middlesex, England: Penguin, 1974. 157 p. \$1.75.—Summarizes psychiatric discoveries and personal experiences over the last 20 yrs in the use of social measures in a hospital milieu to help people change to a state more tolerable to themselves and others. The history of treatment; application, success, and failure of new ideas; and the part that social science has played in increasing liberal attitudes in staff and patients are discussed. (38 ref)

1839. Craft, Michael . (Garth Anmarad, Penmaenpool, Wales) **A Welsh forensic psychiatric service for doctors.** *British Journal of Psychiatry*, 1974(May), Vol 124, 494-495.—Evaluates the results of treating psychopaths and other abnormal offenders at Garth, a mountain-top residential unit providing a therapeutic community for male court referrals, by tabulating outcomes for 300 persons. The number of reconvictions

was reduced, and more offenders were placed in training centers and in sheltered workshops.

1840. Easton, Karl. (Mount Sinai School of Medicine, City U New York) **Boerum Hill: A private long-term residential program for former mental patients.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 513-517.—Discusses the need for a wide variety of community living arrangements for former mental patients, and describes a private residential-care program founded by the author in New York City in 1966. The program includes the 196-bed Boerum Hill Home for Adults, which is certified by the state as a proprietary home and a community residence, and the Brooklyn Vocational Rehabilitation Institute, which conducts vocational training programs for former patients in clerical, food service, and home management areas.

1841. Evangelakis, Miltiades G. (South Florida State Hosp, Children's Div, Hollywood) **A manual for residential and day treatment of children.** Springfield, IL: Charles C Thomas, 1974. xv, 369 p. \$14.50.—Presents a guide for all professionals who work with children in an institutional or day-care setting. Topics include characteristic residential and day treatment centers; administration; methods of integration; functions and roles of the child study unit, child psychiatrist-residence chief, and social work and psychology services; paraprofessional duties; and required psychotherapy and nursing services.

1842. Fryers, T. (Dept of Community Medicine, Manchester, England) **Psychiatric inpatients in 1982: How many beds?** *Psychological Medicine*, 1974(May), Vol 4(2), 196-211.—Data collected by the Salford Psychiatric Case Register indicate that by 1982 total occupancy is likely to be about 2.3 beds/1,000 of the population, and about 1.7 beds/1,000 for long-stay patients (those remaining 1 yr or longer). 3 methods of projecting the accumulation of new long-stay patients are described. (18 ref)

1843. Glenn, Michael (Ed.). **Voices from the asylum.** New York, NY: Harper Colophon, 1974. xvii, 236 p. \$3.95.—After an account of methods of treating mentally ill patients in the past, current oppression and suffering in mental institutions is examined. Personal accounts of patients and staff are presented, and a patients' rights manual is included.

1844. Grob, Mollie C. & Singer, Judith E. **Adolescent patients in transition: Impact and outcome of psychiatric hospitalization.** New York, NY: Behavioral Publications, 1974. xvi, 202 p.—Reports a study of the effects of psychiatric hospitalization on adolescents and their families and their views of the experience and the types of preadmission, hospital, and posthospital variables related to functioning at follow-up. Data were obtained from interviews and observations of 36 male and 31 female 13-19 yr olds who were admitted to a small, private, psychoanalytically oriented psychiatric hospital in Massachusetts.

1845. Hayden, Teresa; Osborne, Alfred E.; Hall, Sharon M. & Hall, Robert G. (Kansas State U) **Behavioral effects of price changes in a token economy.** *Journal of Abnormal Psychology*, 1974 (Aug), Vol 83(4), 432-439.—A total of 33 male psychiatric patients who participated in a token system were exposed to changes

in the token price of available commodities in 2 experiments. In Exp I the price of cigarettes was first raised, then lowered. As predicted, consumption of cigarettes decreased during price increases and increased during price decreases. Contrary to expectations, Ss did not consume less of other commodities or increase their earnings in order to purchase cigarettes at the higher prices. In Exp II, which again raised and lowered the price of cigarettes, evidence was found for the notion that the proportional price change rather than the absolute price change governed cigarette consumption behavior.—*Journal abstract.*

1846. Herrera, Elizabeth G.; Lifson, Betty G.; Hartmann, Ernest & Solomon, Maida H. **A 10-yr follow-up of 55 hospitalized adolescents.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 769-774.—55 young adults (present ages 25-29 yrs) hospitalized for mental illness were followed up 10 yrs after their discharge as a sequel to 3 earlier follow-up studies. The majority of Ss were still poorly adjusted. The area of greatest competence was in school and work, whereas social relationships were almost universally inadequate. Preadmission variables most predictive of good long-range outcome were "chumship" and leadership experiences and healthy parental attitudes. The only therapeutic variables related to long-range outcome were those which described degree of illness. Evidence points strongly to the need for postdischarge vocational services for patients and therapy for parents. (27 ref)—*Journal abstract.*

1847. Karasu, Toksoz B. & Hertzman, Marc. (Albert Einstein Coll of Medicine, Bronx Municipal Hosp Ctr, Yeshiva U) **Notes on a contextual approach to medical ward consultation: The importance of social system mythology.** *International Journal of Psychiatry in Medicine*, 1974(Win), Vol 5(1), 41-49.—Proposes that the medical ward be viewed as a model of a "quasi-open community," in which a culture is transmitted from one generation of personnel to the next through a ward mythology which embodies ideals; e.g., it includes idealized roles for the nurse and doctor. Requests for psychiatric consultation often result from a partial breakdown in this mythology. Implications of this model for the consultant are discussed. Case examples illustrate the principles discussed. (14 ref)—*Journal abstract.*

1848. Kazdin, Alan. (Pennsylvania State U) **A review of token economy treatment modalities.** In D. Harshbarger & R. F. Mailey (Eds), *Behavior analysis and systems analysis: An integrative approach to mental health programs*. Kalamazoo, MI: Behaviordelia, 1974. ix, 403 p. \$14.95.—Presents a review of research on token economy systems emphasizing their effectiveness in dealing with symptomatic behaviors, social interaction of psychiatric patients, changes associated with token reinforcement, combined treatments, the role of punishment, transfer of training, response maintenance, and their social and organizational implications. Issues involved in staff training and the role of the community in token systems are also discussed. (9 p ref)

1849. Linscheid, Thomas R.; Malosky, Phyllis & Zimmerman, Joe. (Indiana U.—Purdue U., Indianapolis) **Discharge as the major consequence in a hospitalized patient's behavior management program: A case study.** *Behavior Therapy*, 1974(Jul), Vol. 5(4), 559-564.—De-



scribes a patient's token reinforcement system in which discharge itself was a purchasable reinforcer. Inclusion of discharge as a reinforcer requires those responsible for a patient objectively to define desired and undesired behaviors and then to convey this information to the patients.

1850. Milenkov, K. **Reasons for removing cases of manic-depression from the outpatient files.** *Foreign Psychiatry*, 1973-1974(Win), Vol 2(4), 72-77.—Analyzed the removal of 387 outpatient records from the files during 1967-1969 to determine reasons for removal. Almost half the cases had been removed because the patient died; 1/5 of the deaths were suicides. 27% of the files were removed because the patient recovered or experienced a prolonged lucid period. "Other reasons," chiefly change of residence, accounted for 27% of removals. Figures for men and women were about the same. The average age of suicides was 48 yrs; of those dead from other causes, 62 yrs; and of those recovered, about 48 yrs. Recommendations are made for improving the statistics by changes in record-keeping methods.—I. Davis.

1851. Milenkov, K. **The duration of outpatient follow-up supervision of manic-depressives.** *Foreign Psychiatry*, 1973-1974(Win), Vol 2(4), 67-71.—Analyzed the opinions of 965 Bulgarian psychiatric specialists as to the proper duration of supervision of manic-depressive outpatients. 62% of all specialists responding felt that supervision should continue throughout the life of the patient. 22% favored supervision for a period up to 10 yrs, about 12% favored a period up to 5 yrs, and only 2% felt that supervision should be discontinued after only 2 yrs. The implications of these findings for the maintenance of patient records in active vs inactive files are discussed. It is considered that no rigid formal time limit for patient supervision should apply; the time should be flexible and dependent on the individual case. In general, however, active supervision should continue for 2-5 yrs after the last psychotic attack; thereafter, it should be left to the patient to seek help if needed.—I. Davis.

1852. Miller, Kent S.; Simons, Ronald L. & Fein, Sara B. (Florida State U) **Compulsory mental hospitalization in England and Wales.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 151-156.—Analyzed data on formal admissions to mental hospitals in England and Wales from 1964 through 1970 in terms of variations over time, region, age, sex, and 1st or multiple admissions. Considerable variability was noted which was attributed to arbitrary administrative policy and highly individualized practices, rather than the behavior or needs of the patient. An argument is made for a critical review of the use of compulsory powers. (19 ref)

1853. Morgan, R.; Cheadle, A. J. & Staples, P. W. (St Wulstan's Hosp, Malvern, England) **Cash in hand.** *British Journal of Psychiatry*, 1974(May), Vol 124, 487-493.—Reports results of a 1972 change in the law which allowed patients' earnings in British hospitals to rise. In a sample of 157 patients, 26% showed an increased work output. Patients with 2 or more conditions and those receiving high doses of neuroleptic drugs showed less improvement in work.

1854. Orlando, Norma J. (Elgin State Hosp, IL) **The mental patient as therapeutic agent: Self-change,**

**power, and caring.** *Psychotherapy: Theory, Research & Practice*, 1974(Spr), Vol 11(1), 58-62.—Conducted a pilot study to see whether it was possible to train hospitalized mental patients to become therapeutic agents for their fellow patients. Ss were 3 chronic patients from a locked ward. Sessions between patients acting as therapists and clients were videotaped and the E instructed the therapists in attending, reflecting feelings, and avoiding judgments. The effectiveness of the training was evaluated qualitatively.—C. P. McCreary.

1855. Ozerengin, M. F. & Cowen, Murray A. (Marcy State Hosp, Research Services, NY) **Environmental noise level is a factor in the treatment of hospitalized schizophrenics.** *Diseases of the Nervous System*, 1974(May), Vol 35(5), 241-243.—2 groups of physically healthy schizophrenic patients (15 withdrawn and 15 actives with comparable sex and age distribution) were placed first in a quiet environment in which the noise level was kept between 40-60 db for 3 hrs each morning for 6 wks. Therapeutic, psychological, and clinical parameters were used to examine the effects of this particular environment. At the end of 6 wks, Ss were switched to a noisy environment where the noise level averaged 80-90 db. In the withdrawn group, the noisy environment produced increased motor and verbal performance, improved perceptual organization, and improved sleep pattern and hallucinations. As a result, overall improvement caused medication decrease. For the active group in a noisy environment, performance decreased and there was an increase in conceptual disorganization, anxiety, and restlessness, resulting in an increase of 40% in their medication. The withdrawn group in the quiet environment showed considerable regression with heightened autism, seclusiveness, more conceptual disorganization, and disturbed sleep patterns with increased hallucinations. The active group in the quiet environment showed improved performance, decreased anxiety, more conceptual organization, less hallucinations, and better sleep patterns; motor and verbal productivity increased.—*Journal abstract*.

1856. Perr, Irwin N. (Rutgers Medical School, Coll of Medicine & Dentistry of New Jersey, Piscataway) **Independent examination of patients hospitalized against their will.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 765-768.—The justification for legal commitment of the mentally ill has come under increasing public and professional scrutiny. While there have been few abuses or errors, certain types of problems are more likely to be reflected in unmerited hospitalization. 9 hospitalizations are reviewed in which an independent psychiatric examination was requested by a private attorney. In 3 of the 9 cases, mandatory hospitalization was not justified. Problem cases involved individuals with a history of mental illness, domestic or marital disputes, and organic mental illness—particularly those related to aging. It is stressed that examination at a later date may reflect the marked improvement that has occurred clinically rather than the symptom picture at the time of hospitalization.—*Journal abstract*.

1857. Rabiner, Charles J. & Lurie, Abraham. (Long Island Jewish—Hillside Medical Ctr, New Hyde Park, NY) **The case for psychiatric hospitalization.** *American Journal of Psychiatry*, 1974(Jul), Vol 131(7), 761-764.

—Indicates that the goal of psychiatric treatment is to restore the patient to a reasonable state of mental health. Hospitalization is often considered to be an unnecessarily expensive component of a total treatment program. It is argued that, in the zeal to reduce expense, many patients for whom hospitalization is indicated are either refused admission or are prematurely discharged. In certain cases the judicious use of hospitalization is suggested to be less costly in terms of the overall treatment program. Some of the other possible benefits to be gained from a period of hospitalization are cited.—*Journal abstract.*

1858. Rachlin, Stephen; Milton, Janet & Pam, Alvin. (Bronx State Hosp, Williamsbridge-Fordham Unit, NY) **The closed ward viewed longitudinally.** *Journal of the Bronx State Hospital*, 1974(Spr), Vol 2(2), 61-70.—Outlines the development of concepts and philosophy relative to the locked ward. Studies of elopement are reviewed which led, in part, to the opening of the Lincoln Intensive Care Unit (ICU). The history of the ICU, its patterns of use, and its operation are detailed. Follow-up data on the 50 patients who completed the treatment, and the advantages and problems associated with the closed setting form the basis for presentation of ideas as to how the hospital can be most responsive to the needs of those it serves. An attempt to reconcile a closed setting with current concepts of civil liberties is presented.—*Journal abstract.*

1859. Reimer, F. & Willis, E. (Weinsberg Municipal Psychiatric Hosp, W Germany) **[New trends in industrial work therapy in a psychiatric hospital.]** (Germ) *Nervenarzt*, 1972(Mar), Vol 43(3), 155-156.—Reports on the organization of the work therapy program in an 80-bed psychiatric hospital. Aspects described and discussed are the modernization of the intramural work therapy (involving a transition from simple, institution-centered crafts, gardening, and agricultural chores to industrial production techniques); assignment of patients to types of work and groups; the work-release program for jobs in nearby industrial enterprises; the remuneration, leave allowances, and other privileges of working patients; protection from abuse and exploitation; cooperation with coworkers, unions, and the community; and other problems and phases of the program.—*T. Fisher.*

1860. Rosenblatt, Aaron; Mayer, John E. & Pam, Alvin. (Bronx State Hosp, Social Science Section, NY) **Patients who return: A consideration of some neglected influences.** *Journal of the Bronx State Hospital*, 1974(Spr), Vol 2(2), 71-81.—Interviewed 30 mental patients who returned to the hospital in order to delineate some of the social processes leading to their return. Attention is focused on the influence of familiarity, hospitality, and the reduction of stigma. The consequences of hospitality on the goals of modern day treatment are discussed.—*Journal abstract.*

1861. Russo, J. Robert. (Southern Illinois U, Graduate School) **Mutually therapeutic interaction between mental patients and delinquents.** *Hospital & Community Psychiatry*, 1974(Aug), Vol 25(8), 531-533.—Describes a program in which juvenile delinquents from a correctional facility for boys visit patients in a state mental hospital. The program is designed to improve the delinquent's self-concepts by enabling them

to help others. For approximately 4 mo, the delinquents go to the hospital every other day to work with the patients in individual and group activities. A study of any changes that might have occurred in the patients was conducted using patients in the program and a control group of patients who did not participate. Staff ratings on the Psychotic Reaction Profile, a 12-item questionnaire on cleanliness and socialization, at the beginning and end of the 4-mo period show that the program patients were significantly improved, especially in the areas of cleanliness and sociability. Comparisons of participating and control delinquents show that the participants viewed themselves, their fathers, and the police significantly more positively than controls; there were no differences in academic performance.—*L. Gorsey.*

1862. Serban, George & Gldynski, Christina B. (New York U, Medical Ctr) **Significance of social demographic data for rehospitalization of schizophrenic patients.** *Journal of Health & Social Behavior*, 1974(Jun), Vol 15(2), 117-126.—Studied the social-demographic variables of education, marital status, employment history, and occupation of 70 acute and 349 chronic schizophrenics of both sexes in relation to readmission. None of these variables were significantly associated with readmission of acute schizophrenics. Among chronic patients, social-demographic index (combining the 4 variables) differentiated readmitted from nonreadmitted group, but further analyses revealed that only marital status and occupation contributed significantly to this differentiation. Although employment history did not appear to be related to readmission among chronic schizophrenics, dependence on welfare was particularly predictive of negative outcome. (21 ref)—*Journal abstract.*

1863. Turns, Danielle M. & Gruenberg, Ernest M. (Hudson River State Hosp, Epidemiology Research Unit, Poughkeepsie, NY) **An attendant is murdered: The state hospital responds.** *Psychiatric Quarterly*, 1973, Vol 47(4), 487-494.—Conducted a study of 80 patients in a mental hospital at the time of an attendant's murder by another patient, comparing their behavior and care patterns with those of 98 patients in a previous study. A before-and-after design was used, based on 4 indices reflecting the expected impact of the murder: (a) increase in transfers to closed wards, (b) decrease in releases and home leaves, (c) increase in tranquilizer usage, and (d) increase in admission social breakdown syndromes. Results show that none of the indices monitored reflected any major or lasting changes in the day-to-day functioning of the hospital. Some tentative explanations are offered.—*Journal abstract.*

## EDUCATIONAL PSYCHOLOGY

1864. Amiel-Lebigne, F. (National Ctr of Scientific Research, Sainte-Anne Hosp, Paris, France) **[Epidemiological study of psychological morbidity among teachers.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(1), 43-65.—Discusses attitudes toward teaching among professional female teachers in Paris. Ss dissatisfied with their choice of teaching as a profession showed significantly more maladjustment. The question is asked,



but left unanswered, whether the physical and psychological symptomatology reported resulted from the teaching environment or whether the teacher had the symptoms prior to entering the profession.—K. J. Hariman

1865. Brandtstädter, J., et al. (U. Trier-Kaiserslautern, Div. 1 of Psychology, W. Germany) [Design of heuristic-taxonomic models for structuring objectives in pedagogical and psychological research and theory.] (Germ) *Zeitschrift für Entwicklungspsychologie und Pädagogische Psychologie*, 1974, Vol. 6(1), 1-18.—Presents a taxonomic scheme to delineate research and teaching objectives in educational psychology. The scheme, which was developed as a framework for a graduate program in educational psychology, is derived from theoretical and programmatic considerations concerning educational psychology as a science and profession. Used as a heuristic device, it facilitates the identification of curricular content areas and indicates a sequence of cognitive-behavioral modes which the student should apply to these content areas. (47 ref)—*English summary*.

1866. Carranza, Elibio. (California State U., San Jose) **Life changes and teacher performance.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 73-78. Investigated the effect of life changes (as measured by the Schedule of Recent Experience—SRE) on the performance of 110 high school teachers. Teacher performance measures included rate of absenteeism, requests for transfer, units earned beyond the BA degree, and distribution of student grades. Significant positive correlations were found between (a) SRE scores and teacher absenteeism due to illness, (b) SRE scores and the number of times the teacher changed residence, and (c) student drop-out rate and percentage of D's and F's distributed. Negative correlations were found between (a) SRE scores and units earned beyond the BA degree; (b) teacher performance units earned and absence due to illness, frequency of absence, and duration of absence; and (c) student drop-out rate and percentage of A's and B's distributed. Data support the hypothesis that life changes and teacher performance variables are significantly correlated and that large life changes are associated with less desirable aspects of performance.—L. Gorsey.

1867. Cowen, Emory L. & Lorion, Raymond P. (U Rochester) **Which kids are helped?** *Journal of Special Education*, 1974(Sum), Vol. 8(2), 187-192.—Describes the Primary Mental Health Project (PMHP), an innovative school mental health program that uses nonprofessional child-aides as direct help-agents with young poorly adjusted school children. Findings from a series of studies aimed at identifying children who are most and least helped by this type of intervention are presented. Younger, initially less maladapted, shy-withdrawn, relatively high socioeconomic status, suburban children improve most through the aide intervention. The relation of these findings to data on the effectiveness of other types of helping services and their implications for program modification are considered. (27 ref)—*Journal abstract*.

1868. Denton, David E. (Ed.). (U Kentucky) **Existentialism and phenomenology in education: Collected essays.** New York, NY: Teachers College Press, 1974. iii,

223 p. \$9.95.—Includes discussion of the work of J. Dewey and of M. Unamuno; the existential ground for aesthetic education; the relationship between literature, existentialism, and education; the multiple realities of schooling; and phenomenology and educational research.

1869. Dunkin, Michael J. & Biddle, Bruce J. (Macquarie U, Sydney, NSW, Australia) **The study of teaching.** New York, NY: Holt, Rinehart & Winston, 1974. xv, 490 p.—Presents an advanced text on research on teaching and methods and issues associated with the field and study of teaching. Topics include early research on teacher effectiveness, beliefs about teaching and teaching research, models for classroom teaching, methodological problems in classroom research, the classroom as a social system, patterns of classroom behavior, and recommendations for both teachers and researchers in the areas of theory, measurement, and practice. (19% p ref)

1870. Farley, Jennie. (Cornell U, New York State School of Industrial & Labor Relations) **Coeducation and college women.** *Cornell Journal of Social Relations*, 1974(Spring), Vol. 9(1), 87-97.—Data from a 1972 survey at Cornell University, which has been coeducational for 100 yrs, suggest that women undergraduates differ from their male classmates in ways which may be occupationally crippling. Evidence that Cornell women, as a group, report higher grade point averages than the men yet report themselves to be less intelligent than the men is presented, together with evidence that Cornell women still choose "women's fields." Suggestions for broadening women's perceptions of their own capabilities and for equalizing opportunities open to them are included. (29 ref)—*Journal abstract*.

1871. Fincher, Cameron. (U. Georgia, Inst. of Higher Education) **A minimax principle for educational research.** *Research in Higher Education*, 1974, Vol. 2(2), 99-107.—Suggests that educational research has lost considerable prestige in recent years and has been relegated to a defensive position. It is argued that in order for the findings of educational research to be more readily understood and widely accepted, researchers should pay more attention to the reduction of needless methodological complexity and to the improvement of conceptual clarity. To focus attention on this necessity, a minimax principle is suggested in which the educational researcher would minimize the maximum methodological complexity that is necessary to produce a satisfactory degree of conceptual clarity.—*Journal abstract*.

1872. Gagné, Robert M. (Florida State U) **Essentials of learning for instruction.** Hinsdale, IL: Dryden, 1974. viii, 164 p.—Discusses the basic facts and principles of human learning, illustrated with examples of learning in educational settings. Processes, outcomes, and conditions for learning are detailed, and the planning and delivering of instruction is discussed. (7 p ref)

1873. Gilmore, George E. (U Texas, Austin) **Models for school psychology: Dimensions, barriers, and implications.** *Journal of School Psychology*, 1974, Vol. 12(2), 95-101.—Argues that the development of school psychology may be seriously retarded unless a program is designed to overcome several hurdles: professional insecurity, nonlanguage, and awkward interprofessional

relationships. It is proposed that the models of school psychology—clinical, psychoeducational, educational programmer, systems-level problem solver, and preventive mental health—offer the potential but no guarantee that the profession will develop appropriately. (21 ref)  
—*Journal abstract.*

1874. Hannum, Wallace H. (Florida State U, Ctr for Educational Technology) **Toward a framework for task analysis.** *Educational Technology*, 1974(Feb), Vol 14(2), 57-58.—Offers a framework for viewing task analysis, based on the hypothesis that certain kinds of learning are necessary prerequisites to other kinds of learning and that tasks should be arranged hierarchically. Intellectual skills, motor skills, attitudes, and verbal information are discussed. The domain of cognitive strategies is thought to differ from these 4 domains in that it represents the learner's overall approach to managing the processes of attending, learning, remembering, and thinking. Thus, it is involved in the learning of tasks in the other 4 domains. The domain of the learning task should first be identified and then the appropriate task analysis procedure should be applied.—*R. S. Albin.*

1875. Karfiková, Svetla. (Pedagogical Research Inst, Bratislava, Czechoslovakia) [New teaching space for modern teaching technology.] (Slovak) *Jednotná Škola*, 1974(Mar), Vol 26(3), 249-259.—Suggests that school buildings be designed to be adaptable to future needs and changing pedagogical methods. Intensification of the teaching process means greater mental and physical stress for both student and teacher. Better working conditions and more flexible teaching space will compensate for stress by physically and technically providing a stimulating environment.

1876. Kushel, Gerald & Madon, Constant A. (C. W. Post Ctr, Long Island U) **Fact and folklore: Social and psychological foundations of teaching.** New York, NY: John Wiley & Sons, 1974. xiii, 178 p. \$8.95(cloth), \$4.95(paper).—Uses the case method to help the student of education distinguish sound teaching principles from unfounded opinion and folklore. Among the topics considered are today's student and alienation, disadvantaged youth, school-community relations, classroom management and the teaching process, and job satisfaction and teaching as a career.

1877. Malott, Richard W. **Contingency management in education.** Kalamazoo, MI: Behaviordelia, 1972. 253 p.—Presents an introduction to the principles of contingency management, and their applicability to education, in a comic book format. Principles of reinforcement, types of reinforcers, guidelines for effective studying, and the conceptual framework of behaviorism are examined.

1878. Robertshaw, C. Stuart & Johnson, Cathy A. (U Wisconsin, La Crosse) **The remedial contract: A facilitator of accountability in education.** *SALT: School Applications of Learning Theory*, 1974(Apr), Vol 6(3), 25-31.—Used a contract as facilitator of accountability with teaching personnel. S was a 5-yr-old male in a private preschool. A contract was designed that would pay for direct remedial services and train the parent to take over the services. At the end of the contract changes were evident in several areas for both the S and the parent.—*D. R. Marina.*

1879. Schmuck, Richard A. & Schmuck, Patricia A. (U Oregon) **A humanistic psychology of education: Making the school everybody's house.** Palo Alto, CA: National Press, 1974. xi, 388 p.—Presents a clarifying analysis of current psychological theories and research in education, and stresses that educational environments should be humanistic climates for learning. Means for changing learning climates, for applying systems theory to schools, and for humanizing learning groups are discussed. (12 p ref)

1880. Sluyter, Gary V. (Texas Dept of Mental Health & Mental Retardation, Houston) **Doctoral training in special education.** *College Student Journal*, 1974(Apr), Vol 8(2), 74-81.—Explores new approaches to the program of doctoral training in special education. The concept of flexibility in the requirements for a doctorate is emphasized. Phase 1 is the process of selecting the doctoral candidate, which should emphasize his intelligence, his empathic understanding of the range and problems of special education, and his spontaneous curiosity and originality. Phase 2 is the assignment of a temporary advisor for the candidate. Phase 3 is exploratory: the candidate learns about the many areas of special education. Phase 4 is the preliminary examination, which should bring out the strengths and weaknesses of the candidate. Phase 5 consists of the assignment of a permanent advisor who will assist the candidate in planning the remainder of his curriculum. Phase 6, the final one, includes appointment of the dissertation committee, construction of the dissertation, and the final defense of the written document.—*A. J. Ter Keurst.*

1881. Tibbetts, Sylvia L. (Bennett Elementary School, Green Cove Springs, Fla.) **The trouble with reading research.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 53-56.—Discusses problems encountered by the reader who is attempting to interpret studies on reading performance and program design. Difficulties which may be encountered in the areas of methodology, measurement, implications of results, and researcher's bias are described briefly.

1882. Velde, Philip B. & Kim, Hyung-chan. (Western Washington State Coll) **An analysis of perceptual-existential psychology and its implications for teacher education.** *Western Carolina University Journal of Education*, 1973(Fal), Vol 5(2), 5-15.—Critically analyzes humanistic psychology, or what A. Combs calls Third Force Psychology, in relation to new programs and ideas in teacher education. On the basis of personal analyses and observations, it is concluded that Third Force Psychology is not an alternative to behavioristic and/or Freudian psychology. Its validity as a scientific concept is considered questionable because of the obscure and emotional character of its terminology.—*J. Joesting.*

1883. Weintraub, Samuel; Robinson, Helen M.; Smith, Helen K. & Roser, Nancy. (Indiana U) **Summary of investigations relating to reading, July 1, 1972, to June 30, 1973.** *Reading Research Quarterly*, 1973-1974, Vol 9(3), 247-513.—Summarizes 369 reports in 6 major categories: (a) summaries of specific aspects of reading research; (b) teacher preparation and practice; (c) sociology of reading; (d) physiology and psychology of reading; (e) the teaching of reading; and (f) reading of atypical learners.



### School Administration & Educational Processes

1884. Ayers, Jerry B. (Tennessee Technological U) **Principals' perceptions of importance of reading readiness factors.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 666.—338 principals ranked the importance of 8 factors in pupils' beginning reading. Elementary principals ranked mental age, background, and emotional adjustment as most important, and nonelementary principals ranked mental age, vision, and desire to read as most important. Results are in agreement with other studies of teachers' perceptions of the importance of reading readiness factors.—*Author abstract*.

1885. Barry, G. Michael. (U West Florida, Educational Research & Development Ctr) **Evaluation technicians: Who are they? Who needs them?** *Educational Technology*, 1974(Feb), Vol 14(2), 49-51.—Presents a case for the need for competent, trained evaluation technicians on the local school level who can administer instruments, evaluate the results statistically, and do follow-up research. Especially with the increase of innovative programs each year, people to evaluate them are needed.—*R. S. Albin*.

1886. Battle, James. (Eastern Michigan U) **Reliability of college students' evaluation of instructors' competence.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1086.—Undergraduates rated their introductory psychology instructor on each of the 10 items of Battle's Instructor Evaluation Inventory and were readministered the inventory 48 hrs later. Results indicate that the items on the scale have acceptable test-retest stability and that Ss responded to the items in a consistent manner.

1887. Blass, Thomas. (U Maryland, Baltimore County) **Measurement of objectivity-subjectivity: Effects of tolerance for imbalance and grades on evaluations of teachers.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1199-1213.—Attempted to provide further validity for the personality construct of objectivity-subjectivity identified by T. Blass (1969) in the real-life setting of a teacher-evaluation procedure where objectivity of interpersonal evaluations is potentially at issue. 48 college students in introductory psychology completed a set of teacher-evaluation scales and the Blass Objectivity-Subjectivity Scale (BOSS) and stated their grade on a recently taken midterm examination. Results support the hypotheses that (a) there would be a positive relationship between grades and evaluations of the teacher for the group as a whole; and (b) this relationship would hold primarily for subjective persons (low BOSS scorers), but not for objective persons (high BOSS scorers). The relevance of the findings for the development of the personality construct of objectivity-subjectivity, personality correlates of differential tolerance for cognitive imbalance, and evaluations of teachers is discussed. (17 ref)—*Journal abstract*.

1888. Carrier, Neil A.; Howard, George S. & Miller, William G. (Southern Illinois U) **Course evaluation: When?** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 609-613.—Data from 385 undergraduates support 2 hypotheses that students attending the last regular meeting of a college course in introductory psychology give more favorable instructor and course evaluations than those attending the final examination only. Data

pertinent to a 3rd hypothesis suggest that, relative to the last-meeting evaluations, the final examination context has little or no effect on ratings.—*Journal abstract*.

1889. Cassel, Russell N. & Todd, Leon W. (U Wisconsin, Milwaukee) **Comparing classroom climate with personal development for graduate and undergraduate college students.** *College Student Journal*, 1974(Apr), Vol 8(2), 38-45.—Investigated the relationship between humanism in the classroom and the personal development of the students. Humanism was measured by the College Assessment of Humanistic Psychology and the Class Activities Questionnaire. Student development was measured by the Test for Self-Esteem, Ego Development Scale, and Tennessee Self-Concept Scale. Ss were 89 lower-division and 65 upper-division students at a technical college, and 31 graduate students at a university. On the whole, no significant relationships were found between the 2 variables or between the sexes. A significant difference ( $p < .05$ ) appeared between classroom humanism and college levels. No significant differences occurred among the 13 part-scores of the 2 tests of classroom humanism or among the 10 part-scores of the 3 personal development tests (37. ref)—*A. J. Ter Keurst*.

1890. de Carlo, Julia E. & Madon, Constant A. (C. W. Post Ctr, Graduate School of Education, Long Island U) **Innovations in education for the seventies: Selected readings.** New York, NY: Behavioral Publications, 1973. xii, 276 p. \$9.95(cloth), \$4.95(paper).—Presents a collection of 23 articles on the advantages or disadvantages and implications of educational innovations. Topics include accountability in the classroom, educational philosophy and behavioral objectives, models and effects of differential staffing programs, education vouchers, individualized instruction, and open education.

1891. DIVPE Committee on the Changing Model of School Psychological Services. **A time for talking about psychological services in schools.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 23-27.—Presents a preliminary committee report clarifying the current status of psychology in Ontario education. It is recommended that (a) a detailed survey of psychological services in education be undertaken; (b) criteria be developed for services in a variety of settings; (c) legislation be studied to facilitate proposals for new legislation; (d) different levels of training and varieties of training settings be studied; and (e) research pertinent to evaluation of educational psychologists be encouraged.—*A. Krichev*.

1892. Furr, Karl D. (Toronto Board of Education, Ontario, Canada) **The school psychologist in the status hierarchy of school personnel.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 16-19.—58 teachers and educational administrators rated 20 educational positions on a 10-point scale as to the relative status, influence, and income the positions should have. The ratings were highly correlated with actual income level, except for "school psychologist," which was rated far higher than actual income would indicate. Findings support the view that the school system has the characteristics of a bureaucratic status hierarchy.—*A. Krichev*.

1893. Heichberger, Robert L. (State University Coll New York, Fredonia) **A humanistic approach to administrative-staff relationships: Link between theory and**

**practice.** *College Student Journal*, 1974(Apr), Vol 8(2), 3-32.—Treats the problems of human adjustment from the perspective of a personality theorist. The approaches and contributions of contemporary psychology are rejected, and the development of innate human nature, or "humanism," is presented in terms of universalism, individualism, social dependency, growth, quest for meaning, integration, and subjectivity. This list of traits is comparable to A. Maslow's hierarchy of motives. However, Maslow's need for actualization applies only to those few people who attain the goal of actualizing their abilities. Growth and goal-orientation are limitless. The role of the school principal that exemplifies these traits is extensively described in terms of his "humaneness," as an educator and as a manager of an educative organization.—A. J. Ter Keurst.

1894. **Howlett, Steve & Phills, George.** (London Board of Education, Ontario, Canada) **Professional development in education.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 28-32.—Presents a general model for preparing professional development programs for teachers. The model includes a statement of objectives, selection of format, implementation, follow-up, and evaluation. A program developed and operated on the basis of this model is described.

1895. **Krichev, Alan.** (Lakehead Board of Education, Thunder Bay, Ontario, Canada) **School psychology's problems in northwestern Ontario.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 20-22.—Describes some of the problems faced by school psychologists in an isolated urban area in northwestern Ontario. Weather is less a problem than is the multicultural, multilingual population. Other problems occur because the city is the social service center for an area of 500,000 sq mi. Educating the native Indians is a special problem.—*Journal abstract.*

1896. **Le Bouedec, Guy.** (Psychological Ctr, Angers, France) **[School structure and educational projects: A critical study of participation.]** (Fren) *Revue de Psychologie et des Sciences de l'Éducation*, 1973, Vol 8(3), 251-269.—Discusses an administrative structure established in 1968 by the French Ministry of Education to alleviate pupil dissatisfaction with secondary education by providing for pupil participation in decision making. The expected results did not come about and in 1971 an inquiry, conducted in 26 schools in western France, obtained 881 responses from pupils in the last year of secondary school. Results support the conclusion that pupils felt the participation actually permitted was less than that promised. Most pupils were indifferent or passive. It is held that responsible participation cannot be brought about by decree, since this involves an inherent contradiction. Research procedures concerning methods of achieving the desired end are outlined.—S. S. Marzoff.

1897. **Levenson, Hanna & LeUnes, Arnold.** (Texas A&M U) **Students' evaluation of an instructor: Effects of similarity of attitudes.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1074.—In a previous study K. C. Good and L. R. Good (see PA, Vol 51:7891) found that students who thought they were attitudinally similar to a hypothetical college instructor gave that instructor more positive ratings for personality and teaching competence than did dissimilar students. The present

study replicated Good and Good's study in a real-life teaching situation, using 136 college students in an introductory psychology class. Results replicate the positive correlation between attitude similarity and teacher personality ratings, but ratings of teaching competence were not influenced by attitude similarity—dissimilarity.—*Author abstract.*

1898. **Masendorf, Fredrich; Tscherner, Klaus & Tücke, Manfred.** (U. Dortmund, W. Germany) **[Cluster-analytical investigation of the teacher's judgment tendencies in the evaluation of the student's personality.]** (Germ) *Zeitschrift für Entwicklungspsychologie und Pädagogische Psychologie*, 1974, Vol. 6(1), 19-27.—Asked 36 teachers to rate each of their students on a 25-item rating scale containing 5 judgment categories. Cluster analysis indicated 3 types of raters: 1 group of teachers tended towards severe judgments, another group towards especially mild judgments, and a 3rd (middle) group used average judgments. It is suggested that teachers with severe judgments are primarily oriented towards effectiveness and fulfillment of schooling requirements, whereas teachers with mild judgments are primarily guided by emotional satisfaction of their students.—*English summary.*

1899. **Maynard, Diane & Stammerman, James.** (U. Kentucky, Coll. of Education, Office of Research & Development) **An investigation into the role of the controller in institutions of higher education.** *Research in Higher Education*, 1974, Vol. 2(2), 165-171.—Examined the financial controller's perception of his role in institutions of higher education and whether that perception differs from that of top academic administrators. Questionnaires were administered to 36 controllers and 26 administrators. A modified Delphi technique was used to gather and refine data. Despite some minor disagreements, there was general agreement as to the proper role of the controller in institutions of higher education.—*Journal abstract.*

1900. **Misumi, Jyujii & Akune, Motomu.** (Kyushu U.) **[The effect of need for achievement, test anxiety and identification with teacher upon a pupil's perception of his teacher's leadership.]** (Japn) *Japanese Journal of Experimental Social Psychology*, 1972(Mar), Vol. 11(2), 159-169.—175 male and 175 female 6th graders completed questionnaires regarding their need for achievement (n-Ach), test anxiety, and identification with teacher. The teacher's leadership was measured by the performance-maintenance (PM) scale. Results of chi-square tests indicate that: (a) High n-Ach Ss perceived higher P (performance) function and higher M (maintenance) function of the teacher's leadership. (b) Low n-Ach Ss perceived lower P and M functions. (c) These findings were not supported in girls' perception of male teachers. (d) Test anxiety and identification with the teacher had no significant effect on the perception of teacher's leadership. (46 ref)—*Journal abstract.*

1901. **Noonan, J. Robert & Thibeault, Robert.** (Bingham Ctr, River Region Services, Louisville, KY) **Primary prevention in Appalachian Kentucky: Peer reinforcement of classroom attendance.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 260-264.—10 elementary and 25 high school students who were identified as chronic absentees participated in a contin-



agency management program in which an equal number of "popular" students were selected as reinforcing agents and assigned to each absentee. These "monitors" were required to observe when the target absentee did or did not attend school. When the target did attend, the monitors communicated that this was appreciated; when they were absent, the monitor contacted the target and sympathetically asked the reason for the absence and when they would return. The effects of this peer reinforcement program were analyzed in a 1- and 2-mo baseline treatment and follow-up assessment. Attendance rates of both the elementary and high school targets increased significantly between treatment and follow-up phases, and between baseline and follow-up phases. Individual trends in attendance patterns are noted, and implications for other difficult educational situations are discussed.—*L. Gorsey.*

1902. Richards, James M. (Johns Hopkins U, Ctr for Social Organization of Schools) "Environments" of British Commonwealth universities. *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 572-579.—Used some techniques developed for describing the "environments" of US universities to explore the correlation between national characteristics and university characteristics in the British Commonwealth. Because such techniques have been little used outside the US, their appropriateness for describing Commonwealth universities was examined first. Secondly, 1 of these techniques (based on J. L. Holland's theory of vocational behavior and occupational classifications) was used to examine the collegial organization of Cambridge University and Oxford University, England. Results for 186 universities suggest that these techniques are appropriate for characterizing Commonwealth universities, including Oxford and Cambridge colleges, and that national characteristics and university environments correlate fairly meaningfully in the Commonwealth. (23 ref)—*Journal abstract.*

1903. Shami, Mohammad A. & Hershkowitz, Martin. (Maryland State Dept of Education, Baltimore) Relative importance of "mastery of reading skills" as a goal of public education. *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 89-97.—Presents findings of a major study of educational goals and needs in Maryland. The goal "mastery of reading skills" was consistently rated the 1st or 2nd most important educational goal by all public groups at the state level and at all local school levels. Several questions of accountability attainment are discussed.

1904. Simpson, Richard L. (U North Carolina, Chapel Hill) Sex stereotypes of secondary school teaching subjects: Male and female status gains and losses. *Sociology of Education*, 1974(Sum), Vol 47(3), 388-398.—Data from a 1962-1963 mail survey of over 22,000 public school teachers in 2 southern states show that teachers considered different subject areas more appropriately taught by men or by women. In evaluating prestige of teachers of different subjects, they attributed higher prestige to whichever sex conformed to the subjects' sex stereotypes. Prestige attributions to men and women teachers, considered separately, varied with sex appropriateness of their fields. Nonconformists appeared to avoid adverse effects on satisfaction by

denying the stereotypes. Men's prestige varied more than women's with conformity to sex stereotypes. This last finding suggests that social norms concerning appropriate occupations may apply more strongly to men than to women because of the greater centrality of occupation as a component of male than of female sex-role images.—*Journal abstract.*

1905. Sullivan, Arthur M. & Skanes, Graham R. (Memorial U Newfoundland, St John's, Canada) Validity of student evaluation of teaching and the characteristics of successful instructors. *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 584-590.—Asked undergraduates in 10 1st-year courses to rate their instructors. The mean ratings for each class were correlated with the mean class mark on final, common, board-marked examinations. The mean correlation was +.39, and correlations were both positive and higher than +.32 in all but 2 of the courses. Correlations were higher for experienced full-time faculty members and lowest for inexperienced part-time instructors. Academically successful and highly evaluated instructors were both "task-oriented" and interest-arousing. Unsuccessful but highly evaluated instructors attempted to arouse interest without being task-oriented. However, electing to take subsequent courses in the subject and the level of achievement in these courses was more highly related to S's level of achievement in the 1st course than to evaluation of instructor.—*Journal abstract.*

1906. Wickett, Beatrice. (Ottawa Board of Education, Ontario, Canada) Investment and income: The use of volunteers and students. *Ontario Psychologist*, 1974(Apr), Vol 6(1), 33-35.—Describes 10 yrs of experience with volunteers serving as part of the support system for emotionally disturbed students, and with graduate students from psychology and other fields (e.g., criminology) serving internships or field placements within the schools. The "investment" is time and training which every school psychologist can afford. The "income" is greatly increased service to students, a profit needed by every school system.—*A. Krichev.*

#### Curriculum Development & Teaching Methods

1907. Berdie, Ralph F. (U. Minnesota) College courses and changes in dogmatism. *Research in Higher Education*, 1974, Vol. 2(2), 133-143.—To observe the impact of an experimental human relations course and to compare changes occurring in students in this course with changes in students having other university experiences, most entering freshmen ( $N = 5,159$ ) completed the Rokeach Dogmatism Scale before the beginning of the school year in 1970, and selected groups were retested at the end of the 1st quarter. Mean Dogmatism scores for all groups, including the experimental group ( $n = 84$ ), declined. Results did not suggest that the experimental course had a unique effect on dogmatism. Ss selecting varying college experiences differed extensively at both testing and retesting.—*Journal abstract.*

1908. Bjerstedt, Ake. Social development and training in school: Glimpses from two research projects. *Didaktometrie & Sociometrie*, 1974, Vol 6(1), 1-48.—Briefly describes 2 research projects with closely related aims: (a) social development and training in the comprehensive school and (b) coplanning of student democracy at

different educational levels. One overall purpose was to increase the possibilities of evaluating different attempts to promote the school's goals in social training (by adding to basic knowledge, improving measurements, and studying certain effects of educational influence). The work was carried out at the Malmö School of Education and has been described successively in about 80 reports and publications. These are listed in the present paper with abstracts or annotations.—*Journal abstract.*

1909. Bjerstedt, Ake . **Social development and training in the comprehensive school: Project summary and report abstracts.** *Pedagogisk Dokumentation*, 1974(May), No 27, 20 p.—Includes abstracts of 50 studies, focusing on the aspects of cooperation, resistance, and world citizen responsibility in the social development and training of students. Topics covered include construction and testing of measuring instruments, mapping of student development, and explorations of the use of educational influence.

1910. Bjerstedt, Ake . **Student democracy—co-planning at different educational levels: Project summary and report abstracts.** *Pedagogisk Dokumentation*, 1974(May), No 28, 16 p.—Summarizes a 3-part project which concentrated on innovative co-planning in Grades 1-6, Grades 7-12, and in teacher training. Abstracts of 30 published reports about the project are included.

1911. Cullen, John B. (Teacher's Coll, Columbia U) **On the methods, rationale and unanticipated consequences of Soviet atheistic "upbringing."** *Religious Education*, 1974(Jan), Vol 69(1), 72-87.—Developing in Soviet youth an atheistic world view is an explicitly stated goal of Soviet character education. Atheistic stages follow a developmental progression from unbeliever to convinced atheist to active atheist. Supplanting religious traditions and ceremonies with communist traditions that also appeal to the emotions is one pedagogical technique. Using aesthetics, as it relates to church music, art, and monuments, provides another technique whose aim is to lead to appreciation of such phenomena on secular grounds alone. 3 principles of religious secularization—eradication, creation, and innovation—bear upon changes in thought pattern of the atheist. Eradication involves loss of relevance of symbols of religion and their associated behaviors or experience. Creation involves association of existing behaviors or experiences with new symbols. Innovation involves association of an old symbol with new experiences or behaviors. By presenting the child with experiences similar to and psychologically equivalent to those found within religion, but associating these with new communist experiences, the Soviet program is currently innovative. The Soviets admit differential success and failure with different types of belief, and many empirical questions remain to be answered.—*E. Gavin.*

1912. Debenham, Jerry . (U Utah) **A computerized simulation game for studying the future of American education.** *Educational Technology*, 1974(Feb), Vol 14(2), 14-19.—Describes a new classroom game—Simulating Alternative Futures in Education (SAFE)—which tries to open the imagination of participants to future educational possibilities. Its specific objectives include

promoting realization of the potential usefulness of computers in educational decision-making, and of the potential usefulness of social indicators; and stressing the fact that there are competing priorities for limited resources, and that there may be alternative educational futures. SAFE has been played with over 200 students and faculty from the University of Utah. The objectives were generally met.—*R. S. Albin.*

1913. Dewey, John . **Religious education as conditioned by modern psychology and pedagogy.** *Religious Education*, 1974(Jan), Vol 69(1), 6-11.—Stresses the need to investigate and to develop religious experience in the context of the child's life, which is qualitatively different from that of the adult. Since religious knowledge and experience develop gradually, the entire record of a child's growth and development must be studied. Religious experience, like any other kind, should not be separated from the general psychology to which it belongs.—*E. Gavin.*

1914. Fisher, Harwood (Ed.). (City Coll, School of Education, City U New York) **Developments in high school psychology.** New York, NY: Behavioral Publications, 1974. xiv, 292 p. \$12.95.—Presents a series of studies which examine the current status and educational objectives of precollege psychology Teacher training, certification problems, and the funding of high school programs are discussed.

1915. Fishman, Joshua A. (Ed.). (Yeshiva U) **Advances in language planning.** The Hague, Netherlands: Mouton, 1974. 590 p. \$28.—Presents a collection of 24 theoretical and empirical studies on language planning policy, modernization, and education. Topics include cultural and cross-cultural linguistics and language issues, the theory and definition of language planning, language standardization in Africa, the effects of mass opinion on language policy, and problems in implementing a language policy.

1916. Garcia, Cirilo H. et al. (U Monterrey, Mexico) **[Differential effects of verbal praise, feedback of results, and verbal praise combined with feedback of results on the maintenance of arithmetic response rate.]** (Span) *Revista Interamericana de Psicologia*, 1974, Vol 8(1-2), 41-52.—Studied the role of verbal praise and feedback of results in maintaining and increasing arithmetic performance previously achieved by a combination of token economy, verbal praise, and feedback of results in 5 elementary school slow learners who were especially deficient in arithmetic performance. Verbal praise was an effective method for improving performance in 3 Ss and ineffective in 1 S. The remaining 5 showed an increase in performance as a function of time in all conditions. (English summary)—*S. Slak.*

1917. Hale, Robert E. & Camplse, Donald A. (St Louis U) **Assessing the effectiveness of a mastery teacher education program.** *Western Carolina University Journal of Education*, 1974(Win), Vol 5(3), 26-32.—Compared 30 student teachers trained in Mastery Method (M), based on Reinforcement Theory, with 30 trained in Lecture-Discussion Method (LD). M students used positive reinforcement more often, aversive stimuli less, and stimulated more student talk than LD students ( $p < .01$ ). Positive reinforcement was significantly



positively related ( $p < .01$ ), and aversive stimuli was inversely related ( $p < .01$ ) to amount of student talk.

1918. Hatch, Evelyn. (U California, Los Angeles) **Research on reading a second language.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 53-61.—Notes that the experimental research on reading a 2nd language is concerned with 3 questions: (a) Should initial reading be taught in the child's 1st language or in the 2nd language when the 2nd is the language of instruction? (b) What, other than "inadequate grasp of the language," accounts for slower reading speed and lowered comprehension when reading a 2nd language? (c) What are the most effective methods for teaching reading in a 2nd language? The literature contrasting the reading behavior of native and non-native speakers of English in each of these areas is reported and discussed. (27 ref)—*Journal abstract*.

1919. Ingersoll, Gary M. (Indiana U, School of Education) **An instructional decision-making model for individual differences in reading.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 77-88.—Points out that although reading educators repeatedly call for individualized instruction, little has been done to determine which instructional treatment is best for whom. The Trait by Treatment Interaction model, now used primarily as a research design, is suggested as a method whereby instructional decision makers can collect and compare data on the effectiveness of alternative forms of reading instruction for individuals of differing predispositions. An example of the types of questions that might be asked is provided. (15 ref)—*Journal abstract*.

1920. Kangas, Tove. (U Helsinki, Inst of Northern Philology, Finland) **[Choice of language of instruction—research or politics?]** (Finn) *Nordisk Psykologi*, 1973, Vol 25(2), 105-112.—Discusses bilingual children and their poor progress at school. Most of those examined belonged to emigrant families or to minority groups in which their language was subjugated, their socioeconomic status may have been below average and they may not have been instructed in their mother tongue. Most of these children were not genuinely bilingual, but rather semilingual. It is concluded that children in linguistic minority groups should be instructed in their mother tongue and that bilingualism should be allowed, as far as possible, for all children in minority and majority groups if they desire. (English summary)—*P. Mylov*.

1921. Lowerre, George F. & Scandura, Joseph M. **Conceptually based development and evaluation of individualized materials for critical reading based on logical inference.** *Reading Research Quarterly*, 1973-1974, Vol 9(2), 186-205.—Reports on the development of a systematic dimensional analysis technique for analyzing complex tasks applied to critical reading of paragraphs requiring use of logical inference rules. The difficulty of passages was identified using 5 levels. Prototype materials were tested using 2 dimensions which assessed Ss' ability to apply 2 logical inference rules. The materials were used successfully for diagnostic testing and training of 45 2nd-, 3rd-, and 4th-grade children. (French & Spanish abstracts) (26 ref)—*E. J. Mason*.

1922. Miller, Thomas E. (Auburn U) **An open system of planning for learning.** *Educational Technology*,

1974(Feb), Vol 14(2), 24-27.—Describes a system for helping students take responsibility for planning their own study programs. The system has 4 phases: identifying the need for learning, determining learning objectives, designing the learning situation, and evaluating learner progress. The system is a way for teachers to interact with learners. In determining learner need the context or setting of the need must be identified. Then a set of objective statements is derived and the requirements and constraints of the objectives can be determined. Continuous learner evaluation is recommended. 2 examples of the use of the system are given. —*R. S. Albin*.

1923. Morrison, Eleanor S. & Price, Milla U. (Michigan State U) **Values in sexuality: A new approach to sex education.** New York, NY: Hart, 1974. 219 p. \$7.50.—Presents a collection of teaching designs and exercises that allow high school and college students to openly explore and discuss their attitudes toward sex. Group exercises and games are presented for learning units on the physiology of sex, psychosexual development, sex roles, values clarification, nonmarital sex, and marriage and parenthood.

1924. Parker, Lorne A. (U Wisconsin Extension, Controlled Communications Systems, Madison) **Educational telephone network and subsidiary communications authorization: Educational media for continuing education in Wisconsin.** *Educational Technology*, 1974(Feb), Vol 14(2), 34-36.—Describes the use of telephones and radios for teaching adults in Wisconsin. Program advantages, processes, and evaluations are discussed.

1925. Saltz, Eli & Johnson, James. (Wayne State U, Ctr for the Study of Cognitive Processes) **Training for thematic-fantasy play in culturally disadvantaged children: Preliminary results.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 623-630.—Reports preliminary findings of a broader longitudinal study investigating the effects of fantasy-play intervention on socially and economically disadvantaged preschoolers. Young children directed in the role enactment of imaginary stories were significantly superior to control group youngsters on a number of measures of social and cognitive development. Fantasy-play training was significantly related to a higher incidence of spontaneous sociodramatic play and to higher scores on selected subtests of standard IQ tests, and it facilitated performance on Borke's Revised Interpersonal Perception Test. It also facilitated performance on tasks designed to measure story-sequence memory skills and story verbalization skills. However, fantasy play did not significantly enhance ability to recall pictures as opposed to objects. It is noted that fantasy-play training is a promising and practical intervention method enjoyed greatly by both the children and the adult interventionists. (15 ref)—*Journal abstract*.

1926. Silverman, Stuart & Phillips, Bronwen. (U South Florida) **Teaching color matching to a pre-school child.** *SALT: School Applications of Learning Theory*, 1974(Apr), Vol 6(3), 32-36.—Studied the effects on a boy 4½ yrs old of positive reinforcement and ignoring of incorrect responses in learning color matching. During programed training which broke the task into small steps responses were 91% correct.

1927. Tennyson, Robert D. & Boutwell, Richard C. (Florida State U, Computer Applications Lab) **Methodology for defining instance difficulty in concept teaching.** *Educational Technology*, 1974(Feb), Vol 14(2), 19-24.—Presents a method for analyzing instance probability in a 2-step procedure, to ensure quality control for selecting instances used by a teacher. The 1st step, subjective analysis, identifies the concept class by relevant attributes and makes sure that a range of difficulty of both relevant and irrelevant attributes is obtained when initially selecting instances. A sufficient number of instances is required so that examples and nonexamples used in the learning condition can be selected on predetermined definable variables. The empirical analysis validates the items according to the population for whom the instruction is intended.—R. S. Albin.

1928. Van Osdol, Bob M.; Johnson, Dale M. & Geiger, Leonard . (U Tulsa) **The effects of total body movement on reading achievement.** *Australian Journal of Mental Retardation*, 1974(Mar), Vol 3(1), 16-19.—Describes 4 of 38 grid games that were used to determine if total body movement would help improve the reading ability of 26 6-14 yr olds in elementary school who were experiencing reading problems. The Ss had been diagnosed as having learning disabilities on the basis of reading levels that were below grade levels and the Ss' inability to perform at a passing level in a regular classroom. For 16 wks an experimental and a control group were taught with the same instructional materials, content sequences, and time allotments. The experimental group was also given the total body movement exercises for 20 min each day, while the control group was given a placebo treatment that consisted of small group reading with assignments outside the regular classroom. Comparison of pre- and posttreatment scores on the Wide Range Achievement Tests indicate that the experimental group demonstrated a higher reading level than the control group at the end of the testing period. Results suggest that the total body movement treatment did enhance the reading ability of the students beyond the increase evident when traditional classroom methods are used.—M. Pounsel.

1929. Walcutt, Charles C.; Lampert, Joan & McCracken, Glenn . (Queens Coll, City U New York) **Teaching reading: A phonic/linguistic approach to developmental reading.** New York, NY: Macmillan, 1974. vii, 471 p.—Defines and describes the reading task as an introduction to reading instruction; discusses methods of evaluating reading readiness in the kindergarten year; outlines concepts for reading awareness; details methods of teaching reading for meaning, knowledge, and pleasure; and summarizes data from research in phonics and reading instruction. (17 p ref)

1930. Webster, William J. . (Dallas Independent School District, TX) **Performance contracting: The Dallas experience.** *Educational Technology*, 1974(Feb), Vol 14(2), 51-54.—Reports results of a performance contract in mathematics and communications classes, Grades 9-12, during the 1970-1971 academic year. Students in need of academic help—835 experimental Ss and 765 controls—were included in the project. Programmed instructional materials, student-controlled pacing, and immediate feedback were the essential features

of the program. Results failed to demonstrate any effect on student performance in either mathematics or communications.—R. S. Albin.

1931. Weir, W. Douglas & Jantz, Eleanore M. (U Maryland, Medical School, Baltimore) **Attitudinal grouping: A rationale for instructional grouping of medical students.** *Journal of Medical Education*, 1974(Aug), Vol 49(8), 785-786.—Describes the establishment of heterogeneous instructional groups of 1st-yr medical students based on their primary response pattern on the Strong Vocational Interest Blank (SVIB). Each group had a mixture of students representing high, medium, and low levels of interest in the 3 SVIB categories—Science, Human Behavior, and People People.

1932. Wiechel, Lennart . (U Malmö, School of Education, Sweden) **Sex-role perception as a barrier to cooperation: Assessment techniques and programs of educational influence.** *Didakometry & Sociometry*, 1973, Vol 5(1), 1-8.—Constructed instruments for assessing perception of sex roles and cooperation readiness, and 2 educational programs (used in the 4th and 6th grades) designed to increase equality between the sexes. With the help of analysis of variance, the effects of the specific educational influences, tests, school level, sex, and development during a final, noninfluenced period were studied in a total of 312 4th and 6th graders. In general, the older Ss showed a greater propensity to put the sex groups on an equal footing in attitudes, perception, and cooperation. Females were more prepared than males to assess the sex groups as equal. Groups exposed to influence underwent a change toward a greater degree of readiness to cooperate and showed an increased tendency to reject stereotyped traditional roles.—*Journal abstract*.

1933. Winett, Richard A. & Vachon, Edith M. (U Kentucky) **Group feedback and group contingencies in modifying behavior of fifth graders.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1283-1292.—Found that systematic feedback on performance based on ratings given to an entire 5th-grade creative arts class improved the appropriate behavior of all children sampled ( $n = 25$ ) compared to an untreated control class of 25 children, regardless of initial baseline level. Contingencies also applied to the entire class and based on the feedback-rating system resulted in further improvement. The procedures and results are discussed with reference to open classroom settings. (15 ref) —*Journal abstract*.

1934. Young, James C.; Bentley, Robert J. & Washington, Ernie . (Georgia State U) **Pitfalls of assessing young children: An overview.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Oct), Vol 2(1), 21-28.—Evaluates the goals of early childhood education programs and their relevance to the needs of disadvantaged children. The need to develop programs aimed at correcting environmental, rather than intellectual, deficits in a child's background is stressed. Research on the predictive validity of preschool programs is reviewed, and the importance of parental recognition and support of the educational program's goals and methods is discussed.



## Academic Learning &amp; Adjustment &amp; Achievement

1935. Anchor, Kenneth N. & Anchor, Felicia N. (George Peabody Coll for Teachers) **School failure and parental school involvement in an ethnically mixed school: A survey.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 265-267.—Investigated the relationship between school failure and parental involvement in school activities in an ethnically mixed lower middle-class urban junior high school. Data from 227 scheduled parent-teacher conferences with parents of male students (either high or low success students) indicate that parents of children with low academic success attended fewer conferences than parents of high-success children. This finding was more pronounced for Mexican-American parents. Possible alternatives to the present success-failure approach to education and its effects on student achievement are noted.—*Journal summary*.

1936. Bailey, Roger C. & Bailey, Kent G. (Oklahoma State U) **Self-perceptions of scholastic ability at four grade levels.** *Journal of Genetic Psychology*, 1974(Jun), Vol 124(2), 197-212.—Administered the Self-Rating Scale of Scholastic Ability and the Otis Quick-Scoring Mental Ability Test to 221 4th, 8th, and 12th graders and 120 college students. The Self-Rating Scale consisted of self- and other-student subscales. It was predicted that Ss' self-perceptions of their ability would become more congruent, stable, and realistic with increasing age. Progressive congruency and stability of self-perceptions were found from the 4th through the 12th grade, although a reversal of this trend was observed in the college sample. Several within-grade sex differences were noted, but little support was found for the prediction that older Ss would have more realistic self-perceptions. Results are interpreted in terms of a sex-role confusion in 4th graders and a more general identity confusion in 8th graders. Clear-cut role differentiation and high self-acceptance characterized 12th graders while prevailing sex stereotypes are suggested as an influence on the self- and other-student perceptions at the college level. (17 ref)—*Journal abstract*.

1937. Bandt, Phillip L.; Meara, Naomi M. & Schmidt, Lyle D. (New Coll) **A time to learn: A guide to academic and personal effectiveness.** New York, NY: Holt, Rinehart & Winston, 1974. xi, 241 p.—Presents a self-help manual for undergraduates to increase their academic and personal achievements and satisfaction. Topics include personal considerations in change and improvement, suggestions for improving textbook and classroom learning, using time effectively, preparing for examinations, facilitating independent study, self-analysis, and planning for the future. (8 p ref)

1938. Bauermeister, José J. & Colon Berlingeri, Nestor. (U Puerto Rico) **[Academic achievement as a function of trait anxiety level, sex, and general ability.]** (Span) *Revista Interamericana de Psicología*, 1974, Vol 8(1-2), 53-67.—Examined the relationship between trait anxiety, sex, general ability, and academic achievement in 142 female and 122 male 10th-grade 15-17 yr old students, using the State-Trait Anxiety Inventory, a Puerto Rican test of general ability, and grade point average. Low anxiety-trait Ss and female Ss showed higher academic achievement than high anxiety-trait Ss and male Ss. General ability was correlated with

academic achievement. Results are discussed in the context of C. D. Spielberger's theory of state and trait anxiety. (English summary) (29 ref)—*S. Slak*.

1939. Cooper, Martin. (U Ottawa, Ontario, Canada) **Factor analysis of measures of aptitude, intelligence, personality, and performance in high school subjects.** *Journal of Experimental Education*, 1974(Spr), Vol 42(3), 7-10.—Used factor analysis to demonstrate relationships among aptitude, intelligence, personality, and performance in high school subjects. Ss were 527 10th-grade students in 5 Ottawa high schools. Scores on the Differential Aptitude Tests, Henmon-Nelson Tests of Mental Ability, and Institute for Personality and Ability Testing, and High School Personality Questionnaire were obtained. School marks, standardized within schools, were used as measures of performance in 7 school subjects. The data were subjected to factor analysis, with oblique rotation to simple structure. 5 factors whose corresponding eigenvalues were greater than unity were obtained. 3 of these, loading on personality variables only, were identified as similar to R. B. Cattell's 2nd-order Factors I, II, and III. A 4th factor loaded on subtests of the Differential Aptitude Tests and Henmon-Nelson Test, and was identified as "verbal ability." This factor had only small loadings on school marks and personality traits. The final factor was loaded on the "academic" school subject marks, and was identified as "academic performance." The expected interrelations between aptitude, personality, and marks in various subjects did not produce factors which were composites of variables from each of these areas.—*Journal abstract*.

1940. Ellis, Robert A. & Manderscheid, Ronald W. (U Georgia) **A further note on the collegiate scholar: The question of value congruence.** *Sociology of Education*, 1974(Sum), Vol 47(3), 379-387.—A previous study by R. A. Ellis et al in 1971 which argued for the extension of the Clark-Trow typology of college student subcultures to include that of the collegiate scholar, rested entirely on data collected at a public university. The present study extended the data to include both undergraduates at a public university's honors college, a large prestigious private university, and lower-class youth in a Job Corps training program. Data show that those originally categorized as collegiate scholars closely resemble in value outlook their counterparts at Ivy League-type schools and, in turn, differ markedly from the Job Corps Ss. Findings strengthen the argument for conceiving collegiate scholars to be a distinct campus subculture rooted in elite traditions which emphasize that the purpose of college is to provide a well-rounded educational experience to prepare for future roles of leadership.—*Journal abstract*.

1941. Evans, Ron & Donnerstein, Edward. (Southern Illinois U.) **Some implications for psychological research of early versus late term participation by college subjects.** *Journal of Research in Personality*, 1974(Jun), Vol. 8(1), 102-109.—Several surveys of recent psychological literature have indicated that a large percentage of human Ss are introductory psychology students who are given the option of selecting when to participate in research which is either implicitly or explicitly required of them. The present study was conducted to investigate the possibility that those Ss who choose to participate

early in the term differ in personality and in attitudes toward research from later-term participants. A total of 31 male and 49 female early- or late-term experimental participants completed a battery of tests, including Rotter's Internal-External Control Scale and the Edwards Personal Preference Schedule. Results indicate that (a) early-term males and females, as expected, were more academically oriented and more internally controlled than late-term Ss; (b) early-term males were more achievement oriented than late-term males; (c) females felt more positive toward research participation than males; and (d) a large percentage of all Ss reported both suspiciousness of E intent and a general and unexpected willingness to voluntarily participate as Ss. Possible effects of these findings on research results and conclusions are discussed, and suggestions for improvements aimed at reducing self-selection bias in college S pools are made. (20 ref)—*Journal abstract*.

1942. Geis, George L. (McGill U, Montreal, Quebec, Canada) **Information about instruction: Before, during and after learning.** *Improving Human Performance*, 1974(Spr), Vol 3(1), 1-6.—Interviewed 12 college students about the information they sought and used before enrolling in a course, during instruction, and after instruction. Ss' responses indicated that they liked practical information about courses, many small ungraded tests, feedback which explained why they were wrong, and grading "on a curve." However, most Ss did not seem to know how to seek important information about learning and lacked the motivation to seek it.—*Journal abstract*.

1943. Good, Lawrence R. & Good, Katherine C. (Middle Tennessee State U) **Similarity of attitudes and attraction to a social organization.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1071-1073.—65 college students completed an attitude survey and subsequently received an attitude survey covering the same issues which purportedly represented the attitudes held by most of the members of a college fraternity or sorority. Ss then filled out a judgment scale calling for evaluations of the organization's likely feelings of belongingness, cooperative atmosphere, sense of group unity, and pride in the organization. In addition, they indicated how much they would probably like the fraternity or sorority and how much they would enjoy being a member. The hypothesized effect of attitude similarity on attraction was confirmed for both liking and desire to be a member. Perceptions of feelings of belongingness and cooperative atmosphere were also significantly influenced by similarity of attitudes.—*Journal abstract*.

1944. Hardy, Clifford A. (North Texas State U) **The junior college transfer: A study of college satisfaction, liberalism, and social class.** *Western Carolina University Journal of Education*, 1973(Fal), Vol 5(2), 28-32.—Compared 88 junior college transfer students with 90 native students on College Student Questionnaires. Results show that junior college transfers tended to be better satisfied than native students with the faculty and administration ( $p < .01$ ). No significant difference was found as to liberalism. Native students came from higher socioeconomic backgrounds than transfer students ( $p < .01$ ).—*J. Joesting*.

1945. Harris, Edward E. (Indiana U Purdue U, Indianapolis) **The teaching of sociological statistics revisited.** *College Student Journal*, 1974(Apr), Vol 8(2), 82-87. Refers to a previous study (1972) which found little support for the hypothesis that conceptual performance is a predictor of computational skills. The motivational problems of failing students are now considered in terms of the academic consequences of previous failures and the justification for repeating failed courses. 6 students who had received D grades in one course, and 11 who had received F grades in another course reviewed the subject matter, completed examinations, and received passing grades. Although the Ss did not apparently have superior intellectual abilities, the reduction of vitiating nonacademic factors, such as lack of motivation, led to acceptable grades after repetition of the previously failed courses.—*A. J. Ter Keurst*.

1946. Kaplan, Robert & Simmons, Francine G. (Bell Lab, New Brunswick, NJ) **Effects of instructional objectives used as orienting stimuli or as summary review upon prose learning.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 614-622. Placed instructional objectives before a text as orienting stimuli for selective attention or after a text as a summary review. 4 experimental treatments were examined: objectives presented before text with or without relevant information and objectives presented after text with or without relevant information. 300 10th-12th graders were Ss. 3 processes (repetition, selection, and search) were hypothesized to account for the results of the experimental treatments. Performance on information relevant to an objective was relatively high whether the objectives were presented before or after the text. Performance on incidental material was greater for objectives located after the text than before the text. More inspection time was consumed by the experimental groups than by a group that received no objectives.—*Journal abstract*.

1947. Kilpatrick, Dean G.; Dublin, William R. & Marcotte, David B. (Medical U South Carolina) **Personality, stress of the medical education process, and changes in affective mood state.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1215-1223. To evaluate the interrelationships of personality characteristics, stress of medical education, and affective mood state, 277 medical students were administered Rotter's Internal-External Control Scale and Profile of Mood States scale. Internal Ss consistently exhibited less mood disturbance than externally oriented Ss. Affective mood state varied considerably as a function of class year, with the junior year appearing to be the most stressful. Freshmen demonstrated increased mood disturbance after the first few months in medical school. A striking finding was the high level of anger and hostility in these Ss. Locus of control did not appear to change as had been predicted, suggesting that it is a relatively stable personality characteristic which might predict adverse emotional reactions in medical school.—*Journal abstract*.

1948. Leino, Anna L. **English school achievements and some student characteristics: II. On the relationships of motivational and auditory variables to English school achievements. Final analyses.** *Research Bulletin, Institute of Education, University of Helsinki*.



1974(Mar), No 40, 48 p.—Evaluated the effects of personality, intelligence, motivation, and auditory ability on the variance of school achievement in learning English as a foreign language. Finnish students in the 6th yr of English study (average age = 18 yrs) were administered a battery of tests including a questionnaire evaluating their rating of the English language as to its pleasantness, importance, and difficulty and instruments to measure attitude, interest, sound discrimination, sound-symbol association, and sense modality preference. Results show that Pleasantness of English was positively correlated, and difficulty of English negatively correlated, with almost all achievement variables. English language skills were best predicted by reasoning-type verbal intelligence and by the ease and pleasantness of the language as experienced by the students. Personality played only a minor role. (4% p ref)—*B. McLean.*

1949. McNinch, George. (U Southern Mississippi) **Awareness of aural and visual word boundary within a sample of first graders.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1127-1134.—Determined the relationships between awareness of visual and aural word boundary for 60 prereading 1st graders and the predictive quality of these perceptual tasks in relation to measured reading success at the end of the year. 2 informal, but previously used, word-boundary tasks were selected. Good, average, and poor reading readiness determinations were made using the Metropolitan Reading Readiness Test. Among the readiness groups, discrimination of aural word boundary did not discriminate performance. The covariance procedures indicated, however, that visual segmentation of word boundaries did discriminate among performance groups. Ss labeled high in readiness produced significantly more correct visual boundary perceptions that did the low-achieving readiness group. Regression models to predict end-of-year reading achievement by the prereading variables indicated that the word-boundary scores gave significant prediction. When considered as a unitary predictor, awareness and aural word boundary remained a predictor of reading achievement but awareness of visual boundary, when considered as a simple predictor, did not. Discrimination of visual boundary was not a readiness factor associated with later reading success.—*Journal abstract.*

1950. Nakamura, Masao. (Tohoku Woman's Coll, Sendai, Japan) **[The validity and underlying factors of scholastic traits.]** (Jpn) *Japanese Journal of Psychology*, 1974(Apr), Vol 45(1), 9-20.—Based on the theory that intellect and personality are subjective factors which determine academic achievement, the validity and underlying factor structure of 16 personality traits, termed "scholastic traits," was investigated. A 128-item questionnaire measuring 16 traits was administered to 3,739 high, average, and low achievers in Grades 1-9. Based on the correlations between each trait and academic achievement, 14 scholastic traits were identified as either "complete" or "semicomplete" as determined by a *t* test. 2 factors underlying the scholastic traits, Self-Adjustment and Emotional Introversion were extracted.—*English abstract.*

1951. Novotny, Elizabeth S. & Burstein, Mario. (Menninger Foundation, Topeka, KS) **Public school**

**adjustment of delinquent boys after release from a juvenile corrective institution.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 49-60.—Studied the public school adjustment of 94 delinquent boys after release from a juvenile corrective institution. 72% of the Ss returned to school in the community, but over 75% of these returners dropped out. Several factors associated with Ss' postrelease school adjustment were examined, with particular attention to the small group of 14 Ss who completed high school. A few personal and social factors were related to public school outcome (i.e., whether the Ss graduated or not). However, all of the Ss who finished high school had received some support from a structured environment or from interested people, in contrast to a majority of the Ss who dropped out. None of the Ss who graduated was involved in antisocial behavior while in school, and only 2 (14%) had gotten into serious legal trouble during the 3-yr followup in comparison to 40% of the Ss who dropped out and 50% of those who never attended school after release. 3 case studies are included.—*Journal abstract.*

1952. Rodewald, H. Keith & Carroll, James L. (Central Michigan U) **Problem in use of student ratings of faculty.** *Perceptual & Motor Skills*, 1974(Apr), Vol 38(2), 574.—Attempted to scale students' attitudes toward their professors. 8 items assumed to reflect important aspects of a professor's teaching ability were presented to 169 upperclassmen and graduate students. All items were presented as paired comparison stimuli. Much intransitivity of choice was noted, indicating that the Ss could not use the items consistently to establish a scale of desirable teaching characteristics.—*Author abstract.*

1953. Rystrom, Richard. (U Georgia) **Perceptions of vowel letter-sound relationships by first grade children.** *Reading Research Quarterly*, 1973-1974, Vol 9(2), 170-185.—Studied the processing strategies used by ordinary children in regular classrooms when they learn to connect letters with sounds. Black and white children were asked to write either an *a*, an *e*, or an *i* in a number of words. 1st graders did not appear to have strong preconceptions of letter-sound relationships when they entered school, but their year-end responses were significantly more like adult responses. No significant differences were found between the responses of speakers of black English and white English. (French & Spanish abstracts)—*Journal abstract.*

1954. Sassenrath, Julius M. & Maddux, Robert E. (U. California, Davis) **Language instruction, background, and development of disadvantaged kindergarten children.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 61-68.—98 disadvantaged kindergartners were grouped by sex, language background (English or English and Spanish) and language instruction method (Distar, Peabody Language Development Program, or Standard Method Language Development). Ss were pre- and posttested on the School Readiness Survey (SRS), the Wepman Auditory Discrimination Test (WADT), and the Illinois Test of Psycholinguistic Abilities (ITPA). A 2 × 3 analysis of covariance (covarying for pretest) was computed for each of the subtests of the SRS, WADT, and the ITPA. Results did not show consistent significant differences due to sex,

language background, or instructional method. Results of *t*-tests for correlated means, however, indicate that regardless of instructional method, sex, or background, Ss improved from pre- to posttest on almost all of the subtests of the SRS, WADT, and ITPA. It is concluded that intensive language development programs in kindergarten appear to be beneficial for disadvantaged children.—*Journal abstract.*

1955. Schultz, Charles B. & Pomerantz, Michael. (Trinity Coll, Hartford, CT) **Some problems in the application of achievement motivation to education: The assessment of motive to succeed and probability of success.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 599-608.—Administered 2 objective measures of motive to succeed, one used by H. J. Hermans and the other by A. Mehrabian to 93 male 9th graders. The preferences of motive-to-succeed (MS) and motive-to-avoid-failure (MAF) Ss for academic tasks which varied in difficulty were compared using individual and group standards for determining probability of success (PS). The biasing effect of MS and MAF on PS was also examined. Both MS instruments were multidimensional; they correlated with internal achievement responsibility for success and measures of academic achievement, and they were significantly related to each other. Hermans's was the more reliable test. The MS and MAF risk preferences were most consistent with theoretical expectations when group standards of PS were used. Overestimation of PS was directly related to MS. Both MS and MAF Ss overestimated PS more on difficult tasks than on easy tasks. (23 ref)—*Journal abstract.*

1956. Thorndike, Robert L. (Teachers Coll, Columbia U) **"Reading as reasoning."** *Reading Research Quarterly*, 1973-1974, Vol 9(2), 135-147.—Develops 3 lines of evidence relating to the proposition that performance in reading, at least after the basic decoding skills are mastered, is primarily an indicator of the general level of the individual's thinking and reasoning processes rather than a set of distinct and specialized skills. The evidence includes (a) results of factorial analyses of specific reading tasks, (b) the correlations between reading tasks and measures both of general intelligence and of later academic progress, and (c) the stability of difficulty in reading test items under translation from one language to another. The concept that reading is primarily a reasoning process may have implications for teaching reading and for education in general. (French & Spanish abstracts)—*Journal abstract.*

1957. Tuck, Mary G. (Cambridge Technical Coll, England) **The effect of different factors on the level of academic achievement in England and Wales.** *Social Science Research*, 1974(Jun), Vol 3(2), 141-149.—Studied the relative importance of 4 factors—ability, social class, sex, and type of school—on the performance of children in the educational system of England and Wales. A dummy variable linear regression analysis of data collected by the National Survey of Health and Development was used, tracing the progress of all children born in 1 wk of 1946. Findings show that reorganization of educational institutions can have considerable effect on children's performance, irrespective of their class and intelligence, and also that sex plays an increasingly

important determining role as pupils progress through the system.—*Journal abstract.*

1958. Watts, William A. & Stewart, Lawrence H. (U. California, Berkeley) **Correlates of activism in British students.** *California Journal of Educational Research*, 1974(Mar), Vol. 25(2), 87-102.—Investigated the applicability of the socialization hypothesis of student radicalism (i.e., that rather than rebelling against parents and other authority figures, student radicals are living out values inculcated by their parents) to 732 British students from grammar schools, modern and comprehensive secondary schools, and colleges and universities. Questionnaire responses indicated that 61 of the 732 reported having taken part in an organized protest because of an ideal and were classified as activists. 65% of the activists were male (vs 50% of the nonactivists). Consistent with the socialization hypothesis, the activists came from higher socioeconomic backgrounds than the nonactivists, and were more likely to perceive their parents as supportive of youthful protests than nonactivists. There was no tendency, however, for the activists to perceive their parents as more liberal or radical than did the nonactivists, and the activists' parents were not appreciably more interested in politics and international affairs. (24 ref)—*Journal abstract.*

1959. Welten, Wayne & Ettaugh, Claire. (Bradley U) **Lateral eye-movement consistency is related to academic aptitude.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1203-1206.—Measured the relationship between lateral eye movement and Scholastic Aptitude Test (SAT) performance in 36 right-handed undergraduates. Eye movements were videotaped while Ss answered a series of 48 questions and were classified into 1 of 4 categories: right, left, no response, or invalid (if S was not looking at E at the end of the question). Inconsistent movers had significantly lower SAT composite scores than did consistent right movers and left movers. Both male and female Ss displayed this pattern, although the difference between consistent and inconsistent movers was significant for females only ( $p < .05$ ). Further analyses showed that the superiority of the consistent movers held for both the Verbal and Mathematics subtests of the SAT. (15 ref)—*L. Gorsey.*

1960. White, William F. & McConnell, John. (U Georgia) **Affective responses and school achievement among 8th grade boys and girls.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1295-1301.—Administered the Junior Index of Motivation, the California Achievement Tests, and the Iowa Tests of Basic Skills to 267 8th graders in a small rural community. Significant small to moderate correlations ( $p < .01$ ) between the total motivational scale scores and achievement test scores were obtained. A factor analysis revealed that a factor labeled General Adequacy in the motivational scale contributed most to the achievement test scores.—*Journal abstract.*

1961. Ycas, Martynas A. & Pascal, Charles E. (McGill U, Ctr for Learning & Development, Montreal, Quebec, Canada) **Convergent, divergent, and esthetic ability and bias in college students: Their relation to personality and preference for major subject and instructional method.** *Improving Human Performance*, 1974(Spr), Vol 3(1), 22-37.—Examined the relationships



among measures of aesthetic preferences, divergent thinking, intelligence (convergent thinking), personality, and attitudes toward learning in 205 college students. Ss were administered a battery of tests—including the Barron-Welsh Revised Art Scale, Raven's Advanced Progressive Matrices, and the Omnibus Personality Inventory, Form F—and a form assessing attitudes toward 8 fields of study and 16 instructional methods. From the data analyses, it is concluded that divergence as a mode of thinking separating the creative from the science-oriented student is a consequence of its role as a secondary indicator of the aesthetic mode of thought, and that aesthetic preference reflects a fundamental mode of cognition. A large proportion of Ss had a substantial cognitive bias in aesthetic preference, enabling fairly accurate predictions of a wide variety of behaviors. (24 ref)—*B. McLean*.

### Special Education

1962. Aleamoni, Lawrence M. & Bowers, John E. (U. Illinois, Office of Instructional Resources, Measurement & Research Div.) **The evaluation of a special educational opportunities program for disadvantaged college students.** *Research in Higher Education*, 1974, Vol. 2(2), 151-164.—Analyzed the early academic achievement of disadvantaged, mainly black, students admitted to a university special educational opportunities program (SEOP) in the fall of 1968 and 1969. High school percentile rank and scores on the School and College Ability Test predicted the early overall academic performance of the 405 SEOP students. Validities, though significant, were not high and were possibly attenuated by use of too difficult test instruments and by inflated grading practices. Nevertheless, data indicate that recruitment people should not abandon customary merit selection based upon these types of measures. Test scores were found to be more valid for predicting the grade point average (GPA) of 9,796 regularly admitted students than for the GPA of SEOP students; the predictive effectiveness of high school percentile rank was greater for regularly admitted students.—*Journal abstract*.

1963. Andrews, R. J. & Andrews, Jeanette G. (U Queensland, Fred & Eleanor Schonell Educational Research Ctr, St Lucia, Australia) **Early education for mentally retarded children.** *Australian Journal of Mental Retardation*, 1974(Mar), Vol 3(1), 1-5.—Reviews selected United Kingdom early education programs for handicapped children that illustrate recent developments in the field. Some of the concepts of the nature of early childhood education considered important in the future development of services for the handicapped are discussed, and suggestions for a model of early education for the mentally retarded are presented.—*M. Pounsel*.

1964. Bieger, Elaine. (Reading & Diagnostic Ctr, Bronx, NY) **Effectiveness of visual perceptual training on reading skills of non-readers: An experimental study.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1147-1153.—Gave either perceptual training and remedial reading instruction or remedial instruction only to 48 2nd and 3rd grade nonreaders with visual perceptual deficiencies. Ss' progress was evaluated using the Marianne Frostig Developmental Test of Visual Percep-

tion, the Spache Diagnostic Reading Scales, and the Durrell Test for Discrimination of Words. After 7 mo, the Ss given visual training improved significantly in visual perception, but improvements were not reflected in reading achievement. Controls gained 8 mo in reading achievement vs 6 mo for the experimental Ss, indicating that visual perceptual training did not influence the achievement of reading skills for this group. (21 ref) —*Journal abstract*.

1965. Brown, Lou; Van Deventer, Pat; Johnson, Pat & Sontag, Ed. (Madison Public Schools, WI) **Teaching adolescent trainable level retarded students to read a restaurant menu.** *SALT: School Applications of Learning Theory*, 1974(Apr), Vol 6(3), 1-14.—Studied the learning of a teacher-made restaurant menu by 4 female trainable retarded adolescents. Ss were taught to label food pictures and word cards and later were able to choose from 15 items from a similar teacher-made menu at a restaurant.

1966. Carter, Ronald D. & Poeschel, Susan M. (U Wisconsin, Oshkosh) **Programming for severely disturbed youngsters in a public school.** *SALT: School Applications of Learning Theory*, 1974(Apr), Vol 6(3), 39-42.—Describes a program for autistic or schizophrenic children based on behavior modification theories. After a child is admitted to the program, a prescription is formulated detailing individualized instruction. Prescriptions are regularly reviewed, and revised or replaced as needed. Samples of improved behavior are given.—*D. R. Marina*.

1967. Coleman, Richard. (North Carolina Dept of Youth Development, Raleigh) **Response generalization in two categories of classroom behavior.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1167-1173.—Notes that although previous research has demonstrated that working behaviors and academic performance can be manipulated in classroom settings, generalization to one group of behaviors when the other group is being manipulated has not been sufficiently explored. The present study examined this possible generalization effect with 19 male adolescent institutionalized delinquents, randomly assigned to 2 groups. Programed instruction and a script economy were the treatment conditions. Group 1 was reinforced for working behavior while Group 2 was reinforced for academic performance. Programed instruction did not produce changes in either working or academic performance. Both groups showed increases in appropriate working behavior as a result of the script economy, with Group 1 showing the greatest change. A trend of improved achievement test scores was established for both groups, with Group 2 making slightly greater gains.—*Journal abstract*.

1968. Csapo, Marg. (U British Columbia, Research Unit for Exceptional Children, Vancouver, Canada) **From villain to class hero.** *Canadian Counsellor*, 1974(Apr), Vol 8(2), 112-120.—Notes that disturbed behaviors are often maintained by variables in the educational environment and that an effective classroom rehabilitation program involves the alteration of the variables which maintain inappropriate behaviors. An intervention plan designed for a 10-yr-old emotionally disturbed boy is described which included positive feedback for academic achievement and positive social

emotional feedback from the peers. The environmental variables were redesigned to promote success instead of failure and to gain acceptance instead of rejection. The intervention consisted of rewarding appropriate academic and social behaviors. Each time the S earned a point for himself he earned a point for the class towards a desirable class event. Results indicate that the alteration of feedback conditions resulted in alteration of behavior in the S, the teacher, and the peers. In the changed classroom environment the frequency of maladaptive behaviors decreased.—*Journal abstract.*

1969. Duckworth, Susanna V.; Ragland, Gilbert G.; Sommerfeld, Roy E. & Wyne, Marvin D. (Winthrop Coll) **Modification of conceptual impulsivity in retarded children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 59-63.—105 educable mentally retarded (EMR) pupils in 9 primary-level classes who were found to be conceptually impulsive received 1 of 3 randomly assigned treatments: (a) visual discrimination training with extended teacher praise for correct responding, (b) visual discrimination training without extended verbal reinforcement, or (c) no specific intervention. Results using the class mean as the experimental unit support the prediction that impulsively responding young EMR pupils can be taught to delay responses and to make significantly fewer errors than similar pupils who receive no specific intervention. (27 ref)—*Journal abstract.*

1970. Flynn, Timothy M. (Southern Illinois U) **Regular-class adjustment of EMR students attending a part-time special education program.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 167-173.—Investigated the effect of a part-time special education program in promoting the personal and social development of elementary educable mentally retarded (EMR) students in the regular class. 122 teachers used a descriptive scale to rate 61 normal students in regular classes, 61 EMR students attending regular class part-time as well as a part-time special education program, and 61 students in regular class who were eligible for EMR class but put on the waiting list pending placement. The normal students were rated significantly higher than both EMR groups. No difference was found between the ratings of EMR special-class and EMR waiting-list students. (16 ref)—*Journal abstract.*

1971. Gampel, Dorothy H.; Gottlieb, Jay & Harrison, Robert H. (U Massachusetts, Boston) **Comparison of classroom behavior of special-class EMR, integrated EMR, low IQ, and nonretarded children.** *American Journal of Mental Deficiency*, 1974(Jul), Vol 79(1), 16-21.—Compared the classroom behavior of 12 segregated and 14 integrated educable mentally retarded (EMR) children—who were all formerly segregated and then randomly assigned to their present class placement—with that of 18 low-IQ children who had never been identified for special-class placements and 11 intellectually average children. The method was a time-sampling observational one, using 12 behavior categories. Data indicate that 4 mo after the school year began, the integrated EMR children behaved more similarly to nonlabeled EMR children than to their segregated peers. Results are discussed in terms of appropriate peer

models influencing classroom behavior of EMR children.—*Journal abstract.*

1972. Gottlieb, Jay; Cohen, Lenore & Goldstein, Laurie. (Research Inst for Educational Problems, Cambridge, MA) **Social contact and personal adjustment as variables relating to attitudes toward EMR children.** *Training School Bulletin*, 1974(May), Vol 71(1), 9-16.—Studied the attitudes of 284 intellectually average 3rd-6th graders toward educable mentally retarded (EMR) pupils, and replicated the study 4 mo later in schools serving and not serving EMR pupils ( $n = 114$  and 101 3rd and 4th graders, respectively). Both sets of findings indicate that attitudes toward EMR pupils were most favorable when the raters had little school contact with the EMR children. The 2nd purpose of the study was to test the prediction that well adjusted non-EMR pupils would express more favorable attitudes than poorly adjusted children. Results did not support this prediction. Results are discussed in terms of the difficulties of the contact hypothesis to predict attitudes toward retarded persons.—*Journal abstract.*

1973. Hewett, Frank M. & Forness, Steven R. (U California, Los Angeles) **Education of exceptional learners.** Boston, MA: Allyn & Bacon, 1974. ix, 464 p.—Presents an introduction to the background and contemporary practices of special education, similarities and differences in learning, ability, and social behaviors of 9 groups of exceptional children; and current practical and theoretical issues involved in the needs and education of exceptional children. (36% p ref)

1974. Holowinsky, Ivan Z. (Rutgers State U) **Special education in Eastern Europe: Oligophrenia and oligophrenopedagogy.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 205-208.—Discusses Soviet and Eastern European views of mental retardation (MR) and special education. The Soviet view of MR, known in the literature as oligophrenia, considers that MR is related to a maldevelopment or defect of the cortical hemispheres which leads to a pathological inertia of the central nervous system. 5 forms of oligophrenia have been identified and these are described. Data on Soviet studies of memory processes, differential diagnoses, and learning disorders related to MR are reported. Trends in oligophrenopedagogy (i.e., special education) are discussed. Physical education is emphasized, and special education programs are begun in the preschool years. As a whole, oligophrenopedagogy is based on a broad, qualitative assessment of abilities and actual achievement, rather than on standardized test performance.—*L. Gorsev.*

1975. Jones, Reginald L. & MacMillan, Donald L. (U California, Berkeley) **Special education in transition.** Boston, MA: Allyn & Bacon, 1974. xi, 464 p.—Includes discussion of the current significant shift in special education programming toward noncategorical models and procedures, issues and directions in psychological assessment of exceptional children, preschool programs, behavior modification, and the training of para- and semiprofessionals.

1976. Kokaska, Charles. (California State U, Long Beach) **The declassified retarded: Implications of the 1973 definition.** *Training School Bulletin*, 1974(May), Vol 71(1), 5-8.—Discusses H. J. Grossman's 1973



definition of mental retardation and its delineation of "significantly subaverage." Attention is directed to those students who no longer meet the revised definition of mental retardation and will be integrated into regular classes. 2 questions are presented about their integration, and 2 implications relative to the special educators responsibilities in the process are discussed. (16 ref)

1977. Mitra, Sudhansu B. (Coppin State Coll) **Language training for retarded-deaf children in a state institution.** *Training School Bulletin*, 1974(May), Vol 71(1), 41-48.—Describes an ongoing program in language training for a nonvocal group of 8 12-19 yr old retarded-deaf children at the Rosewood State Hospital School, Owings Mills, Maryland. Rating scales were used to evaluate the Ss' communication skills and classroom adjustment. A teacher rating form was also used to collect pre- and poststudy data for determining the efficacy of the program. Procedural steps are presented for teaching 3 different components of language skills (i.e., sentence structure, vocabulary, and reading comprehension). Data indicate that the program increased the vocabulary and the usage of words in phrases and sentences to statistically significant levels. Ss also showed substantial gains in reading in terms of grade levels. —*Journal abstract.*

1978. O'Grady, Donald J. (U Cincinnati) **Psycholinguistic abilities in learning-disabled, emotionally disturbed, and normal children.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 157-165.—Administered the Illinois Test of Psycholinguistic Abilities (ITPA) to 90 6-10 yr old children from 1 of 3 educational settings: learning-disabled, emotionally disturbed, and regular classes. Subgroupings within each educational setting were made on the basis of intelligence (either Stanford-Binet Intelligence Scale or Wechsler Intelligence Scale for Children scores) and social class. As a group, both learning-disabled and emotionally disturbed children were deficient in total ITPA abilities as compared with children in regular classes. The learning-disabled and emotionally disturbed children did not differ from each other in total ability. Total abilities were significantly related to intelligence but not to social class, regardless of educational placement. Children from a higher socioeconomic level performed better on auditory-vocal subtests. Disadvantaged children showed equal or superior performance on visual-motor subtests. Data suggest that individualized instruction, based on recognition of specific deficits, may be equally useful with children in regular classes or special classes for emotionally disturbed or learning-disabled children. (21 ref) —*Journal abstract.*

1979. Schulz, Jane B. (Western Carolina U) **Special Education: What makes it special?** *Western Carolina University Journal of Education*, 1974(Win), Vol 5(3), 19-21.—Instructional program for retarded children must have well-defined elements which meet specific needs of these children. 3 such elements are individualism, relevance, and student success. There are as many individual differences among retarded people as in any other group, and special education should help each child develop to his highest possible level. The retarded individual also needs an education that is relevant to

earning a living. The teacher should provide success for the students to encourage further progress.—*J. Joesting.*

1980. Stotsky, Bernard A.; Browne, Thomas & Philbrick, William A. (U Washington, Medical School) **A study of outcome of special schooling of emotionally disturbed children.** *Child Psychiatry & Human Development*, 1974(Spring), Vol 4(3), 131-150.—Evaluated the effects of special residential and day schooling experiences on 573 emotionally disturbed children, using specially constructed schedules, scales, and questionnaires with parents and records from the state department of education. Particular attention was given to such variables as successful and unsuccessful clinical and educational outcomes, age, sex, intellectual differences, residential vs day school placement, differences in diagnosis, degree of emotional disturbance at time of placement, and change in behavior or educational performance while at the special school. Most children derived benefit from the experience but a substantial minority did not.—*Journal abstract.*

1981. Streedbeck, Darlene & Pommer, Dale. (Problems-In-Living Ctr, Sioux Falls, SD) **The combination of positive reinforcement and time-out contingencies to control out-of-seat and accompanying disruptive behavior.** *SALT: School Applications of Learning Theory*, 1974(Apr), Vol 6(3), 15-24.—Ignoring out-of-seat behavior and the accompanying disruptive behavior had proved unsuccessful in eliminating or decreasing such behavior by an 8-yr-old girl in a special education program. A procedure was implemented which combined positive reinforcement for in-seat behavior with time-out contingency for out-of-seat behavior. After 3 wks, in-seat behavior had increased from 25% to 90%, and a recheck after 20 wks showed an increase to over 95%. —*Journal abstract.*

1982. Tsvetkova, L. S. (Moscow State U, USSR) **A consideration of basic approaches to the diagnosis of children with speech defects.** *Journal of Special Education*, 1974(Sum), Vol 8(2), 179-185.—Discusses problems in the education of children with speech deficits and proposes an approach to remedial education for these children, emphasizing a neurophysiological examination and evaluation of perception, memory, and representation processes. An experiment which investigated visual memory and constancy of images in normal and speech-impaired children is reported, showing that children with speech impairments exhibit underdeveloped visual memory and perception.

### Counseling & Measurement

1983. Anderson, Thomas H. (U Illinois) **Cloze measures as indices of achievement comprehension when learning from extended prose.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 83-92.—Conducted 2 experiments to test the hypothesis that cloze measures are a function of content achievement among adult learners and, consequently, should be sensitive to instructional treatments. College juniors and seniors took tests immediately before studying a prose passage (precondition), immediately afterward (postcondition), and 4 wks afterward (delay condition). The types of tests administered in each session were (a) a 20-item multiple-choice test, (b) a reproduction passage cloze test, (c) a

recognition passage cloze test, (d) a reproduction summary cloze test, and (e) a recognition summary cloze test. All tests showed significant differences between pre- and postconditions, and between recognition and reproduction modes. The reproduction summary cloze test was the most sensitive to the instructional treatment, as indicated by an  $\omega^2$  statistic on pre-post measures. The summary cloze tests were resistant to forgetting while the cloze passage and multiple-choice tests showed significant decreases in performance over the 4-wk delay interval.—*Journal abstract.*

1984. **Barnes, Edward J.** (National Inst of Education, Washington, DC) **IQ testing and minority school children: Imperatives for change.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Oct), Vol 2(1), 4-20.—Discusses errors in IQ test items, test norms, examining procedures, and language use which affect the placement of minority group children in school. The effects of IQ scores on teacher expectancies are discussed, stressing that teachers' mental sets are powerful influences on children's learning and performance and that IQ scores play a critical role in determining these sets. Problems in developing culture-free IQ tests are pointed out, and the advantages of developing alternative "culture-specific" tests are described. Statistical comparisons of black and white children's scores are questioned, since the comparative data are often used to limit opportunities for black children. Criterion-referenced tests appear to be a major breakthrough in ability testing, since they focus on growth and behaviorally-defined goals, rather than on setting white standards for black children. (24 ref)—*L. Gorsey.*

1985. **Beck, Michael D.** **Achievement test reliability as a function of pupil-response procedures.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 109-114.—Assessed the different effects on achievement test reliability of 2 pupil response procedures. Over 4,000 3rd- and 4th-grade pupils from 9 school systems took the Metropolitan Achievement Tests, half responding in the test booklets and half using separate answer folders. The 2 groups were matched by grade in general scholastic aptitude. Although the group using answer folders received lower scores than the group using the test booklets, the score reliabilities did not differ significantly for any test. Additionally, these reliabilities did not differ significantly from comparable Metropolitan normative reliabilities. For survey achievement tests such as Metropolitan, test reliability does not appear to depend on pupil response mode.—*Journal abstract.*

1986. **Bingham, William C. & House, Elaine W.** (Rutgers State U, Graduate School of Education) **Counselors' attitudes toward women and work.** *Vocational Guidance Quarterly*, 1973, Vol 22(1), 16-23.—To examine attitudes held by counselors regarding women and work, a 50-item attitudinal questionnaire was mailed to a 10% sample of secondary school counselors in a New Jersey State Department of Education directory. 126 usable questionnaires were received. It was found that on 8 attitudinal items there was general agreement, on 6 items opinions were divided, and on 11 items male and female counselors held different opinions. Reliability and validity estimates for this scale do not exist, and results are therefore tentative. The effects of counselors'

attitudes on their female clients are discussed.—*R. S. Albin.*

1987. **Boy, Angelo V.** (U New Hampshire) **Clients in the school.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses environmental variables in school counseling programs and the effects of these variables on student relationships to and interest in guidance services. Suggestions for counselor innovations in supervision, communication, and assessment in the school setting are presented, and the value of considering various counseling modes (e.g., individual or group) is discussed. (15 ref)

1988. **Brown, A. E. & Landrus, G. D.** (Toronto Board of Education, Ontario, Canada) **Early identification and development program.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 36-38.—Describes an early identification program with 3 main aspects: (a) screening kindergarten and 1st-grade pupils in terms of potential learning difficulties; (b) service to the child, family, and school staff; and (c) research on screening instruments. 35 schools now use the program and it is felt that the investment in time is well worth it. The preventive approach is seen as being more effective than any other.—*A. Krichev.*

1989. **Counts, George E.; DeClue, Maureen & Pace, Randy.** (Southeast Missouri State U) **Grades earned in repeated courses.** *Journal of Experimental Education*, 1974(Spr), Vol 42(3), 11-16.—Studied the pattern of 1,510 courses repeated by 885 students at a state university in the fall semester. Very few students repeated a course more than once. 2nd grades were in general better when the course was not repeated immediately but after 1 or more intervening semesters. The typical repeating student had a cumulative grade point average of about 2.10. A surprisingly large number of students repeated the course with the same instructor. Freshmen students were usually trying to improve an F grade; A, B, and C grades were much harder to earn, but more than 75% of the group received passing grades in the repeated course.—*Journal abstract.*

1990. **Elvers, Douglas A.** (U North Carolina, Chapel Hill) **Students face decision-making under uncertainty: The flexible grading system.** *Educational Technology*, 1974(Feb), Vol 14(2), 31-33.—Describes a university grading system in which the individual student decides, within certain restrictions, what relative weight is to be given to each of his examinations. Results, student opinions of the system, and recommendations for implementing it are discussed.

1991. **Feldt, Leonard S. & Forsyth, Robert A.** (U Iowa, Ctr for Measurement) **An examination of the context effect in item sampling.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 73-82.—Discusses item sampling and/or multiple matrix sampling techniques, which have been recommended for a variety of purposes. For some of these purposes, it must be assumed that examinee performance on a set of items is unaffected by the conditions under which the items are taken (i.e., that no context effect exists). Factors that may lead to a context effect among high school students are considered. The net effect of such factors on examinee scores for an English test and a mathematics



test was investigated empirically. For the mathematics test a definite context effect was found, but there was little evidence of its existence for the English test. (23 ref)  
—*Journal abstract.*

1992. Follman, John; Lucoff, Manny; Small, Leslie & Power, Fred. (U. South Florida, Coll. of Education) **Kinds of keys of student ratings of faculty teaching effectiveness.** *Research in Higher Education*, 1974, Vol. 2(2), 173-179.—Conducted 3 studies to examine the effects of different formats on undergraduate ratings of faculty teaching effectiveness. Study 1 investigated 3 main kinds of keys: Agreement, Evaluation, and Needs Improvement. Study 2 investigated numbers of positive rating categories, and Study 3 investigated the same items worded positively, negatively, and neutrally. Practically important differences in level of ratings were obtained in Study 1, and significant differences were obtained in Studies 2 and 3. It is concluded that additional research is necessary to determine if apparent differences in teaching effectiveness are actually due to the methods of measurement.—*Journal abstract.*

1993. Fowler, Robert L. & Thomas, Elizabeth S. (U. South Florida) **A comparison of the two-level and five-level grading systems in personalized instruction courses.** *Psychological Record*, 1974(Sum), Vol 24(3), 333-341.—Randomly assigned 48 members of a university educational psychology class to 1 of 2 conditions in a vestibule learning lab to determine which grading system used in personalized systems of instruction produces better performance. A 2-grade group received the maximum class points for mastering 4 units of material but no credit for mastering fewer than 4. A 5-grade group received 25% of the maximum points for each unit mastered. The groups differed on motivation and attitude measures but not on academic performance measures. More Ss in the 5-grade group than in the 2-grade group volunteered to participate in the project, viewed their system as fair, and said they would recommend their system to future students.—*Journal abstract.*

1994. Goldman, Roy D. & Richards, Regina. (U. California, Riverside) **The SAT prediction of grades for Mexican-American versus Anglo-American students at the University of California, Riverside.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 129-135.—Calculated the regression equations for 2nd quarter freshman grade point averages on Scholastic Aptitude Test (SAT) scores for Anglo-American and Mexican-American students. The equations differed significantly for the 2 groups. However, the use of the equation derived from the Anglo-American sample to predict grades of Mexican-American students resulted in overprediction. An examination of the standardized regression weights revealed a significant difference in the weight given to the Mexican-American SAT. A replication on a much larger sample revealed a similar outcome. Results are considered as a possible heuristic to suggest a scholastic "strategy" difference between the 2 ethnic groups.—*Journal abstract.*

1995. Greenwood, Gordon E.; Bridges, Charles M.; Ware, William B. & McLean, James E. (U. Florida) **Student evaluation of college teaching behaviors.** *Journal of Educational Measurement*, 1974(Sum), Vol

11(2), 141-143.—Describes the Student Evaluation of College Teaching Behaviors (SECTB), a newly developed instrument for student evaluation of teaching that (a) is empirically derived but reflects a broad conception of college instruction, (b) focuses on specific teaching behaviors, and (c) permits students to rate only those items which they consider relevant. In the SECTB the student must make a dichotomous choice between both negative and positive items. The instrument is seen as a move toward a more empirical approach to the evaluation of teaching.—*Journal summary.*

1996. Harper, Frederick D. (Howard U, School of Education) **Counseling the poor child.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jan), Vol 1(2), 79-84.

1997. Healy, Charles. (U. California, Los Angeles) **Career counseling in the community college.** Springfield, IL: Charles C Thomas, 1974. xv, 140 p. 228.75(cloth), \$5.95(paper).—Describes 13 distinct, replicable counseling procedures for helping people make and implement career plans. Methods of measuring career development are discussed, and classes of counselor responses and career counseling criteria are outlined. (7 p ref)

1998. Hill, George E. (Ohio U) **Management and improvement of guidance.** (2nd ed). Englewood Cliffs, NJ: Prentice-Hall, 1974. xiv, 608 p.—Presents a practitioner-oriented text on the significance of guidance and its importance in school administration, methods of efficiently and effectively managing guidance programs, and recent problems and developments in guidance theory and practice. Topics include the qualities of effective guidance, determination of client needs, interrelationships between guidance and other pupil personnel services, the relationship between teachers and guidance counselors, and the use of tests in guidance programs.

1999. Hoepfner, Ralph. (U. California, Ctr for the Study of Evaluation, Los Angeles) **Published tests and the needs of educational accountability.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 103-109.—Matched consensual indexes of elementary education goal priorities and the availability of published tests that held promise for their assessment. A Q-sort was utilized to obtain priority ratings on 106 pre-established goals from a nation-wide sample. Independently, published tests for the elementary level were sorted into the same 106 goal categories. Results of the matching techniques indicate that most goals, whether high or low in priority, are measured by few or no published tests. This failure on the part of test publishers to respond to the needs of education is seen as an important contributor to the current popularity of criterion-referenced instruments.—*Journal abstract.*

2000. Kuznik, Anthony. (U. Minnesota, Technical Coll) **Qualifications and background of administrators of college placement tests.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Jul), Vol 1(4), 192-198.—Reports data from a questionnaire on the background and responsibilities of 2,332 American College Testing Program test center supervisors. 1,077 centers were in high schools and 995 were in colleges. 64% of the supervisors were in the fields of counseling and guidance, 19% were in educational administration,

and 14% were in teaching or testing. Mean years of experience in these fields was 8.69–10.72 yrs. 79% held master's degrees and 12% had either a PhD or an EdD, 77% of which had been awarded in either counseling and guidance or educational administration. 51% of the test centers administered the examinations to minority students, and had 1 or more minority group supervisors. Data for room supervisors and proctors and recommendations for minority recruitment are presented.—*L. Gorsey.*

2001. **Leard, Hugh M.** (McGill U, Montreal, Quebec, Canada) **The elementary counsellor and discipline.** *Canadian Counsellor*, 1974(Apr), Vol 8(2), 126–136.—Discusses the elementary school counselor's role as consultant to teachers whose students have behavioral problems. The question of discipline is discussed in terms of aspects of school functioning, teacher behavior as it pertains to classroom management, and individual psychology. Techniques are suggested for dealing with problem behaviors. (French summary)

2002. **Lindholm, Lena-Pia & Lundquist, Barbro.** (U Malmö, School of Education, Sweden) **Cooperation and independence: Studies of assessment techniques in observations of small groups.** *Didaktik & Sociometri*, 1973, Vol 5(1), 9–26.—Constructed and tested a system for assessing students' behavior in group-work situations (especially behaviors related to cooperation and independence). The basic data consist of videotape recordings of a total of 143 4th and 6th graders working in small groups. Results on O agreement are presented, and methods of making different kinds of observation data more comparable are examined. A validation study, an investigation of the connection between observation data and background data, and an analysis of structure are reported.—*Journal abstract.*

2003. **Ojha, A. B.** (Ministry of Defence, New Delhi, India) **The use of unfair means in university examinations: A form of protest.** *Indian Journal of Social Work*, 1974(Jan), Vol 34(4), 337–349.—Violent student agitation in India has affected practically all universities. Students' opinions about one form of violence was examined by asking them how they felt about the use of unfair means in university examinations. They were requested to state (a) their reactions in terms of perceptions and values, (b) their thoughts as to the reasons for the behavior, and (c) their suggestions for stopping the practice. 100 replies were analyzed. The main finding was that blame for what is happening on campus cannot be given entirely or primarily to students. Responsibility also falls on teachers, university officials, parents, and the present societal structure.—*I. W. Kidorf.*

2004. **Pettit, Neila T. & Cockriel, Irwin W.** (U Missouri, Coll of Education) **A factor study of the Literal Reading Comprehension Test and the Inferential Reading Comprehension Test.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 63–75.—Literal and inferential reading comprehension was assessed for 533 6th-grade students. The tests used are new instruments for measuring reading comprehension. 6 subscales are provided for literal reading comprehension and 5 subscales for inferential reading comprehension. The total data were factor analyzed using principal components and maximum likelihood procedures. Results

indicate that the 2 tests are measuring distinct factors. (31 ref)—*Journal abstract.*

2005. **Pohlmann, John T. & Beggs, Donald L.** (Southern Illinois U) **A study of the validity of self-reported measures of academic growth.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 115–119.—Obtained self-reported and pre-post measures of academic growth in 3 areas: simple cognitive, complex cognitive, and attitudinal. Ss were 162 graduate students enrolled in 6 graduate courses. Partial correlations relating self-reported measures of growth to posttest performance on measures of achievement (simple and complex cognitive) and attitude, controlling for pretest performance, indicated that self-reported measures were related primarily to growth in attitudes toward the subject matter of a course.—*Journal abstract.*

2006. **Priddle, Flora M.** **School psychological services: A parent's point of view.** *Ontario Psychologist*, 1974(Apr), Vol 6(1), 8–9.—Discusses the important role which school psychological services should play. While individual casework is not to be ignored, the school psychologist should be active in maintaining a mentally healthy school climate. Indirect consultation on administrative matters is essential, even though less visible. The most vital role of these services is that of guarding the mental health of the school.—*A. Kricher.*

2007. **Sanborn, Marshall P.** (U Wisconsin, Madison) **School counseling: Emphatically not a therapy service.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Presents postulates which differentiate counseling from psychotherapy. An attempt is made to clarify the school counselor's evaluation and coordination functions. A counselor interview with a 10th grader is presented to illustrate the school counselor's role.

2008. **Simpkins, Gary; Gunnings, Thomas & Kearney, Annette.** (Community of Mental Health, Cincinnati, OH) **The black six-hour retarded child.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Oct), Vol 2(1), 29–34.—Suggests that the apparently "retarded" performance of many black children on standardized ability tests may be the child's way of adapting to a hostile, racist, and white-oriented educational and assessment system. Black children may often act out the retarded role in what is actually a self-fulfilling prophesy. The ways in which current educational criteria and programs in effect develop "retarded" children are discussed. Recommendations for eliminating the syndrome of the child who is considered retarded during the 6-hr school day are presented.—*L. Gorsey.*

2009. **Strang, Harold R.; Bridgeman, Brent & Carrico, Mary F.** (U Virginia) **Effects of "game" versus "test" task definition for third grade children on three subtests of the Wechsler Intelligence Scale for Children.** *Journal of Educational Measurement*, 1974(Sum), Vol 11(2), 125–128.—Assigned 46 male and 46 female 3rd graders to 1 of 2 experimental conditions. In Condition 1 Ss were told that they were going to take several tests and were then administered 3 subtests from the nonverbal battery of the WISC. In Condition 2 Ss were told that they were going to play several games and were then administered the same 3 subtests. An analysis of variance applied to the resulting summed scores revealed



1 significant main effect, task definition ( $p < .01$ ). While the experiment does not indicate why game instructions yield superior performance, a reasonable hypothesis would be that such instructions help to reduce stress.—*Journal abstract*.

2010. Tuinman, J. Jaap. (Indiana U) **Determining the passage dependency of comprehension questions in 5 major tests.** *Reading Research Quarterly*, 1973-1974, Vol 9(2), 206-223.—Investigated whether student performance on standardized tests of reading comprehension depended on whether the students had previously read the passages upon which the test questions were based. 5 tests were administered to 1,200 Ss each, in Grades 4-6, who read the passages and then answered the questions. The same tests were each administered to comparison groups of 600 Ss who did not read the passages. Both groups performed better than chance although the groups who read the passages did perform somewhat better. It is concluded that none of the reading tests studied was completely dependent upon having read the passages. Statistical methods for calculating passage dependency are proposed. (French & Spanish abstracts) (25 ref)—*E. J. Mason*.

2011. Wainer, Howard & Kaye, Kenneth. (U Chicago) **Multidimensional scaling of concept learning in an introductory course.** *Journal of Educational Psychology*, 1974(Aug), Vol 66(4), 591-598.—Using a model for individual differences in multidimensional scaling (INDSCAL), 16 concepts dealing with developmental psychology were scaled before and after a course with 45 undergraduates. 3 dimensions emerged, but 1 of them was relatively unimportant for the course. The postadministration indicated that this dimension was perceived as having lesser importance. The criterion measure used was the instructor's position in the subject space; movement toward him by the students was significant from pre- to postcourse administration. Implications of this methodology for educational evaluation are discussed.—*Journal abstract*.

## APPLIED PSYCHOLOGY

2012. Argyle, Michael. (U Oxford, England) **The social psychology of work.** Harmondsworth, England: Penguin, 1974. xi, 291 p. \$2.50.—Summarizes research on the social factors which affect the experience of work, traces the biological and historical origins of work, and compares alternative contemporary forms of work organization. Theories of motivation, leadership, training in social skills, and techniques of personnel selection are critically examined. (17 p ref)

2013. Bass, Frank M. & Wilkie, William L. (Purdue U., Krannert Graduate School of Industrial Administration) **A comparative analysis of attitudinal predictions of brand preference.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 262-269.—Assessed the impact of alternative analytical procedures on the results and conclusions drawn in studies of the multiattribute attitude model. Results show that cross-sectional analysis is especially vulnerable to response assumptions, and that importance weights not only do not suppress predictions but also improve the diagnosis of attitude

structure when the data are normalized. Illustrative data from univariate regressions of preference ranks of 2,000 female heads of household for 5 brands in 6 product classes against attitude scores are presented. Although the cross-sectional model does not obtain the predictive levels of within-individual analysis, results are comparable to those found in social psychological attitude studies. (33 ref)—*L. Gorsey*.

2014. Bass, Frank M. (Purdue U, Krannert Graduate School of Industrial Administration) **The theory of stochastic preference and brand switching.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 1-20.—Considers that deterministic theories of behavior, specifically consumer choice behavior, are overemphasized in most empirical research, and introduces recent evidence which suggests that brand choice behavior is substantially stochastic. J. Hermiter's 1973 entropy model of brand switching under static conditions (i.e., when market shares are constant) is used as a basis for a proposed general theory of stochastic brand preference which accounts for brand choices and switches under market conditions of independence, brand loyalty, and static and dynamic market shares. The probability equations and functions underlying the theory are detailed, and an empirical test of the theory involving the choice of soft drink brands supports the conclusion that individual consumer choice behavior is substantially stochastic. Possible theoretical extensions of the theory are presented (e.g., multibrand buying or switching among substitute product classes). (17 ref)—*L. Gorsey*.

2015. Dallis, Constantine A. **Clients in business and industry.** In G. F. Farwell, N. R. Gamsky & F. Mathieu-Coughlan (Eds), *The counselor's handbook*. New York, NY: Intext, 1974. x, 530 p.—Discusses the role of the psychologist who practices within the business-industrial complex and how his work is influenced by organizational structure and employee characteristics. A suggested internship for counseling trainees in an industrial setting is described, opportunities for innovation in both industry and education are examined, and special considerations in supervision, communication, and performance appraisal in the business community are noted.

2016. Day, Richard H. (U Wisconsin, Mathematics Research Ctr) **System simulation: On system dynamics.** *Behavioral Science*, 1974(Jul), Vol 19(4), 260-271.—Presents an exegesis of J. W. Forrester's system dynamics using conventional mathematical concepts, and briefly reviews its advantages and disadvantages. 3 constructive suggestions—improved numerical integration methods, numerical control theory techniques, and a parameter-saving flexible class of smooth functions for representing nonlinear relationships—are made for augmenting the technology. (19 ref)

2017. Donnelly, James H. & Etzel, Michael J. (U. Kentucky) **Degrees of product newness and early trial.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 295-300.—Investigated the actual purchase of 3 groups of convenience products of varying degrees of newness. 20 products were used, and were designated as either "genuinely new," "marginally new," or "artificially new," depending on in how many of 4 evaluative dimensions (packaging, physical appearance, user prepa-

ration or use behavior, and technological processing) they differed from the nearest, previously available substitute. 250 housewives were administered Pettigrew's Category Width Scale and were asked to report which of the products they had purchased. Data support a general hypothesis relating breadth of categorization to new product trial, and indicate that different groups of individuals may be "innovators" for different products depending on the product's attributes (i.e., how similar or dissimilar the product is relative to previous offerings). Attributes of the product may be as important as behavioral and demographic factors in identifying early triers. (21 ref)—*L. Gorsey.*

2018. Farley, John U. & Ring, L. Winston. (Columbia U) "Empirical" specification of a buyer behavior model. *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 89-96.—Attempted to specify a comprehensive buyer behavior model using Automatic Interaction Detector (AID) and canonical correlation analyses of data from 693 members of a consumer panel in terms of 11 endogenous and 17 exogenous variables, representing a mixture of product-specific and brand-specific measures and buyer characteristics. Constructs of either method of analysis are examined, and issues involved in consumer behavior measurement methodologies are discussed.

2019. Fisher, Allan H.; Orend, Richard J. & Rigg, Leslie S. Career potential among ROTC enrollees: A comparison of 1972 and 1973 survey results. Alexandria, VA: Air Force Human Resources Lab, Manpower Development Branch, MR 74-4, 1973. 124 p.—Results of a survey of Reserve Officers Training Corps (ROTC) cadets show that a majority were willing to continue into the advanced program, sought opportunities for further academic education, and would have entered the ROTC without a scholarship or subsistence allowance.

2020. Glickman, Albert S. & Brown, Zenia H. (American Inst for Research, Washington, DC) *Changing schedules of work: Patterns and implications*. Kalamazoo, MI: W. E. Upjohn Inst for Employment Research, 1974. viii, 104 p.—Discusses concepts, values, and uses of free time in current labor-leisure trends; case studies concerned with arrangements of and problems associated with new patterns of work time; individual adjustment and organizational change; and the roles of business, labor, government, and social institutions in influencing and planning work-time flexibility. (8 p ref)

2021. Herniter, Jerome D. (Boston U) A comparison of the Entropy model and the Hendry model. *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 21-29.—Presents a theoretical comparison of the author's 1973 Entropy model of consumer purchase behavior and the Hendry 1966 model of consumer dynamics, emphasizing that information on the Hendry model is not complete and that comparisons are made in terms of market conditions in which advertising, price, distribution, market segmentation, and purchase frequency have no effects. The models are examined for their predictions of total switching, joint probabilities, and conditional probabilities for 2-, 3-, and 4-brand markets. A major difference between the models is that an increase in the number of brands in the market is accompanied by minimal change in total switching in the Hendry model,

whereas in the Entropy model it yields a significant increase in total switching. The relative fit of empirical data to each model is also detailed.—*L. Gorsey.*

2022. Johansson, Charles B. & Flint, Robert T. (National Computer Systems, Minneapolis, MN) *Vocational preferences of policemen*. *Vocational Guidance Quarterly*, 1973, Vol 22(1), 40-42.—Analyzed the vocational preferences of 275 police officers and police recruits who were administered the Strong Vocational Interest Blank. Results indicate that policemen had vocational interests that were militaristic, mechanical, and risky. They had strong preference for authoritarian-structured types of activity. Although the interests of recruits were similar to those of policemen, these preferences were not as strong as those of the officers until the recruits had been on the job for at least 1 yr.—*R. S. Albin.*

2023. Kolb, David A.; Rubin, Irwin M. & McIntyre, James M. (Massachusetts Inst of Technology) *Organizational psychology: An experiential approach*. (2nd ed). Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 422 p.—Presents a textbook which communicates general psychological principles and the skills to apply that knowledge to social and organizational situations. Among the topics considered are interpersonal perception, communication, leadership, intergroup relations, organizational structure, and personal growth and career development.

2024. Kraft, Frederic B.; Granbols, Donald H. & Summers, John O. (Wichita State U.) *Brand evaluation and brand choice: A longitudinal study*. *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 235-241.—Tested whether a measure based on evaluations of brand attributes is predictive of brands purchased over time, and compared the predictiveness of this summated measure with an overall 7-point rating scale, brand first mentioned, last brand purchased, and favorite brand. 173 housewives were administered a brand attitude questionnaire at the beginning of the 16-wk test period. Ss then kept weekly diaries of their purchase of 8 products, 3 of which were actually being assessed. Analyses of brand choice in terms of "market share" measures and comparisons of purchasers and nonpurchasers show that the summated index was highly related in the aggregate to brands purchased over the 16 wks. It correctly predicted the brand most frequently purchased in about 1/3 of the cases for each of the 3 product categories studied. It is concluded that when prediction is the primary criterion, the summated index performs as well but no better than other measures, and may be less useful because of response ambiguities and complex design and scoring procedures. (18 ref)—*L. Gorsey.*

2025. Mizumoto, Kiyoshi et al. (JASDF Aeromedical Lab, Tokyo, Japan) [Studies on pilot's visual characteristics on detecting other airplanes: I.] (Japn) *Reports of Aeromedical Laboratory, JASDF*, 1973(Jun), Vol 14(1), 30-41.—Investigated characteristics of a pilot's eye movements when detecting approaching aircraft, using an eye-mark recorder. Results show that (a) in many cases, the pilot could not detect the approaching plane even if it subtended 1° 36" of the visual arc; (b) a plane approaching from a 0° (head on) or 120° direction was hard to detect; (c) when the pilot had information about



the direction of the approaching plane he could detect it from farther away than when he had no information; and (d) the most typical eye movements used to detect the plane were first horizontal scanning and then vertical searching.—*English abstract.*

2026. Nakanishi, Masao. (U. California, Los Angeles) **Advertising and promotion effects on consumer response to new products.** *Journal of Marketing Research*, 1973(Aug), Vol. 10(3), 242-249. —Describes a stochastic model of consumer response to new products which incorporates the effects of over-time variations in advertising and promotion. An empirical application of the model to the introduction of a new brand of catsup by TV network and spot commercials and to a direct mail campaign is presented. Data suggest that each advertising medium has different effects on the trial and repeat purchase rates and on the existence of differences in buyer characteristics between those who bought the product early and those who bought it late in the campaign. The model's primary usefulness appears to lie in its ability to generate conditional forecasts of product sales to evaluate alternative marketing programs for new product introduction.—*Journal abstract.*

2027. Platt, Anthony & Pollock, Randi. (U. California, School of Criminology, Berkeley) **Channeling lawyers: The careers of public defenders.** *Issues in Criminology*, 1974(Spring), Vol. 9(1), 1-31. —Studied the career characteristics and attitudes of 122 attorneys who worked in a California Public Defender's office between 1927 and 1971. The Alameda County Public Defender's Office (PDO) is described, and the recruitment, background, motivations, aspirations, and career processes of the attorneys are detailed. During the 1950's, motivation and careers of the attorneys began to follow a general pattern: most recruits were male, white, from working and lower-middle class origins, and Protestant and liberal political backgrounds. The PDO was regarded as a place to develop technical skills, and few attorneys planned to make their career in the PDO. Implications of the relationship between the state government, the legal profession, and public service, and factors in the disillusioning atmosphere of the PDO which discouraged many lawyers who planned to enter public service are discussed. (41 ref)—*L. Gorsey.*

2028. Ritchie, J. R. (U. Laval, Quebec, Canada) **An exploratory analysis of the nature and extent of individual differences in perception.** *Journal of Marketing Research*, 1974(Feb), Vol. 11(1), 41-49. —Investigated the extent of individual differences in consumer perceptions of 12 leisure activities and the degree to which these differences are real or simply a function of error in the method of data collection. The measure used to define an individual's perception was his weighting of different dimensions obtained from J. Carroll and J. Chang's individual differences (INDSCAL) model. A consumer panel of 200 females in a Canadian city was used to obtain 6 types of data on 12 leisure activities: similarity/dissimilarity judgments, criteria of similarity judgments, preference data, bipolar scales describing stimuli, familiarity with stimuli, and Rokeach Value Survey scores. Results show that (a) differences in perception among Ss were significantly greater than chance, (b) 5 perceptual segments were identified as best describing the range of

perceptions found in the sample, and (c) these perceptual segments did not significantly differ in their familiarity with the stimuli, personal values, or demographic variables. (28 ref)—*L. Gorsey.*

2029. Savoyant, Alain. (National Ctr for Scientific Research, École Pratique des Hautes Études, Lab of Industrial Psychology, Paris, France) **[Components of a situational analytic framework for problem-solving by work-shifts.]** (Fren) *Année Psychologique*, 1974, Vol. 74(1), 219-237. —Discusses the components of an analytic framework and the need for a high degree of coordinated integration of complex activities. The study of concrete work situations is considered essential for improving the analytic framework. (29 ref)

2030. Schussel, Robert. (Lehigh County Community Coll) **Circularity of vocational interests: Spherical analysis of VIP items.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol. 7(2), 86-91. —A. Roe (1956) and J. L. Holland (1969) have suggested that interest categories are ordered in a circular configuration and have felt that this model would be helpful in explaining changes in vocational behavior. Spatial configuration analysis has confirmed that the internal structural relationships of scales from several different interest inventories are similar and do conform to the circular ordering proposed by Roe and Holland. The present study attempted to (a) explain R. C. Tryon's (see PA, Vol. 41:8928) spherical analysis and show that spatial configuration analysis is a special case of Tryon's method and (b) determine if items from the Vocational Interest Profile (VIP) conform to previous results obtained from a spatial configuration analysis of the VIP scales. Spherical analysis confirmed the ordering effect of items for 1,058 males, but a U-shaped configuration instead of a circular one was found. Results for 655 females were difficult to interpret and suggest that females did not respond to the items in the same manner as males.—*Journal abstract.*

2031. Toenjes, Carol M. & Borgen, Fred H. (Iowa State U) **Validity generalization of Holland's hexagonal model.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol. 7(2), 79-85. —Tested J. L. Holland's 1959 hexagonal model for 6 occupational groups (Realistic, Investigative, Artistic, Social, Enterprising, and Conventional) with data on estimated occupational rewards. Data on rated occupational reward characteristics were available for 148 occupations. Factor analysis was performed to indicate the structure of the 21 reward dimensions, then the occupations were grouped into Holland's 6 classes. Of the 21 reward dimensions, 15 were significantly different across the groups; the groups were also significantly different at the overall multivariate level using discriminant analysis. The 6 groups were plotted in a discriminant space formed by the reward dimensions. Although the hexagonal shape was distorted, the groups were arrayed in the order postulated by Holland. The study indicates the robustness of the Holland hexagonal model with a new methodology and new data (i.e., the measured reward conditions of occupations themselves). —*Journal abstract.*

2032. Toness, Xenia; Suziedelis, Antanas & Lorr, Maurice. (American Assn of Medical Coll, Washington, DC) **Vocational interest types of men-in-general.**

*Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 74-78.—Sought to identify, by typological analysis, the number and characteristics of vocational interest groups among men in general. On 3 randomly drawn samples, each of 120 Ss, from the Strong Vocational Interest Blank men-in-general standardization pool, records were scored for 14 previously isolated factors of interests. The resulting profiles were intercorrelated and then grouped by typological procedures. Analyses yielded 7 replicable interest types. 5 corresponded closely to J. L. Holland's Realistic, Investigative, Social, Enterprising, and Artistic groups; 2 had relatively undifferentiated profiles of high and low elevation. Occupations of Ss comprising 2 types—Realistic and Investigative—were highly distinctive. Occupational representation within the other 5 groups was broad and varied.—*Journal abstract*.

2033. Walker, Orville C. & Sauter, Richard F. (U Minnesota) **Consumer preferences for alternative retail credit terms: A concept test of the effects of consumer legislation.** *Journal of Marketing Research*, 1974(Feb), Vol 11(1), 70-78.—Investigated (a) consumer sensitivity to variations in finance rates compared to their sensitivity to the price of merchandise, down payment size, and size of monthly payments and (b) variations in credit term preferences among consumers with different demographic characteristics. Significant differences in preferences were found among upper- and lower-income respondents which were also related to educational level, occupation, marital status, and income. Implications for retail management, and advantages of the concept testing methodology are discussed.

2034. Wilsted, William D. & Hand, Herbert H. (U Colorado) **Determinants of aspiration levels in a simulated goal setting environment of the firm.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 172-177.—Graduate business students played a computer-simulated competitive business management game to test the hypothesis that previous performance, previous goals, and competitor's performance can be used as predictors of future aspiration levels in a simulated firm environment. Results support the hypothesis and the validity of the macro-organization theory of goal-setting in a simulated environment. (18 ref)

### Occupational Guidance & Personnel Selection & Training

2035. Baizerman, Michael & Cooper, Nicholas C. (U Minnesota, Ctr for Youth Development & Research) **Working youths: Select findings from an exploratory study.** *Journal of Youth & Adolescence*, 1974(Mar), Vol 3(1), 7-16.—Reports findings from an exploratory study of 272 16-22 yr old working youths who were either (a) interviewed in depth using an open-ended questionnaire about their self-concept, occupation, housing, leisure time, and politics; (b) interviewed in a group of 11 other youths, or (c) interviewed on the streets of the inner city. Data presented from the in-depth interviews conducted with 51 Ss emphasize the nature of Ss orientations to the future. Almost all Ss worked in blue-collar, nonfarm occupations. Most reported that they expected a good personal future regardless of their future in their current job and that self-change, self-control, and self-discipline

were second only to education as a means of improving one's life. These findings appeared to cross racial and sexual categories, and suggest that work is not a central emotional locus in Ss' lives, but is instrumental for achieving future goals. Implications for professional practice in education and counseling are noted. (24 ref)  
—L. Gorsey.

2036. Bourgeois, R. P. & Slivinski, L. W. **The interrater reliability of the Consolidated Fund In-Basket.** *Studies in Personnel Psychology*, 1974(Spr), Vol. 6(1), 47-51.—Investigated the interrater reliability of the Consolidated Fund In-Basket Test developed by the Educational Testing Service. The written responses were independently analyzed by 2 scorers on 9 quantitative scales. 38 French-speaking candidates at a middle management level taking part in a public administration program took the French version of the In-Basket Test. While reliability coefficients were generally considered to be high, significant interrater differences were noted in terms of percentile categories on the factors of Analyzing Problems and Relating Implications ( $p < .05$ ) and quantity of Action-Productivity ( $p < .01$ ). The lowest reliability coefficient was obtained for the Scorer's Rating of Overall Performance. (French abstract)—*Journal abstract*.

2037. Dole, Arthur A. (U Pennsylvania) **Aspirations of blacks and whites for their children.** *Vocational Guidance Quarterly*, 1973, Vol 22(1), 24-31.—Attempted to determine how the occupational aspirations of 143 black and white fathers, mothers, and guardians were related to the vocational activity of their children 6 mo after graduation from senior high school. Many of these parents, especially those with low aspirations, seemed to be seriously alienated from their children, perceived the children's career development inaccurately, and expected unreasonable control on the part of home and school. For other children, parents' occupational aspirations were potent in developing careers.—R. S. Albin.

2038. Eltzroth, Marjorie. (Massachusetts Executive Office of Human Services, Boston) **Vocational counseling for ghetto women with prostitution and domestic service backgrounds.** *Vocational Guidance Quarterly*, 1973, Vol 22(1), 32-38.—Examined the characteristics of 2 groups of black women over 25 yrs old who entered vocational training in a poverty agency during the fall of 1971. 20 women had a background of prostitution and 20 had a background of domestic work. The counseling problems encountered, the counseling approaches used, and the training outcomes are discussed. Only 4 of the prostitute group completed the program, but all of the domestic-service group did so. Recommendations are made to improve this result.—R. S. Albin.

2039. Flanagan, John C. (American Inst for Research, Palo Alto, CA) **The first 15 years of Project TALENT: Implications for career guidance.** *Vocational Guidance Quarterly*, 1973, Vol 22(1), 8-14.—Summarizes the major implications for career guidance of Project TALENT studies. *The Career Data Book*, which contains the principal findings from 5-yr follow-up studies of the project, is described.

2040. Huskey, Hyrum H. (Southern Illinois U) **Expressed needs and job satisfaction among military personnel.** *Vocational Guidance Quarterly*, 1973, Vol



22(1), 44-49.—Administered an author-constructed questionnaire to 100 persons in each of 4 rank-structure groupings of the US military population stationed in the area of West Berlin, Germany. The research question was whether the military worker, like his civilian counterpart, was tending to adopt self-actualization as an important part of the work ethic. Results show that job satisfaction was closely related to the individual's feeling that his self-growth needs were being met in his work. It is concluded that military as well as civilian workers are changing their work philosophy.—R. S. Albin.

2041. Kassem, Sami & St. John, D. F. **Technicians in research and development: Background, aspirations and motivational factors.** *Journal of Industrial & Organizational Psychology*, 1973(Spr), No 1, 23-35.—Summarizes, in a composite profile, questionnaires completed by 58 engineering and physical science technicians in 2 midwestern companies. Mean age of the respondents was 30, most were married, and formal education averaged 14 yrs. The majority classified the father's occupation as blue-collar. Positive motivating factors were the work itself, achievement, salary, responsibility, advancement, and recognition. Dissatisfiers were lack of advancement, lack of responsibility, salary, the work itself, lack of recognition, and lack of achievement. On the whole the technician perceives his role as that of a highly diversified skilled worker, not as a professional. 70% indicated the career objective of becoming an engineer or scientist or of entering an unrelated field. The present job is seen as a stepping stone to a professional career that is not yet within reach. It is suggested that management should recognize that technicians are a distinct group in terms of their needs, interests, and frame of reference. The job environment should be improved to be more conducive to growth and career development. Efficient use of skills and talents is also necessary to enrich the jobs of these careerists.—R. L. Sulzer.

2042. Keil, E. C. & Barbee, J. R. (Colorado State U, Research Utilization & Dissemination) **Behavior modification and training the disadvantaged job interviewee.** *Vocational Guidance Quarterly*, 1973, Vol 22(1), 50-56.—Administered a brief behavior change program to disadvantaged minority trainees from federally supported technical training programs to improve their employment interview behavior. 16 experimental Ss and 12 matched controls were compared. Each experimental S was videotaped during a pre- and posttraining simulated interview, and performance was evaluated by 4 judges for each tape. Items of the Job Interview Rating Scale on which the experimental Ss improved, and how these differed from changes in the controls, are discussed. Implications of the findings for interviewer attitudes are considered. (17 ref)—R. S. Albin.

2043. Lachar, David; Sparks, John C.; Larsen, Reed M. & Bisbee, Charles T. (Lafayette Clinic, Detroit, MI) **Psychometric prediction of behavioral criteria of adaptation for USAF basic trainees.** *Journal of Community Psychology*, 1974(Jul), Vol 2(3), 268-277.—Tested the ability of a specially constructed self-report personality inventory to predict emotional adjustment to military basic training. Ss were 14,804 consecutive new recruits. 2

predictive scales (emotional instability and drug-use predictions) were developed by item analysis of the Psychological Screening Inventory and a history, opinion, and interest form which were then combined into an adaptation index. This index labeled 12% of the Ss as high risk for problems of adaptation. Half of these high-risk Ss subsequently evidenced problems in adjustment during basic training. The issues of improved prediction over base rates and application of psychiatric screening to this population are discussed.—*Journal summary.*

2044. Leonard, Russell L. (American Inst for Research, Silver Spring, MD) **Relevance and reliability in the interview.** *Psychological Reports*, 1974(Jun), Vol 34(3, Pt 2), 1331-1334.—64 psychology undergraduate Ss served as interviewers in a simulated employment interview setting. Ss showed greater agreement on rating items that were relevant to the selection requirements for the job in question than on irrelevant items. This result is discussed in the context of improving training of interviewers and feedback in industrial settings.—*Journal abstract.*

2045. Schmidt, Frank L. & Hoffmann, Bernhard. (Michigan State U) **Empirical comparison of three methods of assessing utility of a selection device.** *Journal of Industrial & Organizational Psychology*, 1973(Spr), No 1, 13-22.—Compared the actual savings resulting from lowered worker turnover when using a weighted application blank for nurse's aides with the savings predicted from the Taylor-Russell, Brogden, and general utility models. Despite the widely different assumptions of the models about predictor and criterion scores and relations between variables, the 3 models appeared to be about equal in the accuracy of their savings estimates. The potential value of good selection practices was illustrated by the magnitude of savings. It is important, however, to remember that the validity and hence the utility of a particular selection technique usually declines over time. This is a result of changed labor market conditions, manpower needs, and personnel policies. Hence, periodic monitoring and revalidation when needed are required. (16 ref)—R. L. Sulzer.

2046. Seaton, Hal W. & Maola, Joseph. (U Akron) **Microteaching: A proposal for manpower development and training improvement.** *Journal of Employment Counseling*, 1974(Jun), Vol 11(2), 85-88.—Considers that microteaching through videotape equipment provides program coordinators with a means of evaluating the efficiency, effectiveness, and utility of the training center, and enhances trainee skills through immediate feedback. In addition, videotaped experiences offer increased knowledge to counselors, thus promoting vocational direction best suited to trainee needs.

2047. Smith, David G. & Mohlman, Robert N. (U Oakland) **Change in change agents: Effects of an employability institute.** *Journal of Employment Counseling*, 1974(Jun), Vol 11(2), 73-77.—Used a revised version of the Porter Scale of Counselor Attitudes to assess the interpersonal response patterns of 16 Nebraska Department of Labor employees who had completed training at the Nebraska Employability Development Institute. A significantly greater percentage of understanding responses (compared to national norms for a similar group) was interpreted as meeting intermediate criteria of training

program success. Comments are made regarding the further necessity for final program assessment using enrollee outcomes as successful criteria.—*Journal abstract.*

2048. Sterne, David M. (VA Hosp, Vancouver, WA) **The Kuder OIS and rankings of vocational preference.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 63-68.—Compared Kuder Occupational Interest Survey (KOIS) scores of hospitalized veterans with their preferential rankings of the 77 KOIS occupations. Low intercorrelation was found, although test-retest reliabilities were .93 and .76 respectively. KOIS responses tended to resemble those of construction and skilled trades workers and differed from those of men employed in artistic, verbal-linguistic, and social service and psychologically oriented occupations. Professional occupations related to construction and skilled trades received the highest ranking.—*Journal abstract.*

2049. Trimmer, Harvey W. **Predictive validity of instructor ratings in a skill training setting.** *Journal of Employment Counseling*, 1974(Jun), Vol 11(2), 89-95.—Compared and contrasted predictive training ratings of 36 female trainees by their instructors, with first-line supervisory ratings of the same trainees in an employment setting. An ethnic subgroup analysis suggests possible differences in terms of range and variations of prediction.

2050. Varga, F. Louis . (California Dept of Human Resources Development, San Diego) **Employment counselors' perceptions of client needs.** *Journal of Employment Counseling*, 1974(Jun), Vol 11(2), 63-72.—Measured the differences in types of client needs perceived by various categories of counselors, the types of needs they attempted to help their clients gratify, and the needs that were viewed as gratified. 18 counselors and 697 clients (or their records) were used in the study. A 5-category need-classification guideline was used by 3 outside judges to categorize the list of needs compiled by the counselors. Differences in need categories were compared using a chi-square formula and Yates's correction for small frequencies. Significant findings and conclusions are presented.—*Journal abstract.*

### Job Performance & Satisfaction

2051. Alutto, Joseph A. & Acito, Franklin . (State U New York, Buffalo) **Decisional participation and sources of job satisfaction: A study of manufacturing personnel.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 160-167.—Tested J. A. Alutto and J. A. Belasco's 1972 model of decisional participation by administering measures of decision-making, satisfaction, attitudes toward company, commitment, job tension, interpersonal trust, and authoritarianism to 80 workers in a manufacturing firm. Data confirm the importance of decisional participation in job-related attitudes and behaviors. (17 ref)

2052. Bradburn, Norman M. (U. Chicago) **Is the quality of working life improving? How can you tell? And who wants to know?** *Studies in Personnel Psychology*, 1974(Spr), Vol. 6(1), 19-33.—Examines the concepts behind the variables involved in the changes in the quality of working life and the role of the US government in monitoring these changes. Focus is on the

relation of aspects of working life to a general theoretical framework for how people come to judge themselves as happy or unhappy, and on the role of social indicators in government policy formulation. (French abstract) —*Journal abstract.*

2053. Burke, Ronald J. (York U.) **Personnel job transfers: Some data and recommendations.** *Studies in Personnel Psychology*, 1974(Spr), Vol. 6(1), 35-45.—Notes that job transfers serve a number of purposes; lateral transfers benefit the organization while promotional transfers benefit both the organization and the employee. Descriptive data are presented from a questionnaire survey on the effects of transfer which was completed by 39 engineers who had been transferred at least once in the past 5 yrs and by their wives. Results show that job transfers presented a hardship. The high proportion of lateral transfers may be a source of discontentment, since these were associated with less satisfaction. (French abstract)—*Journal abstract.*

2054. Cascio, Wayne F. (U Rochester, Graduate School of Management) **Value orientation, organizational rewards, and job satisfaction.** New York, NY: U Rochester, Graduate School of Management, TR No 82, 1973. 87 p.—Surveyed 540 members of a nation-wide sales force to determine whether individuals who emphasize intrinsic (extrinsic) aspects of work can achieve the same level of overall job satisfaction if intrinsic (extrinsic) organizational rewards match their value orientation. High-intrinsic-low-extrinsic value orientation Ss were significantly more satisfied across all facets of their job than the high-extrinsic-low-intrinsic group. (49 ref)

2055. Cory, Charles H. **An evaluation of computerized tests as predictors of job performance in three navy ratings: 1. Development of the instruments.** *US Navy Personnel Research & Development Center Report*, 1974(Aug), No 75-2, 35 p.—Constructed 8 computerized tests to measure 5 personal attributes identified in previous research as being important for job performance. The experimental battery also contained 9 previously developed tests. The battery was administered to 385 naval trainees, and test results and interrelationships were analyzed in conjunction with operational written test and biographical variables. Results show that the computerized tests were particularly important for measuring sequential information processing, movement detection, and short-term memory skills. They offered no advantage over paper-and-pencil measures of perceptual speed, and findings relative to perceptual closure were ambiguous. It is concluded that computerized and paper-and-pencil tests of perceptual closure apparently measure different abilities. The 2 separate, short-term memory abilities found corresponded to faculties for high-associational and low-associational (rote) stimuli. (38 ref) —*Journal abstract.*

2056. Farley, Jennie . (Cornell U, New York State School of Industrial & Labor Relations) **Men, women, and work satisfaction on campus.** *Cornell Journal of Social Relations*, 1974(Spr), Vol 9(1), 17-33.—Surveyed the nearly 7,000 employees at Cornell University to get a general picture of the work force and to search for factors affecting the extent to which employees report themselves to be satisfied with their work. The work



force proved to be half male and half female, with the women overrepresented (69%) among those doing nonprofessional jobs and underrepresented (26%) among professional workers. As earlier studies have suggested, reported work satisfaction was linked with time on the job and job level. Women, who in general were at the university for a shorter time and in lower skilled jobs, did manifest less work satisfaction. Certain groups (e.g., faculty wives and student wives) appeared to be less happy than the other women. In addition, there was a trend suggesting that women in "men's fields" were (like men in "women's fields") likely to be less satisfied than their colleagues in fields traditional for their sex. Suggestions for utilizing the potential of women workers are included.—*Journal abstract.*

2057. Feldman, Harold & Feldman, Margaret. **The relationship between the family and occupational functioning in a sample of urban welfare women.** *Cornell Journal of Social Relations*, 1974(Spr), Vol 9(1), 35-52.—Conducted interviews with 1,325 women living in small towns and the areas around them. A  $2 \times 2 \times 2$  design was used with 2 employment groups (working outside the home for pay during the week of the interview vs unemployed), father present or father absent groups, and current welfare vs ex-welfare groups. Results are presented in terms of motivations to work, the degree of satisfaction obtained from working vs caring for the home, husband's role in employment decision making, family problems associated with working, possible changes in material consumption because of the wife's employment or unemployment, and special problems associated with welfare status. Findings indicate that role behavior and expectations in either the family or occupational systems were affected by obligations in the other and that there are strong social pressures for low income women to become employed to avoid becoming "parasites" on society; however, society also expects them to be primarily committed to their homes and families. Policy recommendations and implications are examined.—*L. Gorsey.*

2058. Förander, Nils. [Morale and discipline in the forces.] (Swed) *MPI B-Rapport*, 1974(Jun), No 101, 91 p.—Studied possible changes in the training of officers in the Swedish army which could result in greater efficiency and better morale and discipline. Discrepancies between the views of the Supreme Commander on morale and discipline and the characteristics of the actual situation were examined. Results indicate that the ability to receive information from subordinates should be improved and that the attitude held toward officers is the most important factor for satisfaction within the military environment. Generally, conscripted officers have better contacts with their subordinates than professional officers. It is recommended that professional officers' training should ultimately result in a combination of job performance and friendly contact and that certain rules of social communication be eliminated to facilitate this. Implications for training are noted.—*English summary.*

2059. Ivancevich, John M. & Donnelly, James H. (U Kentucky) **A study of role clarity and need for clarity for three occupational groups.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 28-36.—Investigated the need for role clarity (i.e., the extent to which required

information is communicated and understood) in 48 supervisors, 86 salesmen, and 127 operating (i.e., semiskilled) employees in an electronic manufacturing firm. All Ss completed (a) a 5-item role clarity index which assessed the extent of adequate role-relevant information and variations in the quality of information received; (b) a physical stress index; (c) a job satisfaction evaluation; and (d) a propensity to leave index. Salesmen correlations between all indices and role clarity were significant, except for physical stress, but none of the supervisor and operating employee correlations between job satisfaction and role clarity were significant. Significant relationships between role clarity and general job interest, job tension, and propensity to leave were found for all 3 occupational groups. Results also show that the extent of the need for clarity mediates the relationships between perceived clarity and job satisfaction.—*L. Gorsey.*

2060. Morgenstern, F. S.; Hodgson, R. J. & Law, J. (U London, Inst of Education, England) **Work efficiency and personality: A comparison of introverted and extraverted subjects exposed to conditions of distraction and distortion of stimulus in a learning task.** *Ergonomics*, 1974(Mar), Vol 17(2), 211-220.—Examined the relationship between personality characteristics and efficiency of work output, using as Ss 18 males chosen for high or low extraversion scores on the Eysenck Personality Inventory. Introverted Ss functioned less efficiently in the presence of distractions, while extraverted Ss showed actual improvement in the presence of distractions. Other differences in the mode of reaction of these 2 groups were seen in the range and duration of exploratory movements made to improve the artificially distorted character of the stimulus: the movements of the introverts were few and slow compared with the extravagant movements of the extraverts. It is suggested that this difference in response merits consideration in placement by personnel selection and may result in greater contentment at work and improved work efficiency.—*Journal abstract.*

2061. Ondrack, D. A. (U Toronto, Faculty of Management Studies, Ontario, Canada) **Defense mechanisms and the Herzberg theory: An alternate test.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 79-89.—A construct replication of F. Herzberg's findings, using the semistructured Occupational Values Scale to elicit projective responses about satisfying and dissatisfying job situations from 70 graduate business students, failed to yield the 2-factor pattern. Results from the use of this methodology support V. H. Vroom's ego-defense criticism of the recall methodology. (24 ref)

2062. Organ, Dennis W. & Greene, Charles N. (Indiana U, Graduate School of Business) **The perceived purposefulness of job behavior: Antecedents and consequences.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 69-78.—Investigated the relationships between work satisfaction, role ambiguity, locus of control, tenure, and perceived purposefulness of job behavior (PPB) in 94 senior scientists and engineers in a large electronics firm. Ss completed a perceived purposefulness of behavior index which evaluated how often they performed certain behaviors (e.g., setting goals for oneself) in connection with their jobs, Stogdill's Job Expectation Questionnaire, a role ambiguity scale by J.

R. Rizzo et al, and Rotter's Internal-External Control Scale. Zero-order correlational and correlational-causal analyses indicate that (a) increased tenure led to increasing perceived internal locus of control and reduced role ambiguity, (b) role ambiguity had an indirect effect on work satisfaction through its direct effect on PPB, and (c) internal locus of control was directly related to satisfaction as well as indirectly related to it by its effect on PPB. The possibility that PPB mediates the relationship between role clarity and job satisfaction is discussed. (21 ref)—*L. Gorsev.*

2063. Ronan, William W. & Latham, Gary P. (Georgia Inst. of Technology) **The reliability and validity of the critical incident technique: A closer look.** *Studies in Personnel Psychology*, 1974(Spr), Vol. 6(1), 53-64.—Evaluated the critical incident technique and its resulting behavioral indices with regard to 3 measures of reliability and 4 measures of validity. The behavior of interest was the job performance of small independent businessmen involved in pulpwood production. The interjudge reliability of the categorization process and the test-retest intra-O reliability based on responses to the critical behaviors were satisfactory. Low inter-O reliability was obtained. The content validity, construct validity, and relevance of the critical behaviors were judged satisfactory. Concurrent validity coefficients were significant at the .001 level. Results are discussed with reference to the problem of the observation of human behavior. (French abstract) (22 ref)—*Journal abstract.*

2064. Ruh, Robert A.; Johnson, Raymond G. & Sconrino, M. Peter. (Corning Glass Works, NY) **The Scanlon Plan: Participation in decision making and job attitudes.** *Journal of Industrial & Organizational Psychology*, 1973(Spr), No 1, 36-45.—Distributed questionnaires to employees in 15 separate Scanlon Plan units of 6 organizations. 2,488 were returned and showed a median educational level of 12th grade. Significant differences were noted between units in Scanlon Plan participation. Perceptions of the Scanlon Plan were positively related to job involvement, motivation; and identification with the organization. Results were consistent with earlier studies predicting that the Scanlon Plan should contribute to favorable employee attitudes since it provides opportunities for participation in decision making. Alternatively, the results might be interpreted as suggesting that favorable job attitudes influence perceptions of the Scanlon Plan. Contrary to earlier results, however, the relationships between participation in the plan and job attitudes were not much modified by occupational status or participation in the immediate job situation. (20 ref)—*R. L. Sulzer.*

2065. Sarveswara Rao, G. V. & Ganapathi Rao, V. (Small Industry Extension Training Inst, Hyderabad, India) **A study of factors contributing to satisfaction and importance of industrial personnel: A test of the two-factor theory.** *Indian Journal of Industrial Relations*, 1973(Oct), Vol 9(2), 233-262.—To investigate the 2-factor theory of job satisfaction, a job attitude questionnaire containing items related to satisfaction, importance of various aspects, and overall satisfaction was administered to 113 supervisors, 137 clerks, and 250 skilled workers. The questionnaire met the requirements of reliability and convergent and discriminant validity. The

job factors under satisfaction and importance scales were treated as independent variables and overall satisfaction was conceptualized as dependent variable. Assumptions underlying the 2-factor theory as well as the 2-factor plus importance theory were tested. Multivariate analyses revealed that motivators and hygienes were not mutually exclusive variables and their effects were not unidirectional. Both motivators and hygienes contributed to overall satisfaction, and both the variables were considered important in their relationship to the dependent variable. The 2-factor theory did not receive unequivocal support, and an attempt was made to explain the results with different theoretical frameworks. (2 p ref)—*Journal abstract.*

2066. Sarveswara Rao, G. V. & Ganguly, T. (Indian Inst of Science, Bangalore) **A study of perceived need satisfaction and importance of highly skilled and skilled personnel.** *Indian Journal of Industrial Relations*, 1971(Jan), Vol 6(3), 277-287.—Results of a survey of 82 highly skilled and 95 skilled personnel employed in an electrical equipment manufacturing unit indicate that occupational level was an important variable in determining employee's satisfaction. Both motivators and hygienes contributed to satisfaction and dissatisfaction of both occupational groups. It is concluded that the 2-factor-plus-importance theory is an oversimplification of facts and is unable to account for the dynamic nature of work motivation.—*Journal abstract.*

2067. Sarveswara Rao, G. V. (Indian Inst of Science, Bangalore) **Theoretical and empirical considerations of the two-factor theory of job satisfaction.** *Indian Journal of Industrial Relations*, 1972(Jan), Vol 7(3), 311-330.—The 2-factor theory of job satisfaction has received considerable attention in industrial psychology. The theory hypothesizes that satisfaction and dissatisfaction are separate and independent feelings. There are some variables called motivators which primarily contribute to satisfaction alone, and there are other variables called hygienes which primarily contribute to dissatisfaction alone. A review of the literature indicates that the implications of the theory have been found to be applicable to industrial relations, management training programs, and mental hygiene. Most of the studies designed to test the theory have not given rise to unequivocal results. A critical evaluation of the theory as a whole is presented. (6 p ref)—*Journal abstract.*

2068. Sarveswara Rao, G. V. (Small Industry Extension Training Inst, Hyderabad, India) **Determinants of job satisfaction of Indian engineers: A test of the two-factor theory.** *Indian Journal of Industrial Relations*, 1973(Apr), Vol 8(4), 605-619.—Conducted a study with 124 engineers to test the validity and the generality of the 2-factor theory of job satisfaction. A job attitude questionnaire consisting of 2 unipolar satisfaction and dissatisfaction scales and an overall satisfaction scale was administered to the Ss. Analysis revealed only partial support for the 2-factor theory. Satisfaction and dissatisfaction were found to be independent feelings, and motivators contributed to both satisfied and dissatisfied feelings. Motivators and hygienes were not mutually exclusive in the factor analytic sense. (2 P ref)—*Journal abstract.*



2069. Sarveswara Rao, G. V. (Small Industry Extension Training Inst, Hyderabad, India) **A study of weighting components of job satisfaction with importance ratings of industrial employees.** *Indian Journal of Industrial Relations*, 1974(Apr), Vol 9(4), 537-546.—Administered a job attitude questionnaire, consisting of items dealing with satisfaction and importance, to 113 supervisors, 137 clerks, and 250 skilled workers. An attempt was made to determine whether satisfaction multiplied by importance ratings would offer better results than the results obtained through satisfaction or importance dimensions considered separately. Analysis showed that there was no advantage in weighting components of job satisfaction with that of importance, inasmuch as the 2 dimensions were found to be unrelated. Findings indicate that unless and until the superiority of weighted combination of satisfaction with importance is clearly established, mere use of importance scale is not warranted. Job satisfaction scales of the Likert type are sufficient indicators of the importance of an attitude.—*Journal abstract*.

2070. Sarveswara Rao, G. V. (Small Industry Extension Training Inst, Hyderabad, India) **Convergent and discriminant validities between two measures of job satisfaction.** *Indian Journal of Industrial Relations*, 1973(Jan), Vol 8(3), 425-430.—Considers a type of construct validity termed convergent and discriminant validity by D. T. Campbell and D. W. Fiske (1959). Since this type of validity requires a minimum of 2 traits measured by 2 methods, 2 different ways of measuring job satisfaction were studied. A perceived need deficiency scale and a traditional bipolar job satisfaction scale were employed to determine whether there were any similarities and differences between the job factors of the respective scales. The 2 scales were administered to 247 industrial employees consisting of supervisors, clerks, and skilled workers. Intercorrelation analyses of various job factors revealed that the scales have reasonable validity. Findings have implications for behavioral scientists in industrial settings in that the concern for criterion-oriented or predictive validity may be replaced by an equal concern regarding what a scale means or signifies. (18 ref)—*Journal abstract*.

2071. Singhal, Sushila. (Jawaharlal Nehru U, Zakir Husain Ctr for Educational Studies, School of Social Sciences, India) **Perceptual gap in the need-gratification of industrial employees.** *Indian Journal of Social Work*, 1974(Jan), Vol 34(4), 351-358.—Used Maslow's need-hierarchy model to assess perceptual differences in need-gratification and need importance. Ss were 50 workers who participated in the organization, 50 who did not, and 28 foremen and 17 assistant foremen in different plants. Those who participated placed physiological needs above autonomy; the reverse was true for those who did not participate. Foremen and assistant foremen placed autonomy over self-actualization and employees at the 3 levels of organization had significantly different physiological needs. Gratification of higher-order needs remained important to all employees after their lower-order needs were marginally satisfied. Difference in income led to variations of perceptual gap in the gratification of physiological needs but not of autonomy

and self-actualization. The implications of these findings are discussed.—*I. W. Kidorf*.

2072. Tuttle, Thomas C. & Hazel, Joe T. **Review and implications of job satisfaction and work motivation for Air Force research.** *US AFHRL Technical Report*, 1974(Jan), No 73-56, 76 p.—Reviews certain major theories of work motivation, particularly as related to job satisfaction, derives implications for an Air Force job satisfaction research program, and provides a comprehensive 12-page bibliography of satisfaction-retention studies. The theoretical positions considered were Two-Factor, Equity, Instrumentality-Expectancy, Cornell Studies of Satisfaction, and Need-Fulfillment. Conclusions relevant to Air Force job satisfaction-retention research are derived, a general model of satisfaction-tenure for further inquiry is developed, and recommendations regarding a long-range systematic research program are offered. (139 ref)—*Journal abstract*.

2073. Walton, Richard E. (Harvard U., Graduate School of Business Administration) **QWL indicators: Prospects and problems.** *Studies in Personnel Psychology*, 1974(Spr), Vol. 6(1), 7-18.—Suggests that employees in North America are becoming less satisfied with the quality of their working lives. This quality of working life can be analyzed on 3 levels: organizational conditions, employee attitudes, and behavioral systems. Additional social dynamics complicate the role of social indicators. A step model is presented for improving the quality of working life. (French abstract)—*Journal abstract*.

2074. Williams, William E. & Seiler, Dale A. **Supervisor and subordinate participation in the development of behaviorally anchored rating scales.** *Journal of Industrial & Organizational Psychology*, 1973(Spr), No 1, 1-12.—Describes current trends in performance appraisal. Instead of using instruments developed exclusively by psychologists, the tendency is for users of the rating scales to participate in translating specific work performances and accomplishments into job performance dimensions and general descriptors that will be understood by users and accepted as a fair method of setting salaries. These users are the employees themselves, who establish their own work goals, and the superiors who will assign ratings. Application of this procedure to an engineering organization did not appear to make it more difficult to reach an agreement. It is suggested that the experience of participation in criterion development should also enhance subsequent acceptance of the scales.—*R. L. Sulzer*.

#### Management & Leadership

2075. Frost, Carl F.; Wakeley, John H. & Ruh, Robert A. (Michigan State U) **The Scanlon Plan for organization development: Identity, participation, and equity.** East Lansing, MI: Michigan State U Press, 1974. xii, 197 p. \$10.—Discusses 2 main elements of the Scanlon Plan: a system for coordinating labor and management in pursuing, developing, refining, and implementing ideas that make work more satisfying and productive; and a system for sharing the economic rewards of improved productivity. The philosophy of management of the Scanlon Plan insists on superior performances toward the organization's objectives and rewards individual and collective discipline and responsibility. (5 p ref)

2076. Green, Thad B. & Ray, Dennis F. (Mississippi State U) **Academy of management proceedings: Thirty-third annual meeting, Boston, Massachusetts, August 19-22, 1973.** Boston, MA: Academy of Management, 1974. viii, 631 p.—Discusses current issues in national and international management; business policy and planning; managerial consultation, education, and development; manpower management; and organizational theory, development, and behavior.

2077. Hay, Robert & Gray, Ed. (U Arkansas) **Social responsibilities of business management.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 135-143.—Argues that value systems and styles of social responsibility of managers have gone through 3 historical phases—Phase 1, the profit maximizer style; Phase 2, the trusteeship style; and Phase 3, the quality-of-life style. It is suggested that Phase-3 values will become more accepted by business managers of the future.

2078. Larson, Lars L. & Rowland, Kendrith M. (Southern Illinois U) **Leadership style and cognitive complexity.** *Academy of Management Journal*, 1974(Mar), Vol 17(1), 37-45.—Studied the relationship between least preferred coworker (LPC) scores and cognitive complexity in 24 male middle- and upper-level managers (age range = 31-50 yrs), 30 male civil service engineers (age range = 24-55 yrs), 79 male undergraduates, and 44 male graduate business students. Cognitive complexity was measured using T. R. Mitchell's modification of W. A. Scott's measure of cognitive complexity—simplicity and by Bieri's REP Test. Results do not support the hypothesis that LPC scores are positively related to measures of cognitive complexity in the area of interpersonal relations. Age and experience had no effects on this relationship. (21 ref)—L. Gorsey.

2079. Misumi, Jyuji & Ishida, Umeo. (Kyushu U., Fukuoka, Japan) **[An experimental study of "complementary effects" of leadership styles at two step supervisory levels.]** (Japn) *Japanese Journal of Experimental Social Psychology*, 1972(Mar), Vol. 11(2), 148-158.—Studied the complementary effects of different leadership types between 2 organizational levels upon job satisfaction and productivity of the group. The leadership types were P (strongly performance-oriented), M (strongly maintenance-oriented), PM (strongly oriented toward both performance and maintenance), and pm (weakly oriented toward both). 63 male workers (average age 22) at a post office were randomly formed into 10 groups of 3 members each, to which different combinations of leadership types were assigned between 2 levels. 10 graduate students played the role of 1st-line leaders and 3 associate professors played the role of 2nd-line leaders. Results indicate that "complementary conditions," which included P and M between 2 levels together, yielded significantly higher productivity than "overlapping conditions" (P-P or M-M) or the pm condition.—*Journal abstract.*

### Organizational Structure & Climate

2080. Gadbois, C. **[Psychological analysis of organizations: Climate and its dimensions.]** (Fren) *Année Psychologique*, 1974, Vol 74(1), 269-293.—Examines organizational climate, the environment in which the working individual exists, based on subject-environment

interaction as the explanation of behavior. Topics considered include the evolution of behavior analysis in organizations, personality and individual behavior, the climate of large and small groups, and values and attitudes.

2081. Kiev, Ari. (Cornell U, Medical School, New York) **A strategy for handling executive stress.** Chicago, IL: Nelson-Hall, 1974. 178 p. \$7.95.—Describes sources of tension and anxiety in contemporary corporate life and prescribes techniques for reducing and managing conflict. Major topics include (a) characteristics of psychological stress and self-defeating behavior; (b) procedures for integrating corporate and personal objectives, based primarily on the idea of self-actualization and crisis intervention models; and (c) recommendations for industry for assessing personnel strength and bettering communication.

### Human Factors Engineering & Safety

2082. Bergström, Sten S. & Franzén, Ove. (Uppsala U, Psychological Inst, Sweden) **[Scanning and visual contrast.]** (Swed) *MPI A-Rapport*, 1974(Apr), No 23, 32 p.—Systematically reviewed conditions known to influence contrast thresholds in human visual scanning with particular reference to military applications of detection and recognition of aircraft. Gaps in the literature are identified, especially the topics of moving signals and heterogeneous backgrounds. Research is proposed to explore contrast thresholds under conditions resembling practical scanning situations. Signal detection will be studied as a function of luminance levels and varying backgrounds. (54 ref)—R. J. Simeonsson.

2083. Brigham, F. R. (U of Technology, Loughborough, England) **A critical note on the application of analysis of variance techniques in ergonomics research.** *Ergonomics*, 1974(Mar), Vol 17(2), 259-265.—A survey made of the statistical techniques used in 108 papers appearing in *Ergonomics* between 1969 and 1971 showed that analysis of variance had been misapplied in many cases, sometimes with potentially serious consequences. The major criticisms concern the use of inappropriate error terms, the inadequate consideration of some of the assumptions involved in repeated measures and other designs, and the omission of a posteriori tests.

2084. Chapanis, A. (Johns Hopkins U) **National and cultural variables in ergonomics.** *Ergonomics*, 1974(Mar), Vol 17(2), 153-175.—Posits that ergonomics has been largely an American and Western European discipline and that present-day ergonomics is not robust enough to cope with the large and important differences found among the people of the earth. These differences are discussed under 5 major headings: anthropometry, language, physiology, psychology, and customs and practices. In each case, the differences are so great that they require substantial modification in commonly accepted ergonomics principles and practices. In some cases, the technical design problems involved in adapting equipment to non-Western societies have required the development of new ergonomics principles. It is stressed that failure to take account of national and cultural variables may nullify the gains reasonably expected to follow from the application of ergonomics in many areas of the world. (24 ref)—*Journal abstract.*



2085. **Chapanis, Alphonse**. (Johns Hopkins U) **Human engineering environments for the aged**. *Applied Ergonomics*, 1974(Jun), Vol 5(2), 72-80.—Human engineering, which has until recently been primarily concerned with military and aerospace systems, is now focusing on broader societal problems. Many human engineering principles can be generalized to cover the design of environmental features for the aged, such as visual displays, work places, tools and appliances, and stairways and ramps.

2086. **Evans, Leonard & Rothery, Richard**. (General Motors Research Lab, Warren, MI) **Detection of the sign of relative motion when following a vehicle**. *Human Factors*, 1974(Apr), Vol 16(2), 161-173.—Investigated the ability to detect the sign of relative motion in the driving situation. 12 male passengers in a specially instrumented vehicle were given controlled looks, normally of 4-sec duration, of a lead car. It was the S's task to estimate whether the 2 cars had come closer or moved further apart during the exposure. The comparative ability of 9 stimulus functions to predict the detection of the sign of relative motion was examined. The most consistent results were obtained when it was assumed that the response was to either the average value of relative speed during the exposure divided by spacing, or to the spacing change divided by spacing. One of the most consistent effects observed was a response bias in favor of indicating that the cars had come closer when they had not. Results indicate considerable sensitivity to the sign of relative motion. (18 ref)—*Journal abstract*.

2087. **Ferguson, D. A.; Major, G. & Keldoulis, T.** (U Sidney, School of Public Health & Tropical Medicine, NSW, Australia) **Vision at work: Visual defect and the visual demand of tasks**. *Applied Ergonomics*, 1974(Jun), Vol 5(2), 84-93.—Several studies of visual tasks in a large communications undertaking have revealed much defect of vision and many sources of visual fatigue and inefficiency. The nature of visual fatigue is described, and a program to facilitate visual tasks is outlined. (43 ref)

2088. **Gardner, James A. & Soliday, Stanley M.** (North Carolina State U) **Human factors in digital telecommunications**. *Human Factors*, 1974(Apr), Vol 16(2), 146-153.—Describes an experimental methodology which relates human visual performance to electronic digital system design parameters. These relationships are used to show how to specify optimal encoder design parameters. To illustrate this experimental procedure, tradeoffs were determined for a digitally encoded TV system. These relationships were determined by measuring 12 university students' minimum perceptible acuities for various length lines and spatial orientations. Visual performance was determined for points along 4 noise-bandwidth curves representing different information capacities and system costs. Optimum system performance was achieved by maximizing the sampling frequency (bandwidth) of the encoder.—*Journal abstract*.

2089. **Huddleston, H. F.** (Royal Aircraft Establishment, Farnborough, England) **A comparison of two 7 x 9 matrix alphanumeric designs for TV display**. *Applied Ergonomics*, 1974(Jun), Vol 5(2), 81-83.—12 technical workers and 16 pilots read the individual characters of 2 alphanumeric designs from a TV screen

arranged to appear briefly at a fixed position and contrast level. The comparisons showed that the Royal Aircraft Establishment design caused fewer errors than a comparable US design for the conditions of the experiments. (17 ref)

2090. **Kennedy, T. C.** (Southend-on-Sea Hosp, Essex, England) **The design of interactive procedures for man-machine communication**. *International Journal of Man-Machine Studies*, 1974(May), Vol 6(3), 309-334.—Examines the process of normal communication between individuals to determine principles which may be applied to the design of a man-machine communication language. Practical experience in the design of data entry procedures is discussed, and it is suggested that the system, as perceived by the user, should be made simple and natural in its structure, even though this may involve extensive programming to match efficient internal data structures to the required external model. A set of ground rules for the design of a "well-behaved" system is proposed. (22 ref)

2091. **Kraft, Conrad L. & Anderson, Charles D.** (Boeing Aerospace Co, Seattle, WA) **Prediction of target acquisition performance of aerial observers and photointerpreters with and without stereoscopic aids**. *USAF AMRL Technical Report*, 1973(Dec), No 73-36, 98 p.—Screened 48 adults for visual acuity, stereopsis, phorias, and color perception and investigated the effects of image chromaticity and display stereoscopy. Ss' stereoscopic skill in the Sonne viewer was measured with achromatic and chromatic transparencies of regular and irregular terrain versions of the Critical Limen Stereo Test displayed statically and dynamically. Stereoscopic performance was better with the achromatic tests over the chromatic tests, irregular background over the regular background tests, and stationary display over dynamic display. All main effects were statistically significant, and O performance correlated across tests. Chromostereopsis appeared to be a factor contributing to large individual differences, and its measurement was necessary in maximizing predictions with chromatic imagery. Prediction of target acquisition performance on moving strip imagery displayed stereoscopically was good. The 4 combinations of main conditions, and achromatic and chromatic imagery displayed nonstereoscopically or stereoscopically, resulted in similar target acquisition performance.—*Journal abstract*.

2092. **Long, James L.** (US Naval Personnel Research & Development Lab, Washington, DC) **A stereo tape recorder technique for observational data**. *Human Factors*, 1974(Apr), Vol 16(2), 154-160.—Describes a technique for the collection and analysis of observational data using a specially configured stereo tape recorder and a dual-channel amplifier-recorder for a paper printout. The method has been used to compare trainer operations to real-life operations, and in field studies to evaluate console designs, activity rates, and percentage of time devoted to various activities.

2093. **Mills, Robert G. & Hatfield, Shirley A.** (Wright Patterson Air Force Base, Aerospace Medical Research Lab, OH) **Sequential task performance: Task module relationships, reliabilities, and times**. *Human Factors*, 1974(Apr), Vol 16(2), 117-128.—Developed a methodology and conducted an experiment to examine some of

the assumptions and combinatorial rules employed in applying human performance reliability (HPR) and task time data to the quantification of human performance. 5 paid university students performed a variety of tasks designed to provide empirical estimates of HPR and task time and to permit examination of the effects of combining tasks. Results indicate that (a) the normality assumption for distribution of task time was inappropriate, (b) the rules for combining task times were satisfactory if the underlying distribution of task times was known, (c) HPR was affected severely by combining tasks, and (d) any model for estimating HPR will require parameters to account for task combining and difficulty. —*Journal abstract.*

2094. Moore, T. G. (Loughborough U of Technology, Human Sciences & Advanced Technology Research Group, England) **Tactile and kinaesthetic aspects of push-buttons.** *Applied Ergonomics*, 1974(Jun), Vol 5(2), 66-71.—Describes the tactile and kinesthetic senses, explaining their importance for button design and layout, especially in situations where visual identification of buttons is not possible. An experiment is reported whereby push-button shapes were tested for tactile discriminability and allocated to given control functions.

2095. Pollack, Irwin. (U Michigan, Mental Health Research Inst) **Detection of changes in spatial position: IV. Multiple display fields, display aiding, and interference.** *Human Factors*, 1974(Apr), Vol 16(2), 93-116.—Conducted 3 series of studies with 12-15 operators in each to examine the detection of changes in spatial position for random-dot visual patterns in sequences of 2-16 successive display fields. Results show that operators integrated displacement information across successive display fields; detection was nearly invariant with a fixed total displacement over successive display fields, whether the status of a particular dot was queried or whether the observer indicated only whether any dot in the field has been displaced. Display aiding, represented by a trail of displacements, was extremely effective; strikingly large performance changes—from near chance to near perfect—were observed as a function of the length of the trail, especially at long intervals between successive displacements. The rate of trail fading proved to be a relatively insensitive variable. 3 forms of visual interference were distinguished: clutter, or stationary noise; jitter, or stationary noise modified by a random walk; and random noise. Random noise was substantially more interfering than clutter. Implications for the design of displays are briefly discussed. (17 ref)—*Journal abstract.*

2096. Signori, Edro I. & Bowman, Roland G. (U British Columbia, Vancouver, Canada) **On the study of personality factors in research on driving behavior.** *Perceptual & Motor Skills*, 1974(Jun), Vol 38(3, Pt 2), 1067-1076.—Considers that the involvement of personality factors in traffic accidents is supported by findings from psychiatric studies which focus on psychopathology, psychopathy, stress, alcoholism, and accident-proneness and from other studies which make use of psychological testing devices to measure components of personality. Further progress in clarifying the relationship between personality and traffic accidents may be achieved through the use of more appropriate validation

criteria and more inclusive stylistic conceptions of personality. Guidelines for further research are presented, and studies of field independence-dependence and its role in driving behavior and the relation between certain Jungian functions and driving are suggested. (47 ref)—*Journal abstract.*

2097. Singleton, W. T. (U Aston) **Man-machine systems.** Harmondsworth, England: Penguin, 1974. 178 p. \$2.50.—Examines the concepts and problems involved in man-machine interactions, separates functions from the means of achieving them, and stresses the importance of structuring the design process itself. Techniques of analyzing job and task and skill and error are discussed, as well as job description, selection, and training. (5 p ref)

2098. Slater, S. W. & White, M. J. (Victoria U Wellington, New Zealand) **Sodium lighting and mercury lighting on the road.** Wellington, New Zealand: Victoria U, Dept of Psychology, 1972. 18 p.—Comparisons of signal detectability on the road showed higher detection rates for the sodium-light than for the mercury-light condition. It is recommended that similar research be done under laboratory conditions and that further study be undertaken of acuities relying on color contrast.

2099. Soliday, Stanley M. & Gardner, James A. (North Carolina State U) **Picture quality judgments in a digital television system.** *Human Factors*, 1974(Apr), Vol 16(2), 139-145.—Notes that digital communication systems distort their signals as a consequence of the digitization process and that the distortions are related to the code length and sampling frequency of the system. The present study assessed viewers' responses to these variables by using simulated digital TV. 24 male undergraduates with normal vision rated the quality of pictures distorted by several combinations of the variables. A response surface generated from the ratings showed that the ratings were affected by both variables, but most profoundly by code length. Interpretation of the surface's contours from the perspective of system costs revealed that costs should be considered solely from the standpoint of code length.—*Journal abstract.*

2100. Walker, James T. (U Missouri, St Louis) **Lythgoe's visual stereophenomenon in the natural environment: A possible factor in air and highway accidents.** *Human Factors*, 1974(Apr), Vol 16(2), 134-138.—Discusses R. J. Lythgoe's 1938 discovery that the path of a horizontally moving object, when viewed binocularly, appears distorted in depth if a light shines in only one of the observer's eyes. The image in the lighted eye has a shorter visual latency period than the image in the other eye, and this temporal difference between image latencies translates into an apparent spatial difference between image positions—binocular disparity—which results in the apparent depth displacement of the moving object. It is suggested that, in the natural visual environment, one eye can be lighted by the sun while the other is shaded by the nose, and thus distortions may be produced in the apparent paths of airplanes, or of traffic moving on the ground. It is noted that the roles that such distortions may play in some air and highway accidents have not been considered previously.—*Journal abstract.*



2101. Weltman, Gershon et al . (Perceptronics, Woodland Hills, CA) **Experimental study of man-machine interaction in adaptive computer aided control.** Woodland Hills, CA: Perceptronics, 1974. v, 52 p. —Presents the theoretical background and results of an experiment with 16 military computer operators which

investigated human factors criteria for adaptive computer aiding and a rationale for shared decision and control. A program was developed and tested which provides on-line estimation of operator utilities for his own and machine control. (16 ref)

# BRIEF SUBJECT INDEX

Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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'8327. 'Howard, R. Lee.; Glendenning, Robert L. & Meyer, Donald R. ' (Ohio State U) 'Motivational control of retrograde amnesia: Further explorations and effects.' *Journal of Comparative & Physiological Psychology*, 1974(Feb). Vol. 86(2), 187-192.-' Reports 5 investigations of variables related to the motivational control of retrograde amnesias for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer' (see PA Vol 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. (2) ' (15 ref) -' *Journal abstract*.

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- 3 - Affiliation of first-named author/editor only.
- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
- 5 - Primary publication title and bibliographic data.
- 6 - Text of abstract.
- 7 - Reference to a previous entry in *Psychological Abstracts*. If an abstract number is unavailable at time of publication, the issue number is given. Consult the Author Index of the PA issue noted in order to determine the record number for the article.
- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

## BOOK ANNOTATION

'8328. 'Chase, William G. ' (Ed). ' (Carnegie-Mellon U) 'Visual information processing. 'New York, N.Y. 'Academic, '1973. 'xiv. '555 p. '\$17.50.-' Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Designation of editor.
- 4 - Affiliation of first named author/editor only.
- 5 - Book title: If the book is in a foreign language, the original title is given followed by a translated title and the language of the book is indicated in parentheses.
- 6 - Place of publication.
- 7 - Publisher.
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

## BOOK CHAPTER CITATION

'8329. 'Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. ' (Stanford U) 'On the meeting of semantics and perception. 'In W.G. Chase (Ed), *Visual information processing*, New York, N.Y.: Academic, 1973. xiv, 555 p. \$17.50

- 1 - Record number.
- 2 - Author(s) of cited chapter. As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

## ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH = adrenocorticotrophic hormone  
DNA = deoxyribonucleic acid  
E = experimenter  
EEG = electroencephalogram or -graph  
ESP = extrasensory perception  
Exp = experiment  
IQ = intelligence quotient  
LSD = lysergic acid diethylamide  
MMPI = Minnesota Multiphasic Personality Inventory

NREM = nonrapid eye movement  
REM = rapid eye movement  
RNA = ribonucleic acid  
S = subject  
TV = television  
US = United States  
USSR = Union of Soviet Socialist Republics  
WAIS = Wechsler Adult Intelligence Scale  
WISC = Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., ALGOL, COBOL, FORTRAN, IBM 360.

Language abbreviations used after translated titles are:

Afr = Afrikaners  
Alba = Albanian  
Arab = Arabic  
Bulg = Bulgarian  
Chin = Chinese  
Czec = Czech  
Dan = Danish  
Duth = Dutch  
Finn = Finnish  
Flem = Flemish  
Fren = French

Geor = Georgian  
Germ = German  
Grek = Greek  
Hebr = Hebrew  
Hung = Hungarian  
Iran = Iranian  
Ital = Italian  
Japn = Japanese  
Lith = Lithuanian  
Norg = Norwegian  
Polh = Polish

Port = Portuguese  
Romn = Romanian  
Russ = Russian  
Slov = Slovene  
Slov = Slovak  
Span = Spanish  
Srb = Serbo-Croatian  
Swed = Swedish  
Turk = Turkish  
Ukrn = Ukrainian  
Yugo = Yugoslavian

\*Consult Webster's New Collegiate Dictionary

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# PSYCHOLOGICAL ABSTRACTS

Volume 53

February 1975

Number 2

## GENERAL

2102. Aiba, Hitoshi F. (Keio U, Medical School, Tokyo, Japan) **Psychiatry in Japan.** *Journal of the American Institute of Hypnosis*, 1973(May), Vol 14(3), 126-131.—Traces the development of psychiatry in Japan, from a 19-century anecdote to a discussion of present day practices. Examples of various contradictions (particularly traditional vs modern values) which exist in the society and which make it difficult to practice the science are presented.

2103. Bach-y-Rita, George. (U California, Medical School, San Francisco) **The prisoner as an experimental subject.** *JAMA: Journal of the American Medical Association*, 1974(Jul), Vol 229(1), 45-46.—Discusses the effects of prison and imprisonment on a prisoner's capacity to enter into a research contract, and presents suggestions for criteria that will permit experimentation in prisons. Informed consent in prison is a particularly sensitive issue, since what may be perceived as an acceptable risk for a person inside a prison may be totally unacceptable for that same person outside. The inability of the prisoner to have access to a physician of his choice and the lack of protection that prison affords to the prisoner also must be considered. The types of coercive pressure that occur in prison and how they operate to influence participation (e.g., prisoners may be attracted to the relatively comfortable life that a research ward offers) also place restraints on experimental studies in prison environments. The need for all investigators to design research compatible with social and ethical principles is emphasized.—L. Gorsey.

2104. Benjamin, Martin. (Michigan State U) **Vesey on volition: The "second mistake."** *Michigan Academician*, 1974(Spring), Vol 6(4), 377-387.—Analyzes and disputes Vesey's philosophical analysis of volition, citing philosophers and other writers to discredit Vesey's analogy between perception and volition and shows that his innovative expressions are unnecessary and problematic. A simpler explanation is offered for the discrepancy between intention and motor action in anesthesia.

2105. Bertin, Morton A. (Office of Naval Research, Chicago, IL) **An overview of psychology in Latin America.** Chicago, IL: Office of Naval Research, 1974. 35 p.—Presents the 3rd in a series of works covering the status of foreign psychological research and activity, and includes discussions with prominent Latin American psychologists concerning representative work in process in 10 countries.

2106. Birnbrauer, Jay S.; Peterson, Christa R. & Solnick, Jay V. (U Western Australia, Nedlands) **Design and interpretation of studies of single subjects.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2),

191-203.—Considers that the emphasis upon group-statistical designs of experiments gives the impression that practitioners who work with I S at a time cannot do research. Arguments to the contrary and descriptions of how treatment of individual clients can be designed to yield valid conclusions regarding treatment efficacy are given in this paper. The utility of such studies for the design of future treatment plans is discussed. (30 ref) —*Journal abstract.*

2107. Brody, Eugene B. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **The Journal of Nervous and Mental Disease: The first 100 years: II. 1882-1901. Persisting psychiatric themes and the renewed dominance of neurology.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 1-11.

2108. Brožek, Josef. (Lehigh U) **Soviet historiography of psychology: IV: History of psychology abroad.** *Journal of the History of the Behavioral Sciences*, 1974(Jul), Vol 10(3), 348-351.—In prerevolutionary Russia, translations of Western texts in psychology were readily and rapidly available. A Soviet bibliographic source cites only 3 postrevolutionary Russian works on the history of Western psychology. 3 additional publications by Shorokhova are reviewed here, and attention is drawn to a neglected 1930 text by Fingert and Shirvindt.

2109. Evans, B. T.; Blinnie, C. D. & Lloyd, D. S. (St Bartholomew's Hosp, London, England) **A simple visual pattern stimulator.** *Electroencephalography & Clinical Neurophysiology*, 1974(Oct), Vol 37(4), 403-406.—Describes an electronically controlled visual pattern stimulator which includes a matrix of light-emitting diodes which can be switched to provide pattern reversal over the entire display or any combination of sub-quadrants. The unit is portable and suitable for either manual or computerized operation. (French summary)

2110. Freeman, Linton. (U Hawaii) **Two problems in computer simulation in the social and behavioral sciences.** *Social Science Information*, 1971(Feb), Vol 10(1), 103-109.

2111. Freeman, Roderick A. (Wayne State U) **The case of the missing sense-data.** *Michigan Academician*, 1974(Spring), Vol 6(4), 409-416.—Disputes G. E. Moore's philosophical view that when we know or perceive a material object our sense data include a particular surface of the object and a sense-patch that includes color, size, and shape. Moore's deductions that the sense data are distinct from both the object and the mental act of seeing are specifically challenged. "Sense data" is said to be used equivocally, appropriately to refer to the sense-patch, but inappropriately to refer to attributes such as color and shape. This ambiguity, especially treating attributes as things, is blamed for violations of



ordinary language that led to Moore's disputed conclusions.—*R. D. Kahoe.*

2112. French, A. S. (U Alberta, Edmonton, Canada) **Synthesis of low-frequency noise for use in biological experiments.** *IEEE Transactions on Biomedical Engineering*, 1974(May), Vol 21(3), 251-252.—Describes a simple technique for generating white noise having sufficient power below 10 Hz to be useful in biological experiments.

2113. Frith, Uta. (MRC Developmental Psychology Unit, London, England) **The Georgian school of psychology: Impressions from a visit to Tbilisi.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 197-201.—Describes and discusses the concept of "set," which is central to the Georgian school of psychology. Set is roughly defined as "instantaneous personality," a basic way of perceiving the environment to which the situation and the internal needs at a given moment give rise. The original experiments leading to set theory are described. Set theory has been applied to the study of individual personality differences, and thus to diagnosis, and it can serve as a model of behavior. Ongoing research, not hitherto published in English, is described: a study of the cognitive structures of educationally subnormal children, an experiment in subliminal perception, and a series of studies in semantics. It is concluded that the ideas and methods of psychology in Soviet Georgia are novel, exciting, and stimulating, and should be better known in other countries. (24 ref)—*R. S. Albin.*

2114. Fuchs, Alfred H. & Kawash, George F. (Bowdoin Coll) **Prescriptive dimensions for five schools of psychology.** *Journal of the History of the Behavioral Sciences*, 1974(Jul), Vol 10(3), 352-366.—Evaluated the utility of R. I. Watson's prescriptive dimensions (see PA, Vol 49:11036) by asking 68 judges from Division 26 of APA (a 28% return) to rate 36 defined "dimensions" in terms of their significance for the schools of structuralism, functionalism, behaviorism, gestalt psychology, and psychoanalysis. Reliability was satisfactory, permitting characterization of each school and comparisons in terms of relative emphasis with respect to subject matter, methods, theory, aims, and general scientific character.—*C. M. Franks.*

2115. Goldfarb-Maor, Suzanne. [An existential approach to Voltaire.] (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 333-355.—Presents an analysis of Voltaire's life and work from an existentialist's viewpoint. Special attention is paid to his ways of dealing with his existential anxiety. (French, Dutch, English, German, Italian, & Spanish summaries)

2116. Goulet, L. R.; Hay, Carl M. & Barclay, Craig R. (U Illinois) **Sequential analyses and developmental research methods: Descriptions of cyclical phenomena.** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 517-521.—Examines K. W. Schaie's (see PA, Vol 39:14611) general model for the study of developmental problems and assumptions concerning the independence of phenomena related to cohorts, ages, and time-of-measurement. Scrutiny of available data from this perspective suggests the existence of behavioral phenomena which are cyclical and operate over a short term, as opposed to the longer-term behavioral change associated with generational (cohort) and secular change (time-of-meas-

urement) factors. It is suggested that such cyclical phenomena may result from adaptation to cultural and physical environmental conditions, or biological or psychological states, which are unique to (i.e., dependent on) particular times of birth, times of measurement, or ages. Examples of such phenomena and the methodological implications which result from their existence are presented. (19 ref)—*Journal abstract.*

2117. Iker, Howard P. & Klein, Robert H. (U Rochester, School of Medicine & Dentistry) **WORDS: A computer system for the analysis of content.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 430-438.—WORDS is a computer-oriented system designed to elicit major content themes without recourse to a priori categorization systems. The system consists of a number of modular and independent programs that the user can configure in any fashion to process the data to be analyzed. Current information on WORDS, WORDS programs, WORDS systems logic, and on the availability of the system is presented.

2118. Kay, Harry. (U Sheffield, England) **Psychology today and tomorrow.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 177-188.—Presents statistical data to illustrate recent unprecedented changes in society and an equally changing picture within psychology. The intellectual turmoil of today is compared to that of the 1st half of the 17th century; our problems, however, are of a different type and affect a world-wide community. The dominant issues are no longer technological but psychological and social; they concern the aims of our society and man's role in it. Psychology can make a contribution in 2 areas particularly. In education, the past is overemphasized. New concepts and methods should and can make it possible to teach adaptive skills that will enable children to adjust to further social changes. In the area of social-industrial psychology, increasing labor unrest points to the need for studies of patterns of work hours, shift systems, and the overall question of how far the individual worker should participate in the responsibilities of his firm. The many interlocking problems cannot be solved by the lawyer and economist alone. Psychologists are urged to take a more holistic view of man, one which denies neither his evolutionary heritage nor his achievements and adaptations.—*R. S. Albin.*

2119. Krech, David; Crutchfield, Richard S. & Livson, Norman. (U California, Berkeley) **Elements of psychology.** (3rd ed.) New York, NY: Alfred A. Knopf, 1974. xxiii, 874 p.—Presents the 3rd edition of a comprehensive introduction to the field of psychology. Topics include origins, growth, and development; thinking and language; intelligence; perception; conditioning, learning, and memory; motivation and emotion; conflict and adjustment; personality; and the individual in society. An appendix on psychological measurement and statistics is included. (22 p ref)

2120. Leedy, Paul D. (American U) **Practical research: Planning and design.** New York, NY: Macmillan, 1974. x, 246 p.—Presents a step-by-step manual for planning, designing, and carrying out a research project. Topics include tools of research, aspects of the research proposal, treatment of the data, different research methodologies, and writing the research report.

2121. Lydic, Ralph & Anson, John. (Texas Tech U) **A modified shock-delivery system for quail.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 441-443.—Describes a successful method for implanting electrodes in bobwhite quail to study the effect of shock on operant or species-specific behavior. Data from an experiment using the device and illustrations of the implanting technique are included.

2122. Lyons, John P. & Gillio, Aldo. (Aerospace Medical Research Lab, Wright-Patterson Air Force Base, OH) **The human engineering electronic countermeasures simulator.** *USAF AMRL Technical Report*, 1972(Sep), No 72-59, 17 p.—Describes the Human Engineering Electronic Countermeasures (HEECS) and the procedures used in its operation. The basis of the HEECS is an AN/ALQ-T4 Electronic Warfare Crew Station (T-4) trainer reconfigured to operate as a research tool. The trainer interfaces with an IBM 360, model 40, which controls presentation of threat signals to the S and serves as an automatic data collection system. The IBM 360 also simulates on-board digital computers and digital logic circuitry for specific pieces of equipment. The capability and flexibility of this new systems simulator are discussed. Some of the problem areas addressed are (a) the communication problems between an analog machine with a reference voltage supply of +300 volts and a digital converter which accepts only a range of +5 to -5 volts; and (b) the problem of filtering out analog changes due to noise on the signal, as opposed to actual changes by the S. The system-effectiveness measures used by human engineers to evaluate performance are discussed.—*Journal abstract.*

2123. Mackenzie, Brian D. & Mackenzie, S. Lynne. (U Tasmania, Hobart, Australia) **The case for a revised systematic approach to the history of psychology.** *Journal of the History of the Behavioral Sciences*, 1974(Jul), Vol 10(3), 324-347.—Presents an assessment of behaviorism, followed by a systematic treatment of the major theories and influences in history of psychology. This historical analysis yields 3 suggested modifications, whose implications for modern psychology are discussed. (69 ref)

2124. Nordby, Vernon J. & Hall, Calvin S. (U California, Santa Cruz) **A guide to psychologists and their concepts.** San Francisco, CA: W. H. Freeman, 1974. 187 p. \$8.—Presents brief biographies of persons whose thinking has been influential and/or decisive in establishing the conceptual horizons of contemporary psychology, including A. Adler, G. W. Allport, A. Bandura, E. Fromm, R. B. Cattell, Freud, Jung, D. O. Hebb, K. Horney, A. Maslow, F. Heider, Pavlov, Piaget, C. R. Rogers, and B. F. Skinner.

2125. Pyke, S. W. **The female biogram.** *Ontario Psychologist*, 1974(Jun), Vol 6(2), 60-63.—Analyzes the biologically-based theoretical orientation of L. Tiger and R. Fox. It is concluded that neither they nor their opponents fully appreciate the complexity of the interplay between biology and environment.

2126. Pylyshyn, Zenon W. (U Western Ontario, London, Canada) **Are there discovery procedures?** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 189-192.—Questions the existence of discovery procedures in any of the 3 phases of scientific discovery

described by T. S. Kuhn. Normal Science—research in a mature area—is chiefly puzzle-solving; although for some classes of puzzles the methods of solution are so obvious that discovery procedures may be said to exist, most discoveries do not proceed in this codified manner. In Preparadigmatic Science—research in an area which does not yet have acknowledged theories and methods—efforts have been made to formulate discovery procedures, but such procedures exhibit serious shortcomings. Revolutionary Science is the phase of paradigm innovation, marked by the emergence of a new way of looking at things. Discoveries in this phase resemble the discovery of a hidden picture in a perceptual test. In this realm no discovery procedure can do much for science. The hope of finding objective empirical methods for capturing truth is regarded as a blind alley, one of the "myths of this age of heretic positivism." —R. S. Albin.

2127. Rivers, L. Wendell. (U Missouri, St Louis) **Behavioral objectives for Psychology, the Hybrid Science.** (2nd ed). Engelwood Cliffs, NJ: Prentice-Hall, 1974. v, 120 p.—Presents a workbook for the text, *Psychology, the Hybrid Science*, which stresses a systems approach to the learning of psychology. Study objectives, exercises, theories, equipment, procedures, and questions about the topic are included for each chapter of the text.

2128. Schlumpf, Margaret et al. (U Zurich, Switzerland) **Standardized excision of small areas of rat and mouse brain with topographical control.** *Biochemical Pharmacology*, 1974(Sep), Vol 23(17), 2447-2449.—Describes equipment for preparing brain slices with defined frontal planes and for punching cylindrical tissue pieces out of the slices according to given coordinates. The equipment has been used in studies of monoamines carried out with a miniaturized miniaturized method.

2129. Shengold, Leonard. **A parapraxis of Freud's in relation to Karl Abraham.** *American Imago*, 1972(Sum), Vol 29(2), 123-159.—Presents an interpretation of Freud's behavior over a paper of Karl Abraham's while the former was writing *Moses and Monotheism*. This is discussed in terms of passive wishes and the castration complex. (38 ref)

2130. Silverman, Irwin. (York U, Toronto, Ontario, Canada) **The experimenter: A (still) neglected stimulus object.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 258-270.—Examined applicable research articles published during 1 yr in 3 journals of the American Psychological Association to determine the effect of Es on study results. This examination and a mail survey of authors show that (a) the number of Es was specified in only 11% of the studies and (b) usage and systematic variation of multiple Es occurred in only 6% of the studies. The implications of these figures are discussed in light of other data collection efforts. Data are presented on Es' age, sex, relationships to investigators, and bases of selection. (French abstract) (23 ref)—*Journal abstract.*

2131. Tiberius, Richard G. (U Toronto, Ontario, Canada) **Freedom within control: A elaboration of the concept of reciprocal control in B. F. Skinner's Beyond Freedom and Dignity.** *Interchange*, 1974, Vol 5(1), 46-58.—Discusses Skinner's suggestion of a principle of reciprocity as a criterion for evaluating the acceptability of control. Reciprocity of control between controller and controllee is also considered to be superior as a



safeguard of human freedom. The use and study of dialogues in education is advocated as a way of extending reciprocity. (30 ref)

2132. Toulmin, Stephen E. (U California, Crown Coll, Santa Cruz) **Rules and their relevance for understanding human behavior.** In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Considers the relevance of "rules" and "roles" to the notion of "persons" and argues that "rule explanations" and "law explanations" are linked or differentiated by a whole spectrum of likenesses and differences. Several varieties of description of explanation are critically compared in which rules are involved to account for human behavior, and a taxonomy of rules is drawn up which suggests that the phenomena, actions, thoughts, and utterances found in human conduct fall into 7 different types and orders of complexity. (15 ref)

2133. Trosman, Harry & Wolf, Ernest S. **The Bernfeld collaboration in the Jones biography of Freud.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 227-233.—Delineates the successful collaborative effort of Siegfried Bernfeld and Ernest Jones in the roles of psychoanalytic historians, as revealed in their correspondence. (19 ref)

2134. Van de Merwe, C. (Erasmus U, Rotterdam, Netherlands) **Thesaurus of social research terminology.** Rotterdam, Netherlands: Rotterdam University Press, 1974. x, 471 p.—Provides a classified vocabulary of standardized terms that may be used for classification of social research methodology and technology. Major categories include research design, types of research, sampling, data collection, measurement, statistical analysis and interpretation of data, and reliability and validity of data and instruments.

2135. Wehner, Ernst G. (U Wurzburg, Psychological Inst, W Germany) **[The development of German psychology since 1945.]** (Fren) *International Review of Applied Psychology*, 1974(Apr), Vol 23(1), 47-53.—Notes that the reorganization of German psychological teaching and research since 1945 has created a scientific "establishment," rooted in national psychology but influenced by international movements, particularly the Anglo-American tradition, which has been a liberating influence.

## PSYCHOMETRICS AND STATISTICS

2136. Ace, Merle E. & Dawis, René V. (U British Columbia, Vancouver, Canada) **Type of content, type of score, and response inconsistency in comparison measures of preference.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 221-230.—Conducted 3 experiments to determine the influence of type of content and type of score on response inconsistency. Types of content included color preference, preference for work situations, and preference for teacher characteristics. Types of scores were circular triad score on the upper triangle, circular triad score on the lower triangle, and inconsistency score from a comparison of upper and lower triangles; all scores were from a paired-comparison matrix. Results confirm a previous finding that type of score was a much more significant source of variation

than other instrument characteristics (type of content, number of items, or item format). Other findings cast doubt on the utility of the types of scores used as measures of a response inconsistency trait.—*Journal abstract*.

2137. Barcikowski, Robert S. (Ohio U) **The effects of item discrimination on the standard errors of estimate associated with item-examinee sampling procedures.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 231-237.—Conducted a Monte Carlo study using item-examinee sampling procedures to examine the standard error of estimate for a given test's mean and variance. The main variables considered were test length, item difficulty, and item discrimination. Results indicate that optimal estimates (i.e., smallest standard error) of both mean and variance from a single item-examinee sampling plan may not be possible. *Journal abstract*.

2138. Boldt, R. F. (Educational Testing Service, Princeton, NJ) **Comparability of scores from different tests though on the same scale.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 239-246.—Scores from tests in the same battery are put on scales which are the "same" in some sense, so that certain interpretations are made easier. This is often done when scores for different tests are obtained on different population segments, especially scores on newer, more varied batteries of test offerings. It is felt that traditional erroneous expectations about the meaning of scaled scores may be carried over into the new situations, and certain of these expectations are therefore discussed. It is suggested that when special properties of scales are considered valid for the users of a new battery, active technical steps beyond those of traditional steps for scaling are required to assure that these values are implemented.—*Journal abstract*.

2139. Bruchon, Marilou. (U Paris X—Nanterre, Lab of Experimental & Differential Psychology, France) **[Gestural expansivity: A dimensional study.]** (Fren) *International Review of Applied Psychology*, 1974(Apr), Vol 23(1), 3-15.—Tested the reliability and factorial consistency of various expressive and graphic variables, particularly their spatial modality of "expansivity." Ss were 72 male and female students 17-21 yrs old. Reliability of variables (test-retest) ranged from .64 to .82. The hypothesis of factorial consistency was confirmed for each of the 5 subtests: raising of arms, walking, posture, drawing, and writing. Thus specific and general expansivity were found to be reliable and consistent dimensions.—L. A. Ostlund.

2140. Carroll, Robert M. & Field, John. (U Maryland) **A comparison of the classification accuracy of profile similarity measures.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 373-380.—Compared 13 profile similarity measures, using profiles generated from sets of 3 standards by adding random and normally distributed error components to the profile points of the standards. The 3 standards within each set were varied systematically, altering the elevation, scatter, and shape similarities between the standards. A correct classification occurred if the generated profile was most similar to the standard from which it was generated. Significant differences were found between the proportions of correct classifications for the 13 profile similarity measures under all condi-

tions. C. E. Osgood and G. J. Suci's (1952) and R. B. Cattell's (1949) measures were superior to or equal to all others. (17 ref)—*Journal abstract*.

2141. Echternacht, Gary. (Educational Testing Service, Princeton, NJ) **A quick method for determining test bias.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 271-280.—Notes that of the several available methods for determining test bias, probably the most effective involves collecting criterion information. This process often presents difficulties, however, especially for the small test user and for the researcher who needs an immediate solution to a test bias question. A method is described for identifying and analyzing the nature of test bias. The method is only a preliminary analysis to be used before a criterion data collection process or concurrently with it.—*Journal abstract*.

2142. Gruen, Gerald E.; Korte, John R. & Baum, John F. (Purdue U) **Group measure of locus of control.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 683-686.—Gave the Gruen, Korte, Stephens Internal-External Scale, a new measure of locus of control designed for use with children of differing socioeconomic and ethnic status, to a total of 1,100 black, white, and Spanish, moderately disadvantaged children from Grades 2, 4, and 6. The white children were compared to a sample of 155 affluent white children. As predicted, older children made more internal responses than younger children and the affluent children made more internal responses than the disadvantaged. Also, white children made more internal responses than either black or Spanish children. Among black Ss there was a significant sex difference, females being more internal than males. Further analyses with another sample of 50 white 2nd graders revealed that the locus of control scores were significantly related to grade point averages, but not significantly related to scores on the Otis-Lennon Mental Ability Test or the Crandall Social Desirability Scale. The scores on the measure of locus of control were generally skewed toward the internal end of the scale but were most discriminative at the 2nd-grade level. Internal consistency and test-retest reliability estimates for Gruen, Korte, Stephens Internal-External scores were moderately high.—*Journal abstract*.

2143. Holland, Thomas A.; Blakeney, Roger N.; Matteson, Michael T. & Schnitzen, Joseph P. (U Houston) **Empirical derivation of SVIB-Holland scales and conversion tables.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 23-29.—Demonstrated significant relationships between the Holland's Vocational Preference Inventory (VPI) and the Strong Vocational Interest Blank (SVIB) in 2 validation samples totaling 596 male college students. Conversion equations were developed to use standard scores of SVIB scales, rather than items, to produce estimates of VPI scores.

2144. Hunter, Sara; Overall, John E. & Butcher, James N. (U Texas Medical Branch, Galveston) **Factor structure of the MMPI in a psychiatric population.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 283-301.—A multistage factor analysis of the 373-item short form of the Minnesota Multiphasic Personality Inventory (MMPI) revealed 6 factors consistent with item-level analyses of a number of other investigators

and with those previously identified by the authors in analysis of the 1st 168 items: (a) Somatization, (b) Feminine Interests, (c) Depression, (d) Psychotic Distortion, (e) Low Morale, and (f) Acting Out. Scoring keys for the 6 factors are presented along with t-score profile sheets and t-score equivalents of raw factor scores derived from 708 normal college students. It is concluded that factor scoring promises to simplify pattern interpretation insofar as the more common code types tend to be represented in single factors. Moreover, since the MMPI-168 shows a factor structure consistent with the longer form, it seems justified to use it in situations requiring an abbreviated administration.—*Journal abstract*.

2145. Johnson, Richard W. (U Wisconsin, Madison) **Content analysis of the Strong Vocational Interest Blank for Women.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 125-131.—Analysis of the Strong Vocational Interest Blank for Women (SVIB-W) shows that a variety of interest factors is represented on each of the Occupational and Nonoccupational scales. Several shortcomings of the SVIB-W (e.g., restricted range of interests represented in item pool, no Occupational scale for "outdoors" occupations, and questionable validity of Diversity scale) are noted.

2146. Mayerberg, Cathleen K. & Bean, Andrew G. (Temple U) **The structure of attitude toward quantitative concepts.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 311-324.—Conducted a study with 311 graduate students to assess the dimensionality of attitude toward quantitative concepts. The instrument employed was a semantic differential consisting of 6 quantitative concepts—Algebra, Statistics, Mathematics, Numbers, Calculations, and Formulas—and 14 evaluative scales. An obliquely rotated principal factor analysis of the data yielded 2 categories of interpretable factors: (a) factors defined by all scales within 1 quantitative concept and (b) factors defined by a subset of scales across quantitative concepts.—*Journal abstract*.

2147. Nesselroade, John R. & Cable, Dana G. (Pennsylvania State U) **"Sometimes, it's okay to factor differences scores"**—**The separation of state and trait anxiety.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 273-281.—Argues that contemporary psychometric policy and practice have tended to make the use of algebraic difference scores in psychological research taboo. To examine the relationships among factors obtained from separate occasion and difference score analyses, 141 undergraduates were administered the State-Trait Anxiety Inventory. The fit of the factor analytic model to difference score data was investigated and found to be quite good. Methodological issues related to properties of difference scores and their implications for personality research are briefly discussed. (17 ref)—*Journal abstract*.

2148. Silverstein, A. B. & Fisher, Gary. **Cluster analysis of Personal Orientation Inventory items in a prison sample.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 325-330.—Clustered the responses of 500 male prisoners to the 150 items of the Personal Orientation Inventory (POI), using elementary linkage analysis. 5 major clusters accounted for 74 of the 150 items in the POI. Reliabilities of these clusters compared quite favorably with those of the original scales, but scale



scores could be predicted with only fair accuracy from cluster scores. The invariance of the present solution and the relative validity of cluster scores and scale scores remain to be determined.—*Journal abstract.*

2149. Thyssen, Sven. (Danish Inst for Education Research, Copenhagen) [Problems with subjects in psychological testing.] (Danh) *Skolepsykologi*, 1974, Vol 11(4), 304-312.—Discusses the premises which underlie psychological testing, especially with reference to the expectations and preconceptions of the Ss tested. Traditional tests aim at the objectification of human beings. It is suggested that new methods must be developed; several possible approaches are suggested.—P. Mylov.

2150. Young, Darrell D. (State University Coll New York, Buffalo) The semantic differential application as an affective measure. *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 86-91.—Investigated the relationship between the Purdue Master Attitude Scales and a previously developed semantic differential test with physical science college students. Analysis of covariance indicates that the 2 tests were equally effective in their measurement of attitude change.

### Test Construction & Validation

2151. Boruch, Robert F. & Creager, John A. (Northwestern U) Measurement error in social and educational survey research. *ACE Research Reports*, 1972(May), Vol 7(2), 62 p.—Assesses stability of item response over time as an index of reliability in large-volume surveys. Review of measurement error and survey reliability is followed by report of 2 empirical studies using Student Information Forms of the Cooperative Institutional Research Program of the American Council on Education. Test-retest study of 202 freshmen at 3 institutions over 2-3 wk intervals yielded reliabilities of near unity for demographic and factual information and of .58-.88 for attitudinal information. 4,415 students from 246 colleges were compared for sex and race differences in reports of grade and age. Results suggest that biases in self-report of grades depend to some extent on sex, and that self-reports of age are sufficiently accurate for matching and stratification purposes. (6 p ref)—J. B. Francis.

2152. Corman, Louise & Budoff, Milton. (Research Inst for Educational Problems, Cambridge, MA) Factor structures of retarded and nonretarded children on Raven's Progressive Matrices. *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 407-412.—Item responses of normal and educable mentally retarded children on Raven's Coloured Progressive Matrices were submitted to a principal components analysis and varimax rotation. 4 factors were obtained which corresponded to readily identifiable problem types. The factor structure for both groups of Ss was replicated by an independent sample. Comparability of factor structures of normal and retarded Ss indicate the factorial invariance of this test with children of different IQ levels.—*Journal abstract.*

2153. Danset, A.; Danset-Léger, Jacqueline & Winnykamen, Fajda. (U René-Descartes, Lab de Psychologie Génétique, Paris, France) [Application of a scale to study classroom behavior of 1,325 Parisian students.] (Fren) *Revue de Psychologie Appliquée*, 1974,

Vol 24(2), 87-102.—Presents and discusses the French version of the Devereux Elementary School Behavior rating scale (see PA, Vol 39:1707). A copy of the 47-item test and its factor analysis and item analysis are presented and discussed in detail. The test measures adaptation of children to the school milieu.

2154. Davis, Hilton. (City of London Polytechnic, School of Science & Technology, England) What does the P scale measure? *British Journal of Psychiatry*, 1974(Aug), Vol 125, 161-167.—Investigated the validity of the questionnaire scale of Psychoticism (P), by testing 103 patients in a hospital for abnormal offenders with Eysenck's Psychoticism, Neuroticism, Extraversion, and Lie scales as well as with personality scales derived mainly from the MMPI. Results indicate that (a) P is rather unreliable, (b) the items of the P scale do not consistently mark a factor separate from Neuroticism and Extraversion, (c) only 5 items meet the criteria for use as a scale, and (d) the P scale is a good measure of Emotionality. A comparison of 18 psychotics with 18 nonpsychotic offenders, matched individually for intelligence, resulted in no differences on P. On the basis of present results and previous research it is concluded that the evidence falsifies the hypothesis that the P scale is a measure of a dimension of Psychoticism, but that it might be construed as a measure of a broad semantic dimension of evaluation. (21 ref)—*Journal summary.*

2155. Kohler, Emmett T. & Graves, William H. (Mississippi State U, Office of Institutional Research) Factor analysis of the Disability Factor Scales with the Little Jiffy, Mark III. *Rehabilitation Psychology*, 1973(Sum), Vol 20(2), 102-107.—Analyzed Disability Factor Scales data obtained from rural South Central United States Ss.

2156. Levitt, Eugene E.; Aronoff, George & Morgan, C. Duane. (Indiana U, Medical School) A note on possible limitations on the use of the Harvard Group Scale of Hypnotic Susceptibility, Form A. *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 234-238.—Tested the Harvard Group Scale of Hypnotic Susceptibility, Form A and found 2 possible limitations. The scale may be insufficiently valid with male Ss, and may nominate different hypnotically susceptible Ss and simulators than other scales. The prudence of E. Orne's proposed double-check on S selection is thus supported. (German, French & Spanish summaries)

2157. Lin, Yi-Guang. (U Michigan) A validity study of Factor B scale of Cattell 16PF in a college sample. *Acta Psychologica Taiwanica*, 1973, Vol 15, 1-5.—Conducted a validity study of Factor B (a measure of intelligence) of the 16 Personality Factor Questionnaire using 348 male and 406 female college students. The correlations with total scores on the American Council of Education Psychological Examination for College Freshmen were .16 and .43 for the male and female groups. Factor B scale also had lower correlations with performance measures in an introductory psychology course than other intelligence measures. Results suggest the limited usefulness of the Factor B scale for college students.—*Journal abstract.*

2158. Marshall, Nancy J. (Portland State U) Dimensions of privacy preferences. *Multivariate Behavioral*

*Research*, 1974(Jul), Vol 9(3), 255-271.—Describes the development of the Privacy Preference Scale, a 56-item, 5-choice summative scale. 198 undergraduates responded to the original scale, and 149 college students and 101 of their parents were Ss for the scale revision. 6 subscales were constructed from a principal axis factor analysis with unities in the diagonal of an 86-item pool; these focused on preferences for noninvolvement with neighbors, seclusion of the home, solitude, privacy with intimates, anonymity, and reserve. The ability of the subscales to differentiate between age and sex groups and their relationship to personality measures and to self-reported privacy-oriented behavior, are presented. (23 ref)—*Journal abstract*.

2159. Murray, Chris. (U Manchester, England) **Item analysis of the elementary school form of the Dogmatism Scale.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 50-54.—Shortened R. L. Figert's paper-and-pencil 50-item elementary school form of the Rokeach Dogmatism Scale to produce a 20-item instrument with a test characteristic curve designed to maximally spread respondents around the midpoint of the score range. Reliability coefficients for selected subsample responses to the modified instrument by school-aged adolescents ranged from .81 to .77.

2160. Overall, John E. & Gomez-Mont, Francisco. (U Texas, Medical Branch, Galveston) **The MMPI-168 for psychiatric screening.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 315-319.—Describes a convenient short-form administration of the MMPI. Rather than selecting items out of context, it is recommended that the abbreviated administration consist of the 1st 168 items of the standard MMPI. The usual scoring stencils can be applied to obtain scores which can be used to estimate *k*-corrected clinical scale scores by application of regression weights.

2161. Pyrczak, Fred. (California State U, Los Angeles) **Passage-dependence of items designed to measure the ability to identify the main ideas of paragraphs: Implications for validity.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 343-348.—Items from a standardized reading test designed to measure the ability to identify the main ideas of paragraphs were administered without the associated paragraphs. The 2 samples consisted of graduate students and inner-city high school students. Half of the Ss in each sample were given brief general directions for answering the items in the absence of the passages, and the other half were given more extensive directions. The different directions did not have a significant effect on performance, but both groups in each sample answered a substantial number of items correctly. An index of passage-dependence was computed for each item, and the index values obtained from the responses of the graduate students and high school students were substantially correlated.—*Journal abstract*.

### Mathematical Models & Statistics

2162. Bray, Robert M. (U Illinois) **ANOVAR: A general program for one- and two-way analysis of variance.** *Educational & Psychological Measurement*, 1974(Spr), Vol 34(1), 137-139.—Describes a program which performs 1- and 2-way analyses of variance for

equal, unequal, and proportional cell sizes. A least squares analysis is performed when cell size is equal or proportional; otherwise, an unweighted means solution is used. The program also provides estimation of the percentage of variance accounted for by each of the factors and their interaction. A description of the program use, limitations, and availability is provided.—R. W. Covert.

2163. Carlson, James E. & Timm, Neil H. (U Pittsburgh) **Analysis of nonorthogonal fixed-effects designs.** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 563-570.—Discusses nonorthogonal fixed-effects experimental designs using both the full-rank and reduction in error sums of squares conceptualizations of data analysis. The hypotheses tested by several commonly used methods of analysis are clarified, and suggestions for choice of the most appropriate procedure are proposed. (17 ref)

2164. Cramer, Elliot M. (U North Carolina, L. L. Thurstone Psychometric Lab, Chapel Hill) **A generalization of vector correlation and its relation to canonical correlation.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 347-351.—Cites G. C. Chow's theorem (1966) which shows that the least-squares estimate of the regression coefficient matrix in multivariate linear regression maximizes the squared vector correlation coefficient between the dependent variables and a linear transformation of the independent variables. This paper shows that the problem is closely related to canonical correlation and that the correlation involved is the product of the canonical correlations between the independent and dependent variables. A symmetric generalization of vector correlation is given which applies to matrices with different numbers of variables and with linear dependencies among the variables. It is shown to be related to canonical correlation, as well as to a measure of correlation between sets of variables.—*Journal abstract*.

2165. Dickinson, Terry L. & Wolins, Leroy. (Colorado State U) **Analysis of repeated measures and other designs.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 353-371.—Discusses procedures for using regression programs for the computing of analyses of variance. A procedure for coding matrices for experimental designs having nested and crossed factors is described. Several illustrations are given, and the limitation of the procedure with large repeated measures designs is discussed. A 2nd algorithm is offered for obtaining the sums of squares for nested factors and their interactions in such designs. (17 ref)—*Journal abstract*.

2166. Dwyer, James H. (U California, Adlai E. Stevenson Coll, Santa Cruz) **Analysis of variance and the magnitude of effects: A general approach.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 731-737.—Proposes a method for estimating the variance explained by each term of an analysis of variance model. The core of this method is the determination of an equation that expresses the total variance of the dependent variable as a weighted sum of variance components. Previous estimation methods are thus extended to include finite random effects, random effects, and fixed effects models in 1 parsimonious set of formulae. It is shown that previous methods overestimated the variance explained



by interactions in mixed models. The proposed procedure is demonstrated for the 2-way design, and a brief historical review is presented. (27 ref)—*Journal abstract*.

2167. Dziuban, Charles D. & Shirkey, Edwin C. (Florida Technological U) **On the psychometric assessment of correlation matrices.** *American Educational Research Journal*, 1974(Spr), Vol 11(2), 211-216.—Compared 3 procedures for assessing correlation matrices before applying factor analysis, using 4 matrices from the literature which represent somewhat disparate conditions. The 3 procedures were (a) M. S. Bartlett's test (1950); (b) inspection of the off-diagonal elements of the anti-image matrix  $S^2 R^{-1} S^2$  where  $R^{-1}$  is the inverse of the correlation matrix (H. F. Kaiser, 1963); and (c) the Kaiser-Meyer-Olkin Measure of Sampling Adequacy (MSA). It is concluded that the Bartlett procedure is sensitive to sample size and could lead to erroneous results when routinely applied to data preceding principal component analysis. The anti-image matrix analysis is useful but lacks enough decision rules except in extreme cases. MSA is considered the best of the 3 procedures because it provides specific assessment of individual variables and some decision rules. (17 ref)—E. J. Mason.

2168. Fulcomer, Mark C.; Schönemann, Peter H. & Molnar, George. (New York U) **Classification by linear and quadratic discriminant scores.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 443-445.—Describes a program written in FORTRAN IV which provides 2 alternative Bayes solutions to problems of classifying an individual into one of  $K$  mutually exclusive populations on the basis of measurements taken on  $p$  predictor variables. The Bayes decision rule minimizes the total probability of misclassification.

2169. Hall, Ralph & Weir, Robyn. (U New South Wales, Sydney, Australia) **Laterality effects in risk preference: A test of portfolio theory.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 351-355.—A central assumption in portfolio theory of risk preference is that for games with expected value constant the preference ordering of an individual should exhibit a single peaked preference function. This assumption was tested with 30 undergraduates by determining the level of stochastic transitivity satisfied by triples of pairwise preference proportions among 8 gambles. In only a small percentage of cases were the predicted levels of stochastic transitivity not satisfied. Results provide strong support for portfolio theory.—*Journal abstract*.

2170. Hays, James E. (American U) **A FORTRAN program to perform analysis of variance and analysis of cross-products.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 449.

2171. Henry, Franklin M. (U California, Berkeley) **Variable and constant performance errors within a group of individuals.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 149-154.—Presents a mathematical model for the correct individual single score for a within-S series of errors about the target (for  $k$  trials). The commonly used absolute error under-represents or deletes the variable error component ( $V$ ). In correlational analysis, the constant error score should be  $C$  absolute, and  $V$  should be used unsquared in order to avoid curvilinearity; in general,  $r$  patterns across Ss are not

predictable from within-Ss relations. While  $V$  and  $C$  are necessarily independent within Ss, they usually exhibit substantial correlation across Ss; evaluation of the role of each is sometimes important. Linearity of regression is demanded; it, rather than nonskewness, is the important assumption in using  $r$ . If relations involving algebraic  $C$  are of interest, the correlation index may be required because of U-shaped regression. Several common statistical misinterpretations are discussed.—*Journal abstract*.

2172. Huck, Schuyler W. & Layne, Benjamin H. (U Tennessee) **Checking for proportional  $n$ 's in factorial ANOVAs.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 281-287.—If the cell frequencies (i.e., the  $n$ 's) in a factorial analysis of variance (ANOVA) are not equal to one another, the researcher must determine whether or not the condition of proportionality is satisfied. Although several texts demonstrate how to test for proportionality, these discussions (a) give the impression that every cell must be tested and (b) are restricted to the case of a simple 2-factor ANOVA. In fact, however, only some of the cells need to be tested: 2 rules are provided by which the researcher can determine how many and which cells should be tested. A test for proportionality in a 3-way ANOVA is also provided, with comments on how the test can be generalized to higher-order factorial designs.—*Journal abstract*.

2173. Jackson, Douglas N. & Morf, Martin E. (U Western Ontario, London, Canada) **Testing the null hypothesis for rotation to a target.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 303-309.—Proposes and illustrates a method for estimating the degree to which a factor rotation to an hypothesized target represents an improvement over rotation to a random target. The original hypothesized target matrix is transformed so that the direction of targeted salients is randomly determined, with the restriction that the new target is orthogonal to the original. When applied to a factor matrix of content and response style measures, the hypothesized target yielded a decidedly better fit to the data than did the random target.—*Journal abstract*.

2174. Keselman, H. J. & Murray, Robert. (U Manitoba, Winnipeg, Canada) **Tukey tests for pair-wise contrasts following the analysis of variance: Is there a type IV error?** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 608-609.—Following a significant analysis of variance  $F$  test with a Tukey multiple comparison statistic for pair-wise contrasts is a popular testing sequence. J. R. Levin and L. A. Marascuilo (1972) maintain that by adopting this sequence the E may be committing a Type IV error, since the Tukey test could detect differences not judged significant by an analysis of variance. P. A. Games (1971), however, believes that the analysis of variance-Tukey sequence is legitimate and consequently maintains that one therefore could not commit a Type IV error. Data from the present investigation indicate that the likelihood of committing a Type IV error, even if it is a theoretically valid concept for the above testing sequence, is extremely small.—*Journal abstract*.

2175. Lord, Frederic M. (Educational Testing Service, Princeton, NJ) **Significance test for a partial correlation corrected for attenuation.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 211-220.—Correc-

tion for attenuation is important for partial correlations because not even the sign of the partial between true scores can be inferred safely from the partial between observed (fallible) scores. Methods for inferring the corrected partial are discussed. It is noted that the corrected partial will sometimes have an overwhelming sampling error. A significance test is developed that largely circumvents this problem in those cases where it is enough to infer just the sign of the partial between true scores.—*Journal abstract.*

2176. Lund, Thorleif. (U Oslo, Inst of Psychology, Norway) **Comments on the Stone-Coles multidimensional scaling method.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 343-346.—Demonstrates that G. J. Coles and L. A. Stone's (see PA, Vol 48:6071) model of multidimensional similarity analysis is not a content method, but rather an alternative to the ordinary distance methods. As such, it is argued, it is of limited value. (19 ref)

2177. Sherwin, Ronald G. & Wayman, Nien-Ling. (U Southern California, Los Angeles) **Nonhierarchical clustering technique: GROUPER.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 446-448.—Describes a program written in FORTRAN IV which adapts to computer use a technique for reducing a larger interaction group to its underlying subgroups. The technique involves the creation of a sociomatrix in which the cell entries can be of any value and significance so long as they measure relations among the units of a group.

2178. Shinnors, Stanley M. (Sperry Rand, Great Neck, NY) **Modeling of human operator performance utilizing time series analysis.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Sep), Vol 4(5), 446-458.—Identifies the form of a method for modeling the human operator from actual input-output data and estimates the parameters of the identified model based on these data. The methodology for applying the time-series technique for determining the model of the human element in a feedback system is discussed, as well as an approach for determining the human model under various levels of stress. (47 ref)

2179. Shirai, Katsuhiko & Fujisawa, Hiromichi. (Waseda U, Tokyo, Japan) **An algorithm for spoken sentence recognition and its application to the speech input-output system.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Sep), Vol 4(5), 475-479.—Presents an algorithm which mathematically formulates the problem of sentence recognition, reduces the effective number of words that affects the recognition score, automatically detects the end of a sentence, and rejects a sentence that is logically invalid. The algorithm is applied to a practical situation as a speech command recognition and vocal response system.

2180. Spence, Ian & Graef, Jed. (U Western Ontario, London, Canada) **The determination of the underlying dimensionality of an empirically obtained matrix of proximities.** *Multivariate Behavioral Research*, 1974(Jul), Vol 9(3), 331-341.—Describes a completely automatic procedure based on the results of I. Spence's (1970a) extensive Monte Carlo experiment. The technique may be applied to matrices of order 12 to 36 inclusive. A

computer program, M-SPACE, which will implement the procedure, is available. (15 ref)—*Journal abstract.*

2181. Terranova, Carmelo. (Herbert H. Lehman Coll, City U New York) **A method to determine the congruity of dimensions across instruments.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 247-251.—High school seniors responded to 2 semantic differential instruments before and after attending a summer program on college orientation. Principal components were extracted from the before and the after data. Before-after component combinations were found to be highly similar, thereby providing not only interpretations of change across the variables, but also a heuristic method for further research.

2182. Urry, Vern W. (U Washington) **Approximations to item parameters of mental test models and their uses.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 253-269.—Derived equations to enable the graphic approximation of the item parameters of the stochastic mental test models (i.e., the generalized normal ogive and logistic models). The item parameters for the models are discriminatory power (a), difficulty (b), and lower asymptote of the item characteristics curve (c) where the item characteristic curve is the regression of the binary item on latent ability. In brief, c, can be approximated through visual inspection of the left-hand (lower) asymptote of the proportion passing the item plotted against the total test score minus the particular item. Thereafter a graph appropriate to the approximate c, can be consulted to convert an ordinary item total test point-biserial correlation and proportion passing the item into approximations of item discriminatory power (a) and item difficulty (b). The approximations can be used to provide a basis for screening items for tailored testing, to enable a determination of the appropriateness of a set of items for tailored testing, and to provide starting values for parameter estimation in maximum likelihood procedures. The conditions and assumptions necessary for an effective application of the method are delineated.—R. W. Covert.

2183. Wagner, Edwin E. & Hoover, Thomas O. (U Akron) **The effect of serial position on ranking error.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 289-293.—Used words of known selection values arranged in completely counterbalanced order to show that overranking tends to occur at both terminal points of a series of rankings. The presence of other unforeseen "ranking errors" suggests that errors arising out of ranking procedures may be more complex than hitherto suspected.

2184. Williams, John D. (U North Dakota) **A simplified regression formulation of Tukey's test.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 80-82.—Presents a simplified regression approach for Tukey's test for multiple comparisons. By constructing  $k-1$  regression equations (where  $k$  is the number of means) so that each mean is compared to every other mean, the computed  $t$ -values resulting from testing the significance of each regression weight can be compared to a modified value from the studentized range statistic.

2185. Zar, Jerrold H. (Northern Illinois U) **Probabilities of Rayleigh's test statistics for circular data.** *Behavior Research Methods & Instrumentation*, 1974(Jul),



Vol 6(4), 450.—Common circular data distributions include those involving compass directions or clock times. Means of variables such as angular directions or times of day may be computed by appropriate means, including Rayleigh's test. A program is presented written in FORTRAN IV which computes the probability of a given value of any of Rayleigh's statistics for a specified sample size.

2186. Zar, Jerrold H. (Northern Illinois U) **Probabilities for the Kolmogorov-Smirnov one-sample test statistic.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 450.—The Kolmogorov-Smirnov statistic tests the goodness of fit of an hypothesized population distribution to a sample population distribution. A computer program written in FORTRAN IV is presented which computes the probability that the observed sample came from a population having the hypothesized distribution.

## PERCEPTION AND MOTOR PERFORMANCE

2187. Anderhuber, Raymond. [Study of audiomotor coordination.] (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 55-60.—Describes the Audiokinetron, a new instrument designed to measure the coordination between auditory information and hand movements. The S's task consists of manipulating certain controls in order to maintain at its maximum a sound intensity which tends to decrease according to a pre-established program. Since the time required by the program to unfold depends on the accuracy of the performance at each moment, the quality of S's coordination is measured by the time it takes to execute the task. Data on the reliability of the device is not reported, but it is suggested that a 2nd trial be used as assessment, since considerable learning can take place during the 1st trial. As to the validity of the Audiokinetron, it successfully differentiated the performance of a group of radar operators and a group of electronic technicians from the performance of a random heterogeneous group ( $p < .001$ ). Zero order correlation was found with a test of intellectual efficiency.—A. Blasi.

2188. Bouwhuis, D. (Ed.). (Inst for Perception Research, Eindhoven, Netherlands) **IPO annual progress report, Nr. 8, 1973.** Eindhoven, Netherlands: Instituut voor Perceptie Onderzoek, 1973. vi, 61 p.—Presents the report of the Institute for Perception Research, including works on auditory perception, speech, visual perception, perception and motor skills, and instrumentation.

2189. Eriksson, E. Sture. (Uppsala, Sweden) **Movement parallax during locomotion.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 197-200.—Conducted 2 experiments with a total of 14 paid female Os to investigate an hypothesis concerning the nature of movement parallax during locomotion. According to the hypothesis, movement parallax constitutes a basic perceptual-motor mechanism able to produce veridical information as to spatial relations in 3-dimensional space. Results verify the hypothesis in that information due to movement parallax unequivocally dominated both the effects of proximal relative size and spatial anisotropy.—Journal abstract.

2190. Gates, Anne & Bradshaw, John L. (Monash U, Clayton, Vic, Australia) **Effects of auditory feedback on a musical performance task.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 105-109.—2 experiments examined the effects of various feedback conditions on performance by a total of 18 musically proficient adult volunteers on an electronic organ. Playing time scores showed complete absence of auditory feedback to have little or no detrimental effect; in fact, some Ss played fastest under this condition. Delayed auditory feedback (DAF), as expected, caused considerable performance decrement when compared with immediate auditory feedback (IAF). Extraneous prerecorded input as a distractor in the absence of auditory feedback ranked between mixed DAF-with-IAF, and pure DAF, which showed the greatest disruption. The possible role of auditory imagery in musical performance is discussed, together with 4 components which perhaps contribute to the standard DAF effect: distraction, error repetition, conflict with expectancies and auditory imagery, and presentation of 2 competing and conflicting signals (IAF and DAF). (26 ref)—Journal abstract.

2191. Grossberg, Mitchell. (Massachusetts Inst of Technology, Lincoln Lab, Lexington) **Failure of Bloch's law for simple reaction time.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 147-149.—Instead of the equal reaction times (RTs) for equal-energy flashes that Bloch's law requires, some previous studies demonstrated unequal luminance-related RTs. Because the flash luminance in those studies was not randomized over trials, J. D. Hildreth (1973) attributed those failures of Bloch's law to drifts in response. The present article demonstrates a failure of the law in experiments with randomized, equal-energy flashes in which the author served as the only S. A brief survey of studies suggests that failures of the law occur when the equal-energy flashes differ sufficiently in luminance.—Journal abstract.

2192. Knight, James L. & Kantowitz, Barry H. (Purdue U) **Speed-accuracy tradeoff in double stimulation: Effects on the first response.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 522-532.—Compared a single-stimulation and 2 double-stimulation response conditions using explicit payoff matrices to vary speed-accuracy tradeoff with 60 female undergraduate Ss. Under accuracy payoff, response latency (RT<sub>1</sub>) to the 1st stimulus increased as interstimulus interval (ISI) dropped, but accuracy remained high and relatively constant. Under speed payoff, RT<sub>1</sub> was only slightly affected by ISI, but accuracy dropped as ISI decreased. Transmitted information rates consistently reflected detrimental effects of short ISI. In double stimulation, error response latency exceeded correct response latency. Furthermore, error response latencies were far more variable and more sensitive to changes in speed-accuracy condition than were correct response latencies. Under both speed and accuracy conditions, response latency to the 1st of 2 successive stimuli was faster if a response was also required to the 2nd stimulus. (22 ref)—Journal abstract.

2193. Weil, Andrew. **Parapsychology: Andrew Weil's search for the true Geller: II. The letdown.** *Psychology Today*, 1974(Jul), Vol 8(2), 74-82.—Describes how a

stage magician reproduced several of the supposed paranormal feats performed by Uri Geller. The magician revealed just how he could make an observer believe he actually saw the bending of a spike, ring, or key. Geller appears to be practicing his former trade—stage magic—thus leading people, including physical scientists, to treat him as a psychic phenomenon. Those who see Geller as having paranormal ability are engaged in "wishful thinking."—E. J. Posavac.

2194. Zobar, Dov. (U Maryland) **Amount and order of redundancy as determinants of continuous tracking performance.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 165-178.—Conducted an experiment with 12 male right-handed undergraduates which used a methodology for manipulating redundancy in continuous input tracks. The influence of redundancy on continuous tracking performance was compared to that found previously using discrete tracking tasks. 3 orders of redundancy were introduced in continuous tracks. Within each order of redundancy, 5 different amounts of redundancy were used by manipulating the sequential probabilities of the tracks' maximum amplitude values. The analysis of response lags and error data indicated that Ss did not respond as predicted to the conditioned probabilities of amplitude heights existing in the tracks, even when the probabilities were relatively high, but rather responded to different aspects of the tracks. Results are interpreted in terms of the unique characteristics of the continuous input and of the postulated sampling strategy employed by Ss. (17 ref)—*Journal abstract*.

### Perceptual Processes

2195. Allan, Lorraine G. & Kristofferson, A. B. (McMaster U, Hamilton, Ontario, Canada) **Psychophysical theories of duration discrimination.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 26-34.—There are few quantitative theories of duration discrimination and few established empirical phenomena to guide theorizing. This paper discusses 3 such theories and several empirical findings. The theories assume that the discrimination is based only upon information extracted from the temporal extent of the stimulus pattern, and experimental evidence is presented that clearly supports this assumption for many stimulus patterns. Recent findings which indicate that duration information is analyzed in certain ways that are fundamentally different from other stimulus dimensions are reviewed, the duration discrimination psychometric function is examined, and the time-order error is discussed. The 3 theories are compared in terms of their ability to incorporate the empirical data. (49 ref)—*Journal abstract*.

2196. Auerbach, Carl & Sperling, Philip. (Yeshiva U) **A common auditory-visual space: Evidence for its reality.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 129-135.—Conducted an experiment with 18 adult Ss which compared 2 hypotheses concerning the relation between auditory and visual direction. The 1st, the "common space" hypothesis, is that both auditory and visual direction are represented on a single underlying direction dimension, so that comparisons between auditory and visual direction may be made directly. The 2nd, the "disjunct space" hypothesis, is that there are 2 distinct internal dimensions, one for auditory direction

and one for visual direction, and that comparison between auditory and visual direction involves a translation between these 2 dimensions. Both of these hypotheses were explicated using a signal detection theory framework, and evidence was provided for the common space hypothesis. (29 ref)—*Journal abstract*.

2197. Buchwald, Charles & Blatt, Sidney J. (State U New York, Downstate Medical Ctr, Brooklyn) **Personality and the experience of time.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 639-644.—Conducted 2 studies to investigate the effects of personality, as dichotomized along a thought-action dimension, on time perception. Study 1 divided 27 10-48 yr old psychiatric patients into groups depending on whether their weighted color responses on the Rorschach exceeded or were exceeded by the sum of the movement responses. Ss with an introverted Experience Balance (EB) overestimated time, whereas Ss with an extraverted EB underestimated time. Study 2 used 24 normal undergraduates divided into high introverted and high extraverted based on the Maudsley Personality Inventory. 2 time judgments were obtained from each S, and the effect of situational factors (stress) as well as personality was noted. Results are similar to those of Study 1. The time estimation of the action-oriented Ss was significantly more influenced by situational factors than were the time judgments of the ideational Ss. The relationship between thought-action and time estimation was significant in both normal and clinical samples. (40 ref)—*Journal abstract*.

2198. Collings, Virginia B. (U Pittsburgh) **Human taste response as a function of locus of stimulation on the tongue and soft palate.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 169-174.—Conducted 2 experiments with 15 and 28 paid university students who were nonsmokers. Taste recognition thresholds and psychophysical intensity functions were determined for table salt, sucrose, quinine, urea, and citric acid for 4 loci on the tongue and on the soft palate. Results show greater differences between loci than previously reported. Contrary to older data, the threshold for bitter was lower for the fungiform papillae at the front of the tongue and for the soft palate than for the vallate papillae. For all compounds, the slopes of the intensity functions varied with the locus of stimulation. The functions for most compounds were steepest at the vallate and foliate loci. (20 ref)—*Journal abstract*.

2199. Collyer, C. E. (Princeton U) **The detection of a temporal gap between two disparate stimuli.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 96-100.—When a temporal gap was bounded by a light and a tone, gap detection performance by 3 experienced graduate and undergraduate students as a function of gap duration was well described by a simple model which characterized the discrimination as a purely temporal one. When the gap was bounded by 2 tones, performance was superior and seemed to depend on the frequency difference between the tones, but was not well described by the same model. It is suggested that the light-tone performance represents the operation of a central temporal discrimination mechanism, while the tone-tone cases represent the use by Os of nontemporal cues



originating in the peripheral auditory system.—*Journal abstract.*

2200. Davis, Christopher M. (Simon Fraser U, Burnaby, British Columbia, Canada) **The role of effective lever length in the perception of lifted weights.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 67-69.—Objects are lifted through a system of body levers, and since the force required to lift objects decreases as the effective lever length is shortened, it was hypothesized that the perceived heaviness of objects would be less when they were lifted with the elbow bent than with it extended. Cans lifted from greater initial angles were consistently judged to be lighter by 32 blindfolded university students.

2201. Engen, Trygg & Gasparian, Florence E. (Brown U) **A study of taste preferences in young children.** *Journal of Safety Research*, 1974(Sep), Vol 6(3), 114-117.—As part of an investigation of the feasibility of using aversive tastes to keep children from ingesting harmful nonfood substances, the taste preferences of 102 3-6 yr olds were tested. Specially prepared fondant candies with 4 distinct flavors (cinnamon, cherry, peppermint, and horehound) were given to Ss in a paired comparison design. Taste preferences were generally consistent regardless of age, supporting the hypothesis that some tastes may be inherently aversive.—*Journal abstract.*

2202. Gross, Yigal; Webb, Ross & Melzack, Ronald. (McGill U, Montreal, Quebec, Canada) **Central and peripheral contributions to localization of body parts: Evidence for a central body schema.** *Experimental Neurology*, 1974(Sep), Vol 44(3), 346-362.—Asked a total of 41 university students in 4 experiments to point with the left index finger to different parts of the right arm and hand which rested on a surface completely concealed from vision. Results show that, under these conditions, the normal, resting upper limb was systematically perceived to be closer to the midline of the body on the right-left dimension, and closer to the body on the near-far dimension than it really was. The magnitude of some of these errors in localization increased systematically as a function of the duration of time that the limb was concealed from vision. Self-produced, random-like movements of the tested arm, hand, and fingers increased the magnitude of the systematic errors in localization. Results are discussed in relation to the concept of the body schema—the central representation of the body in the brain. They suggest that both central and peripheral variables contribute to the localization of the limb in space. (18 ref)—*Journal abstract.*

2203. Hilgard, Ernest R.; MacDonald, Hugh; Marshall, Gary & Morgan, Arlene H. (Stanford U) **Anticipation of pain and of pain control under hypnosis: Heart rate and blood pressure responses in the cold pressor test.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 561-568.—Studied heart rate and systolic blood pressure changes anticipatory to 3 stress conditions: (a) ice water pain to be felt at normal levels in the hypnotic nonanalgesia condition, (b) absent or greatly reduced ice water pain to be experienced following hypnotic analgesia suggestions, and (c) the pain of ice water to be hallucinated, with no ice water stimulation. Ss were 18 highly responsive hypnotic undergraduates; 12 of the Ss were also experienced in hallucination.

Despite the absence of pain, the maximum anticipatory rises in both physiological indicators appeared when the analgesic condition was anticipated. The anticipation of hallucinated pain also led to a rise greater than that in anticipation of experienced physically produced pain. (15 ref)—*Journal abstract.*

2204. Hoornaert, Johan. (Catholic U Louvain, Research Ctr for Motivation & Time Perspective, Belgium) **Time perspective theoretical and methodological considerations.** *Psychologica Belgica*, 1973, Vol 13(3), 265-294.—Reviews literature on psychological time and analyzes vaguely defined terminology in the area. Time perspective is defined as the perspective which exists and is continually elaborated, more or less consciously, by the reciprocal influence of global viewpoints on the past, present, and future. It occurs as a function of actual needs and value orientations and manifests itself in all aspects of behavior. Time perspective is contrasted with other aspects of psychological time (e.g., time calculation, time orientation, and time estimation). Specific dimensions of time perspective are described, and classified methods for studying them are presented. (7 p ref)—*S. Slak.*

2205. Indow, Tarow. (Keio U, Tokyo, Japan) **On geometry of frameless binocular perceptual space.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 50-63.—Discusses 2 fundamental postulates: (a) frameless binocular space as a Riemannian space of constant curvature  $K$ , and (b) simple and rigid mapping functions between physical space and the Euclidian map of perceptual space. Results of experiments using the Luneburg model, and of experiments attempting to embed perceptual configurations into a Euclidian space with the aid of metric multidimensional scaling are reviewed. The possibilities of testing the 2 postulates independently and of incorporating perturbation as to  $K$  or the mapping functions are discussed. (38 ref)—*R. D. Nance.*

2206. Jacobs, Diana E. & Galanter, Eugene. **Estimates of utility function parameters from signal detection experiments.** New York, NY: Columbia University, Psychophysics Lab, TR PLR-32, 1974. 18 p.—Develops a theory to make it possible to estimate the slope parameter of a presumed power law utility function from an analysis of data from a psychophysical signal detection experiment. An experiment to test the consequences of the theory is described.

2207. Kanthamani, H. (Inst for Parapsychology, Durham, NC) **Psi in relation to task complexity.** *Journal of Parapsychology*, 1974(Jun), Vol 38(2), 154-162.—Explored the question of how an S known to be a high scorer on extrasensory tasks would perform under circumstances in which the operations required of psi were made to seem increasingly "complex" as the experiment progressed. The basic method used was the "psychic shuffle," in which an S shuffles a deck of ESP cards to match a prearranged target order provided by the E. Modifications were made in the procedure from series to series by the introduction of a different E, by reversing the role of E and S, by moving the S and E into separate rooms, and by advancing to more complicated methods of randomizing the target order. 7 series, comprising 570 50-trial runs, were carried out with

significant results ( $p < .01$ ) in each. These results suggest that the apparent complexity introduced into the different series did not adversely affect the operation of psi.—*Journal abstract.*

2208. Kusajima, T. (Tokyo U, Japan) **Visual reading and braille reading: An experimental investigation of the physiology and psychology of visual and tactual reading.** New York, NY: American Foundation for the Blind, 1974. 60 p.—Reports results of comparative tests made over a 35-yr period to determine the similarities and differences between visual and tactile reading. It was found, for example, that both visual and tactile reading require the dual task of discerning distinctive features and integrating the differentiations into a total meaning. (39 ref)

2209. MacDonald, Ronald R. (U Stirling, Scotland) **Intertrial dependence in detection and recognition tasks.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 357-365.—Gave detection and recognition tasks to 10 university students. Results of a Markov analysis revealed the existence of first-order intertrial dependence in error and response sequences from both detection and recognition tasks. Both feedback and the introduction of a burst of white noise between trials reduced intertrial dependencies in the error sequences. Task difficulty and intertrial periods affected intertrial dependence in the response sequence.—*Journal abstract.*

2210. Moore, H. J. & Guedry, Fred E. **Individual differences in vestibular information as a predictor of motion disturbance susceptibility.** Pensacola, FL: Naval Aerospace Medical Research Lab with US Army Aeromedical Research Lab, NAMRL-1200 & USAARL 74-11, 1974. 19 p.—Describes 2 experiments with 21 navy aviation officer candidates. Results do not demonstrate a relationship between a vestibular response variance measure and motion disturbance susceptibility at the conventional significance level. The test-retest reliability of the response variance measure was not found to be favorable.

2211. Natsoulas, Thomas. (U California, Davis) **The subjective, experiential element in perception.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 611-631.—Discusses the problem of sentence and how we are to understand it. It is argued, among other things, that sentence can find its place in psychological theory only in relation to perception and other modes of awareness. Basic issues examined pertain to the subjective, experiential element in perception and to the qualitative contents of perceptual and imaginal awarenesses. These issues are basic to the theory of the percept (and image) and have to do with where and how to locate the experiential element in a materialist world view. Subjective knowledge of qualitative contents is no less structural than knowledge by description; any advantage that exists in respect to a mode of knowing rather than in what can be known about them. The S "participates" in what he comes to know, but such participation does not make for knowledge unique to him. Nor does what he knows by this route count against qualitative contents belonging to brain processes, except perhaps for the problematic property of "grain." The discussion proceeds via review and evaluation of a variety of relevant views and arguments. (101 ref)—*Journal abstract.*

2212. Pressey, Alexander W. (U Manitoba, Winnipeg, Canada) **Measuring the Ponzo illusion with the method of production.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 424-426.—In an experiment with 124 undergraduates, the Ponzo illusion was varied as a function of angle of oblique arms and measured by the method of production. Results show that the method produced very similar results to those obtained by the method of limits. Data also indicated that relatively stable individual scores could be obtained if about 6 judgments were required and if the targets elicited a large illusion.

2213. Rhine, J. B. (Inst for Parapsychology, Durham, NC) **Telepathy and other untestable hypotheses.** *Journal of Parapsychology*, 1974(Jun), Vol 38(2), 137-153.—Reviews the history of the main attempts to verify the existence of telepathy and the evident failure to do so. It is suggested that telepathy be indefinitely shelved until a conclusive test design is discovered. Other untestable hypotheses (e.g., spirit projection) are discussed.

2214. Salvatore, Santo. (Brown U, Hunter Lab of Psychology) **The ability of elementary and secondary school children to sense oncoming car velocity.** *Journal of Safety Research*, 1974(Sep), Vol 6(3), 118-125.—Asked 20 male and 20 female 5-14 yr old children to classify as slow, medium, or fast the velocity of vehicles approaching them on a 2-lane rural road in a residential setting. Age was positively associated with correct slow and medium judgments. Correct judgments of fast were inversely related to age, however. Females were more likely to correctly classify the dangerous fast vehicles. In contrast, males made more correct judgments over the whole speed range. Vehicle-associated characteristics (e.g., size and noise) also influenced the velocity judgment.—*Journal abstract.*

2215. Schneider, Bruce et al. (Columbia U) **A scale for the psychological magnitude of number.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 43-46.—Constructed a scale from similarity ratings by 20 undergraduates of the 45 number pairs that can be obtained from a set of 10 integers. A nonmetric analysis of these similarity ratings showed that "psychological number" was a power function of number. (15 ref)

2216. Sekuler, Robert & Levinson, Eugene. (Northwestern U) **Mechanisms of motion perception.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 38-49.—Discusses the characteristics common to motion perception and other sensory responses. At threshold levels, responses of sensory mechanisms tend to be independent. At suprathreshold levels, sensory mechanisms tend to interact, usually in an inhibitory way. A narrow and simplified model of some parts of motion perception is presented. Threshold experiments, plus those on selective adaptation, aftereffect, subthreshold summation, and combinations of adaptation and summation are considered.—R. D. Nance.

2217. Spanos, Nicholas P.; Barber, T. X. & Lang, Gerald. (Boston U) **Cognition and self-control: Cognitive control of painful sensory input.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states.* Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Undergraduates tested for baseline responses to a



painful stimulus were retested on the same stimulus after either the presence or absence of hypnotic induction, anesthesia instructions, or demands for honest reports. Ss' reports of pain were less affected by demands for honesty and more closely related to actual experiences than previously assumed. Instructions to use cognitive control over painful sensations reduced pain. (33 ref)

2218. Stanley, Gordon. (U Melbourne, NSW, Australia) **Adding and averaging angles: Comparison of haptic-visual and visual-visual information integration.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 331-336.—In a study with 40 undergraduates, 1 group of Ss added and another group of Ss averaged pairs of angles presented simultaneously according to a factorial design. One set of angles was presented haptically and then visually, and the other set was presented visually on both occasions. Although analysis of variance indicated no main effect due to sensory mode of presentation, some interactions due to sensory mode were significant. The adding functions were parallel, but the averaging functions converged with a significant interaction, suggesting a differentially weighted integration model.—*Journal abstract.*

2219. Ullman, Montague; Krippner, Stanley & Vaughan, Alan. **Dream telepathy: Experiments in nocturnal ESP.** Baltimore, MD: Penguin, 1973. xiii, 300 p. \$2.95.—Discusses the theoretical, experimental, and methodological aspects of spontaneous telepathic dreaming based on the hypothesis that ESP occurs more often in dreams than in consciousness. Results of experiments conducted to determine whether a person acting as an agent can transmit his thoughts to a sleeping S are reported, including Ss' reactions, transcripts of dream sessions, and accounts of unusual telepathic communication. (8 p ref)

2220. Vicario, Giovanni. (U Trieste, Inst of Psychology, Italy) **[Psychophysics and the psychology of time.]** (Ital) *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 19-33.—Suggests that the perception of time as a topic for psychophysics, has been inadequately represented in traditional approaches and in bibliographies. The study of time includes the study of frequency, duration, an instantaneous "only" event, and repetitions. Experimental methods that are appropriate for one of these areas may be unsuitable for others. Also, the duration of events and of the intervening periods are interactive, not independent. Psychophysical research should study conscious experience, not physics or biology; however, the dependence of conscious experience on physical dimensions is acknowledged.—*J. W. Black.*

2221. Weintraub, Daniel J.; Green, Gary S. & Herzog, Thomas R. (U Michigan) **Kinesthetic aftereffects day by day: Trends, task features, reliable individual differences.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 827-844.—Measured the kinesthetic aftereffect across 15 days in 3 groups of 37 undergraduates. Pre- and postinduction scores decreased across sessions for groups I > T (in which the inducing block was wider than test block) and increased for groups I < T (narrower) and no-I (control). The negative aftereffect for group I > T and the positive one for group I < T both declined toward zero across sessions; group no-I remained at zero aftereffect. Also found were errors of anticipation and of wedge position, low aftereffect-score

correlations across sessions (poor intraobserver reliability), and high reliability of pre- and postinduction scores. By combining residual change scores across sessions, reliable individual differences in induction susceptibility were secured; these proved unrelated to personality variables assessed by questionnaire. (19 ref)—*Journal abstract.*

### Auditory Preception

2222. Ades, Anthony E. (Massachusetts Inst of Technology) **How phonetic is selective adaptation? Experiments on syllable position and vowel environment.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 61-66.—Used P. D. Éimas and J. D. Corbit's (see PA, Vol 50:2176) selective adaptation method to investigate the existence of detectors sensitive to consonants in any environment, irrespective of their acoustic properties. Exp I with 5 paid young adult Ss concerned consonants in initial and final position. Repeated presentation of a consonant-vowel (CV) syllable had an adapting effect on a CV continuum but not on a VC continuum. The converse was also true. In Exp II with 5 additional Ss, a detector for C<sub>i</sub> V<sub>i</sub> was fatigued by repeated presentation of C<sub>i</sub> V<sub>i</sub>, even though the adapting C<sub>i</sub> had very little acoustically in common with the test C<sub>i</sub>. It is concluded that there are detectors for phonemes, or possibly features, which respond to a fairly abstract representation of the input, but not so abstract that a C is represented the same in initial and final position.—*Journal abstract.*

2223. Dorman, M. F. (Haskins Lab, New Haven, CT) **Discrimination of intensity differences on format transitions in and out of syllable context.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 84-86.—Presented 10 experienced adult Ss with pairs of stimulus syllables, or isolated transitions from them, which differed in the initial 60 msec of the signals by 0, 7.5, or 9 db. In the syllable context, the intensity differences were discriminated essentially at chance; in both the vowel and isolated transition conditions, the intensity differences were discriminated essentially perfectly. This outcome suggests that after the acoustic features of a stop-consonant-vowel syllable have been recorded into a phonetic representation, the acoustic information is relatively inaccessible for recall from auditory short-term memory.—*Journal abstract.*

2224. Eisler, Hannes & Montgomery, Henry. (U Stockholm, Psychological Lab, Sweden) **On theoretical and realizable ideal conditions in psychophysics: Magnitude and category scales and their relation.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 157-168.—By spacing 10 stimuli (white noise) between 40 and 110 dB according to 2 criteria—equal response ambiguity (ERA) and equal discriminability (ED)—an attempt was made to construct an ideal case for magnitude estimation and category rating. The ideal case is defined by linear and constant Weber functions (SDs as a function of scale values) for the 2 scales, respectively. Altogether, 3 group and 2 individual magnitude- and category-rating experiments were run with these 2 spacings. It was found that the ERA spacing approximated the ideal case well for both Weber functions and the ED spacing only for the Weber function of the category scale. The general

psychophysical differential equation that relates scale values and Weber functions for the 2 scales allowed good prediction of the category scales from the magnitude scales and the Weber functions. Data suggest a distinction between phenotypic (empirical) and genotypic Weber functions, analogous to real and ideal cases in physics. (20 ref)—*Journal abstract*.

2225. Hammill, Donald D. & Larsen, Stephen C. **The relationship of selected auditory perceptual skills and reading ability.** *Journal of Learning Disabilities*, 1974(Aug-Sep), Vol 7(7), 429-436.—Reviews studies using correlational statistical procedures to examine the relationship of reading to measures of auditory discrimination, memory, blending, and auditory-visual integration. The consensus of this research suggests that the auditory skills are not sufficiently related to reading to be particularly useful for school practice. The conclusions provide information regarding the desirability of training these skills with the aim of increasing reading ability. The direction future research must take to explore further the relation of other auditory variables to reading is indicated. (55 ref)—*Journal abstract*.

2226. Lunney, H. W. (Macquarie U, Speech & Language Research Ctr, North Ryde, NSW, Australia) **Time as heard in speech and music.** *Nature*, 1974(Jun), Vol 249(5457), 592.—Describes a technique and a device for measuring perceptions of intervals between notes or beats in speech or musical rhythms. Data from this and previous studies suggest that the limit of discrimination is biologically imposed and that the brain mechanism involved in timing resembles a simple analog device, possibly of a delay time or a delay line type.

2227. Martin, Frederick N. (U Texas, Austin) **Minimum effective masking levels in threshold audiometry.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 280-285.—Describes a procedure for masking during threshold audiometry. Illustrations are provided which show that use of an effective masking level equal to the threshold of the masked ear results in noise levels identical to those derived by the use of more complicated formulas.

2228. Mencher, George T. (U Nebraska, Lincoln) **A program for neonatal hearing screening.** *Audiology*, 1974, Vol 13(6), 495-500.—Describes a project at the University of Nebraska in which 10,000 infants tested for hearing loss in the nursery were Ss in a longitudinal study attempting to resolve questions regarding the prevalence of hearing disorders, the extent of false positive and false negative responses in the nursery, differential response patterns, and other sequelae. Subsequent studies involving stimuli and response types and the use of preconditioning auditory alerting signals are discussed. Lack of response to auditory stimuli when hearing is normal, response only to broad-band white noise, lack of response decrement, and the hyperactive response are considered, and some of the long-range implications of these forms of behavior are reviewed. (French summary)—*Journal abstract*.

2229. Penner, M. J.; Cudahy, E. & Jenkins, G. W. (Bell Telephone Lab, Holmdel, NJ) **The effect of masker duration on forward and backward masking.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 405-410.—Investigated temporal masking of clicks by noise using forward

and backward masking paradigms. Both the noise duration and the temporal separation,  $\Delta T$ , between the click and noise were varied for 2 experienced student Os. For very brief  $\Delta T$ s (100 microsec) and for very long  $\Delta T$ s (100 msec), the duration of the masker did not greatly affect the click threshold. However, for intermediate  $\Delta T$ s (3 msec), the threshold increased by as much as 44 db as the noise duration increased from .1 to 100 msec. Temporal weighting functions, which describe the relative effectiveness of the noise as a function of  $\Delta T$ , are computed from these data.—*Journal abstract*.

2230. Pike, Ray; McFarland, Ken & Dalgleish, Len. (U Queensland, St Lucia, Australia) **Speed-accuracy tradeoff models for auditory detection with deadlines.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 379-399.—Considers 2 neural models for response latency in auditory signal detection: R. Luce and D. M. Green's 1972 timing model and a modified counting model based on that of W. J. McGill (1967). The modified counting model is described in some detail. The experimental situation to which the models were applied was one where a deadline in response time was enforced on signal trials only or on noise trials only, the condition of deadlines on both cases having previously been studied by Green and Luce (1973). Ss were 6 male undergraduates. The results for mean latencies of the various categories of response, together with response probabilities, favor either the counting model or a dual process model. Data indicate either the operation of a dual process model or that the "interval of uncertainty" of the counting model may vary with bias position. Some consideration is also given to the possibility of differential residual response time components and it is concluded that such components may be important in the deadline situation.—*Journal abstract*.

2231. Rubin, David C. (Harvard U) **The subjective estimation of relative syllable frequency.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 193-196.—13 university student Ss were able to judge the relative frequency of occurrence in English of nonmorphemic syllables independent of phoneme frequency. Results support a theory of speech perception based on the syllable as a unit as opposed to the phoneme.

2232. Satinder, K. Paul & Mastronardi, Laura M. (Lakehead U, Thunder Bay, Ontario, Canada) **Sex differences in figural after-effects as a function of the phase of the menstrual cycle.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 1-5.—Sought information on sex differences in auditory figural aftereffects (AFAE), taking into account the phases of the menstrual cycle. Ss were 10 female and 10 male volunteers 19 yrs old, tested individually using the method of limits with counterbalancing. Apparatus included audiogenerators and matched headphones. The magnitude of the aftereffect varied significantly in relation to the phase of the menstrual cycle. No significant sex differences were found when the phases of the menstrual cycle were ignored.—R. D. Nance.

2233. Toppino, Thomas C. (U New Mexico) **The underlying structures of sentences are not the primary units of speech processing: A reinterpretation of Bever, Lackner and Kirk's findings.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 517-518.—Results of the experi-



ment of T. G. Bever et al (see PA, Vol 44:1654) were originally interpreted to imply that listeners segment speech on the basis of underlying sentence propositions rather than on the basis of surface constituent structure. Reexamination of the data reveals that the results do not support such a conclusion but offer more support for the surface structure hypothesis which was originally rejected.

2234. Warren, Richard M. & Sherman, Gary L. (U Wisconsin, Milwaukee) **Phonemic restorations based on subsequent context.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 150-156.—Earlier experiments have shown that when 1 or more speech sounds in a sentence are replaced by a noise meeting certain criteria, the listener mislocalizes the extraneous sound and believes he hears the missing phoneme(s) clearly. The present experiment with 60 undergraduates confirmed and extended these earlier reports of phonemic restorations under a variety of novel conditions. All stimuli had some of the context necessary for the appropriate phonemic restoration following the missing sound, and all sentences had the missing phoneme deliberately mispronounced before electronic deletion (so that the neighboring phonemes could not provide acoustic cues to aid phonemic restorations). Results are interpreted in terms of mechanisms normally aiding veridical perception of speech and nonspeech sounds.—*Journal abstract.*

2235. Warren, Richard M. (U Wisconsin, Milwaukee) **Quantification of loudness.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 807-825.—Extended earlier experiments under "ideal" conditions to white noise, using a total of 600 undergraduates in 5 experiments. When known experimental biases were eliminated, half loudness was equal to half sound-pressure level (-6 db) from 45 through 90 db. The same simple relation held whether stimulation was through headphones or loudspeaker, and whether responses were numerical estimates or marks on a linear loudness scale. These findings and other evidence support the physical-correlate theory of sensory intensity and suggest that quantitative estimates of sensation are based not on the quantitative nature of sensory events as such but rather on the external events and relations they signify. (29 ref)—*Journal abstract.*

2236. Zelniker, Tamar; Rattok, Jack & Medem, Avraham. (Tel-Aviv U, Ramat-Aviv, Israel) **Selective listening and threshold for tones appearing on a relevant and on an irrelevant input channel.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 50-52.—Threshold scores for tones appearing on shadowed and on nonshadowed messages were obtained from 16 undergraduate psychology students in order to test whether input presented on an irrelevant channel was attenuated when Ss attended to another channel. Comparisons were made between threshold scores obtained for each ear, when Ss shadowed messages appearing on that ear and when Ss shadowed messages appearing on the contralateral ear. The threshold scores in the 2 conditions were highly similar. Data are evaluated in the context of auditory target detection with targets identified by their verbal content vs their physical characteristics.—*Journal abstract.*

2237. Zwislöcki, J. J. & Sokolich, W. G. (Syracuse U, Inst for Sensory Research) **On loudness enhancement of**

**a tone burst by a preceding tone burst.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 87-90.—Investigated the loudness level of a 2nd tone burst in a monotic burst pair as a function of the intensity and frequency of the 1st burst relative to the corresponding variables of the 2nd burst and as a function of the interburst time interval. The loudness level was measured with the help of a 3rd, a comparison burst whose frequency was the same as that of the 2nd burst. Results from groups of 4-10 listeners show beyond any reasonable doubt that loudness effects in pairs of sound bursts were controlled by 2 perceptual processes; loudness enhancement and loudness summation. The 1st refers to the loudness of the 2nd burst; the 2nd, to the overall loudness of the burst pair. The time and frequency functions of the 2 processes were fundamentally different.—*Journal abstract.*

2238. Zwislöcki, J. J.; Ketkar, I.; Cannon, M. W. & Nodar, R. H. (Syracuse U, Inst for Sensory Research) **Loudness enhancement and summation in pairs of short sound bursts.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 91-95.—Presented a pair of short, temporally spaced sound bursts to groups of 4-7 listeners and requested them to match the loudness of a 3rd, a comparison burst to the overall loudness of the pair. A fundamentally different result was obtained from this task than when Ss were instructed to match the loudness of the comparison burst to that of the 2nd burst in the pair. Loudness-level changes occurring in the 1st situation were designated as loudness summation; those occurring in the 2nd situation, as loudness enhancement. Some parameters of both phenomena are studied. Results lead to the suggestion of a principle of maximum similarity in stimulus matching and to a reinterpretation of some earlier data. (15 ref)—*Journal abstract.*

### Visual Perception

2239. Andrews, D. P.; Webb, Jane M. & Miller, D. T. (U Keele, England) **Acuity for length comparison in continuous and broken lines.** *Vision Research*, 1974(Sep), Vol 14(9), 757-766.—In 2 experiments with the 3 authors as Ss, acuity for length comparison was compared in figures made of spots and of lines. Performance was always better for the line figures, regardless of configuration, size, or orientation. Large constant errors were found which differed between spot and line figures (among other variables). Efficiency of use of positional information was low compared with an ideal O. Results indicate that the high-grade positional data which Hubel units integrate to encode orientation or shape is not available for distance estimation. It is suggested instead that the positional specificity of Hubel units serve to encode distances and that the positional specificity is low. (French, German, & Russian summaries)—*Journal abstract.*

2240. Banks, Martin S. & Munsinger, Harry. (U Minnesota, Inst of Child Development, Minneapolis) **Pupillometric measurement of difference spectra for three color receptors in an adult and a four-year-old.** *Vision Research*, 1974(Sep), Vol 14(9), 813-817.—Used pupillometry as a measure of visual sensitivity in a female, color-normal adult and a 4-yr-old female with color-normal parents. Photopic spectral sensitivity determined with this measure agreed with the CIE photopic

visibility curve, although the child's data show a small long-wavelength decrement. Difference spectra for 3 color receptors were also measured. 3 distinct functions, similar to those obtained in adults by more traditional methods, were obtained in both Ss. (French, German, & Russian summaries) (23 ref)—*Journal abstract*.

2241. Budohoska, Wanda; Konorski, Jerzy; Celiński, Marek & Szymański, Leszek. (Nencki Inst of Experimental Biology, Warsaw, Poland) **The perception of competing visual patterns.** *Polish Psychological Bulletin*, 1974, Vol 5(2), 59-65. —Investigated the interaction of 2 familiar simple visual patterns unified into an unfamiliar one, using 12 adult Ss with normal vision. In Exp I Ss were trained for 4 days in recognizing 2 simple visual patterns: 1 linear and 1 dotted, shown for durations of 20, 30, 50, and 75 msec. In Exp II the linear pattern was placed above the dotted one. In Exp III the dots were above the lines. In Exp IV Ss were instructed to watch either the dots alone or the lines alone, to keep apart the 2 elements of the complex. Results show that while learning to recognize the simple patterns, Ss initially committed more errors with dots than with lines. This difference disappeared gradually so that on the 4th day of learning Ss performed equally well on both patterns. On combining the 2 patterns the number of errors increased only in relation to the dotted element. Results are discussed in the framework of J. Konorski's (1967) theory which assumes that there are antagonistic interactions between gnostic units involving the mechanism of lateral inhibition.—*Journal abstract*.

2242. Caplan, David; Holmes, Jane M. & Marshall, John C. (McGill U, Medical School, Montreal, Quebec, Canada) **Word classes and hemispheric specialization.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 331-337.—Studied the effects of noun-class on recognition accuracy in the 2 visual half-fields. Data from 24 Ss (mean age = 25.5 yrs) who were given a word recognition task show that agentive nouns are more easily recognized than either simple nouns or category-ambiguous (noun/-verb) items with right visual field presentation, and that both agentive and category-ambiguous nouns are more easily recognized than simple nouns with left visual field presentation. Implications for a theory of hemispheric specialization are discussed. (French & German summaries) (23 ref)—*Journal abstract*.

2243. Cohn, Theodore E.; Thibos, Larry N. & Kleinstein, Robert N. (U California, School of Optometry, Berkeley) **Detectability of a luminance increment.** *Journal of the Optical Society of America*, 1974(Oct), Vol 64(10), 1321-1327.—Studied the psychometric function for the detection of a foveal luminance increment in 3 male Os. The signal to be detected was a modulation of a circular red target. For an ideal photodetector, the theory of signal detectability predicts that the index of detectability should rise linearly with the luminance of the luminance increment unless the O has some uncertainty concerning the parameters of the signal to be detected. The theory predicts that the slope of the receiver operating characteristic (ROC curve) should decrease with increasing uncertainty. In Exp I, in which luminance was varied, a nonlinear psychometric function and an ROC curve of relatively low slope were found. In Exp II, which included a pulsed background (pedestal)

whether or not the signal was presented, the predicted psychometric function was found. The ROC slope that was measured in rating experiments increased when the pedestal was used. Presumably, the pedestal provides the signal-parameter information that the O could not remember. It is concluded that the human O acts like an ideal photodetector that has imperfect memory concerning the signal to be detected. (18 ref)—*Journal abstract*.

2244. Corballis, Michael C. & Roldan, Carlos E. (McGill U, Montreal, Quebec, Canada) **On the perception of symmetrical and repeated patterns.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 136-142. —4 experiments with a total of 116 university students investigated rapid perceptual judgments about tachistoscopically presented patterns that were either symmetrical about or repeated across a vertical axis. The same patterns were presented under 2 different instructional conditions: some Ss were to judge the 2 halves of each pattern "same" or "mirror"; others were to judge each pattern as a whole "symmetrical" or "asymmetrical." With dot patterns, reaction times (RTs) were faster for symmetrical than for repeated patterns when the 2 halves were close together, but not when they were separated, regardless of instructions. With simpler patterns made up of arrowheads and C-shapes, however, same RTs were faster than mirror, but asymmetrical RTs were marginally slower than symmetrical, regardless of spatial separation. The advantage of same over mirror did not seem to be simply a labeling effect. Results suggest that left-right symmetry was perceptually more salient than left-right repetition when the patterns were perceived holistically. By contrast, distinct patterns could be matched more rapidly when they were the same than when they were left-right mirror images.—*Journal abstract*.

2245. Davidoff, Jules. (U Coll Swansea, Wales) **The psychological relationship between lightness and saturation.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 79-83.—Lightness and saturation, though independent in a physical sense, have often been seen to be psychologically related. Exp I used a multidimensional scaling technique to verify again this nonindependence for 2 untrained female undergraduate Os. Exp II, using a matching technique, quantified this relationship, giving the extent of the error in lightness for varying levels of saturation presented to 36 Os. This relationship was independent of hue if saturation was measured by the colorimetric purity of the hue. Errors in value (lightness on the Munsell system) were linearly related to colorimetric purity. (30 ref)—*Journal abstract*.

2246. Doehrmann, Steven. (U Michigan) **The effect of visual orientation uncertainty in a simultaneous detection-recognition task.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 519-523.—Examined the processing of the outputs of visual orientation-sensitive mechanisms by higher order mechanisms. 3 female college students performed a simultaneous detection-recognition task. Variation in the number of possible orientations of task. A single straight line produced only slight, if any, changes in detection or recognition performance compared with findings from similar experiments. It is concluded that the outputs of all orientation-sensitive mechanisms are examined by higher order mechanisms. As the angular separation of 2 possible orientations increased, recogni-



tion improved in keeping with other reported findings. Comparison of detection with recognition indicated that the latter, under certain conditions, was superior to the former. (22 ref)—*Journal abstract*.

2247. Eriksen, Barbara A. & Eriksen, Charles W. (U Illinois) **Effects of noise letters upon the identification of a target letter in a nonsearch task.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 143-149.—During a 1-sec tachistoscopic exposure, 6 graduate and undergraduate students responded with a right or left leverpress to a single target letter from the sets H and K or S and C. The types of noise letters (response compatible or incompatible) flanking the target and the spacing between the letters in the display were experimentally varied. In all noise conditions, reaction time (RT) decreased as between-letter spacing increased. However, noise letters of the opposite response set impaired RT significantly more than same response set noise, while mixed noise letters belonging to neither set but having set-related features produced intermediate impairment. Differences between 2 target-alone control conditions, one presented intermixed with noise-condition trials and one presented separately in blocks, gave evidence of a preparatory set on the part of Ss to inhibit responses to the noise letters. It is concluded that S could not prevent processing of noise letters occurring within about 1° of the target due to the nature of processing channel capacity and had to inhibit his response until he was able to discriminate exactly which letter was in the target position. (15 ref)—*Journal abstract*.

2248. Estes, W. K. (Rockefeller U, New York, NY) **Redundancy of noise elements and signals in visual detection of letters.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 53-60.—Studied forced-choice detection in relation to heterogeneity of noise letters and multiple signal letters within tachistoscopic displays. 24 paid young adults served as Ss in both experiments. Curves plotting both probability and latency of correct detections vs number of redundant signals at different display sizes exhibited significant interactions with heterogeneity of the noise background, but did not differ as a function of similarity among redundant signals. Application of interactive and independent channels models indicated that noise redundancy operated to a major extent through effects of signal-noise confusability at the decision level but might also have involved perceptual interaction at the level of feature detectors.—*Journal abstract*.

2249. Estévez, Oscar & Spekrijse, Henk. (U Amsterdam, Lab of Medical Physics, Netherlands) **A spectral compensation method for determining the flicker characteristics of the human colour mechanisms.** *Vision Research*, 1974(Sep), Vol 14(9), 823-830.—Details the use of a spectral compensation technique with 5 color-normal males in which the silencing of either of the 2 classes of cones in the red-green spectral range resulted in similar flicker fusion curves for both the red and green cones. Results show that the isolated human medium and long wavelength cone systems did not exhibit low frequency attenuation even at high retinal illuminations. (French, German, & Russian summaries)

2250. Frith, Uta. (MCR Developmental Psychology Unit, London, England) **Scanning for reversed and**

**rotated targets.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 343-349.—10 5-8 yr olds and 10 adults scanned arrays of identical shapes for mirror-reversed or 180°-rotated targets. The decomposition of scanning time into target identification time and context scanning time indicated that it took longer to identify reversed than rotated targets but equally long in both conditions to scan context. This confirms the notion of a specific difficulty in coding mirror-reversed shapes. When the shapes used contained vertical lines, scanning time increased while target identification time was unaffected. This was probably due to a tendency to fixate lines at right angles to the direction of scan and does not reflect a coding difficulty.—*Journal abstract*.

2251. Frith, Uta. (MRC Development Psychology Unit, London, England) **A curious effect with reversed letters explained by a theory of schema.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 113-116.—Conducted 4 experiments with a total of 40 adult Ss in which it took longer to find a normal N embedded in a context of reversed Ns than it took to find a reversed N embedded in a context of normal Ns. This was true for other letters as well and can be explained by a theory of schema. This theory holds that there is a schema for the normal form of a letter based on past experience, and that this schema is not a static but a flexible construct which is sensitive to the immediate cognitive context. This property of the schema enables recognition even if the letter is presented in a deviating form. A deviation, such as mirror reversal, may at times be as acceptable as the normal form of the letter. This was the case when context stimuli in a scanning task consisted of reversed letters. If the target stimulus was the normal form of the letter, it was more difficult to detect since both context and target were accepted as the same letter.—*Journal abstract*.

2252. Gogel, Walter C. & Tietz, Jerome. (U California, Santa Barbara) **The effect of perceived distance on perceived movement.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 70-78.—Developed equations to predict the apparent motion of a physically stationary object resulting from head movement as a function of errors in the perceived distances of the object or of its parts. In 2 experiments applying these equations, the perceived slant of an object was varied with respect to its physical slant by means of perspective cues. In Exp I, 72 undergraduate Os reported the apparent motion and apparent distance of each end of the object independently. Results are consistent with the equations in terms of apparent relative motion, but not in terms of apparent common motion. The latter results are attributed to the tendency for apparent relative motion to dominate apparent common motion when both are present simultaneously. In Exp II a direct report of apparent relative motion was obtained from 60 Os for illusory slants of a physically frontoparallel object. It was found that apparent rotations in the predicted direction occurred as a result of head motion, even though no rotary motion was present on the retina.—*Journal abstract*.

2253. Gogel, Walter C. (U California, Santa Barbara) **Relative motion and the adjacency principle.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol

26(3), 425-437.—Investigated the perception of motion of physically moving points of light in terms of the distinction between absolute and relative motion cues and the change in the effectiveness of the latter as a function of the frontoparallel separation between the points. In situations in which 2 competing relative motion cues were available to 24 right-handed undergraduate Ss to determine the perceived path of motion of a point of light, it was found that the relative motion cue between more adjacent points was more effective than the relative motion cue between more separated points. In situations in which only 1 relative motion cue was available, the effectiveness of this cue as compared with the absolute motion cue decreased with increased separation. Results are predictable from the adjacency principle which states that the effectiveness of cues between objects is an inverse function of object separation.—*Journal abstract.*

2254. Gregory, R. L. & Harris, J. P. (U Bristol, Medical School, England) **Illusory contours and stereo depth.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 411-416.—Formulated a theory for illusory contours, which fill gaps in certain figures, and tested it with 12 medical students and technicians as Ss. It was suggested that nearer masking objects are perceptually postulated to "account" for gaps when these are unlikely. Results show that when stereoscopic depth information incompatible with this "perceptual hypothesis" was presented, the illusory contours were reduced in intensity or disappeared. (16 ref)—*Journal abstract.*

2255. Holmgren, John E.; Juola, James F. & Atkinson, Richard C. (U Maryland) **Response latency in visual search with redundancy in the visual display.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 123-128.—Conducted 2 experiments with a total of 18 paid female undergraduates to investigate the effects of redundant display items upon response latency in a visual search task. In Exp I Ss searched 5-letter displays for a predesignated critical letter. Both critical and noncritical letters could be repeated in the displays. Mean response latency decreased markedly with increasing redundancy in the critical letter and was affected to a lesser extent by redundancy in the noncritical letters. In Exp II Ss were required to detect the presence of redundant letters in displays of from 2 to 5 letters, first with no information as to what letter might be repeated, then with knowledge of which letter would be repeated if the display contained a redundant letter. Response latencies in the former case were much slower than in the latter. Implications of these findings for current views of visual information processing are discussed.—*Journal abstract.*

2256. Kanizsa, Gaetano. (U Trieste, Inst of Psychology, Italy) [**"Gestalt errors" and other visual illusions.**] (Ital) *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 3-18.—Presents 23 examples of visual illusions regarding color, length of lines, geometric forms, and movement. Errors are categorized as functions of the stimuli and of experience. No alternative theoretical explanations are offered. (16 ref)

2257. Kinchla, R. A. & Collyer, C. E. (Princeton U) **Detecting a target letter in briefly presented arrays: A confidence rating analysis in terms of a weighted additive effects model.** *Perception & Psychophysics*,

1974(Aug), Vol 16(1), 117-122.—Reports a visual experiment in which 3 Os rated their "confidence" that briefly presented 4-letter arrays contained one or more target-letter Fs. Their responses are interpreted as the product of a weighted additive combination of partial or "noisy" subjective representations of the 4 letters in each array.

2258. Manelis, Leon. (Stanford U) **The effect of meaningfulness in tachistoscopic word perception.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 183-192.—Reviews studies of tachistoscopic word perception under 2 theoretical headings: the structural approach, in which the variables of interest were linguistic relations among letters, and the lexical approach, where the interest was in the availability of words in lexical memory. Results of a recent tachistoscopic recognition study question the importance of lexical availability by finding no difference in performance between meaningful words and well-structured, pronounceable nonwords. In the present 3 experiments with a total of 64 university students, further comparisons between words and pronounceable nonwords were performed, and a meaningfulness effect was demonstrated. The generality of this finding is discussed, and alternative models accounting for the effect are considered. 2 of these are capable of explaining structural effects as well as the meaningfulness effect: a translation model and a lexical discrimination net. (39 ref)—*Journal abstract.*

2259. Mial, R. P.; Smith, P. C.; Doherty, M. E. & Smith, O. W. (Bowling Green State U) **The effect of memory color on form identification.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 1-3.—Previous studies have demonstrated that a form's identity affects the phenomenal hue of that form. This effect has been attributed to the operation of the "memory color" phenomenon. The present study with 6 female undergraduates was proposed to assess the effect of memory or characteristic color on form identification. Results indicate that memory color, rather than interacting with the object in such a manner as to aid identification, induces a bias toward identification of an object of the memory color.—*Journal abstract.*

2260. Monk, Timothy H. (U Nottingham, England) **Sequential effects in visual search.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 315-321.—Demonstrated 2 types of repetition effect in a visual search situation with a total of 5 female university students and employees. A target dot of 1 of 4 possible brightnesses was randomly placed in a field of nontarget dots. A target repetition effect caused search time to be significantly reduced if the trial had a target dot of the same brightness as was used in the immediately preceding trial. An "edge effect" caused targets in the outer part of the display to have longer search times than those in the inner part. A spatial sequential effect caused targets appearing in the inner part of the display to have reduced search times if the target in the immediately preceding trial had also appeared in the inner part. Possible implications and mechanisms of the sequential effects are discussed.—*Journal abstract.*

2261. Munsinger, Harry & Banks, Martin S. (U California, San Diego) **Pupillometry as a measure of visual sensitivity among infants, young children, and**



**adults.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 677-682.—Proposes pupillometry as an objective measure of visual sensitivity for infants, young children, and adults. To study the possible close relationship between pupillary contraction and perceived brightness for infants and young children, photopic pupillary sensitivity was measured for 5 1-yr-olds, 5 3-yr-olds, and 5 adults. Results support the utility of pupillometry as a sensitivity measure for infants and children, based on the demonstrated close agreement between the children's and adults' data in the study and adult data obtained by more traditional psychophysical techniques. (39 ref)—*Journal abstract*.

2262. Murch, Gerald M. & Paulson, James. (Portland State U) **An extension of the Riggs projection colorimeter.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 403-406.—Describes a method for the construction and calculation of CIE chromaticity coordinates from a simple and inexpensive projection colorimeter. The device allows variation along the dimensions of hue, saturation, and brightness and specification of these variations in terms of chromaticity coordinates, dominant wavelength, relative luminance, and excitation purity.

2263. Olson, Richard K. (U Colorado) **Slant judgments from static and rotating trapezoids correspond to rules of perspective geometry.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 509-516.—Compared the apparent static slant of trapezoids aligned in the O's frontal plane with the apparent plane of reversal for the same trapezoids when rotated. Slant responses of 9 paid undergraduate Os were similar in both static and rotation conditions, thus allowing description of the trapezoidal window illusion in terms of projective geometry. Linear perspective was systematically varied in the stimulus series to geometrically imply slants of 50, 60, 70, and 80°. Perceived slant corresponded remarkably well with these values. Results show that with the proper viewing conditions and response measures, Os may be rather good perspective geometers. (28 ref)—*Journal abstract*.

2264. Oyama, Tadasu. (Chiba U, Japan) **Perceived size and perceived distance in stereoscopic vision and an analysis of their causal relations.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 175-182.—Effects of visual angle and convergence upon the perceived sizes and perceived distances of a familiar object (playing card) and a nonrepresentational object (blank white card) were investigated with 6 undergraduate psychology majors by means of a projector stereoscope with polarizing filters. Results indicate that size estimates increased nearly proportionally as the visual angle increased and decreased nearly linearly as the convergence increased. Distance estimates decreased nearly linearly as either the visual angle or the convergence increased. The ratio of the size estimate to the distance estimate for a given visual angle was almost constant irrespective of convergence. In this sense, the size-distance invariance hypothesis held. No clear effect of familiarity was found. Partial correlations were used to discriminate direct and indirect causal relationships between the stimulus variables and perceptual estimates. Both perceived size and perceived distance were found to

be determined directly by the 2 stimulus variables but mutually related only indirectly. (31 ref)—*Journal abstract*.

2265. Papaioannou, J. **Effects of retinal adaptation on brightness estimation in humans: Temporal considerations.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 514-519.—Asked 10 young adult volunteers to identify 1 of 7 possible luminance levels under Ganzfeld conditions. The luminance range investigated was .5-500.0 ft lm. Earlier findings on the subjective effects of a Ganzfeld on humans were verified. Ss performed significantly better under nonadapted than under adapted conditions. Under both conditions Ss tended to perform better after pupillary diameter had been fixed. Errors never exceeded 1 log<sub>10</sub> unit in magnitude.—*Journal abstract*.

2266. Pitt, I. T. & Winter, L. M. (Kodak Ltd, Research Div, Harrow, England) **Effect of surround on perceived saturation.** *Journal of the Optical Society of America*, 1974(Oct), Vol 64(10), 1328-1331.—Examined the effects of having a light or dark surround around a color, and, in particular, the effect these surrounds have on the perceived saturation of the color. Results of the experiments, with a total of 5 Os, show that a dark surround not only increased the apparent brightness of a color but also reduced its apparent saturation. It is concluded that for equivalence with a light-surrounded color, a color with a dark surround must have a higher purity.—*Journal abstract*.

2267. Plack, Jerelyn J. & Shick, Jacqueline. (U Minnesota) **The effects of color on human behavior.** *Journal of the Association for the Study of Perception*, 1974(Spr), Vol 9(1), 4-16.—Reviews the literature on the effects of color on physical, perceptual, and emotional responses and color preferences. Because color is related to many of these variables (e.g., blood pressure, pulse rate, judgments of size, weight, and distance, and personality characteristics) and since these variables have also been linked to motivation and motor performance, several hypotheses concerning the effects of color on motor performance are suggested. Implications for educational equipment and facilities are also examined. (75 ref)—*L. Gorsev*.

2268. Pressey, Alexander W. (U Manitoba, Winnipeg, Canada) **Evidence for the role of attentive fields in the perception of illusions.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 464-471.—Predicted, on the basis of the concept of attentive fields, that the position of the comparison line would systematically affect the amount of illusion displayed in the Ponzo configuration and in 2 impoverished forms of the Müller-Lyer illusion. In an experiment with 30 normally seeing undergraduates 10 of 12 predictions which seemed to be unique to assimilation theory were verified statistically, and the remaining 2 predictions were in the correct direction. A reversed Ponzo illusion, which was expected from the concept of attentive fields, was not exhibited. This latter result is explained by the fact that the Müller-Lyer illusion of elongation is normally greater than the Müller-Lyer illusion of shrinkage. (16 ref)—*Journal abstract*.

2269. Pressey, Alexander. (U Manitoba, Winnipeg, Canada) **Effect of size of angle on the ambiguous**

**Müller-Lyer illusion.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 401-404.—Measured the ambiguous Müller-Lyer illusion as a function of the angle formed by the oblique lines. 60 undergraduates served as Ss. The illusion increased with an increase in the size of the angle, confirming the validity of the attentive field postulate of the assimilation theory of geometric illusions.

2270. **Putz, Vernon R. & Rothe, Robert.** (National Inst of Occupational Safety & Health, Cincinnati, OH) **Peripheral signal detection and concurrent compensatory tracking.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 155-163.—Introduced a Mackworth-clock monitoring task into a standard compensatory tracking task located at different lateral positions in the visual field of 48 right-handed undergraduates, while the tracking task was located in the center of the visual field. The variables tracking frequency and monitor position were hypothesized to produce mutual interference in the dual-task arrangement, and the spatial separation of the 2 tasks was assumed to adversely affect peripheral signal detection. As the tracking frequency increased, peripheral monitoring performance remained high, while tracking accuracy was reduced. The position of the monitor task did not affect monitoring performance but did influence tracking accuracy at the low tracking frequency. A divided-attention effect was found with respect to the monitoring task when both tasks were located directly in S's field of view. Eye-movement data provides some support for the notion of a functional visual field. (16 ref) —*Journal abstract.*

2271. **Pynte, Joël.** (U Provence, Lab de Psychologie Experimentale, Aix-en-Provence, France) **Readiness for pronunciation during the reading process.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 110-112.—Required 24 French psychology students to read a series of 3 numbers projected on a screen. Depending on the series presented, the number projected at the center (test) required one or more syllables to be pronounced. Results show that the more syllables it took to pronounce it, the longer the eye fixation on that number lasted. This suggests that a mechanism of readiness for pronunciation co-occurs with visual processing.—*Journal abstract.*

2272. **Roufs, J. A.** (Inst voor Perceptie Onderzoek, Eindhoven, Netherlands) **Dynamic properties of vision: V. Perception lag and reaction time in relation to flicker and flash thresholds.** *Vision Research*, 1974(Sep), Vol 14(9), 853-869.—In order to relate perception lag to flicker thresholds, both were measured by the same 2 Ss under the same conditions. Perception lag obtained by 3 methods—double flash, eye and ear, and reaction time—were compared for foveal flashes at a dark background. The course of perceptive delay was measured as a function of the intensity of long flashes over a large intensity range. At medium intensities the results of the 3 methods agree. At low intensities, decreasing the intensity towards the threshold increased reaction time progressively faster than double-flash settings in the 1st decade above the threshold. In a 2nd series of experiments with 2 Ss, reaction times and double-flash settings at a low and a high background level were compared. The flicker fusion characteristics of the same stimuli were determined by modulating them harmonically. The change of perception lag at the low background level was

considerably greater than that at the high level on varying the flash intensity over a comparable range. Visual latency and flicker thresholds were related on the basis of 3 hypothetical general system properties. The course of perception lag obtained by double-flash settings is in agreement with that calculated from the flicker fusion curve. Latency curves at different background levels can be found from a generalized function and 2 parameters which are characteristic for sensitivity and inertia and which can be found either from flicker or flash thresholds. (French, German, & Russian summaries) (54 ref)—*Journal abstract.*

2273. **Roufs, J. A.** (Inst voor Perceptie Onderzoek, Eindhoven, Netherlands) **Dynamic properties of vision: IV. Thresholds of decremental flashes, incremental flashes and doublets in relation to flicker fusion.** *Vision Research*, 1974(Sep), Vol 14(9), 831-851.—3 experiments with a total of 3 Ss measured the thresholds of pairs of incremental and decremental flashes as a function of their duration, those of doublets as a function of the flash interval, and those of incremental flashes over a very large range of durations. The incremental and decremental threshold characteristics did not differ significantly, from which it is concluded that the excursion of the system responses to the flashes in the positive and negative direction must be approximately equally large if the flashes are to be detected. The doublet characteristics confirmed that the response to short flashes contained a definite 2nd phase. At low and high levels, however, they were practically isomorphous, which represents a deviation from the characteristics calculated from the De Lange flicker fusion curves. Measurements over a large range of duration showed that under certain conditions the threshold characteristics of rectangular increments displayed a minimum and that they were remarkably isomorphous at low and high levels. A refinement of the model introduced in order to explain these results yields a transmission curve which differs from the De Lange characteristics in the direction of greater attenuation at the very low frequencies and which is also isomorphous for the various background levels. (French, German, & Russian summaries) (40 ref) —*Journal abstract.*

2274. **Sekuler, Robert & Pierce, Scott.** (Northwestern U) **Perception of stimulus direction: Hemispheric homology and laterality.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 679-695.—Used response times to measure the difficulty of discrimination between various simple geometric figures in 3 experiments with a total of 40 undergraduates. Response times for "right-left" stimuli (3-sided squares with their open sides to the right or left) were not affected by vertical misalignment between the stimuli; those for "up-down" stimuli were affected. Left-right discriminations were no more affected by contralateral vs ipsilateral projection than were up-down discriminations. (17 ref)—*Journal abstract.*

2275. **Simmonds, M. B.** (U Canterbury, Christchurch, New Zealand) **Stereopsis and subjective contours.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 401-404.—10 undergraduate volunteers rated perceived depth and contour clarity of figures containing binocularly disparate subjective contours. There was no tendency for stereoscopic depth cues to enhance the



perceived clarity of subjective contours. Disparity cues that were incompatible with monocular depth cues reduced the depth sensation but did not affect contour clarity. It is concluded that, although subjective contours can be perceived stereoscopically, they are seen in less depth than real contours with the same degree of horizontal disparity.—*Journal abstract.*

2276. Skowbo, D.; Gentry, T.; Timney, B. & Morant, R. B. (Brandeis U) **The McCollough effect: Influence of several kinds of visual stimulation on decay rate.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 47-49.—Conducted an experiment to determine whether the decay rate of the McCollough effect could be differentially influenced by the type of visual stimulation that followed its induction. After acquiring this effect, each of 3 trained Os was exposed to achromatic gratings, homogeneous chromatic fields, natural visual stimulation, or complete darkness. Exposure to achromatic gratings caused a marked fading of the effect; the other types of stimulation were associated with similar and much less rapid decay.—*Journal abstract.*

2277. Taylor, M. M. & Aldridge, K. D. (Defence & Civil Inst of Environmental Medicine, Downsview, Ontario, Canada) **Stochastic processes in reversing figure perception.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 9-25.—Measured the timing patterns of figural reversals, using as a stimulus figure a 3-dimensional surface which could be seen as dented or as bubbly. Transitions between the 2 forms were clear and abrupt and could not be voluntarily controlled by even a practiced O. The timing distributions of reversals, for 4 female adult Os who worked for 5 sessions of 36 min each, were incompatible with theories based on satiation-like effects; neither did they conform with a simple random-walk model. A random-walk model based on a finite majority decision device with memory described the data better than either. Data from 20 90-min observation periods for each of 2 Os were analyzed in detail according to this model, and it was found that the gross behavioral changes that sometimes occurred from period to period could usually be accounted for by a change of exactly 1 unit in one or another of the 3 parameters of the majority detector. The mathematical description of the model is given in a separate appendix to the paper. (20 ref)—*Journal abstract.*

2278. Thompson, Jack G. & Schiffman, H. R. (Rutgers State U) **The influence of figure size and orientation on the magnitude of the horizontal-vertical illusion.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 413-420.—Performed 2 experiments to examine the effect of display size and figure orientation on the horizontal-vertical illusion. A total of 50 college students served as Ss. According to the visual field hypothesis of T. M. Künnapas (1957), if the relation of the figure components to the surrounding frame is held invariant neither experimental manipulation should exert an appreciable influence. However, both manipulations produced significant effects, indicating that the visual field hypothesis is untenable as the primary determinant of the horizontal-vertical illusion. An alternative explanation is discussed. (16 ref)—*Journal abstract.*

2279. Tynan, Paul & Sekuler, Robert. (Northwestern U, Cresap Neuroscience Lab) **Perceived spatial frequen-**

**cy varies with stimulus duration.** *Journal of the Optical Society of America*, 1974(Sep), Vol 64(9), 1251-1255.—Conducted 4 experiments with a total of 22 observers in which a sinusoidal grating appeared of higher spatial frequency when briefly flashed than when presented for longer durations. This effect was restricted to gratings of low spatial frequency. Time-dependent changes in the response of spatial frequency channels are a likely cause.

2280. Uhlarik, John J. & Osgood, Alan G. (Kansas State U) **The role of some spatial parameters of gratings on the McCollough effect.** *Perception & Psychophysics*, 1974(Jun), Vol 15(3), 524-528.—110 undergraduates with normal color vision were alternately adapted to vertical and horizontal gratings that consisted of black bars and colored slits. The slits of one grating were green and of the other, magenta. The widths of the black bars and the colored slits were varied independently during adaptation and testing. This design separates the relative influence of bar width, slit width, and spatial frequency on an orientation specific color aftereffect known as the McCollough effect. Black bar width had the major influence on the strength of the aftereffect, suggesting that the neurophysiological mechanism underlying the McCollough effect might consist of orientation specific units that are sensitive to both the widths of black bars and the chromatic characteristics of their surrounds.—*Journal abstract.*

2281. Van der Meer, H. C. (Catholic U, Psychological Lab, Nijmegen, Netherlands) **Aniseikonia: II. The influence of vertical and horizontal aniseikonia on the orientation of longitudinal horopters.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 303-314.—Conducted a study with 7 advanced psychology students with normal vision to investigate the influence of vertical and horizontal aniseikonia on the orientation of the longitudinal horopter. Results indicate that vertical disparity had some influence on the orientation of the horopter formed by equating the primary subjective visual directions of the 2 eyes. This seems at variance with the hypothesis of a stable system of corresponding retinal elements.—*Journal abstract.*

2282. Van der Meer, H. C. (Catholic U, Psychological Lab, Nijmegen, Netherlands) **Aniseikonia: I. The influence of the magnification percentage of afocal meridional lenses on the magnitude of the stereoscopic depth effect.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 283-302.—In 1964 K. N. Ogle postulated that the magnitude of the stereoscopic depth effect at horizontal aniseikonia is a linear function of the magnification percentage of meridional size lenses (axis at 90°). For vertical aniseikonia Ogle proposed the operation of 2 processes: an excitation process directly proportional to the vertical disparity and an inhibitory process that increases exponentially with the vertical disparity. In the present investigation with 22 normal-vision undergraduates these rules could not be confirmed. With horizontal aniseikonia most Ss showed, apart from a significant linear trend, also significant quadratic and/or cubic trends; furthermore, significant linear trends in opposite direction occurred. With vertical aniseikonia, a depth experience opposite to the expected direction occurred very frequently. Here, individual differences in the course of the curves representing the relationship

between the degree of the stereoscopic depth effect and the magnification percentage of the lens were particularly great. Results suggest that the processes which, according to Ogle, occur under aniseikonia are not compatible with the idea of a stable preformed structure of corresponding retinal elements, but that the lawfulness in the relationship disparity-depth experience arises only after a process of learning. (19 ref)—*Journal abstract*.

2283. Wildman, Kenneth N. (Nathaniel Hawthorne Coll) **Visual sensitivity at an edge.** *Vision Research*, 1974(Sep), Vol 14(9), 749-755.—In 3 experiments with a total of 3 Ss, the threshold for a small spot of light rose as it approached the edge of an illuminated area and gradually fell in the dark. The threshold rise on the illuminated side of the edge was dependent on the intensity of the illuminated field, absent at low intensity. Short duration flashes of both edge and test spot abolished the threshold elevation on the illuminated side of the edge regardless of field intensity. While the threshold rise may be associated with lateral inhibitory effects, the fall in the dark was due to stray light in the eye. (French, German, & Russian summaries) (16 ref)—*Journal abstract*.

2284. Worrall, Norman & Firth, Diane. (U London, Inst of Education, England) **The components of the standard and reverse Müller-Lyer illusions.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 342-354.—Experimental results show that the major factor in the Müller-Lyer reverse illusion is the apex-in and not the apex-out figure as previously supposed, and that for both standard and reverse figures there is a visual field effect. It is concluded that the Müller-Lyer oblique figures operate as 2 of many possible examples of a single underlying mechanism, and recent arguments that the Müller-Lyer is really 2 separate constituent illusions are not supported. (17 ref)

### Motor Processes & Performance

2285. Boucher, Jean-Louis. (U Ottawa, Ontario, Canada) **Higher processes in motor learning.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 131-137.—Used a linear displacement task to study the effects of verbal activity after knowledge of results (KR) and the time of its introduction in the learning process on the acquisition of a simple discrete motor task. The temporal occurrence of the interpolated act was systematically varied (3 and 10 sec immediately following KR) with 160 male right-handed undergraduate Ss. Reading polysyllables during the post-KR delay interval interfered with the learning process. Interference occurred whether the post-KR delay interval lasted 3 or 10 sec.—*Journal abstract*.

2286. Colegate, Robert L. & Hoffman, James E. (U Illinois) **Monitoring small eye movements with averaged EOG.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 149-151.—Studied the feasibility of measuring small ( $1-1\frac{1}{2}^\circ$  of visual angle) eye movements by small averaged electrooculograms (EOGs). Data from the 2 authors who served as Ss show that the latencies and amplitudes obtained by this procedure are in good agreement with results reported using other methods. The additional finding of different waveforms due to movement and voicing components makes the procedure

useful for studying the role of eye movements in reaction-time investigations of visual selective attention.—*Journal abstract*.

2287. de Lannoy, Jacques D. & Leyn, Guy. (U Louvain, Faculty of Psychology & Sciences of Education, Belgium) **[Body movements and sociometric status in male adolescents.]** (Fren) *Psychologica Belgica*, 1973, Vol 13(3), 239-245.—Recorded spontaneous body movements of 24 male 12-16 yr old adolescents during a 50-min observation period and classified them into 10 categories. Average duration of different types of body movement was related to the sociometric status of each S. The difference between "popular" and "isolated" Ss was significant only for movements involving contact with the S's own body, the amount of such movement being almost 3 times greater for the isolated Ss. Motivational aspects of spontaneous movements are discussed. (English abstract)—S. Slak.

2288. Golin, Sanford. (U Pittsburgh) **Effects of stress on the performance of normally anxious and high-anxious subjects under chance and skill conditions.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 466-472.—Studied whether a belief in personal control over a stressor would improve the performance of high-anxious Ss. Ss were 30 normal-anxious and 30 high-anxious undergraduates, classified according to Taylor Manifest Anxiety scale scores. The 2 groups did not differ on a complex learning task under nonstress conditions. Under a stress-chance condition, in which Ss were told they had no control over a shock stressor, the performance of high-anxious Ss was disrupted while that of the normals was not. In a stress-skill condition, Ss were told that they could control the stressor through their performance. Normals showed a marked improvement in performance in the stress-skill condition, but high-anxious Ss showed no significant improvement. (32 ref)—*Journal abstract*.

2289. Ishikawa, Takado. (Tokyo U of Education, Japan) **[Effect of the redundancy of stimulus events on speed and accuracy of motor response.]** (Jpn) *Japanese Journal of Educational Psychology*, 1973(Jun), Vol 21(2), 90-101.—4 age groups of 20 children and 1 group of 5 college students performed keypressing under 6 different stimulus conditions with high redundancy of approximately 70% in varying orders. In each condition, 300 trials with a 5-sec intertrial interval were given. Reaction time and error frequency were measured. Results indicate that the effect of the 2nd-order redundancy was stronger than that of the 3rd-order redundancy ( $p < .01$ ), that the 2nd-order components were used effectively in the 3rd-order redundancy, but that the 3rd order components were not used effectively under conditions in any order containing low redundancy. (English summary) (19 ref)—S. Choe.

2290. Kelso, J. A. & Stelmach, George E. (U Wisconsin) **Behavioral and neurological parameters of the nerve compression block.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 179-190.—Used the nerve-compression block with 10 male right-handed university students to investigate movement control in the absence of kinesthetic information. Implicit was the assumption that tactile and kinesthetic sensation were eliminated 5-10 min prior to motor function. Motor fibers in the ulnar



and median nerves of the upper preferred limb were tested at systematic intervals throughout the duration of the block application. When kinesthetic cut-off was assigned, Ss performed 3 tapping trials with vision and audition eliminated. Progressive reduction in nerve-conduction parameters (motor nerve conduction velocity and amplitude of the muscle action potential) occurred across and below the block, with significant decrements occurring as early as 15 min. Results indicate that motor impairment was a confounding factor in the use of the nerve block technique. (29 ref)—*Journal abstract*.

2291. Meijers, L. M. & Eijkman, E. G. (U Nijmegen, Lab of Medical Physics & Biophysics, Netherlands) **The motor system in simple reaction time experiments.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 367-377.—Presents evidence that the variability of the motor system does not play an important role in the variability of simple reaction time. A model is proposed for the operation of the motor system in simple reaction-time experiments which consistently links single-cell neuronal activity with electromyographic activity and with response time. (15 ref)

2292. Merchant, John; Morrisette, Richard & Porterfield, James L. (Honeywell Radiation Ctr, Lexington, MA) **Remote measurement of eye direction allowing subject motion over one cubic foot of space.** *IEEE Transactions on Biomedical Engineering*, 1974(Jul), Vol 21(4), 309-317.—Describes the remote oculometer, a new instrument in which the video processing is performed by a minicomputer. This processor provides automatic calibration and linearization to each S and can supply the output eye-direction information in the form of either fixation-point coordinates on any specified fixation plane, azimuth and elevation, or direction cosines.

2293. Pack, D. Michael; Cotten, Doyce J. & Biasiotto, Judson. (Georgia Southern Coll, Marvin Pittman Lab School) **Effect of four fatigue levels on performance and learning of a novel dynamic balance skill.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 191-197.—Investigated the effect of fatigue on the performance and learning of the Bachman ladder task to determine if the relationship between activation and both the performance and learning data would support the inverted-U theory. 48 male college physical education students were randomly assigned to 4 groups. A level of fatigue as determined by heart rate (control, 120, 150, and 180 bpm) was assigned to each group. Each S was fatigued to his assigned level prior to the task and following each trial, was given 20 trials on Day 1 to learn the task while at his designated level, and then was given 20 additional trials on Day 2 under control conditions. On Day 1, 150 and 180 bpm impaired performance of the motor task. The learning score data indicated that 150 and 180 bpm had a detrimental effect on learning of the task. Both the activation-performance and the activation-learning relationships partially support the inverted-U theory. (16 ref)—*Journal abstract*.

2294. Sharp, R. H. & Whiting, H. T. (U Leeds, England) **Exposure and occluded duration effects in a ball-catching skill.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 139-147.—48 male university students attempted single-handed catches of lawn tennis balls delivered

by a mechanical projection machine. The within- and between-S variables in a split-plot factorial design were the period for which the ball was illuminated (VP) and the subsequent period of occlusion (OP). Both variables and their interaction were significant sources of variation. Generally the effect of VP diminished as OP was extended. This result is discussed in terms of (a) information processing time and (b) motion prediction. With respect to the 1st issue, the most important variable was not VP but a composite term  $VP + OP$ . On the 2nd issue, support is provided for an hypothesis to account for prediction error raised in a previous study. (17 ref)—*Journal abstract*.

2295. Sheerer, Nancy & Berger, Richard A. (Temple U) **Effects of various levels of fatigue on reaction time and movement time.** *American Corrective Therapy Journal*, 1972(Sep), Vol 26(5), 146-147.—Studied the effects of 3 different levels of fatigue on reaction time (RT) and movement time (MT). 16 college males were subjected to fatigue by doing a varying number of shoulder flexions. RT and MT were evaluated using the same response. Results show that fatigue had no significant effect on either variable. The techniques of analysis are discussed. It is concluded that the evidence suggests an adverse effect on RT and MT by increasing fatigue.—R. S. Albin.

2296. Shephard, Roy J. (U Toronto, School of Hygiene, Ontario, Canada) **Work physiology and activity patterns of circumpolar Eskimos and Ainu: A synthesis of I.B.P. data.** *Human Biology*, 1974(May), Vol 46(2), 263-294.—The International Biological Programme (IBP) collected data on the working capacity and activity patterns of 3 Eskimo populations and 1 Ainu group. All groups were of short stature, but showed a rapid secular trend towards increase of standing height. In the relatively acculturated Alaskan Eskimos, skinfold readings have apparently increased since 1963; the other groups remain thin, and total body fat is poorly correlated with skinfold readings. Strength of leg muscles and lean body mass were well developed in Igloolik; lean mass was relatively lower at Wainwright, but anaerobic power was still better than in a white population. In 3 of the 4 groups, aerobic power and related measures of work tolerance were much as in the sedentary white population. Figures for the Igloolik population were at least 20% greater, particularly marked in men who adhered to the traditional pattern of nomadic hunting. This is mainly attributed to the bursts of intense work and the high total energy demands of traditional hunting. Previous reports of poor working capacity in hunters may reflect the immediate influence of advanced chest disease. (21 ref)—S. L. Warren.

2297. Thorsheim, Howard I.; Houston, Lanning & Badger, Christopher. (Saint Olaf Coll) **Visual and kinesthetic components of pursuit-tracking performance.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 199-203.—Trained 74 paid undergraduates on a pursuit rotor for 10 trials with ambient illumination from a strobe light flashing at frequencies of either 2, 5, 10, 15, or 20/sec. A transfer trial followed, with a strobe-flashing frequency of 10/sec for all Ss. Results support hypotheses derived from J. A. Adams's (see PA, Vol 48:2177) closed-loop theory of motor learning that (a)

performance would improve during training as a function of amount of visual feedback available and (b) if after training visual feedback was reduced, performance would be maintained to the extent that reliance upon kinesthetic feedback had been learned as an alternate compensatory feedback loop.—*Journal abstract.*

## COGNITIVE PROCESSES AND MOTIVATION

2298. Bear, Gordon. (U Wisconsin, Madison) **Cognition of the relation between an event and a circumstance understood to explain the event.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 491-496.—Proposes a model for the process of explanation, according to which (a) an event to be explained is understood to be a value on a particular dimension of variation, (b) a circumstance believed to explain the event is understood to be a value on another dimension of variation, and (c) the 2 dimensions are understood to be related such that the dimension whose value is to be explained is more likely to take that value when the dimension of circumstance takes its obtaining value than when the dimension of circumstance takes an alternative value. Evidence for the model is reported from a 2-part study in which a total of 65 university students made 2 judgments about a human action—which of 2 statements of circumstance specifying alternative values for a certain dimension was the better explanation for the action, and which of the same 2 statements described the case in which the action, or for certain items the opposite action, was more likely to occur. For each of 5 different actions, the judgments were significantly related as required by the model. (19 ref)—*Journal abstract.*

2299. Blum, Gerald S. & Porter, Marcia L. (U California, Santa Barbara) **Effects of the restriction of conscious awareness in a reaction-time task.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 335-345.—Investigated the ascription of a proper role to consciousness in mental functions in the context of a visual-choice reaction-time task involving the presentation of an irrelevant auditory signal. 3 paid, high-hypnotic undergraduates were programed hypnotically in advance "not to hear" the irrelevant tone on half the trials; 3 paid, nonhypnotic undergraduate controls were given waking instructions to ignore the tone. The posthypnotic "ablation" of conscious awareness of the tone significantly attenuated its influence upon reaction time, whereas the control instruction had no effect. Results are suggestive in their implication of consciousness as a factor in the processing of cognitive events. (German, French, & Spanish summaries)—*Journal abstract.*

2300. Briggs, George E. (New Mexico State U) **On the predictor variable for choice reaction time.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 575-580.—A survey of published research using the S. Sternberg information reduction task (1966, 1969) was made for the period 1966 to early 1973. It is proposed that a majority of the data are better described by a linear equation involving log positive set size than by one involving set size per se as the scale of the predictor variable. (47 ref)

2301. Briggs, George E.; Johnsen, Arthur M. & Shinar, David. (New Mexico State U) **Central processing uncertainty as a determinant of choice reaction time.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 417-425.—Demonstrated in an experiment with 80 paid, right-handed undergraduates that central processing uncertainty ( $H_c$ ) can be derived to provide a single valued statement of the reaction-time (RT) information hypothesis  $RT = a + b(H_c)$  across test-stimulus sets and across several levels of test-stimulus probability in an information reduction task. The derivation procedure assumes successive tests of stimulus hypotheses with Bayesian revision of stimulus probabilities after failure of an initial test. Results show that the procedure could be generalized to data from single test stimuli in an information conservation task. Stimulus and response repetition effects were estimated for the information reduction task data. (17 ref)—*Journal abstract.*

2302. Coltheart, Max & Glick, Marcia J. (U Reading, England) **Visual imagery: A case study.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 438-453.—Describes a female student who, when presented with a word or a sentence, is abnormally proficient at spelling this material in reverse order. It is suggested that her superiority in this and in tachistoscopic performance is achieved principally because her internal visual representations are extremely resistant to disruption by other mental activities.

2303. Eckert, Ed & Kanak, N. Jack. (U Oklahoma) **Verbal discrimination learning: A review of the acquisition, transfer, and retention literature through 1972.** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 582-607.—This review of the literature pertaining to verbal discrimination acquisition, transfer, and retention includes discussions of frequency theory, extensions to the frequency theory, and hypotheses independent of the frequency theory. It is generally concluded that the frequency theory is suitable for the explanation and prediction of data in experiments which require only recognition memory, and that other theoretical accounts or extensions are needed to predict and explain verbal discrimination problems which require processes other than simple recognition memory. (118 ref)—*Journal abstract.*

2304. Forster, Kenneth I. & Olbrei, Ilmar. (Monash U, Clayton, Vic, Australia) **Semantic heuristics and syntactic analysis.** *Cognition*, 1973, Vol 2(3), 319-347.—Conducted 5 experiments with a total of 90 Ss (most of whom were undergraduates) to investigate the hypothesis that the component of sentence processing time directly attributable to syntactic processing depends critically on certain semantic properties of the sentence. Using 2 different procedures, little evidence was found to support this view. Syntactic processing time tended to be constant for sentences of varying semantic plausibility but constant syntactic structure, and reversibility failed to affect sentence processing in a systematic way. Results indicate that the recovery of the underlying structure of a sentence is controlled by purely syntactic properties of the input. (French summary) (20 ref)—*Journal abstract.*

2305. Galin, David & Orstein, Robert. (Langley Porter Neuropsychiatric Inst, San Francisco, CA) **Individual differences in cognitive style: I. Reflective eye move-**



ments. *Neuropsychologia*, 1974(Jul), Vol 12(3), 367-376.

—Studied reflective eye movements in Ss whose vocations emphasize either verbal/analytic or spatial/holistic cognitive modes in 2 experiments. In Exp I, 18 male lawyers and 17 male artists (ceramicists) were asked questions demanding verbal or spatial thought; the 1st eye movement following the question was scored for both vertical and lateral directions. Ss differed only in the vertical direction, with ceramicists showing more "up" movements than lawyers. In Exp II, the effects of question type (verbal or spatial) were studied in the 2 original groups of Ss and in 19 nonspecialized undergraduates. Verbal questions evoked more right and more down movements than spatial questions. (French & German summaries) (18 ref)—*Journal abstract*.

2306. Hock, Howard S.; Gordon, Gregory P. & Whitehurst, Robert. (Florida Atlantic U) **Contextual relations: The influence of familiarity, physical plausibility, and belongingness.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 4-8.—Obtained individual differences in a task requiring the same-different comparison of multiobject scenes. For some of the 32 paid university student Ss, performance depended on whether the objects were in a physically plausible arrangement. It was inferred that these Ss used internalized rule systems to interrelate arrays of objects into organized scenes. For the other Ss, performance depended on whether the objects belonged together, and whether their arrangement was familiar. It was inferred that these Ss dealt with each object on an individual basis, using information concerning belongingness and familiarity of arrangement to anticipate which objects would be present and where they would be located.—*Journal abstract*.

2307. Paivio, Allan & Begg, Ian. (U Western Ontario, London, Canada) **Pictures and words in visual search.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 515-521.—A total of 102 university students in 3 experiments searched through an array of pictures or words for a target item that had been presented as a picture or a word. In Exps I and II, the pictures were line drawings of familiar objects and the words were their printed labels; in Exp III, the stimuli were photographs of the faces of famous people and their corresponding printed names. Search times in Exps I and II were consistently faster when the array items were pictures than when they were words. Search was also faster with pictures than with words as targets when the search array also consisted of pictures. Exp III yielded a completely different pattern of results: Search time with names as targets and faces as search array items was significantly slower than in the other 3 conditions. Results are most consistent with a dual-coding interpretation. That is, items that are cognitively represented both verbally and as nonverbal images can be searched and compared in either mode, depending on the demands of the task. The mode actually used depends on whether the search must be conducted through an array of pictures or words. (19 ref)—*Journal abstract*.

2308. Potts, George R. (Dartmouth Coll) **Incorporating quantitative information into a linear ordering.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 533-538.—Required a total of 236 undergraduates in 3 experiments to learn linear orderings of 4 terms ( $A > B > C > D$ ).

Each pair of terms was described as being either "just barely," "moderately," or "very much" different on some meaningful dimension. 2 distinct strategies for coding this information were observed. Some Ss varied the spacing of the terms along some continuum, while others spaced the terms evenly along a continuum and inserted verbal tags to represent the quantitative information (e.g., A just barely B moderately C very much D). The former strategy was consistently superior. Performance did not vary as a function of the quantitative difference between the terms.—*Journal abstract*.

2309. Ray, Colette. (University Coll, Cardiff, Wales) **The manipulation of color response times in a color-word interference task.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 101-104.—The relationship between word and color response times and color-word interference is of theoretical importance for understanding the interference phenomenon. In this experiment with 16 undergraduate Ss, color response times were manipulated by varying the size of the color-word set, but there was no corresponding change in interference. Since the manipulation of word response times consistently leads to such changes, this result has certain implications which are briefly discussed. (23 ref)—*Journal abstract*.

2310. Stone, George C. & Peeke, Shirley C. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Relative frequency of attribute relevance and response times in visual search.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 453-462.—Conducted 2 experiments, one using a between-Ss and one a within-Ss design, with a total of 36 university students and staff with normal color vision. Results show that response latencies to single attribute probe stimuli were longer when the target stimulus embodied 2 attributes (form and color) rather than a single attribute. The magnitude of this mixed-attribute effect was influenced by the probability of attribute relevance, but the probability effect was mostly due to a repetition effect, such that latencies on trials involving repetitions of the same attribute were shorter than when the relevant attribute was shifted. Implications of these results are drawn for the issues of holistic vs attributized representation of the target stimulus and serial vs parallel search of a set of attributes. Although no class of models can be ruled out on the basis of these experiments, constraints can be imposed on the versions of each that are compatible with the data presented. (24 ref)—*Journal abstract*.

2311. Thomas, Ewart A. (Stanford U) **The selectivity of preparation.** *Psychological Review*, 1974(Sep), Vol 81(5), 442-464.—Examined the extent to which preparatory processes are selective (a) between 2 performance measures, speed and accuracy; (b) within a processing stage (e.g., stimulus encoding and response execution); and (c) among possible stimulus presentation times. Results of 3 experiments with 12 Ss show that the appearance of selectivity between speed and accuracy depended on whether these variables were considered over the possible preparatory states on a given trial, over the trials within an experimental condition, or over different conditions. The relevance of this result to the measurement of processing capacity is discussed. Selectivity within processing stages was demonstrated by

applying a parametric processing model to data from letter-matching tasks in which the identity of the 1st letter was probabilistically related to that of the 2nd letter. In these tasks, reaction time differences between physical and name matches and between *same* and *different* responses depended on the stimulus and response contingencies and on the stimulus presentation times. A method is presented for resolving observed error rates into components that reflect the accuracy of each processing stage. (42 ref)—*Journal abstract*.

2312. Travers, Jeffrey R. (Swarthmore Coll) **Word recognition with forced serial processing: Effects of segment size and temporal order variation.** *Perception & Psychophysics*, 1974(Aug), Vol 16(1), 35-42.—Serial processing was forced by displaying words 1 letter or letter cluster at a time to a total of 20 paid, normally seeing adult volunteers in 2 experiments. Letters or clusters appeared in adjacent spatial positions and in rapid sequence, followed immediately by a mask. Under these conditions, there was a sharp increase in the percentage of words correctly identified as the size of the letter clusters presented in series increased. In a control condition without masking, designed to permit parallel processing across clusters, words were identified near-perfectly regardless of the size of the clusters displayed. Words displayed 1 letter at a time without masking were identified fairly well even when letters were presented in random order. Results are interpreted as evidence that skilled readers tend to process letters within words in parallel.—*Journal abstract*.

2313. Ullrich, James R. & Painter, John R. (U Montana) **A conjoint-measurement analysis of human judgment.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 50-61.—Obtained rank order preferences from 32 undergraduate judges for a set of hypothetical job applicants varying simultaneously on the 3 attribute dimensions of intelligence (IQ), experience (E), and motivation (M). The resulting ordinal matrices were analyzed by polynomial conjoint measurement techniques to determine if the judges were using a specific configural model, the distributive polynomial ( $IQ + E$ )M, or a nonconfigural additive model,  $IQ + E + M$ . It is concluded that few Ss utilized the configural strategy in this task, and that most judgments could be described with an additive model.—*Journal abstract*.

2314. Wannemacher, Jill T. (Bryn Mawr Coll) **Processing strategies in picture-sentence verification tasks.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 554-560.—Investigated the encoding and comparison strategies used by 7 paid undergraduate Os in matching pictures and sentences in each of 2 experiments. The location of the mismatch or difference between a sentence and a picture was varied, and the latencies of same-different responses were compared as a function of whether the mismatch occurred in the sentence subject, verb, or object. Sentences were presented auditorily and varied in both voice and reversibility. Pictures either preceded or were presented simultaneously with the sentences. In all cases, Ss adopted a serial self-terminating comparison strategy and a surface structure encoding strategy. The comparison was terminated as soon as a mismatch was encountered, and actives were processed in the order

subject-verb-object, whereas passives were processed in the order object-verb-subject.—*Journal abstract*.

2315. Wyer, Robert S. (U Illinois) **Some implications of the "Socratic effect" for alternative models of cognitive consistency.** *Journal of Personality*, 1974(Sep), Vol 42(3), 399-419.—Views the Socratic effect, or the tendency for cognitions to increase in consistency once they have been made salient to an S in close temporal proximity, as a criterion for the validity of alternative theoretical formulations of cognitive organization. 3 experiments were performed to test the generality of this effect in a total of 75 paid undergraduate Ss. Beliefs hypothesized to be related in a manner described by 4 different laws of mathematical probability became more consistent over time; these changes were similar in magnitude regardless of the importance of the issue to which the beliefs pertained, and regardless of whether these beliefs were evaluative or nonevaluative. However, consistency as defined by congruity theory, balance theory, and the principles of symbolic psycho-logic did not increase once the cognitions involved were made salient. Implications of these findings for cognitive organization processes are discussed. (34 ref)—*Journal summary*.

### Learning & Thinking & Conditioning

2316. Barclay, J. R. et al. (U Colorado) **Comprehension and semantic flexibility.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 471-481.—4 studies of cued recall using a total of 136 undergraduates as Ss produced evidence that interpretation of familiar, unambiguous words varied with their sentential contexts. Each recall cue mentioned some property of a target word's referent, a property which was not explicitly identified during input. Cues were more effective when the properties were relevant, rather than irrelevant, to the events described by corresponding acquisition sentences. Results raise considerations pertinent to theories of semantic encoding, to semantic theories in linguistics, and to the role of normative data in psycholinguistic theories of comprehension. (31 ref)—*Journal abstract*.

2317. Bracewell, R. J. & Hidi, S. E. (Ontario Inst for Studies in Education, Toronto, Canada) **The solution of an inferential problem as a function of stimulus materials.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 480-488.—Varied the stimulus materials presented in 3 ways to 96 graduate students to assess the effect on performance of problems involving implicational rules. The 3 factors were natural vs arbitrary relationship between the terms of the problem, concrete vs abstract problem material, and order of the presentation of the terms in the rules. The natural relationship condition facilitated performance compared with the arbitrary relationship condition. This difference is explained in terms of differential cognitive load. A significant interaction between materials and order factors is attributed to semantic differences in the rules.—*Journal abstract*.

2318. Branthwaite, Alan. (U Keele, England) **A note comparing three measures of subjective probability, their validity and reliability.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 337-342.—Compared 3 measures of subjective probability—estimates out of 10, confi-



dence ratings, and time to decide—with 12 male undergraduates as Ss. The validity and reliability of these measures were also investigated. Estimates out of 10 and confidence ratings were found to be closely similar measures, but the results from decision times were not so closely comparable. However, the results might offer sufficient support for the use of decision time when there are strong advantages for a scale which does not require Ss' active participation and deliberation.—*Journal abstract.*

2319. Brehmer, Berndt. (U Umea, Sweden) **Effects of cue validity and task predictability on interpersonal learning of linear inference tasks.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 17-29.—Conducted an experiment where 32 pairs of undergraduate Ss learned 2-cue linear inference tasks from each other and from the feedback from the task. Results show that (a) Ss did not develop optimal inference policies, (b) the degree of optimality was inversely related to task predictability, and (c) Ss' performance in tasks which required them to use only 1 cue did not exceed that in tasks which required them to use 2 cues. The latter result is interpreted in terms of the Ss' tendency to develop policies in interpersonal learning that served both to increase achievement and to decrease the differences between the judgments made by the Ss in the pair. (20 ref)—*Journal abstract.*

2320. Bujak, Franciszek. [Subjective evaluation of probability of events by school children.] (Polh) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 143-150.—Asked primary school children to show the arrangement of various events of a 2-colored disk with different proportions of green and blue fields. The test revealed 3 stages in the development of appreciating the probability of perceptively legible events: deterministic-mechanistic, purely deterministic, and indeterministic. Results are discussed in terms of the principle of cognitive conservatism.—*English summary.*

2321. Chlewiński, Zdzisław. [Three models of concept identification.] (Polh) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 85-100.—Presents basic information regarding the 3 most recent mathematical models of concept identification: (a) the model of conditioning and adaptation developed by L. E. Bourne and F. Restle, (b) the model of selection and strategy by F. Restle, and (c) the model of selecting hypotheses and conditioning by G. H. Bower and T. Trabasso. (19 ref)

2322. Coleman, Edmund B. & Miller, Gerald R. (U Texas, El Paso) **The simplest experimental design that permits multiple generalization.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 31-40.—Several methodological critiques have pointed out that most experiments in verbal learning fail to present statistical evidence that their results could be replicated using a different sample of language materials. Consequently, many of the studies have little scientific point because their conclusions have to be restricted to the specific language items used in the experiment. All these critiques are summarized, the various solutions to the problem are evaluated, and procedures to arrive at the simplest solution are described. This solution should present no difficulties to anyone who has had a course in analysis of variance. (17 ref)—*Journal abstract.*

2323. de Jorio, Lucio & Rossi, Serena. (U Urbino, Inst of Psychology, Italy) **Effects of frequency and the schedule of reinforcement on measures of learning.** [Ital] *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 107-118.—Randomly assigned 41 male and 49 female high school students 13-15 yrs old to 5 experimental groups, homogeneous as to intelligence and personality. Ss were given a task requiring the evaluation of plane geometric figures. It was hypothesized, on the basis of Skinner's theory, that the capacity to give correct judgments depends on the frequency and the schedule of reinforcement. The 5 experimental groups received reinforcement on 100% of the occasions, on 50% and 25% of the occasions in a regularly alternating pattern, on 25% of the occasions randomly selected or not at all (control group). Results show that, as previously reported in the literature, reinforcement is more effective when it is less frequent and more irregular, since it is thus less predictable by the Ss. (20 ref)—*English summary.*

2324. Duncan, Carl P. (Northwestern U) **Word frequency in problem solving.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 93-94.—In a modification of an earlier study by N. H. Jurca and C. P. Duncan (see PA, Vol 43:12160), 60 Ss were presented with problems consisting of 5 words varying in printed language frequency. In different groups, Ss tried to guess the word at a particular frequency level in each problem. The words used within a problem were structurally more similar to each other than had been the case in the previous study. The result was that the word-frequency dimension emerged even more clearly as a habit strength variable in problem-solving.—*Journal abstract.*

2325. Einhorn, Hillel J. (U Chicago, Graduate School of Business) **Cue definition and residual judgment.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 30-49.—Examines the problem in naturalistic studies of whether the residual portion of judgment has functional value (i.e., whether it adds to the clinician's predictive efficiency). Cue definition is shown to be related to the "bootstrapping" phenomenon, and conditions are delineated where bootstrapping will work. The issue depends on the correlation of the residual and the criterion. Furthermore, psychological achievement is a weighted sum of the modeled and residual parts of judgment where the weight parameters are interpreted as environmental complexity. The present 2 naturalistic studies with 29 clinicians and 3 pathologists, respectively, as Ss investigated the residual contribution to achievement. Results show that the residual entered into achievement most prominently in situations where the model of man was poor. For certain cases the residual correlated higher with the criterion than either the model of the man or the global judgment. (28 ref)—*Journal abstract.*

2326. Ellis, Henry C. & Shaffer, Ronald W. (U New Mexico) **Stimulus encoding and the transfer of stimulus differentiation.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 393-400.—3 experiments with a total of 128 Ss investigated the transfer of stimulus differentiation in an A-B, A-D paradigm using trigram, random shape, and letter-matrix stimuli, respectively. Consistent with previous findings, no transfer of differentiation in the form of a paradigm by stimulus

similarity interaction was obtained with trigram stimuli. In contrast, transfer of differentiation was obtained in accord with the classic hypothesis using shapes and letter matrices. The transfer results are interpreted in terms of an encoding stability hypothesis. (18 ref)—*Journal abstract*.

2327. Gilhooly, K. J. & Falconer, W. A. (U Aberdeen, Scotland) **Concrete and abstract terms and relations in testing a rule.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 355-359.—Tested each of 200 undergraduates in 4 experimental groups. Ss had more difficulty in correctly testing a conditional rule stated in abstract form than the same rule given in "thematic" form. The thematic form of the rule involved both concrete terms and a concrete relation. 4 conditions were formed by combining concrete and abstract terms and relations. Results indicate that concreteness of the terms was the main factor leading to improved performance with thematic, as compared with abstract, material in the rule testing task.—*Journal abstract*.

2328. Ingison, Linda J. (U Wisconsin, Madison) **Effects of attribute identification training on rule effects in an attribute identification transfer task.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 133-134.—Tested the hypothesis that attribute identification (AI) pretraining would reduce or eliminate rule effects in AI tasks. 36 12th graders were given 0, 4, or 8 AI problems based on the same rule prior to transfer to a final AI problem. Results indicate that familiarity with AI problems was not a key factor in eliminating rule effects in transfer. Implications for a 2-component model of concept learning are discussed.—*Journal abstract*.

2329. Janssen, Wiel H. & Nodine, Calvin F. (Inst for Perception TNO, Soesterberg, Netherlands) **Eye movements and visual imagery in free recall.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 267-276.—Notes that the relationship between eye movements and visual imagery has almost exclusively been studied by treating eye movements as the dependent variable while an imagery task is being performed. In the present experiment with 18 college students, 3 within-S eye-movement treatment conditions were manipulated as the independent variable to study their effects on the free recall of nouns which Ss had to store by means of imagery. The imagery-evoking capacity (I) of nouns was varied over 3 levels within lists of Dutch nouns (low, medium, and high I). Ss were instructed to generate a visual image to each separate noun under each of the following treatment conditions: (a) while they looked over and scanned their image as if they were looking at the real object, (b) while they received concurrent visual stimulation from a checkerboard pattern, and (c) while they fixated on a target. Reliable, but minor effects of treatment conditions on the recall scores were found. Results are discussed in the terms of possible theories about the nature of the relationship between eye movements and visual imagery. (16 ref)—*Journal abstract*.

2330. Kajita, Masami. [Experimental study on the mediational processes in discrimination shift learning: An alternative view.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 137-146.—Tested an alternative model of mediation and its relevant stimulus dimension which is based on set theory, as

contrasted with T. S. Kendler and H. H. Kendler's (1959) emphasis on the verbal mediational process. 30 college students learned pairs of Japanese nonsense bigrams and single-digit numbers. Ss were assigned to 3 groups which were exposed to 3 different learning conditions: reversal shift, nonreversal shift, and the control task. After completion of the learning tasks, E questioned Ss as to what learning strategies they used. Results indicate that the model, which involves unrelated stimuli and logical mediation, can also be applied to rapid reversal shift. (English summary) (22 ref)—s. Choe.

2331. Kauffman, Dan; Johnson, Mike & Knight, Gene. (Arizona State U) **The empirical derivation of equations for predicting subjective textual information.** *US AFHRL Technical Report*, 1974(Jul), No 74-55, 38 p.—Derives an equation for predicting the subjective textual information contained in a text of material written in the English language. Specifically, this investigation describes, by a mathematical equation, the relationship between the subjective information content of written textual material and the relative number of errors committed by a learner when asked to predict, letter by letter, the content of given textual material. This relationship shows that the subjective information of a given text for a specific learner is directly proportional to the number of wrongly guessed signs made by that learner. The application of C. Shannon's guessing procedure (1951) in this study permits the measurement of the subjective information of a given text for a specific learner. The derived equation permits the measurement of information in terms of a value that is dependent not only upon the inherent qualities of the subject matter, but also upon the internal state of the learner. (16 ref)—*Journal abstract*.

2332. Klemp, George O. (Yale U) **The influence of selected verb characteristics on the acceptance of generic assertions.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 355-364.—R. P. Abelson and his associates (1965, 1966) have shown that the tendency of people to agree with generalizations is dependent upon the verbs employed rather than the subjects or objects of assertions. The present 2 experiments investigated the effects on generalization power (probability of generic agreement) of a total of 77 undergraduates of selected inherent and transfer features of 32 subjective-state verbs. Generic assertions, based on inductive and deductive evidence providing varying degrees of support, were presented to Ss for their acceptance or rejection. Results show that generalization power was influenced primarily by inherent verb characteristics. The notion that transfer features depend on assertion-related evidence for their effect was substantiated, while an implicit-quantifier interpretation of the findings was rejected. (19 ref)—*Journal abstract*.

2333. Kobayashi, Eva L. & Cantor, Joan H. (U Iowa, Inst of Child Behavior & Development) **The effects of dimensional naming upon children's performance in a modified optional shift problem.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 401-405.—Administered shift and test tasks concurrently to 120 2nd graders. Those Ss required, during shift learning, to verbalize the values of the previously relevant dimension showed an increase in reversal responding in the test task, whereas those



required to verbalize the values of the previously irrelevant dimension showed an increase in nonreversal responding. Results are in good agreement with predictions made from an extension of Hull-Spence discrimination learning theory. (15 ref)—*Journal abstract*.

2334. Koenig, Karl P. & Henriksen, Kermit. (U New Mexico) **Cognitive manipulation of GSR extinction: Analogues for conditioning therapies.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Data from 70 undergraduates show that (a) conditioned galvanic skin responses (GSRs) extinguished rapidly when Ss were informed that the unconditioned stimulus would not be administered again and (b) high false feedback about S's responsivity to the conditioned stimulus during extinction maintained a higher level of GSR activity than did low false feedback. (17 ref)

2335. Kramar, M. [Aspects of critical thinking in pupils of grades I-IV.] (Romn) *Studia Universitatis Babes-Bolyai*, 1972, Vol 17, 63-70.—Studied children's critical thinking as applied to solving arithmetical problems. Ss were given problems with incomplete data, problems without a stated requirement, and problems containing redundant data. Critical thinking was shown most often by calling attention to the presence of redundant data, less often by noticing the lack of sufficient data. Noncritical thinking was most often observed as lack of awareness of redundant or incomplete data. (Russian & English summaries)—R. A. Meyer.

2336. Kuhara, Keiko. [Equivalence in verbatim memory: II. Learning of German words using English words as standard.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 155-161.—4 groups of 60 college Ss who were familiar with English but had no previous knowledge of German were exposed for 3 10-sec periods to lists of Japanese-German word pairs, and tested afterward. Rules of consonant correspondence between English and German were given to the 1st 3 groups at different times between or after the 1st and 3rd presentation; the 4th group did not receive rules. Results of a retest indicate that rules given immediately before testing increased memory; however, instruction between the learning exposures facilitated the transfer effect on learning new words. (English summary)—S. Choe.

2337. Legrenzi, Paolo. (Higher Inst of Social Science, Lab of Psychology, Trento, Italy) [Recent research on the psychology of deductive reasoning.] (Ital) *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 67-106.—Reviews findings on deductive reasoning arising from the experimental situation, "if . . . then" (e.g., "if p is on one side then q is on the other"; "if p, then no q"; "if no p, then . . ."; etc). 2 schematic models represent (a) J. Piaget's sequential strategies for deductive reasoning and (b) the strategies of "natural thought" (problem solving) developed by P. N. Johnson-Laird and P. C. Wason. It is suggested that the 2 models may be complementary, the former describing thought processes in concrete, familiar circumstances and the latter, thought processes in abstract, unfamiliar material. (79 ref)—J. W. Black.

2338. Levin, Irwin P. (U Iowa) **Averaging processes and intuitive statistical judgments.** *Organizational Be-*

*havior & Human Performance*, 1974(Aug), Vol 12(1), 83-91.—Required undergraduates to make numerical judgments based on a brief inspection of a pair of samples of IQ scores. In Exp I each sample within a pair contained 20 scores, and the values of the 2 sample means were varied factorially. Each of 25 Ss was to infer the mean IQ of the school from which the samples were taken. In Exp II sample size was varied within a pair of samples. In 1 group each of 25 Ss was to infer the mean IQ of the entire school. In another group, 25 Ss judged the mean IQ if the 2 samples were combined into a single sample. The data of Exp I were in agreement with a model that assumes that the judgment of population mean is a simple average of the subjective values of the sample means. The data of Exp II could be described by a weighted average model where sample means are differentially weighted as a direct function of sample size.—*Journal abstract*.

2339. Levin, Joel R. & Divine-Hawkins, Patricia. (U Wisconsin, Madison) **Visual imagery as a prose-learning process.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 23-30.—Examined the effects of visual imagery on recall of short passages. 48 4th graders served as Ss in Exp I and 112 5th graders in Exp II. Experimental conditions were (a) reading or listening to a passage and (b) receiving or not receiving instructions for imagery. Except for differences in rate of presentation, procedures were the same in both experiments. Results indicate that the effect of imagery instruction in recall was statistically greater under listening than under reading conditions. Several interpretations of the findings are presented. (16 ref)—W. L. Chovan.

2340. London, Perry; Cooper, Leslie M. & Engstrom, David R. (U Southern California) **Increasing hypnotic susceptibility by brain wave feedback.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 554-560.—Presents a reanalysis of earlier studies by D. R. Engstrom et al (1970) as well as additional findings which show that successful training to increase alpha rhythm duration raises people's hypnotic susceptibility. Ss in the previous studies were 30 volunteers who had low to moderate hypnotic susceptibility and low alpha production. It was found, subsequent to publication, that some Ss had had previous exposure to alpha training. When they were eliminated in reanalysis, the previous findings were still confirmed; alpha training was more effective for experimental than for control Ss, and hypnotic susceptibility accordingly increased more among experimentals than among controls. In addition, base-rate alpha production in each training session was correlated with feedback alpha output among experimental Ss but not among controls. (24 ref)—*Journal abstract*.

2341. Manning, Susan K. & Clark, Elisabeth O. (Hunter Coll, City U New York) **Response effects of equated values of event frequency, repetition, and alternation in one- and two-cue probability learning.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 417-424.—An experiment using 50 college students equated cue values of frequency, repetition, and alternation in 1- and 2-cue partially random sequences in order to determine whether the cues were responded to independently or in combination and to test earlier

results concerning cue saliency. Using improved methods of data analysis, previous findings that repetition is more salient than frequency and frequency more salient than alternation were replicated. In spite of the saliency differences, the design employed demonstrated that both cues in 2-cue sequences were responded to and that responses to 1-cue appeared to be independent of responses to the other.—*Journal abstract.*

2342. Matsuda, Michihiko & Matsuda, Fumiko. [The effects of verbal reinforcement combinations on three-alternative discrimination learning and extinction in infants and the analysis of error factors.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 147-154.—60 kindergartners responded to 3-alternative learning tasks in which color, shape, and position were randomly combined. E gave 3 different verbal reinforcement combinations: right-wrong, right-silence(wrong), and silence(right)-wrong. Results indicate that the right-wrong combination was the most effective, and that alternation with respect to position was the strongest error factor. (English summary)—S. Choe.

2343. Mazzocco, Alberto. (Higher Inst of Social Science, Lab of Psychology, Trento, Italy) [Two experiments on deductive reasoning: The problem of the converse.] (Ital) *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 47-65.—Tested the ability of university students to distinguish between a positive statement and its converse. 50 different Ss participated in each experiment, 25 following the positive statement (controls), and 25 the experimental. No student had studied logical calculus. Each experiment contained 3 phases: (a) both red boxes contained marbles (no white box); (b) 1 red box contained a marble (no white box); (c) 1 white box contained a marble. The statement was: "All the red boxes contain marbles." The required reasoning was "all a's are b's" and the converse. The task was "true or false." Ss were shown guiding situations and asked to apply the reasoning. Exp II was similar but used 4 cards, 2 of each central figure and 2 of each border. The instructions called for the reasoning "if p, then q" and the converse. The converse of the statements were the more difficult for the students when responding to the same instructions that accompanied the affirmative statements. Exp II was more difficult than Exp I. (26 ref)—J. W. Black.

2344. McConkie, George W. & Rayner, Keith. (Cornell U) *Investigation of reading strategies: I. Manipulating strategies through payoff conditions.* *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 9-18.—Studied the effects of reading strategies and payoff conditions or reward systems on reading rate and retention. 70 undergraduates served as Ss. Passages extracted from *Scientific American* were used to test performance under 4 conditions: (a) information about payoff, (b) type of payoff, (c) specificity of instructions, and (d) presence or absence of test questions. Results indicate that the conditions primarily affected reading rates. Applications of payoff conditions for future study of reading strategies are presented.—W. L. Chovan.

2345. Mendelsohn, Gerald A. & O'Brien, Anne T. (U California, Inst of Personality Assessment & Research, Berkeley) *The solution of anagrams: A reexamination of*

*the effects of transition letter probabilities, letter moves, and word frequency on anagram difficulty.* *Memory & Cognition*, 1974(Jul), Vol 2(3), 566-574.—Related word frequency (WR), number of letter moves, and solution word transition letter probabilities (TP) to anagram solution by 60 undergraduate Ss. The solution word TP measure was based on the relative frequencies of correct to incorrect bigrams within the pool of bigrams defined by the letters of the anagram rather than on the absolute frequencies of the correct bigrams. This bigram rank measure, which also took word length and letter position into account, was a powerful predictor of anagram difficulty ( $p < .001$ ). Number of letter moves predicted anagram solution strongly ( $p < .001$ ), but WF was only a marginal predictor ( $.05 < p < .10$ ). There were no significant interactions among the 3 variables, nor was anagram TP consistently related to anagram difficulty. Results are interpreted in terms of an approach which combined elements of an hypothesis and a stimulus-response mediational theory. (24 ref)—*Journal abstract.*

2346. Meyers, Lawrence S.; Gilman, Dennis & Halpern, Joseph. (California State U, Sacramento) *Small-trials partial reinforcement effects in humans: The role of sequential variables.* *American Journal of Psychology*, 1973(Dec), Vol 86(4), 729-737. Conducted 2 experiments with a total of 104 undergraduates. The acquisition sequences in Exp I combined light-off (-) trials with either 46 or 71% light-on (+) trials; those in Exp II had either 2 or 4 - transitions, or run lengths of the - event of 1, 2, or 3. Extinction, administered after very limited acquisition training, consisted of only trials. It was found that resistance to extinction increased as a direct function of the number of + transitions and the length of the run of - trials.—*Journal abstract.*

2347. Moffat, Gene H. & McGown, William. (U Southern Mississippi) *Effect of three extinction procedures following avoidance conditioning in preschool children.* *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 116-118.—Following acquisition of an instrumental avoidance response, 36 preschool children were given 200 extinction trials. Omission of children's songs served as the aversive event. 3 extinction procedures were established: (a) a conditioned stimulus (CS) only procedure in which the music was never omitted, (b) a punishment procedure in which music omission was response contingent, and (c) a procedure whereby music omission was unavoidable and inescapable. Results are dependent upon the extinction procedures being compared; however, the CS-only procedure was most resistant to extinction.—*Journal abstract.*

2348. Mueller, John H.; Kanak, N. Jack & Flanagan, John L. (U Missouri, Columbia) *The strength of implicit associative responses in verbal-discrimination learning.* *American Journal of Psychology*, 1973(Dec), Vol 86(4), 777-784.—Manipulated the strength of implicit associative responses in the right and wrong terms of verbal-discrimination lists given to 48 undergraduates. The frequency-theory predictions for these manipulations were not supported, despite the presence of false recognitions in a subsequent recognition test. In view of these and earlier equivocal results, it is suggested that implicit associative responses contribute to situational



experience less than other frequency units.—*Journal abstract.*

2349. Ney, Richard C. & Solso, Robert L. (Loyola U, Chicago) **Associative symmetry as measured in the B-Ar paradigm: A stage analysis.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 139-140.—Studied the principle of associative symmetry by using the indirect measure of the B-Ar transfer paradigm. 60 undergraduates were randomly assigned to 3 paradigmatic conditions (C-D, A-Br, or B-Ar). Results indicate that bidirectional learning may be asymmetrical when the learning is viewed in stages.

2350. Oleron, G. & Nosjean, M. (École Pratique des Hautes Études, Lab of Experimental Psychology, Paris, France) **[Effect of vocalization on mnemonic encoding.]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 11-21.—Studied the processes of encoding vocal elements (vowels and consonants) into more complex units (words) when the rules of transformation are known by the S. The hypotheses were that (a) the vocal articulation of each element interferes with the central processes of control and thus delays production of the complex unit, and (b) delays will be longer for more complex coding rules. The 3 coding rules were (a) to maintain the order of presentation (simple rule), (b) to exchange the 1st with the 2nd vowel, and (c) to exchange the 1st with the 2nd consonant (complex rules). Ss were 12 male and female students. Each was presented with all the tasks in a counterbalanced order. Results did not support the hypotheses. Under simple coding rules, it was the order of the tasks which had a significant effect: the 1st tasks given to S (to vocalize or not to vocalize) produced the shortest reaction times. Under complex coding rules, vocalization produced significantly better results than the lack of it, but only when the 1st task was to vocalize.—A. Blasi.

2351. Olson, James N. & MacKay, Donald G. (U Texas Permian Basin, Odessa) **Completion and verification of ambiguous sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 457-470.—Cites alternative models which have been offered to explain the mechanisms underlying the processing of ambiguous sentences. One model contends that the meanings of an ambiguity are processed one at a time, without interaction between them. A rival model contends that to some extent both meanings of an ambiguity can be processed simultaneously, competing with one another until one is perceived. The present 2 experiments with a total of 69 university students tested these theories by systematically varying the probability that a given meaning of an ambiguous sentence will be perceived, and measuring the time to complete or verify the sentences. Results question the adequacy of the noninteraction model and suggest that parallel processing and reciprocal interactions at the semantic feature level are important psychological processes underlying the comprehension of ambiguous sentences.—*Journal abstract.*

2352. Osborne, Bruce; Roach, Tom; Gendreau, Lorna & Gendreau, Paul. (Trent U, Peterborough, Ontario, Canada) **An electrode hookup for eyelid conditioning.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 416-418.

2353. Payne, R. B. & Richardson, E. T. (U Georgia) **Control of supplementary feedback cue properties by differentiation and extinction procedures.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 100-102.—Previous studies have suggested that classically pre-differentiated supplementary feedback cues promote psychomotor learning through the operation of conditional properties. The present study with 88 right-handed female undergraduates examined whether such effects could be nullified by conventional extinction procedures. After preliminary tracking practice under common conditions, Ss were assigned in equal numbers to the following conditions: (a) aversive differentiation of to-become supplementary error (positive conditioned stimulus—CS+ and targeting (CS-) cues, (b) differentiation followed immediately by extinction trials, (c) CS-only controls, and (d) neutral controls. Subsequently, all groups tracked under common conditions of cue availability and withdrawal. Once again, predifferentiation transformed otherwise ineffective cues into significant learning supports. Contrary to expectation, however, extinction trials failed to nullify their effects on performance. This failure was rationalized in terms of the known resistance of aversive conditioned responses to extinction and/or possible reconditioning of the cues during the tracking trials.—*Journal abstract.*

2354. Peters, Joan T.; Hammond, Kenneth R. & Summers, David A. (U Colorado) **A note on intuitive vs analytic thinking.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 125-131.—Investigated E. Brunswik's 1956 propositions concerning intuitive vs analytic thinking by assessing performance of 45 young adult Ss in a 3-cue inference task presented in 1 of 3 ways. In Condition 1, cues were presented only as points on a blank, 2-dimensional field, thus encouraging an intuitive, or perceptual, mode of thinking. In Condition 2, Ss were given only the numerical equivalents of the 3 cues. In Condition 3, the cues were presented both perceptually and numerically. The resulting error distributions are consistent with Brunswik's theoretical propositions.—*Journal abstract.*

2355. Peterson, Christopher & Rubel, Carol. (U Colorado) **Associability and anagram solution.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 83-84.—10 undergraduates solved 11 word anagrams that had been scaled for associability. Partialling out the effect of solution associability, solution time and anagram associability were negatively correlated. Partialling out the effect of anagram associability, solution time and solution associability were positively correlated. These results were replicated in a 2nd experiment in which 10 additional undergraduates solved the 11 word anagrams in the opposite direction. It is concluded that associability mediates the ease with which a solver breaks down a given anagram and conversely, the difficulty with which a solver finds a given solution. (15 ref)—*Journal abstract.*

2356. Richardson, Jack. (State U New York, Binghamton) **Stimulus selection and the number of stimulus components.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 463-466.—Conducted 2 experiments with a total of 264 college students in which the number of word components in the compound stimuli of paired-associate lists were varied, and the words within a compound were

presented either in a constant or in a variable order from trial to trial. The number of components, above one, had no appreciable effect on the difficulty of learning, and the variable-order lists were more difficult than the constant-order. Recall with the word components as cues showed that the amount of selection decreased with the variable-order lists as the number of components increased. With the constant-order lists, selection tended to remain constant as number of components increased. This is interpreted as the result of the availability of a rule for selection in the constant order conditions. —*Journal abstract.*

2357. Rothkopf, Ernst Z. (Bell Lab, Murray Hill, NJ) **Barbarism and mathemagenic activities: Comments on criticism by Carver.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 3-8.—Analyzes and rejects Carver's recent objections to the concept of mathemagenic activities. Flaws in Carver's arguments, both logical and empirical, are pointed out. Comments are focused on Carver's remarks about the relationship between mathemagenic activities and reading time, his concept of current theoretical possibilities, and his esthetic of language. (20 ref)—*Journal abstract.*

2358. Rychlak, Joseph F.; Carlsen, Nancy L. & Dunning, Larry P. (Purdue U) **Personal adjustment and the free recall of materials with affectively positive or negative meaningfulness.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 480-487.—Conducted 2 experiments on the role of affective assessment in human verbal learning. In Exp I, 40 high school students grouped according to Tennessee Self-Concept Scale scores were given consonant-vowel-consonant trigrams as learnable items. Ss with high self-concepts learned the trigrams they liked more rapidly than disliked trigrams. Ss with low self-concepts reversed this customary pattern and learned disliked trigrams more rapidly than liked trigrams. In Exp II, 64 undergraduates who had completed the Barron Ego-Strength scale were given real words as learnable materials. Results showed that it was possible for the same S to learn certain words along a negative and other words along a positive reinforcement-value sequence. This depended upon whether the word meanings involved reflected a problem area or an area of competence for the Ss being studied. (34 ref)—*Journal abstract.*

2359. Salatas, Harriet & Bourne, L. E. (U Colorado) **Learning conceptual rules: III. Processes contributing to rule difficulty.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 549-553.—Compared 8 unique bidimensional conceptual rule forms in a rule-learning paradigm. Ss were 96 college students. It was predicted that rule difficulty order and error distributions across stimulus class defined by a truth table would be a function of Ss' preexperimental experience predominantly with conjunctive concepts. The hypothesis stated specifically that loci of difficulty with rules derive from (a) assignment of TT of stimuli (those with both relevant attributes) to the negative category, (b) assignment of FF stimuli (those with neither relevant attribute) to the positive category, and (c) assignment of TT and FF stimuli to the same category. The main effects of rule and truth table class were and the interaction of rule and truth table class were statistically significant. Results confirm all predictions

about rule order and error distributions.—*Journal abstract.*

2360. Sanford, A. J. & Seymour, P. H. (U Dundee, Scotland) **The influence of response compatibility on a semantic classification task.** *Acta Psychologica*, 1974(Oct), Vol 38(5), 405-412.—56 students had to decide whether or not a target word was a member of a prespecified semantic category. Poorly representative, or low conjoint frequency (LCF), exemplars were accepted less rapidly than representative, or high conjoint frequency (HCF), exemplars. This effect was considerably enhanced by requiring an incompatible response in which the Ss were asked to say "No" when the target was a member of the category. Results show that the category membership judgment is a natural affirmative, and that the semantic distance effect of conjoint frequency has a magnitude dependent upon the processing demands of the task in which it is measured. Results are discussed in relation to theories of the mechanisms of category membership judgments. It is suggested that the influence of compatibility may be in load-sharing between activation of a response rule and the judgment task per se. (17 ref)—*Journal abstract.*

2361. Smith, Donald B. & Noland, J. Dennis. (Ohio State U) **Reversal and extradimensional shifts with continuous and discontinuous stimulus dimensions.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 757-768.—32 junior high and 32 college students learned discriminations based on continuous (weight-length) or discontinuous (color-form) dimensions; they then learned reversal and intradimensional and/or extradimensional shifts in an experimentally varied order. Both reversal and intradimensional shifts were learned more readily than extradimensional ones, and junior-high students required more training than college students. Neither order of shift, type of stimulus, nor any interactions were significant. (21 ref)—*Journal abstract.*

2362. Steinmann, Derick O. (U Colorado, Inst of Behavioral Science) **Transfer of lens model training.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 1-16.—Assessed the effects of training on the ability to learn probabilistic cue-criterion relationships as a function of differential feedback and previous tasks. 4 paid female undergraduates received outcome feedback (the correct answer), 4 others received feedforward (statistical information about the task), and 8 more received lens model feedback (statistical information about the task and statistical information about performance). Compared with outcome feedback, both feedforward and lens model feedback led to increases in the consistency and knowledge components of accuracy. There was no systematic effect of the 8 different tasks on increased effectiveness of feedforward or lens model feedback. Judges who received lens model feedback subsequently used outcome feedback more effectively. The effects of previous tasks on accuracy were due to increases in consistency, and not knowledge. (20 ref)—*Journal abstract.*

2363. Vezin, Liliane & Radiguet, Chantal. (U Paris VIII, France) **[Effect of concrete examples on the assimilation of scientific knowledge.]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 61-70.—Investigated the role of differently structured examples in the learning



of abstract concepts. 2 types of examples were considered: homologous examples, illustrating only the fundamental properties of a definition; and examples transformed by extension, i.e., containing details which were unrelated to the essence of a concept. Dependent variables were the ability to apply the concept to a similar context and the ability to transfer it to a different context. 48 boys about 12 yrs old were divided into 3 groups and were taught Archimedes' law under 3 experimental conditions: without examples (Group 1), with homologous examples (Group 2), or with extended examples (Group 3). Application of the learning (to a liquid context) and transfer of learning (to a gas context) were tested. Results show that the performance of both experimental groups was significantly superior to that of Group 1, the controls ( $p < .001$ ). Group 3 was superior to Group 2 in the application task ( $p < .001$ ), but inferior in the transfer task ( $p < .01$ ).—A. Blasi.

2364. White, Richard T. (Monash U, Clayton, Vic, Australia) **The validation of a learning hierarchy.** *American Educational Research Journal*, 1974(Spr), Vol 11(2), 121-136.—Describes 9 stages in the validation of a learning hierarchy. The stages, an amendment to previous methods of validation, lead to strong evidence in support of F. Gagné's postulate that generalized intellectual skills are learned hierarchically while specific individual facts, termed verbalized knowledge, are not. (20 ref)

2365. Williams, Richard L. & Moffat, Gene H. (U Southern Mississippi) **Escapable/inescapable pretraining and subsequent avoidance performance in human subjects.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 144-146.—Tested 72 undergraduates in an escape/avoidance task in which omission of entertaining material served as the aversive stimulus event. Prior to these trials, Ss received 0, 15, or 30 escapable trials and either 0 or 100 inescapable trials with the same aversive stimulus. Results indicate that inescapable trials interfered with performance on the escape/avoidance task and that escapable trials negated the interference effect. The pretraining conditions more directly affected escape rather than avoidance performance.—*Journal abstract*.

2366. Wilson, Robert A.; Fuhrer, Marcus J. & Baer, Paul E. (Midwestern U) **Differential conditioning of electrodermal responses: Effects of performing a masking task during the interstimulus and intertrial intervals.** *Biological Psychology*, 1974, Vol 2(1), 33-46.—Assessed differential conditioning of electrodermal responses (EDRs) in 3 groups of male university students ( $n = 29$ ) which were assigned a probability learning procedure as a masking task. One group performed the task during the interstimulus interval, another during the intertrial interval, and a 3rd during both intervals. A 4th group of 15 Ss did not perform the masking task. Consistent with M. J. Fuhrer and P. E. Baer's findings (see PA, Vol 43:15172), inaccurate verbalizers in the group which performed the masking task during the interstimulus interval exhibited reliable differential conditioning of 1st-interval EDRs during the late acquisition trials. Substantial conditioning effects were observed in all groups of accurate verbalizers. Results confirm that differential EDR conditioning can occur without awareness of the stimulus relations, but only

when relatively restricted masking operations are used.—*Journal abstract*.

### Attention & Memory

2367. Anderson, John R. & Bower, Gordon H. (Human Performance Ctr, Ann Arbor, MI) **Interference in memory for multiple contexts.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 509-514. Remembering that an item occurred in several different lists is formulated here in terms of retrieval of corresponding list tags associated to the item. Therefore, associative interference should operate upon remembering the several list contexts in which an item appeared. In 2 experiments a total of 74 paid university students studied 4 (or 5) overlapping lists of 16 words with a given word exemplifying one of the 16 (or 32) possible sequences of appearances and nonappearances over the 4 (or 5) lists. Later, Ss rated from memory for each word and for each list whether that word had occurred in that list. Indices of discriminative memory revealed strong proactive interference and weaker retroactive interference. Discriminative memory that an item occurred in a given list was poorer the more prior or more subsequent the lists in which that item had also occurred. Thus, list differentiation appears explicable in terms of item-specific associative interference.—*Journal abstract*.

2368. Anderson, John R. & Bower, Gordon H. (U Michigan) **A propositional theory of recognition memory.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 406-412.—Modifies J. R. Anderson and G. H. Bower's (see PA, Vol 49:10383) theory of recognition memory for words. A propositional representation is outlined for the contextual information underlying word recognition. Logical arguments are offered for preferring this representation over the undifferentiated associative representation used earlier. The propositional representation is used to interpret effects of verbal context upon recognition memory. Implications of these context effects are considered for 2-process models of recall and recognition. (21 ref)—*Journal abstract*.

2369. Anderson, Richard C. (U Illinois, Training Research Lab) **Substance recall of sentences.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 530-541.—73 high school girls who received either imagery or repetition instructions attempted to recall a once-exposed series of 16 sentences shortly after exposure or 1 day later. Both the absolute and relative frequency with which semantically related words were substituted for the verbatim language of the sentences increased over the retention interval. This fact is explained in terms of transfer from a phonological to a semantic store. Sentences were almost always recalled as a whole if they were recalled at all, which is interpreted as evidence that sentences are learned and recalled as propositions rather than sets of independent associations among words or concepts. (16 ref)—*Journal abstract*.

2370. Bahrack, Harry P. (Ohio Wesleyan U) **The anatomy of free recall.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 484-490.—Inferred the relative importance of various covert cues used in free recall on the basis of conditional probabilities of free recall given success vs failure of cued recall of the same material in a 2-part experiment with a total of 96 undergraduate Ss. 36 names

associated with pictures arranged in a  $6 \times 6$  matrix were learned. A free-recall test of names was followed by cued recall of names, with pictures, positions, or joint pictures and positions used as cues. Matching tests based on these cues were also administered. The tests were given at 1 of 2 stages of training, immediately or after 2 days. Pictorial and position cues were equally well encoded, but pictorial cues were less accessible and, therefore, relatively more useful in cued than in free recall. Position and pictorial information related to the names appeared to be encoded and forgotten independently, and there was no evidence for summation of subthreshold encoding effects.—*Journal abstract.*

2371. Bellezza, Francis S. & Poplawsky, Alex J. (Ohio U) **The function of one-word mediators in the recall of word pairs.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 447-452.—Conducted 2 experiments using cued-recall (Exp I with 32 undergraduates) and free-recall (Exp II with 32 Ss) learning tasks. Ss were requested to add a 1-word mediator to some of the pairs of concrete nouns presented. The mediated pairs were learned better than the control pairs in both tasks. Both words were recalled only when the mediator was also recalled. Also, 1-word mediators were the most effective recall cues and were the best recalled words in free recall. A 2-stage learning model adequately describes the data. However, a counterargument can be made which considers the mediator to be a high associate of one of the words presented and actually has no direct link to the other presented word. A possible experimental resolution of the problem is discussed.—*Journal abstract.*

2372. Brink, John H. (Purdue U) **Impression order effects as a function of the personal relevance of the object of description.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 561-565.—Tested the influence of different target stimuli on impression order effects. 60 undergraduates evaluated bivalent sets of personality-trait adjectives which purportedly described a hypothetical stranger, the E, or the Ss themselves. Under unwarned recall conditions, variations in the object of description significantly influenced impression order effects ( $p < .01$ ). It is suggested that this effect may have been a function of attention decrements and of implicit evaluations associated with various levels of personal relevance of the impression formation task. Analyses of adjective recall support the verbal memory hypothesis of impression formation for only the unfavorable-favorable sets in the forewarned recall conditions. Recall analyses, however, suggest the importance of recall measurement criteria used in tests of the verbal memory hypothesis. (24 ref)—*Journal abstract.*

2373. Burrows, David & Okada, Ronald. (State U New York, Brockport) **Scanning temporally structured lists: Evidence for dual retrieval processes.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 441-446.—Presented lists of memory items containing 1 temporal pause to a total of 73 undergraduates. After each list, Ss were asked to classify a test item as positive or negative based on the memory information. In Exps I and II, the test item was to be classified as positive if it occurred in the memory set at all, and mean reaction times for the decision were longer than for a no-pause control. In Exp III a positive response was required provided that the test item was in

a relevant portion of the list as defined by a postlist cue. Reaction times were longer and showed a somewhat different pattern than for a no-pause control. An interpretation is offered based on the hypothetical existence of 2 simultaneously executed serial scans, one "exhaustive" and the other "self-terminating," as defined by S. Sternberg (1966, 1969).—*Journal abstract.*

2374. Carpenter, Patricia A. (Carnegie-Mellon U) **On the comprehension, storage, and retrieval of comparative sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 401-411.—Tested a methodology that permits the separate examination of sentence comprehension processes and subsequent sentence memory processes. 44 undergraduate Ss were timed as they read a comparative sentence like "Giraffes are taller than goats" and decided whether the sentence was true or false. The response latencies indicated that sentences with unmarked adjectives like "taller" or "larger" were verified faster than sentences with marked adjectives like "shorter" or "smaller." A subsequent recall or recognition procedure tested incidental memory for the previously verified sentences. Recall performance was superior for sentences with unmarked adjectives. The similarity between the results of comprehension and recall is discussed in terms of a retrieval process that may be similar in both tasks. This process retrieves the representations of objects from memory and places them appropriately along the dimension on which they are being compared. (21 ref)—*Journal abstract.*

2375. Cohen, David B. & MacNeilage, Peter F. (U Texas, Austin) **A test of the salience hypothesis of dream recall.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 699-703.—Tested the hypothesis that dream salience (subjective impact of the generated dream) would be greater for frequent than infrequent dream recallers. Dream recall data from 8 frequent and 8 infrequent recallers (male undergraduates) were obtained under 2 conditions: tape-recorded verbal reports given to the E after interruption of rapid eye movement (REM) sleep and written diary reports after awakening by alarm clock in the absence of the E. Analysis of the verbal reports confirmed the hypothesis. The relatively greater difference between the 2 groups in mean percentage of dream diary recall for Stage 2 (non rapid eye movement; NREM) than for REM awakenings suggests that salience differences between the 2 groups may be greater following NREM than REM awakenings. Although salience may be affected by dream recall as well as dream generation processes (imagery ability seems related to both), the higher frequency of temporal references to past and future in the dreams of frequent recallers appears to relate to the generation processes alone.—*Journal abstract.*

2376. Corballis, Michael C.; Roldan, Carlos E. & Zbrodoff, Jane. (McGill U, Montreal, Quebec, Canada) **Response set effects in recognition memory.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 501-508.—In 3 experiments with 12 university students in each, Ss responded to individual digits or letters according to whether or not each was in some prememorized list. There were either possible responses (yes-no condition) or a single response (yes-only and no-only conditions). With memorized sets of 1, 2, or 4 digits, reaction time was a linear



function of memory set size. The slope of the function was least under the yes-only condition and greatest under the yes-no condition. With memory sets of 4, 8, or 12 letters, the slopes under the yes-only and yes-no conditions did not seem to differ, and practice with specific sets flattened the function considerably in both cases. Overall, the errors under the yes-no condition were mostly false alarms, those under the no-only condition mostly misses, and those under the yes-no condition were divided about equally. Results are interpreted partially in terms of a multiple-observations model of decision time. (19 ref)—*Journal abstract*.

2377. Derks, Peter L. (Coll of William & Mary) **The length-difficulty relation in immediate serial recall.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 335-354.—6 experiments examined the time a total of 46 graduate and undergraduate students and 52 other Ss spend studying arrays of items before they tried to recall the items in order. Within and across experiments the relation between study time and amount of material to be recalled was most generally a power function with an exponent of approximately 2.6. Thus, arrays doubled in size were studied about 6 times as long. Experimental manipulations and individual differences, however, suggest some limitations on the generality of the power function. The power, logarithmic, and exponential functions observed are suggested as possible indicators of the interaction of associative and organizational processes in serial learning. (45 ref)—*Journal abstract*.

2378. Duffy, Thomas M. & Kearn, David. (US Navy Personnel Research & Development Ctr, San Diego, CA) **Mnemonics and intralist interference: A reexamination.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 749-755.—120 undergraduates learned a list of nonsense syllables paired with words and presented with a relational, a nonrelational, or no mnemonic. The stimulus syllables formed 3 subgroups of similarity. It was predicted that mnemonics would reduce error responses more to similar than to distinctive stimuli. Results, however, indicate that mnemonics reduced confusions only between distinctive stimuli. Interpretations based on transfer of associative strength and grouping of similar pairs are discussed. (15 ref)—*Journal abstract*.

2379. Duncan, Carl P. (Northwestern U) **Retrieval of low-frequency words from fixed lists.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 137-138.—Presented either a list of high- or a list of low-frequency words (unmixed lists), or lists containing equal numbers of words from the 2 frequency levels (mixed lists) to a total of 248 Ss in 2 experiments. In recall there was a significant Frequency  $\times$  List interaction: in unmixed lists high-frequency words were better recalled; in mixed lists low-frequency words were better recalled.

2380. Flores, Luis M. & Brown, Sam C. (Kansas State U) **Comparison of output order in free recall.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 385-388.—Examines 2 measures of output order in free recall and shows them to vary with characteristics of recall unrelated to output order. The output location of a subset of items in recall, using the standard recall rank measure and the "observed minus expected" score, varies

both with number of items in the subset and total number of items recalled. A new measure of output order (the relative index of priority or RIP score) is proposed that is invariant with these characteristics of recall, providing an uncontaminated empirical index of the output location of a subset of items in the recall sequence.—*Journal abstract*.

2381. Folkard, Simon & Greeman, Adrian L. (MRC Applied Psychology Unit, U Sussex, Brighton, England) **Salience, induced muscle tension, and the ability to ignore irrelevant information.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 360-367.—Examined the effects of salience and induced muscle tension on 24 adult volunteers (Exp I) and on 16 paid university students (Exp II) in card sorting tasks. Results of Exp I suggest that even though the responses appropriate to the relevant and irrelevant information were unrelated there was an effect of irrelevant information, but only when it was more salient than the relevant information. Induced muscle tension improved performance based on less salient attributes but degraded performance based on more salient attributes. Exp II confirmed this latter finding using a version of the Stroop Color-Word Test. It is tentatively suggested that induced muscle tension may inhibit naming responses. (15 ref)—*Journal abstract*.

2382. Gerver, David. (U Stirling, Scotland) **Simultaneous listening and speaking and retention of prose.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 337-341.—Examined the effects of simultaneous listening and speaking on comprehension and recall, requiring 9 trainee simultaneous interpreters to shadow, listen to, and simultaneously interpret into English 3 French prose passages. Subsequent tests of comprehension and recall showed that higher scores were obtained in the listening condition than in simultaneous interpretation, which in turn yielded significantly higher scores than shadowing.—*Journal abstract*.

2383. Glass, Arnold L. & Holyoak, Keith. (Stanford U) **The effect of some and all on reaction time for semantic decisions.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 436-440.—Tested a model proposed by D. E. Meyer (see PA, Vol 45:7411) to account for the times required to verify semantic-memory statements quantified by *all* or *some*. Each S was presented with both *all* and *some* statements in a mixed list, and the discriminability of false statements of the 2 quantifier types was controlled. In Exp I with 24 female undergraduates positive subset statements were verified more quickly when quantified by *all* rather than *some*; the reverse ordering occurred for negative subset statements. Sentences with pseudowords in subject or predicate position took longer to reject than false real-word sentences. Findings contradict Meyer's theoretical predictions and suggest that his earlier results were artifactual. Exp II with 18 paid undergraduates replicated the faster verification of positive subset statements quantified by *all*. The production frequency of predicates which form subset statements was lower when the quantifier was *some* rather than *all*. Holding predicate production frequency constant, sentences with different quantifiers were verified equally quickly.—*Journal abstract*.

2384. Glass, Arnold L.; Cox, Julia & LeVine, Susan J. (Stanford U) **Distinguishing familiarity from list search responses in a reaction time task.** *Bulletin of the Psychonomic Society*, 1974(Aug). Vol 4(2-A), 105-108. —Tested the claim of the model proposed by R. C. Atkinson and J. F. Juola that recognition responses in a reaction-time (RT) task are a mixture of fast responses on the basis of the item's familiarity and slower responses based on a list search for the item. 24 undergraduates had to learn 2 16-word lists (A and B). Then they had to respond alternately to "Is the following a List A word?" and "Is the following a List B word?" In the control task, the members of one list served as distractors for the other. Hence, the familiarity values of the targets and distractors were equal, and the only basis for response was a list search. In the experimental task, the distractors were not list words. Consequently their familiarity was lower, and familiarity responses could be made. There were no differences between 2 groups of Ss when they all responded in the control task. But when half the Ss were switched to the experimental task, they responded significantly faster than the Ss who continued in the control task. In the experimental task distractors were rejected quicker than targets were identified, but in the control task the reverse was true. Results support the hypothesis that the control task required a list search while a familiarity judgment was possible in the experimental task.—*Journal abstract*.

2385. Gold, Paul E. & King, Richard A. (U California, Irvine) **Retrograde amnesia: Storage failure versus retrieval failure.** *Psychological Review*, 1974(Sep). Vol 81(5), 465-469.—Retrograde amnesia is generally taken as evidence for the disruption of memory storage processes. Recently, R. R. Miller and A. D. Springer (see PA, Vol 50:263) proposed that retrograde amnesia is the result of a (usually) reversible retrieval block and not the result of interference with memory storage processes. "Reminder" studies provide the principal data on which their theory is based. The reminder studies are reviewed, as well as other recent studies which are purported to support the retrieval block hypothesis. It is concluded that the findings of these studies are compatible with storage interpretations of retrograde amnesia and have little bearing on the interpretation of retrograde amnesia. (29 ref)—*Journal abstract*.

2386. Grober, Ellen H. & Loftus, Elizabeth F. (Johns Hopkins U) **Semantic memory: Searching for attributes vs searching for names.** *Memory & Cognition*, 1974(Jul). Vol 2(3), 413-416.—Investigated whether searching for a word that has a particular attribute (a fruit that is yellow) involves a different process than searching for a word whose name has a particular form (a fruit whose name begins with "p"). 20 graduate students saw category nouns paired with adjectives or letter restrictors presented on a series of blocked trials and on a series of mixed trials. Ss had to produce a word that fell in the space defined by the noun and the restricting adjective or letter. Reaction time was fastest when trials were blocked and when a letter followed the presentation of the noun. This finding suggests the existence of 2 retrieval plans that can be executed when S has knowledge of the forthcoming type of item. (20 ref)—*Journal abstract*.

2387. Gruneberg, Michael M. & Monks, Joseph. (University Coll Swansea, Wales) **"Feeling of knowing" and cued recall.** *Acta Psychologica*, 1974(Aug). Vol 38(4), 257-265.—Investigated the relationship between an individual's "feeling of knowing" (FOK) that a memory response is stored and evidence of later retention. Immediately following the presentation of a test list in which 36 undergraduates were required to recall capitals of countries, unretrieved items were subject to a further retrieval attempt. Items still unretrieved were then subject to 1st-letter cuing. Finally, items still unretrieved were subject to 1st- and 2nd-letter cuing. Results indicate that degree of expressed FOK was significantly related to later retrieval following both 1st- and 2nd-letter cuing. This finding thus extends the findings of J. T. Hart (1965) and of J. L. Freedman and T. K. Landauer (1966) concerning the relationship between FOK and later measured retention, as in both these studies retention was measured by a recognition procedure. Where Ss reported "not knowing" a capital on the test list, there was nevertheless a substantial probability of recall following cuing. Wrong responses given during the test list presentation were highly indicative of a correct response following cuing.—*Journal abstract*.

2388. Hall, James W. & Pierce, Jean W. (Northwestern U) **Recognition and recall by children and adults as a function of variations in memory encoding instructions.** *Memory & Cognition*, 1974(Jul). Vol 2(3), 585-590.—Conducted 4 experiments with a total of 96 3rd graders, 102 4th graders, 108 5th graders, and 224 undergraduates. Ss were instructed to learn a set of 40 words by producing implicit associative responses to each item (association instructions), by repeating items over and over (repetition instruction), or by using their own devices (neutral instructions). Exp I showed that recognition memory (RM) accuracy was greatest under association instructions for adults and children and least under repetition instructions for children. Implications of these results for a frequency theory analysis for RM are discussed. Exps II, III, and IV examined free recall (FR) as a function of encoding instructions at short (1-min) and long (either 90-min or 24-hr) retention intervals. FR was worst under repetition instructions, with little overall difference between the association and neutral conditions. However, in Exps III and IV, using children, the neutral condition exceeded the others in FR after 90 min but not after 1 min.—*Journal abstract*.

2389. Hitch, Graham J. (U Stirling, Scotland) **Short-term memory for spatial and temporal information.** *Quarterly Journal of Experimental Psychology*, 1974(Aug). Vol 26(3), 503-513.—Examined the probed recall of visually presented letter sequences in which the items appeared at different spatial locations. 3 types of probe were compared: spatial position, temporal association, and combined position and association. In Exp I with 11 naval ratings, in which the spatial locations of the items were correlated with their temporal order, spatial probes were more effective than temporal association probes. In Exp II with 36 housewives, spatial location was uncorrelated with temporal order, and spatial probes were less effective than temporal association probes. Regardless of the probe, errors tended to be items presented close in time to correct responses. Results are discussed in terms



of a storage system in which items and their spatial locations are organized within a temporal format. Both experiments showed superior combined probe performance, demonstrating that short-term retrieval is not limited to the use of 1 type of cue at a time.—*Journal abstract.*

2390. Holmes, David S. (U Kansas) **Investigations of repression: Differential recall of material experimentally or naturally associated with ego threat.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 632-653.—Reviews the wide variety of relatively recent research conducted to test predictions derived from the theory of repression. It is found that none of the investigations provided support for the predictions. Changes in recall when threat was experimentally introduced and then eliminated were due to increases and decreases in distraction, and differences in recall of material identified as threatening and nonthreatening by the word association technique could not be used as evidence because threat and association value (which can be related to recall but independent of threat) were confounded in the word association measure. Research employing personally conflictual material or material identified as threatening on the basis of a theory also failed to provide evidence for repression. Theoretical implications and alternative approaches for understanding differential recall in the applied setting are discussed. (64 ref)—*Journal abstract.*

2391. Hopkins, Ronald H. (Washington State U) **Retrieval problems in successive short-term retention trials.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 424-429.—Tested a total of 196 undergraduate Ss in 4 experiments for short-term retention of different triads of month names on 4 successive trials. Results show that (a) though apparently recallable across trials; (b) this decrement in recall was much smaller with 20-sec than with 4-sec periods for recall, and a shift from 4-sec to 20-sec recall periods produced an abrupt improvement in recall performance; (c) response latency for correctly recalled words increased across trials. Results are interpreted as support for the hypothesis that proactive interference in this task is primarily due to retrieval, as opposed to encoding or storage, processes. (16 ref)—*Journal abstract.*

2392. Johnson, Ronald E. (Purdue U) **Learners' predictions of the recallability of prose.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 41-52.—Attempted to determine whether learners of textual prose know which portions of the text are likely to be difficult to recall. For each of 2 textual passages, samples of college students (107 and 114, respectively) were able to predict accurately the prose subunits which were actually recalled by various samples of learners attempting immediate or delayed reproductions. Multiple regression analyses provided evidence that the predictions of recall showed considerable congruence with independent ratings of the meaningfulness and comprehensibility of the subunits.—*Journal abstract.*

2393. Klein, Raymond & Kerr, Beth. (U Oregon) **Visual signal detection and the locus of foreperiod effects.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 431-435.—Determined the effect of alertness on S's sensitivity to external signals by varying the foreperiod in

a visual signal detection task with 5 paid, normally seeing young adults. Discriminability increased with increasing foreperiods up to an optimal foreperiod, beyond which it decreased slightly. This pattern of results parallels closely that of many foreperiod studies in which reaction time was the dependent variable. Because no speeded response was required in this signal detection task, it is concluded that alertness must be affecting an information processing stage prior to those associated with responding. Other evidence indicates that alertness does not affect sensory stages either. Alertness, by elimination, must be affecting the operation of a central stage. The view of alertness of M. I. Posner et al (see PA, Vol 50:6196) which implicates the central stages is discussed. (28 ref)—*Journal abstract.*

2394. Loftus, Elizabeth F.; Wiksten, Sif & Abelson, Robert P. (U Washington) **Using semantic memory to find vs create a mood.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 479-483.—In 3 experiments a total of 52 college students produced words from semantic memory which satisfied certain constraints. In Exp I a noun category plus a number and a letter were presented, and S produced an instance of the category which had the given letter in the position designated by the given number. Faster responses occurred when the position cue occurred before the letter rather than after it. In Exps II and III Ss saw only a number and a letter and were required to produce any word that had the given letter in the position designated by the given number. Order of the position and letter cues did not influence response times. The effect of order in one case and not the other strongly suggests that producing a word that satisfies certain semantic constraints involves a different process from producing a word that satisfies only certain orthographic restrictions.—*Journal abstract.*

2395. Loftus, Geoffrey R. & Loftus, Elizabeth F. (U Washington) **The influence of one memory retrieval on a subsequent memory retrieval.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 467-471.—18 paid adult Ss produced an instance of a category and following zero or 2 intervening items produced a 2nd instance of the same category. Results show that the 2nd instance was produced more quickly than the initial instance. This finding, in conjunction with other data reported in the paper, indicates that the reduction in latency for the 2nd instance is due mostly to a reduction in the rate with which the category is searched.—*Journal abstract.*

2396. Loftus, Geoffrey R. (U Washington) **Acquisition of information from rapidly presented verbal and nonverbal stimuli.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 545-548.—2 experiments with a total of 10 adult Ss tested recognition memory for rapidly presented stimuli. In Exp I, 16 words were presented at exposure times ranging from 25 to 500 msec followed by a yes-no recognition test. Results show a strong dependence of memory performance on both exposure time and serial position. In Exp II, 16 random forms were presented at exposure times ranging from 125 to 2000 msec followed by a yes-no recognition test. Results for random forms show that memory performance was strongly dependent on exposure time but not on serial position. Taken together, the results of Exps I and II suggest qualitative

encoding differences between verbal vs nonverbal stimuli.—*Journal abstract.*

2397. Mark, Richard. (Monash U, Clayton, Vic, Australia) **Memory and nerve cell connections: Criticisms and contributions from developmental neurophysiology.** Oxford, England: Clarendon, 1974. x, 156 p. \$10.95.—Presents a comprehensive review of the literature on mechanisms of electrical signaling in the nerve system, the development and maintenance of brain structure, and the behavioral expression of memory. Experimental data from the fields of neurophysiology, neuroembryology, and learning and memory, and a theory of modifiable brain cell networks are included. (14½ p ref)

2398. Melnick, Gerald I. & Wexler, Harry K. (Yeshiva U) **Two modes of association.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 845-850.—144 undergraduates were presented unitary or nonunitary stimuli (formed of consonant-vowel-consonants of low and middle association value) and then given recognition or recall tests equated for availability of the stimuli. For both association values, there was a significant interaction between the type of test and the stimulus conditions. The procedures provide a means of experimentally distinguishing unitary and nonunitary forms of association.—*Journal abstract.*

2399. Miller, Ralph R. & Springer, Alan D. (Brooklyn Coll, City U New York) **Implications of recovery from experimental amnesia.** *Psychological Review*, 1974(Sep), Vol 81(5), 470-473.—Examines 2 alternative explanations of experimental amnesia reversal following a noncontingent reminder trial. On the basis of a review of research data, it is concluded that a retrieval failure hypothesis is the more plausible. In either case, both models are predicated on the existence of physiological mechanisms capable of consolidating information in intervals (seconds or fractions of a second) shorter than typical estimates of consolidation times. The generality of retrieval failure as a source of a variety of behavioral deficits is discussed. (15 ref)—*Journal abstract.*

2400. Peterson, Richard G. & McIntyre, Curtis W. (U Minnesota) **The influence of semantic "relatedness" on linguistic integration and retention.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 697-706.—Manipulated semantic "relatedness" of sentences in an attempt to clarify the relationship between R. N. Shepard's (1967) demonstration of specific recognition memory and J. D. Bransford and J. J. Franks's (1971) integrated recognition memory. Ss were 40 undergraduates. Accurate specific recognition memory for sentences occurred when semantic intersentential relations were not present but virtually disappeared when they were present. (18 ref)—*Journal abstract.*

2401. Ray, Colette. (University Coll, Cardiff, S Wales) **Some components of colour-word interference and their relationship with field dependence.** *Acta Psychologica*, 1974(Aug), Vol 38(4), 323-330.—Hypothesized that a standard color-word interference situation involves a number of distinct factors, each of which contribute to the overall delay. A total of 30 undergraduate and graduate students were given a color-word test and D. N. Jackson's short form of the Embedded Figures Test. Interference was analyzed in terms of the delay associat-

ed with particular characteristics of different interfering stimuli. These measures were found to be unrelated and were thus held to represent distinct components of the interference effect. Field dependence was primarily related to the component which was described as "perceptual distraction."—*Journal abstract.*

2402. Reitman, Judith S. (U Michigan) **Without surreptitious rehearsal, information in short-term memory decays.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 365-377.—Cites J. S. Reitman's (see PA, Vol 46:10198) finding that Ss could retain 3 words perfectly for 15 sec while detecting tones in noise and supposedly avoiding rehearsal. These results were taken to indicate lack of support for the decay principle of short-term memory. The present 2 studies with a total of 52 male paid undergraduates tested 2 assumptions in the Reitman study: that 100% recall reflects not a ceiling effect but the absence of forgetting, and that lack of disruption of interpolated detection performance indicates lack of rehearsal. Major results indicate that (a) the 1971 study did involve a ceiling effect; (b) tonal detection was measurably disrupted when subjects rehearsed; and (c) when Ss detected equally well in the retention interval as in a control interval they forgot 33% of what they could recall immediately, and when they detected syllables instead of tones, they forgot about 44% more. There is clear evidence for both decay and simple interference in short-term memory.—*Journal abstract.*

2403. Richards, Larry G. (U Virginia) **"Vexilver-such" revisited: A reexamination of Goldiamond and Hawkins' experiment.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 707-715.—Replicated I. Goldiamond and W. F. Hawkins's (see PA, Vol 34:805) experiment on the log relationship between word frequency and recognition, using L. Postman and M. R. Rosenzweig's (1956) dual-modality design. Ss were 20 undergraduates. A postexperimental interview assessed the Ss' perceptions of and reactions to the task. Goldiamond and Hawkins's results were replicated and extended to auditory training and test conditions. However, results of the postexperimental interview call into question the relevance of this type of study to the debate about the source of the standard word-frequency effect.—*Journal abstract.*

2404. Richards, Larry G. (U Virginia) **On perceptual and memory processes in the word-frequency effect.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 717-728.—Pretrained a total of 30 undergraduate and graduate students on a task involving recognition of artificial words by R. L. Solomon and L. Postman (see PA, Vol 27:4218). Ss were then given both a memory (recall) and a tachistoscopic (recognition) test either immediately, after 1 wk, or both. Recognition and recall both improved with increased pretraining, but this effect on recognition was greatly attenuated after 1 wk. Recognition improved with repeated testing. The number of letters correctly recognized was also analyzed. Findings support a response-bias interpretation of the word-frequency effect in the Solomon and Postman paradigm.—*Journal abstract.*

2405. Rothstein, Lee D. (Stanford U) **A simplified procedure for the study of memory retrieval processes.**



*Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 73-75.—Presents a simplified and inexpensive procedure for the conduct of research on recognition memory retrieval. The procedure is a card sorting analog to S. Sternberg's item recognition task. An experiment is reported with 15 undergraduates which demonstrates the validity of the card sorting task. The suitability of the task for the undergraduate laboratory is discussed. Suggestions are given for how card sorting may be used to study psycholinguistic processing and semantic memory.—*Journal abstract*.

2406. Routh, D. A. & Mayes, J. T. (U Bristol, England) **On consolidation and the potency of delayed stimulus suffixes.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 472-479.—Notes that, in a strictly serial recall task, increasing the temporal separation of a spoken memory list and a spoken distractor (stimulus suffix) reduces the latter's potency as a source of interference. This phenomenon was studied further with 20 university personnel and student volunteers using suffix delays in the range of .8-6.4 sec and a transcription task to minimize rehearsal during the suffix delay. Results indicate that the probability of correct recall from the terminal serial position, of a sequence of 8 digits, is a linearly increasing function of the logarithm of the suffix delay, over the range studied. Results are discussed in terms of their value as evidence for the existence of a consolidation process. (21 ref)—*Journal abstract*.

2407. Runquist, Willard N. (U Alberta, Edmonton, Canada) **The assessment of discriminative encoding in memory for paired associates.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 472-478.—Designed a technique for providing for the measurement of encoding stability and intralist stimulus discrimination. An experiment with 78 undergraduate Ss applied the technique to the analysis of some paired-associate data. Essentially, the measure involved a recall test for all stimuli in the list except one, then presenting either a previously tested stimulus or the missing stimulus. Recognition of repeated stimuli reflected code stability, and recognition of the missing stimulus reflected stimulus discrimination.—*Journal abstract*.

2408. Sales, Bruce D.; Cole, Ronald A. & Haber, Ralph N. (U Nebraska) **Mechanisms of aural encoding: VIII. Phonetic interference and context-sensitive coding in short-term memory.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 596-600.—In previous experiments Ss were presented with sequences of 5 consonant phonemes paired with /a/ in which the middle 3 consonant phonemes shared the same manner of articulation, the same place of articulation, or neither. The middle consonant phoneme was always more difficult to recall in manner of articulation sequences but not in place of articulation sequences. Results suggest that consonant phonemes were not remembered in terms of their place of articulation. In the present experiment, sequences of consonant-vowel (CV) or vowel-consonant (VC) syllables were presented to 50 undergraduates for recall in which each consonant phoneme was paired with a different vowel. When consonant phonemes in the different sequence types were presented for recall with different vowels, phonetic interference was observed for the middle consonant in place as well as manner of

articulation sequences, and the effect was observed in both CV and VC groups. It is suggested that vowels are encoded in short-term memory in terms of their place of articulation and that presenting consonant phonemes for recall with different vowels caused Ss to use this dimension to code consonant phonemes in short-term memory.—*Journal abstract*.

2409. Salzarulo, P. & Cipolli, C. (Hôpital Henri-Rousselle, Paris, France) **Spontaneously recalled verbal material and its linguistic organization in relation to different stages of sleep.** *Biological Psychology*, 1974, Vol 2(1), 47-57.—Performed 104 sleep recordings in 7 20-25 yr old students who were awakened once in each recorded sleep session, either during slow-wave or fast-wave sleep. Recalled verbal material (RVM) reported on these awakenings was submitted to linguistic analysis. Semantic RVMs were obtained in both conditions in the same proportion. Syntactic RVMs were rarely obtained in slow-wave sleep compared to fast-wave sleep. The length of evoked RVMs depended on the type of sleep (fast-wave sleep; phasic events at the time of awakening) and on its location during the night (last fast-sleep phase). The complexity of RVMs remained identical during the 1st few kernel sentences regardless of the type of sleep. Data suggest that during sleep, different, although probably interrelated, mechanisms underlie RVM evocation and their complexity and control their length.—*Journal abstract*.

2410. Santa, John L. & Lamwers, Linda L. (Rutgers State U, Douglass Coll, New Brunswick) **Encoding specificity: Fact or artifact.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 412-423.—Examined the encoding specificity principle which suggests that Ss can retrieve information from memory only via cues encoded for retrieval at the time of study. 45 undergraduates participated in Exp I and 9 paid Ss in Exp II. Contrary to the encoding specificity hypothesis both experiments suggested that Ss were able to make use of semantic cues which were not likely to have been encoded at time of study. Contrasts of recognition and recall were also examined. Several theoretical problems were noted in such comparisons, and it is concluded that differences between recall and recognition provide no measure of support for encoding specificity.—*Journal abstract*.

2411. Schwartz, Steven & Witherspoon, Kirk D. (Northern Illinois U) **Decision processing in memory: Factors influencing the storage and retrieval of linguistic and form identification.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 127-129.—Attempted to replicate a study by J. D. Bransford and J. J. Franks (see PA, Vol 48:4191) which tested the idea that sentence meaning is stored in a schematic fashion and found that new sentences containing all information conveyed by simpler sentences were more likely to be misidentified as having been seen earlier than sentences containing only part of the information. The present study, using a signal detection framework with 15 undergraduates as Ss, demonstrated that this effect was due not only to schematic organization, but to the retention of the "new" form of the originally presented sentences as well. This form of new sentences conveying only part of the earlier information was remembered better (and less frequently

confused) than new, complex sentences.—*Journal abstract.*

2412. Thompson, Janet T. & Clayton, Keith N. (Vanderbilt U) **Presentation modality, rehearsal-prevention conditions, and auditory confusions in tests of short-term memory.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 426-430.—Describes an experiment with 6 paid graduate students in which Ss were presented four-letter sequences either auditorily or visually and asked for ordered recall after 0, 2.1, 4.2, 8.4, or 12.6 sec of digit categorization. 3 different rehearsal-prevention conditions were required during presentation of the memory set: categorizing, suppressing (saying "ah"), or pronouncing each letter. Recall was worst after categorizing, best after pronouncing. Auditory presentation led to better recall after no delay, but to more rapid forgetting than visual presentation, regardless of the rehearsal-prevention condition. These results, and analyses of auditory confusions, are inconsistent with a view of memory which asserts that sensory information is encoded auditorily regardless of presentation modality or vocalization behavior during presentation. (23 ref)—*Journal abstract.*

2413. Tulving, Endel & Watkins, Michael J. (U Toronto, Ontario, Canada) **Continuity between recall and recognition.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 739-748.—Discusses (a) the discontinuity hypothesis that recall and recognition are in some sense fundamentally different memory processes; and (b) the continuity hypothesis that retrieval in both modes is essentially the same, a joint product of the information stored in the past and that in the immediate environment. Data from a simple experiment with 20 undergraduates and a brief discussion of other studies in the literature support the proposal that the continuity view is both more parsimonious and more fruitful than the discontinuity view. (20 ref)—*Journal abstract.*

2414. Tversky, Barbara. (Hebrew U, Jerusalem, Israel) **Breadth of pictorial and verbal codes in memory.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 65-68.—Examined the breadth of pictorial and verbal encoding modalities by using reaction times to a same-different task in 4 bilingual Hebrew-English college students. For each of the 4 geometric figures, there were 2 pictorial representations (outline or filled drawings) and 2 verbal representations (the figure names in 2 languages). While the pictorial code was broad enough to allow unmediated comparison of 2 pictures with no visual components in common, the verbal code was not semantic, as had been previously maintained, and did not allow direct comparison of equivalent words in different languages.—*Journal abstract.*

2415. Underwood, Geoffrey. (U Nottingham, England) **Moray vs. the rest: The effects of extended shadowing practice.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 368-372.—Notes that the processing requirements of the shadowing response have led to criticism of its use in selective attention experiments. The present experiment tested a single highly skilled shadower using a task requiring the detection of digits embedded in dichotic lists of letters, with attention being directed to 1 list by use of the shadow technique. This S was able to detect considerably

more digits in both the attended and unattended messages than were groups of unskilled shadowers previously tested. Although performance to the unattended message was high, it remained below performance to the attended message.—*Journal abstract.*

2416. Watkins, Michael J. (U Toronto, Ontario, Canada) **Concept and measurement of primary memory.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 695-711.—The recency effect in free recall remains relatively constant over experimental conditions that have large and systematic effects on overall level of recall. The effect is commonly attributed to a distinct memory system, known as primary memory. 3 views of primary memory are discussed: the 1st conceptualizes primary memory as a limited capacity store from which information is transferred to a more permanent store, the 2nd equates primary memory with consciousness, the 3rd sees primary memory as a limited capacity retrieval system. Methods for measuring primary memory have been suggested by N. C. Waugh and D. A. Norman (1965), B. Raymond (1969), B. B. Murdock (1967), and E. Tulving (1968, 1970). These methods are critically evaluated, and their relative merits are assessed with a combination of rational and empirical arguments. (63 ref)—*Journal abstract.*

2417. Watkins, Michael J.; Watkins, Olga C. & Crowder, Robert G. (Yale U) **The modality effect in free and serial recall as a function of phonological similarity.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 430-447.—28 undergraduates read lists of phonologically similar or dissimilar words under instructions either for free or for serial recall; additionally, reading was either silent or overt. In free recall primary memory capacity was not affected by phonological similarity, whereas an advantage for the overt over the silent presentation mode was observed with the dissimilar but not the similar lists. Further, phonological similarity reduced the size of the modality effect in serial recall. Apart from its interactive effects with mode of presentation, the effect of similarity on free recall was beneficial for all except the recency items, whereas similarity reduced performance in serial recall. Results allow dismissal of some hypotheses for the modality effect, and in general pose a problem for theories of how similarity affects memory. (58 ref)—*Journal abstract.*

2418. Wells, J. Elisabeth. (Massey U, Palmerston North, New Zealand) **Strength theory and judgments of recency and frequency.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 378-392.—Argues that strength theory can account for certain memory phenomena only if strength is regarded, not as the basic unit of memory, but as some overall measure of the amount of information in store about a particular item. However, not all information need be stored directly.—information about recency and frequency of presentation is potentially derivable from the strength of an item rather than from recency or frequency information per se. This paper examines the evidence for and against such strength theories of recency and frequency, and reports 2 experiments with a total of 28 paid adult Ss. Strength theories of frequency were almost completely discredited. The case against strength theories of recency was less compelling—Ss reverted to using strength as the



basis for recency judgments if specific temporal or serial information was lacking. (41 ref)—*Journal abstract.*

2419. Wickens, Delos D. & Contrucci, Joyce J. (Ohio State U) **The effects of formal and acoustic repetition in the Brown-Peterson paradigm.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 581-584.—Presented the trigram B, K, T to 432 undergraduate Ss on a given trial in L. R. Peterson and M. J. Peterson's (see PA, Vol 34:5499) paradigm. For 1 group this same trigram had been presented 3 trials earlier (exact repetition). For another group the critical item which had preceded the consonant trigram was BEE, KAY, TEA (homophonic repetition). Both groups showed a repetition facilitation significant beyond that of the appropriate control groups. The exact repetition group excelled the homophonic repetition group. Postexperimental questionnaires on awareness of the experimental manipulation did not precisely clarify the results obtained. The data support the view of multiple encoding.—*Journal abstract.*

2420. Wright, P.; Holloway, C. M. & Aldrich, A. R. (MRC Applied Psychology Unit, Cambridge, England) **Attending to visual or auditory verbal information while performing other concurrent tasks.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 454-463.—Investigated the effect of a word recognition task on concurrent nonverbal tasks performed by a total of 48 paid adults in 3 experiments. Results show that (a) auditory verbal messages affected visual tracking performance but not the detection of brief light flashes in the visual periphery, and (b) greater impairment, both of tracking and light detections, when verbal messages were visual rather than auditory. With a kinesthetic tracking task, errors increased significantly during auditory messages but were greater during visual messages. There was no interaction between the modality of tracking error feedback (auditory or visual) and the modality of the verbal message. It is suggested that different temporal characteristics of visual and auditory information affect the attentional demands of verbal messages.—*Journal abstract.*

### Motivation & Emotion

2421. Berkowitz, Leonard & Turner, Charles. (U Wisconsin) **Perceived anger level, instigating agent, and aggression.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—80 undergraduates were moderately provoked by 1 of 2 confederates. Ss were then led to believe they had either low, medium, or high anger toward the confederate and were required to give shocks to either the provoker or the neutral confederate. Anger-level feedback was related to the intensity of aggression only when the provoker was the available target.

2422. Bria, Pietro. (U Cattolica del Sacro Cuore, Facoltà di Medicina e Chirurgia, Milan, Italy) **The relationship between thinking and emotion in the works of Ignacio Matte Blanco.** (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 36-49.—The relation between thought and emotion represents a fundamental "modes of being," the atemporal and nispacial mode of being that plays a leading role in motion. This mode of being is based on coercive

thinking. The latter uses spatial-temporal parameters while the former does not. The rich and various psychical phenomenology of human beings emerges from the dynamic interrelation between these 2 modes.—L. L'Abate.

2423. Hill, C. G. (Massey U, Palmerston North, New Zealand) **A psychological view of corporal punishment.** *Delta*, 1973(Jun), No 12, 2-5.—Reviews literature related to effects of reward, punishment, and reinforcement on behavior, and identifies problems associated with study of corporal punishment. It is suggested that punishment has minimal desirable effects on changing behavior, but may reinforce the behavior of the person administering punishment.

2424. Klemp, George O. & Leventhal, Howard. (U Wisconsin) **Self-persuasion and fear reduction from escape behavior.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Replicated a study by R. J. Bandler et al (see PA, Vol 42:13090) which showed that Ss rated a shock as more painful when they chose to escape it than when they chose to sustain their exposure or when E controlled their exposure. Results support the hypothesis that the self-persuasion effect occurs only when S has a high tolerance for shock. (15 ref)

2425. Laird, James & Crosby, Melvin. (Clark U) **Individual differences in self-attribution of emotion.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Hypothesized that people differ in the relative importance of situational and self-produced cues in inferring attributes. Data from 2 replications, in which the expressive behavior of undergraduates was manipulated without their awareness, support the hypothesis of differences in the importance of self-produced cues in the attribution of emotional experience.

2426. London, Harvey & Monello, Lenore. (Long Island U) **Cognitive manipulation of boredom.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—High school and college students were led to believe by a rigged clock that a task, actually lasting 20 min, lasted either 10 or 30 min. Ss in the 10-min condition were more bored by the task because from S's viewpoint, time passed more slowly than in the 30-min condition. Data extend S. Schacter's theory of cognitive labeling of bodily states. (17 ref)

2427. London, Harvey & Nisbett, Richard E. (Eds.). (Long Island U) **Thought and feeling: Cognitive alteration of feeling states.** Chicago, IL: Aldine, 1974. 239 p. \$8.95.

2428. Navarick, Douglas J. & Fantino, Edmund. (California State U, Fullerton) **Stochastic transitivity and unidimensional behavior theories.** *Psychological Review*, 1974(Sep), Vol 81(5), 426-441.—Notes that unidimensional theories of choice behavior assume that an S evaluates stimuli on the basis of a common parameter or scale. The unidimensionality assumption is prevalent in theories of human and animal choice behavior, but its empirical implications have been tested infrequently. The major implication of unidimensionality is weak stochastic transitivity, confirmation of which

would suggest that a single factor controls the direction of binary choice. Many theories also assume that a single factor controls choice probability, an assumption requiring confirmation of a stringent form of strong stochastic transitivity (functional equivalence). Methods of testing 5 behaviorally oriented theories, all of which assume unidimensional control of choice probability, are discussed. (44 ref)—*Journal abstract*.

2429. Steele, Daniel G. & Walker, C. Eugene. (Los Alamos Schools, NM) **Male and female differences in reaction to erotic stimuli as related to sexual adjustment.** *Archives of Sexual Behavior*, 1974(Sep), Vol 3(5), 459-470.—100 male and 100 female undergraduates viewed erotic slides depicting a wide range of human sexual behaviors. Each S rated the stimuli on 3 criteria: sexual stimulation, liking for the slide, and extremeness of the behavior portrayed. Ss also completed Thorne's Sex Inventory, which theoretically measures psychosexual adjustment. Males and females reported minimal sexual stimulation and minimal liking for the slides, but males reported greater sexual stimulation and liking than did females. In terms of rated extremeness, males and females showed quite close agreement, differing significantly on only 1 slide. Males rated a greater number of the slides considered to be the more extreme as more sexually stimulating and more liked than did females. Both males and females, however, tended overall to rate the more extreme slides as less sexually stimulating and less liked; this relationship was stronger for females than for males. Scales on the Sex Inventory did not correlate positively with ratings of sexual stimulation and liking for the slides, and scales theoretically indicating sexual maladjustment failed to consistently correlate negatively with ratings of sexual stimulation and liking for the slides for males and females. (29 ref)—*Journal abstract*.

2430. Taylor, Shelley E. & Huesmann, L. Powell. (Yale U) **Replication report: Expectancy confirmed again: A computer investigation of expectancy theory.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 497-501.—Conducted a computerized attempt to replicate E. Aronson's and J. M. Carlsmith's (see PA, Vol 38:10033) expectancy theory. Ss performed consistent with their expectancy, although the effect of expectancy was strongly attenuated by an overall achievement orientation. Results contradict the hypotheses that experimenter bias, demand characteristics, or differential recall of performance mediate the effects of expectancy upon performance.

2431. Valins, Stuart. (State U New York, Stony Brook) **Persistent effects of information about internal reactions: Ineffectiveness of debriefing.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Male undergraduates viewed slides of nude females while hearing about their alleged heart-rate reactions and were then informed that these reactions were part of a deception manipulation. Although Ss accepted the debriefing, the false information continued to exert an influence on their attitudes toward the nudes in that debriefed and nonbriefed Ss had the same attitudes.

2432. Weil, John L. (Harvard U, Medical School, Boston) **A neurophysiological model of emotional and**

**intentional behavior.** Springfield, IL: Charles C Thomas, 1974. xii, 189 p.—Presents flow charts and experimental data which propose a neurophysiological basis of emotion as a function of upper limbic-hypothalamic-reticular discharge through ascending and descending nonspecific activation, and extrapyramidal, visceral and pituitary reactions. A neurophysiological conceptualization of intentional behavior as a function of emotional and cognitive processes is also presented. (9 p ref)

## NEUROLOGY AND PHYSIOLOGY

2433. Cain, Donald P. (McGill U, Montreal, Quebec, Canada) **The role of the olfactory bulb in limbic mechanisms.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 654-671.—Reviews recent data obtained after peripheral olfactory system damage which, when compared with bulbectomy data, suggest that the olfactory bulb has certain general modulatory functions in addition to its specific sensory role as initial processor of olfactory information. It is proposed that the olfactory bulb is involved in a forebrain arousal mechanism comprised mainly of hypothalamus and limbic system. Behavioral and electrophysiological evidence is discussed that supports the idea that the olfactory bulb may modulate the excitability of forebrain regions. Anatomical details of the system are considered, and its relationship to reinforcement mechanisms and to A. Routtenberg's (see PA, Vol 42:5112 and 47:244) Arousal System II is outlined. (5 p ref) *Journal abstract*.

2434. Hécaen, Henry. (National Inst of Health & Medical Research, Research Unit of Neuropsychology & Neurolinguistics, Lab of Pathology of Language, Paris, France) **[Functional hemispheric asymmetry and behavior.]** (Fren) *Social Science Information*, 1973(Dec), Vol 12(6), 7-23.—Reviews research on morphology and function of cerebral hemispheres. Handedness preference relates to differences between right and left in interhemispheric functional organization. The left hemisphere is more involved in language symbol meanings. Using different sounds to each ear, B. Kimura found retention better for right ear (left hemisphere) than for left ear (right hemisphere). The right hemisphere, classically mute, mediates body awareness and the recognition of human faces. Split-brain research indicates the same. Damage to the left affects sound symbol identification, to the right, perceptual discrimination and patterns. The left temporal is larger than the right in adults, in the newborn, and in the fetus. When the left is damaged, some recuperation is possible through takeover by the right. Disruption by lesions was described by H. Lissauer as apperceptive in the right and associative in the left hemisphere. The author postulates an interhemispheric gradient: at subcortical levels there is more interhemispheric tie-in. Inherent predisposition undergoes rapid maturation; at 1 mo infants show fine discrimination of verbal sounds. (57 ref) *R J Anderson*

2435. Rodieck, R. W. (U Sydney, NSW, Australia) **The vertebrate retina: Principles of structure and function.** San Francisco, CA: W. H. Freeman, 1973. 1044 p.—Presents a comprehensive text about the organization of the vertebrate retina, following the



temporal sequence of events in retinal function. Findings are based on physical, chemical, and structural foundations. The part played by the retina in adaptation and in color vision is included. (52 p ref)

2436. University of Edinburgh. (Scotland) **Recent advances in methods for studying the pharmacology of single central neurones: A symposium held at the University of Edinburgh, 8-9 October 1973.** *Neuropharmacology*, 1974(Jun), Vol 13(6), 401-573.—Discusses attempts to quantify the effects of drug dosages by using dose-response curves, and summarizes drug effects in their action on glial cells and blood vessels and the possibility of interneural connections and transneuronal responses. Evidence is presented for multiple receptor sites with different types of drug responses. Advances concerning the nature and type of cell that is fired, including a hypothesized interneuron, are discussed, and a technique which anatomically identifies cells at the electrode-tip site using histochemical methods is described. Advantages and disadvantages (a) of new techniques for coupling between the recording electrode and the iontophoresis or conductance-measuring electrodes, (b) of stimulus-secretion coupling and the effect of this on membrane conductance, and (c) of the use of ion-selective electrodes are explored.—*B. McLean*.

### Neuroanatomy & Electrophysiology

2437. Armington, John C. & Bloom, Marie B. (Northeastern U) **Relations between the amplitudes of spontaneous saccades and visual responses.** *Journal of the Optical Society of America*, 1974(Sep), Vol 64(9), 1263-1271.—Electroretinograms and visually evoked cortical potentials, dependent on the occurrence of spontaneous saccadic eye movements, were recorded from 3 human Os. A computer system was used to isolate average-response waveforms that resulted from saccadic displacements of the retinal image. The responses were recorded as the O fixed his eye on the center of a steady pattern of vertical stripes presented in maxwellian view. The responses depended on the spatial frequency of the pattern being viewed; in all cases, they were proportional to the extent of saccadic movement. Results are interpreted in terms of response additivity and the numbers of cones stimulated by the image displacement. (40 ref)—*Journal abstract*.

2438. Buchsbaum, Monte S.; Henkin, Robert I. & Christiansen, Richard L. (NIMH, Bethesda, MD) **Age and sex differences in averaged evoked responses in a normal population, with observations on patients with gonadal dysgenesis.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 137-144.—Studied visual and auditory average evoked responses (AERs) in 166 normal 6-60 yr old males and females and in 10 14-43 yr old patients with chromatin negative gonadal dysgenesis (45 XO). Females of all ages and patients with 45 XO exhibited larger amplitude AERs than males. No correlation between cephalometric roentgenographs and AER amplitude was found to explain these differences. Younger Ss exhibited larger AER amplitude, and greater increases in amplitude with increasing stimulus intensity; latencies were shorter and increased with increasing intensity rather than decreasing as in older Ss. These findings suggest that levels of

follicle stimulating hormone, luteinizing hormone, or gonadal steroids cannot be the only determinants of the sex differences observed. From the data on patients with 45 XO, it may be hypothesized that the absence of the Y chromosome may be associated with the female AER pattern. (French summary) (34 ref)—*Journal summary*.

2439. Butler, S. R. & Glass, A. (U Birmingham, Medical School, England) **Asymmetries in the CNV over left and right hemispheres while subjects await numeric information.** *Biological Psychology*, 1974, Vol 2(1), 1-16.—Recorded the contingent negative variation (CNV) from frontal and central electrodes in 1 left-handed and 12 right-handed medical students. The CNV was elicited by tachistoscopically exposed visual stimuli comprising a warning spot followed by a numeral. Numerals so exposed had to be memorized (cumulative condition), added (arithmetic condition), or checked to ensure that all were zeros (repetitive condition). The arithmetic and cumulative tasks were designed to potentiate any expectancy mechanisms in the hemisphere dominant for verbal processes. The repetitive task was intended as a neutral control. All 3 tasks elicited CNVs whose amplitude was greater over the hemisphere contralateral to the preferred hand. Results are discussed in terms of possible relationships with handedness and the lateralization of cerebral function. (43 ref)—*Journal abstract*.

2440. Cael, William W.; Nash, Allan & Singer, Jay J. (Florida Atlantic U) **The late positive components of the human EEG in a signal detection task.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 385-387.—Attempted to replicate a study by S. Hillyard et al (1971) which used human Ss in a signal detection task and obtained a prominent late positive component (LPC) of the EEG only in the Hit category of responses. They concluded that the LPC reflected S's degree of certainty that a signal has occurred. In contrast the present study, which used 8 undergraduates, found that the LPC occurred in the Hit, Miss, and Correct Rejection categories of responses, thereby supporting the hypothesis that the LPC is a correlate of uncertainty reduction and does not directly depend on the physical presence of the signal. (French & German summaries)—*Journal abstract*.

2441. DeArmond, Stephen J.; Fusco, Madeline M. & Dewey, Maynard M. (Medical Coll Pennsylvania, Philadelphia) **Structure of the human brain: A photographic atlas.** New York, NY: Oxford U Press, 1974. ix, 166 p.

2442. Desmedt, J. E.; Brunko, E.; Debecker, J. & Carmeliet, J. (U Brussels, Brain Research Unit, Belgium) **The system bandpass required to avoid distortion of early components when averaging somatosensory evoked potentials.** *Electroencephalography & Clinical Neurophysiology*, 1974(Oct), Vol 37(4), 407-410.—Studied the effects of 14 filter conditions with cutoff ranging from 3 kc/sec to 50 c/sec and with either 6 or 24 db/octave roll off when averaging the somatosensory cerebral potentials evoked by electrical stimulation of fingers in 8 21-37 yr old normal adult men. Severe distortions of latencies and voltages were observed for low-pass filtering below 1 kc/sec. It is emphasized that the overall system bandpass should extend to 3 kc/sec when studying the early components and when estimating the onset latency of the surface negative N<sub>1</sub> component. Precise information about the system band-

pass used should be included in published reports.

—*Journal summary.*

2443. Doyle, Joseph C.; Ornstein, Robert & Galin, David. (Langley Porter Neuropsychiatric Inst, Inst for the Study of Human Consciousness, San Francisco, CA) **Lateral specialization of cognitive mode: II. EEG frequency analysis.** *Psychophysiology*, 1974(Sep), Vol 11(5), 567-578.—Conducted a frequency analysis of hemispheric EEG asymmetries in 10 normal right-handed adults performing cognitive tasks. Language and arithmetic tasks were expected to engage primarily the left hemisphere; spatial and musical tasks were expected to engage primarily the right hemisphere. Recordings from temporal leads and parietal leads referred to the vertex were subjected to discrete Fourier transforms; ratios of power from homologous leads were computed in conventional frequency bands. These ratios (right-left) were significantly higher in verbal and arithmetic tasks than in spatial tasks primarily in the alpha band. Considering the alpha band alone revealed a task dependence of the asymmetry 2-5 times greater than reported earlier for whole band power. Whenever a significant task dependence of asymmetry appeared in any band, it was in the same direction; the hemisphere primarily engaged in the cognitive activity developed proportionately less power. The requirement of motor output increased the task dependence of alpha asymmetry and lowered alpha power levels. (25 ref)—*Journal abstract.*

2444. Edwards, David C. (Iowa State U) **Stimulus intensity and recency contrasts and orienting response strength.** *Psychophysiology*, 1974(Sep), Vol 11(5), 543-547.—300 university students heard sequences of noise pulses. Skin conductance response (SCR) magnitudes revealed that intensity and recency effects remained effective during habituation trials. Habituation of the SCR magnitude occurred to stimuli that were presented in a pattern composed of 2 intensities and to stimuli in a pattern of 2 interstimulus intervals, though the specific differential effects of level of intensity and of recency remained clearly evident. There appeared an enhancement of response magnitude to intense stimuli (an apparent contrast effect) when they were presented in that pattern of 2 intensities and compared to response to suitable control sequences. After significant but not complete habituation occurred, a reduction in stimulus intensity or of interstimulus interval reduced SCR magnitude further. (16 ref)—*Journal abstract.*

2445. Eggermont, J. J. & Odenthal, D. W. (U Medical Ctr, Leiden, Netherlands) **Methods in electrocochleography.** *Acta Oto-Laryngologica*, 1974, Suppl 316, 17-24.—Human electrocochleography is reviewed and the significance of the recorded potentials is discussed, with special reference to the recording site. Response amplitude and threshold values for transtympanic action-potential recording are compared for various recording sites. In addition, click and tone-burst results are compared with respect to frequency specificity and accordance with subjective thresholds. (49 ref)

2446. Eggermont, J. J. & Odenthal, D. W. (U Medical Ctr, Leiden, Netherlands) **Action potentials and summing potentials in the normal human cochlea.** *Acta Oto-Laryngologica*, 1974, Suppl 316, 39-61.—Describes

the properties of both the compound action potential and summing potential, based on a study of 18 normal human cochleas. The summing potentials are discussed with respect to the input-output behavior and occurrence of positive and negative summing potentials. The compound action potential is discussed with respect to (a) amplitude-intensity and latency-intensity behavior, (b) the action potential waveform, (c) adaptation and masking properties, and (d) amplitude-latency and width-latency relations describing the internal synchronization for the components of the compound action potential. A regression analysis was performed for the amplitude-latency scattergrams to provide adequate data reduction. Detailed properties of the 2 populations of neural units are given, and a morphological substrate is proposed. A comparison is made between results obtained in humans and guinea pigs.—*Journal abstract.*

2447. Eggermont, J. J. (U Medical Ctr, Leiden, Netherlands) **Basic principles for electrocochleography.** *Acta Oto-Laryngologica*, 1974, Suppl 316, 7-16. Describes the stimulus-related cochlear potentials in terms of their usefulness in human electrocochleography (ECOG). It is concluded that cochlear microphonics cannot provide information about the integrity of hair cells outside the most basal part of the cochlea and therefore are not useful for ECOG. Other considerations when performing clinical ECOG are also discussed. (39 ref)

2448. Flamm, Lois E. (Texas A&M U) **Electroretinogram and visually evoked potential associated with paced saccadic displacement of the stimulus.** *Journal of the Optical Society of America*, 1974(Sep), Vol 64(9), 1256-1262.—In a 3-part experiment with a total of 4 Ss, 2 Os made saccadic eye movements of specified distance horizontally across the central opaque stripe in circular patterns of vertically oriented stripes that differed in area or spatial frequency. Electroretinograms (ERGs) and visually evoked cortical potentials (VECPs) were recorded simultaneously. When the S moved his eye through either a fraction of a stripe width in a fixed-stimulus configuration or a complete stripe width across stimuli of various diameters, ERG amplitude increased linearly with the number of visual cells activated. When illuminance changes over equal numbers of receptors were produced by having the S make full-stripe saccades in fixed-diameter gratings of various spatial frequencies, the resulting ERGs were of approximately equal size. The VECPS showed monotonic increases of amplitude with increasing saccade size and area of stimulation. (20 ref)

—*Journal abstract.*

2449. Foret, J. & Benoit, O. (Lab de Physiologie du Travail, Paris, France) **[Sleep patterns of workers on rotating shifts.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Oct), Vol 37(4), 337-344.—Recorded EEG activity and sleep patterns during nocturnal and diurnal sleep in workers who had been on rotating work shifts for several years. The duration of sleep was reduced when it took place during the daytime or at times other than usual sleep periods. The later S went to sleep, the shorter was the duration of daytime sleep. The amount of daytime paradoxical sleep (PS) was less than during the night, but the amount of slow wave sleep (SWS) was practically the same in these 2 conditions. PS



increased as a function of time in a given period of sleep during both the night and day, but increased more rapidly during the first cycles of daytime sleep. PS and SWS were dependent on the time when sleep began but in different manners: PS followed a circadian rhythm with the most favorable period in the nycthemeron at the end of the night and in the beginning of the morning, while SWS was more dependent on the duration of the previous waking period. It is concluded that the difficulties experienced by workers with alternating work schedules should be attributed more to the schedule shift than to the lack of sleep itself. (21 ref)—*English summary*.

2450. Furst, Charles J.; Gardner, Joanne & Kamiya, Joe. (Dartmouth Coll) **Posterior alpha-wave characteristics of eidetic children.** *Psychophysiology*, 1974(Sep), Vol 11(5), 603-606.—Investigated 4 5½–11 yr old right-handed children who reported having eidetic images. 10 other Ss served as controls. It was found that high-amplitude occipital alpha activity occurred during eidetic periods, contrary to the usual observation in adults that visual imagery tends to block alpha waves. In addition, these children had higher resting baseline alpha than the controls.—*Journal abstract*.

2451. Gentle, Michael J. (Poultry Research Ctr, Edinburgh, Scotland) **Changes in habituation of the EEG to water deprivation and crop loading in *Gallus domesticus*.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 15-19.—Recorded arousal changes in the EEGs of 10 implanted Brown Leghorn hens in response to successive oral stimuli with distilled water following either overnight water deprivation or previous loading of the crop with 50 ml of distilled water. From the EEG record it appeared that the Ss took longer to habituate to the distilled water after deprivation, and there was a very marked increase in the length of arousal following crop loading. This increase was accompanied by behavioral evidence that the water was aversive. It is concluded that the type of feedback from the oral receptors depends on the physiological state of the animal. (18 ref)—*Journal abstract*.

2452. Haaland, K. York. (VA Hosp. Albuquerque, NM) **The effect of dichotic, monaural and diotic verbal stimuli on auditory evoked potentials.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 339-345.—To clarify the nature of the right ear preference in dichotic listening to speech stimuli, comparisons were made between evoked responses from the 2 hemispheres of 9 right-handed normal males when verbal input (dichotic, monaural, or diotic) and response accuracy varied. The positive component of the evoked response was significantly larger in the right hemisphere in all conditions. No significant asymmetry was seen in the negative component. Negative and positive components did not vary with response accuracy. However, the negative component was significantly larger in dichotic tasks than in all others. This difference may be related to complexity of dichotic input or to inhibition of the ipsilateral auditory pathway during dichotic stimulation. (French & German summaries) (21 ref)—*Journal abstract*.

2453. Hord, David; Tracy, Mary & Naitoh, Paul. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Intra-hemispheric phase relationships during self-regulated alpha activity.** *Electroencephalography*

& *Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 133-136.—Examined the phase angle of frontal-occipital alpha in 6 college students during 45-min alpha feedback sessions in which a contingent auditory reinforcer was used to maximize occipital alpha abundance. During the baseline and early part of the feedback session the mean phase angle for the Ss was approximately 40–42 msec with occipital alpha leading frontal alpha. During the latter part of the contingent feedback period the average phase angle increased significantly to approximately 47 msec. The results were consistent for repeated alpha feedback sessions separated by several days. (French summary)—*Journal summary*.

2454. Ikeda, Terutika. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) [Later component of optic evoked potential during affective behavior in cats.] (Japn) *Kyushu Neuro-psychiatry*, 1971(Oct), Vol 17(2), 85-89.—Investigated evoked potential induced by optic nerve stimulation during conditioned avoidance behavior in cats. The later potential, whose negative peak occurred at the latency of 16 msec, appeared to follow the primary optic evoked potential under a high level of arousal. This potential was usually concealed by the myogenic extracerebral potential, and its full appearance was made under Flaxedil immobilization. A close correlation was found between the later potential and the reticular potential. The postsynaptic component of the optic evoked potential increased with the elevation of arousal level up to a given level, at which augmentation of the potential ceased. The relation of the optic evoked potential to the reticular arousal level is discussed.—*English summary*.

2455. Kasamatsu, Akira & Hirai, Tomio. (U Tokyo, Branch Hosp, Japan) **An electroencephalographic study on the Zen meditation (zazen).** *Journal of the American Institute of Hypnosis*, 1973(May), Vol 14(3), 107-114.—Studied alpha blocking by observing the EEG response to repetitive click stimulation in 48 priests and followers of Zen Buddhism. Results show that (a) Zen meditation with opened eyes produced a fairly constant alpha blocking time (3–5 sec) to every stimuli; and (b) while the habituation of alpha waves in 4 control Ss occurred very quickly, this was not the case in the 3 Zen masters. (32 ref)—*M. E. Pounzel*.

2456. Kimsey, Randall A.; Dyer, Robert S. & Petri, Herbert L. (U Delaware) **Relationship between hippocampal EEG, novelty, and frustration in the rat.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 561-568.—In a single alternation runway task, hippocampal EEG's of 7 implanted male Sprague-Dawley rats changed with learning. At the goal cup, EEG frequencies varied depending upon whether a trial was reinforced or nonreinforced. Frequencies of 7.5–8.5 Hz accompanied nonreinforced trials while lower-frequency less synchronized activity accompanied reinforced trials. These EEG patterns did not appear closely related to novelty or frustrative nonreward.—*Journal abstract*.

2457. Kinkaide, Perry S. & Walley, Roc E. (U Alberta, Edmonton, Canada) **Visual evoked potentials during stimulus selection in eyelid conditioning in the rabbit (*Oryctolagus cuniculus*).** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 481-494.—The eyeblinks of 24 New Zealand white rabbits were

conditioned in Exp I to either the visual or the nonvisual element of a compound conditioned stimulus. Evoked potentials (EPs) were simultaneously recorded from the visual cortex. Changes in the late negative component of the EP were related to nonspecific arousal effects. The initial surface positive component, however, was significantly enhanced during visual stimulus control. This enhancement was observed whether the visual stimulus was presented alone or in compound and with either photic or optic chiasma stimulation as the visual stimulus. The effect could not be attributed to arousal, sensitization, or to peripheral mechanisms. Some implications of the data were assessed through a subsequent investigation in Exp II of geniculostriate recovery cycles under the same conditions. (28 ref)—*Journal abstract.*

2458. Lynch, James L.; Paskewitz, David A. & Orne, Martin T. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Some factors in the feedback control of human alpha rhythm.** *Psychosomatic Medicine*, 1974(Sep-Oct), Vol 36(5), 399-410.—Conducted 3 experiments to explore factors involved in the biofeedback control of human alpha rhythm. 21 Ss were given either auditory or visual feedback regarding the occurrence of alpha activity in their EEG record; 8 Ss were run as a noncontingent feedback control group. Significant linear increases in alpha density across feedback trials were observed in all Ss given visual feedback, including the control group. Auditory feedback did not lead to significant increases in alpha density across feedback trials, and levels approached but did not exceed the initial preexperimental baseline levels. Data do not support the view that the feedback situation produces levels of alpha activity greater than those seen under natural baseline conditions or that accurate feedback is necessary to demonstrate gradual trial-to-trial increases in this rhythm. The data do suggest that alpha densities observed in the feedback situation have less to do with feedback per se or a learning process than with the experimental situation and S's own natural alpha densities. Results support the position that increases in human alpha activity occur in feedback situations when the individual disinhibits various stimulus, attentional, and arousal factors that normally block this rhythm. (21 ref)—*Journal abstract.*

2459. Mader, D. J.; Marble, A. E. & Reeves, John L. (Nova Scotia Technical Coll, Halifax, Canada) **An inexpensive variable time period integrator for electromyographic signals.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 411-415.

2460. Mailloux, J. G. et al. (U Ottawa, Faculty of Medicine, Ontario, Canada) **Effects of differential rearing on cortical evoked potentials of the albino rat.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 475-480.—3 groups of Sprague-Dawley albino rats were reared in different environments from weaning to the age of 95 days. One group was in a visually enriched environment ( $n = 8$ ), a 2nd group was in an auditorily enriched environment ( $n = 8$ ) and a 3rd group, controls, received no enrichment ( $n = 16$ ). Photic and auditory evoked potentials were recorded in unanesthetized Ss from chronically implanted epidural electrodes over the visual and auditory cortex. Ss whose enrichment included visual stimulation yielded significantly

shorter latencies in their photic evoked responses recorded over the visual cortex than latencies recorded from controls or from Ss whose enrichment excluded visual stimulation. (17 ref)—*Journal abstract.*

2461. Milstein, Victor. (U Indiana, Medical Ctr, Indianapolis) **Alpha wave phase and alpha attenuation.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 167-172.—Examined habituation of the alpha attenuation response (AAR) to both visual and auditory stimuli to determine whether different degrees of habituation would be demonstrated when stimuli were presented at different phases of the alpha wave. Contingent alpha attenuation in a paired click-flash sequence was also examined. 60 hospital personnel and medical and nursing students with abundant, fairly high amplitude alpha activity were assigned randomly to 1 of 5 groups determined by the point on the alpha wave at which they were stimulated. The groups were further divided into 4 subgroups, each of which had the procedure repeated with stimuli presented at 1 of the other points on the alpha wave. The duration of the AAR decreased with successive blocks of trials to the least extent and most slowly for Ss stimulated randomly. Duration decreased most rapidly for the group stimulated at the peak of alpha wave with clicks and for the group stimulated midway on the up-going portion of the wave with flashes. In the paired condition, Ss stimulated at the trough of the wave tended to reach criterion in the fewest number of trials. Results suggest that phase of the alpha wave is associated with cortical excitability. (French summary)—*Journal summary.*

2462. Nakao, Hiroshi. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[Brain mechanism of fear and anger.]** (Japn) *Kyushu Neuro-psychiatry*, 1971(Dec), Vol 17(3-4), 113-118.—Discusses basic brain functions of fear, anger, and conflict from the standpoint of "brain-behaviorism." Electrophysiological evidence shows that electrical stimulation of the hypothalamus and part of the limbic system can evoke both fear and anger; however, it is still not known whether each nerve cell in these areas has its own function. Behaviorally, the hypothalamus may be divided into 2 major parts, the lateral area and the medial area. The lateral area is related to sleep, pleasure, and self-stimulation while the medial area is related to fear and anger. It is concluded that conflict can be effectively studied by the use of a behavioral model based on concepts of physiological psychology.—S. Ashida.

2463. O'Brien, James H. & Packham, Steven C. (U Oregon, Medical School) **Habituation of cell activity in cat postcruciate cortex.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 781-786.—Recorded single cell activity in postcruciate cortex of 50 acutely prepared cats during habituation and classical conditioning. Background firing rate and evoked activity in light (conditioned stimulus) were examined. Based on P. M. Groves and R. F. Thompson's (1970) dual-process theory of habituation, it was hypothesized that neurons which exhibit habituation should also show the best conditioning. Neurons which exhibited response decreases during the habituation series produced slightly larger changes in response during conditioning, but the effect was essentially a maintained early change in response



rather than a response development analogous to learning. In contrast, neurons which exhibited response increases during the habituation series produced developmental response changes during conditioning. A single neuron exhibited both increases in response and habituation effects, but these effects were located at different response intervals following the stimulus.—*Journal abstract*.

2464. Ornitz, Edward M. et al. (U California, Medical School, Los Angeles) **The recovery cycle of the averaged auditory evoked response during sleep in normal children.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 113-122.—Studied the recovery cycle of the averaged auditory evoked response to paired clicks during Stage 2 and rapid eye-movement (REM) sleep in 23 normal 22-67 mo old children. Stimulus separations of 250, 160, 80, 40, 20, and 10 msec were used, and paired clicks were alternated with single clicks every 2.0 sec throughout the night. It was found that in Stage 2 sleep there was a significant reduction of amplitude recovery at stimulus separations of 250 and 20 msec, while this reduction occurred at all stimulus separations during REM sleep. The reduction of amplitude recovery was significantly greater during REM sleep than during Stage 2 sleep at stimulus separations of 80 msec or less. However, the amplitude recovery cycle in the 2 sleep stages was similar, and was best described by a combination of linear and cubic components. In Stage 2 sleep, the only significant effect on latency recovery was a slight delay at an 80-msec stimulus separation. During REM sleep significant delays in recovery occurred at 80, 40, and 20 msec. In both sleep stages, the latency recovery cycle showed a significant linear delay in recovery with shorter stimulus separations. Increased amplitude recovery and delay in recovery during REM sleep at a 250-msec stimulus separation occurred with increasing age. (French summary) (29 ref)—*Journal summary*.

2465. Peters, Michael. (British Columbia Mental Health Branch, Tranquille, Canada) **A schematic atlas of the cerebellum of the rat.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 133-141.—Shows 32 sagittal and 22 frontal sections of the Wistar AF/Han albino rat cerebellum. The selection of sections emphasizes areas of the cerebellum which contain the cerebellar nuclei. Each section is provided with stereotaxic coordinates.

2466. Pinson, Lewis J. & Childers, Donald G. (Auburn U) **Frequency-wavenumber spectrum analysis of EEG multielectrode array data.** *IEEE Transactions on Biomedical Engineering*, 1974(May), Vol 21(3), 192-206.—Analyzes EEG data consisting of (a) visual evoked responses monitored via an array of electrodes from humans and (b) penicillin-induced focal epileptic discharge data recorded from rat neocortex. This procedure, previously applied to seismic array data, offers a method by which high-resolution vector velocity, and thus the direction and speed of propagating wavefronts, can be estimated.

2467. Prevec, Tine S.; Lokar, Jože & Černeč, Smilja. (U Ljubljana Hosp, Inst of Clinical Neurophysiology, Yugoslavia) **The use of CNV in audiometry.** *Audiology*, 1974, Vol 13(6), 447-457.—Used the contingent negative variation (CNV) to design an objective test of the

threshold of perception of a simple acoustic stimulus by 8 volunteers with normal hearing. A tone of adjustable intensity was delivered by an audiometer to predict a 2nd stimulus (weak flash of light) to follow after a short interval. A CNV was generated during this interval if the S expected the 2nd stimulus. When the S did not perceive the tone, the CNV did not appear. Acoustic stimuli near the threshold frequently produced a CNV of higher amplitude than those following stronger stimuli. Comparatively short intervals between the conditioning and the test stimulus could be used. The advantages of the use of the CNV as an objective audiometric test as compared to evoked cerebral potential audiometry and the possibility of using the method in clinical practice are discussed. (French summary) (40 ref)—*Journal abstract*.

2468. Sano, Katsunori; Iwahara, Shinkuro & Sano, Atsuko. (Tokyo U of Education, Japan) **[Hippocampal electrical activity in spontaneous behavior and active avoidance conditioning in rats.]** (Japn) *Annual of Animal Psychology*, 1972, Vol 22(2), 70-81.—Investigated the frequency characteristics of the hippocampal EEG in relation to behavior patterns. Bipolar recording electrodes were implanted into the brain of 8 adult male rats, and the hippocampal EEG was continuously examined with an electronic frequency analyzer. Regular slow waves of 7-9 Hz (theta waves) appeared when the Ss were making head or body movements related to search and attention. During the acquisition of 1-way avoidance response, the theta waves appeared upon the presentation of a warning signal. The frequency shifted from 7 Hz to 10 Hz a few seconds before the occurrence of an avoidance response, and returned to 6-8 Hz after the response. The theta waves are more closely related to attention than to learning or voluntary responses. (English summary)—S. Nakajima.

2469. Schlehuber, Cameron J.; Flaming, Dale G.; Lange, G. David & Spooner, Charles E. (U California, Medical School, Davis) **Paradoxical sleep in the chick (*Gallus domesticus*).** *Behavioral Biology*, 1974(Aug), Vol 11(4), 537-546.—Classified states of sleep and wakefulness in 17 White Leghorn cockerel chicks by computerized monitoring of multiple unit activity, EEG, and electromyographic recordings. Ss of 1 day, 1 wk, 1 mo, and 4 mo of age, were monitored for paradoxical sleep (PS) on a 12-hr-day-12-hr-night cycle. No significant differences could be distinguished among the Ss 1 wk and older. Obvious PS periods were shorter and fewer for the day-old Ss, and total PS appeared to be less than half that of the older Ss. A trend in frequency of PS through the night was evident in the older Ss. As the sleep period progressed, PS increased from less than 5 to more than 25% of sleep by the termination of the night period. The PS increase was due to an increase in the frequency of occurrence of the periods, rather than a lengthening of each period. Percentage of total PS and the increase in the absolute amount of PS through the sleep period in the older chick is slightly similar to man, but the pattern is different. (17 ref)—*Journal abstract*.

2470. Schlue, Wolf R. (U Göttingen, W Germany) **[Central nervous system organization of the escape reflex in the cockroach (*Periplaneta americana*): II. Fatigue processes in cercal reflex arc.]** (Germ) *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 224-238.

—Studied electrophysiological mechanisms of fatigue of the cockroach cercal escape response. Fatigue was associated with synaptic changes in the abdominal ganglion VI, and the synapses involved were those between sensory fibers and interneurons and not between sensory fibers and giant fibers. (English summary)

2471. Schlue, Wolf R. (U Göttingen, Zoological Inst, W Germany) [Central nervous system organization of the cercal escape reflex in the cockroach *Periplaneta americana*: I. Transformation of cercal excitation into leg motoneurone efferences.] (Germ) *Zeitschrift für Tierpsychologie*, 1974(Feb), Vol 34(2), 172-207.—Studied transformation of afferent signals into different patterns of motor response. Cercal sensillae, the cercal nerve, or the abdominal cord were stimulated and neural activity in various efferent nerves was recorded.

2472. Schmidt, P. H. & Spoor, A. U. (U Medical Ctr, Leiden, Netherlands) The place of electrocochleography in clinical audiometry. *Acta Oto-Laryngologica*, 1974, Suppl 316, 5-6.—Discusses the advantages and disadvantages of using electrocochleography (ECOG) compared to auditory-evoked-response and psychogalvanic-response audiometry. Major reasons for using ECOG are outlined, including the need to obtain objectively determined thresholds in patients for whom subjective audiometry is not feasible.

2473. Sharrard, G. A. (U Manchester, England) A study of auditory evoked responses during sleep. *Audiology*, 1974, Vol 13(6), 458-463.—Studied the evoked responses to tones in different stages of sleep in a group of 31 normally hearing medical and dental students. The stage of sleep was monitored by experienced workers in EEG and the responses recorded together with the stage of sleep in which they were elicited. Attention was paid to the shape, amplitude, latency, and clarity of responses. Statistical attention was paid to the relationship between stage of sleep and the above qualities of the responses. It was found most useful to stimulate with a 1,000-Hz tone of 75 db intensity since this gave a clear response without disturbing the depth of sleep. The most favorable periods appeared to be Stages 2 and 3; the least favorable were Stages 4 and that of rapid eye movement. (French summary)—*Journal abstract*.

2474. Smith, D. B. & Strawbridge, P. J. (U Southern California, Inst of Safety & Systems Management) Auditory and visual evoked potentials during hyperoxia. *Electroencephalography & Clinical Neurophysiology*, 1974(Oct), Vol 37(4), 393-398.—Recorded averaged evoked potentials (AEP) and contingent negative variations (CNV) in Ss who breathed air and oxygen at 1 atm. No effect of hyperoxia was found on the auditory AEP, visual AEP, or CNV, nor was a prior report of enhancement of the after-discharge of the visual AEP observed. (French summary) (25 ref)

2475. Spoor, A. (U Medical Ctr, Leiden, Netherlands) Apparatus for electrocochleography. *Acta Oto-Laryngologica*, 1974, Suppl 316, 25-36.—Describes the recording and stimulation components of an apparatus for electrocochleography, designed to be used in experimental work and in auditory evoked potential audiometry.

2476. Stark, Louis H. & Norton, James C. (U Kentucky, Medical Ctr) The relative reliability of average evoked response parameters. *Psychophysiology*, 1974(Sep), Vol 11(5), 600-602.—19 male alcoholic volunteers served as Ss in a study to determine the relative test-retest reliability of various average evoked response (AER) parameters. Slope was found to be the most reliable measure. Implications for group studies using AER techniques are drawn.

2477. Waters, William F. & McDonald, David G. (U Missouri) Effects of "below-zero" habituation on spontaneous recovery and dishabituation of the orienting response. *Psychophysiology*, 1974(Sep), Vol 11(5), 548-558.—20 male undergraduate Ss underwent habituation of the skin conductance component of the orienting response to a neutral tone, spontaneous recovery, rehabituation, and dishabituation (habituation, H condition). Another 20 Ss underwent the same procedure, except they received an additional 10 stimulus presentations immediately after initial habituation (extended habituation, EH condition). The EH condition resulted in more (nonsignificant) spontaneous recovery and trials to rehabituation than did the H condition, indicating that such a "below-zero" habituation procedure did not strengthen habituation. There were significant differences between the groups in response to a postrehabilitation buzzer (dishabituating stimulus), and in response to the subsequent re-presentation of the original tone stimulus (dishabituation), the EH group giving larger responses than the H group. These latter results are consonant with both Y. N. Sokolov's (1963) and P. M. Groves and R. F. Thompson's (1970) approaches to habituation.—*Journal abstract*.

2478. Zschocke, St. (U Hamburg, Neurology Clinic, W Germany) An electronic device for continuous counting of chemically induced epileptic discharges. *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 191-193.—The amplitude discriminating power for detection of epileptic interictal "spikes" can be increased by a preceding differentiation of the EEG, which enables a selective amplification of the seizure potentials with respect to their slope. A device is described which rejects the spurious pulses obtained with this procedure by using a monostable multivibrator. (French summary)

2479. Zuckerman, Marvin; Murtaugh, Thomas & Siegel, Jerome. (U Delaware) Sensation seeking and cortical augmenting-reducing. *Psychophysiology*, 1974(Sep), Vol 11(5), 535-542.—Presented 49 male undergraduates with 5 intensities of light flashes in randomly presented blocks of trials at each intensity. Averaged evoked response (AER) amplitudes were measured at each intensity of light. Augmenting-reducing was measured for each S as the slope of the relationship between stimulus intensity and amplitude of response. This slope measure correlated very significantly ( $r = .59$ ) with the Disinhibition subscale of the Sensation Seeking Scales and positively, but not significantly, with other subscales. Comparing the low and high scorers on the Disinhibition scale, a significant interaction between groups and stimulus intensities was found. The high disinhibitors did not differ from the lows at the low stimulus intensities but did differ significantly at the



highest intensity where the lows showed a marked reducing tendency. Results show an interesting convergence between the Disinhibition type of sensation seeking, manic tendencies, and the AER. (23 ref) —*Journal abstract.*

### Physiological Processes

2480. Adamson, Robert. (Florida Atlantic U) **Count-sampling circuits for heart-rate conditioning and other applications.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 407-408.—Describes count-sampling circuits which enable E to preset sample intervals and critical response rates (e.g., heart rates). The configurations are relatively inexpensive and easy to build.

2481. Axelrod, Julius. (National Inst of Mental Health, Lab of Clinical Science, Bethesda, MD) **The pineal gland: A neurochemical transducer.** *Science*, 1974(Jun), Vol 184(4144), 1341-1348.—Examines evidence from the literature which supports the existence of circadian rhythms in serotonin, serotonin N-acetyltransferase, N-acetylserotonin, and melatonin in the pineal gland which persist in continuous darkness and are abruptly abolished by exposure to light. These rhythms are generated by diurnal changes in the release of the neurotransmitter noradrenaline from sympathetic nerve terminals innervating the pineal. The responsiveness of the pineal  $\beta$ -adrenergic receptor changes and becomes supersensitive after decreased exposure to the catecholamines noradrenaline and isoproterenol and subsensitive after increased exposure to the catecholamines. It is concluded that the circadian rhythm in pineal amines appears to arise from a biological clock present in or near the suprachiasmatic nucleus in the hypothalamus. This clock is modulated by inhibition through environmental light. (62 ref)—*Journal summary.*

2482. Barbeau, André & Donaldson, John. (Clinical Research Inst of Montreal, Quebec, Canada) **Zinc, taurine, and epilepsy.** *Archives of Neurology*, 1974(Jan), Vol 30(1), 52-58.—Reviews recent findings that suggest that taurine, a nonessential amino acid, can prevent experimental seizures in mice, cats, and rats and some forms of seizure in man. Taurine and zinc metabolism seem closely related to epileptogenicity. Zinc, injected intraventricularly, leads to epileptic seizures in rats while taurine decreases seizures. Results suggest the need for conducting controlled therapeutic trials of taurine and detailed biochemical study of zinc metabolism in human epilepsy. (114 ref)—*E. A. Gavin.*

2483. Chouvet, Guy et al. (U Claude Bernard, Hôpital Neurologique, Lyon, France) **[Bicircadian period of sleep, waking cycle in "beyond time" isolation: A polygraphic study.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Oct), Vol 37(4), 367-380.—Reports data from polygraphic recordings of 3 young male Ss who were isolated "beyond time" in caves for 5-6 mo. Control recordings were obtained just before and after isolation. With variable latencies, all Ss reached a bicircadian rhythm (34 hrs of wakefulness followed by 14 hrs of sleep) which they subjectively considered to be a 24-hr cycle. Only 1 S was able to adapt completely to this new rhythm and maintain it over more than 2 mo. Several variations in sleep were observed, including (a)

the periodicity of paradoxical sleep (PS) remained unchanged while the sleep-waking rhythm was disrupted; (b) the total sleep duration was not correlated with the duration of the previous waking period, although both the duration of Stages 3 and 4 and PS remained in constant relationship with it; and (c) PS onset latencies in the 2 Ss unable to maintain a bicircadian rhythm were shortened. (19 ref)—*English summary.*

2484. Connor, William H. (State U New York, Binghamton) **Effects of brief relaxation training on autonomic response to anxiety-evoking stimuli.** *Psychophysiology*, 1974(Sep), Vol 11(5), 591-599.—Autonomic response effects of relaxation training are sometimes considered secondary to either cognitive or autonomic level change. In the present experiment, specific instruction and training were provided to 84 paid male undergraduates in making relaxation responses to a cue stimulus which was used subsequently in 2 mild anxiety conditions. Brief relaxation training did not significantly affect either verbal report of anxiety or autonomic level following training but did affect autonomic response in the anxiety conditions. Results suggest that autonomic response modification can be accomplished by instruction and relatively minimal training. Autonomic response effects need not be accompanied by either verbal report of greater relaxation or autonomic level modification. These results are difficult to account for by any theoretical model of desensitization which considers autonomic response change secondary to either cognitive or autonomic level change. (30 ref)—*Journal abstract.*

2485. DeLuca, Donald C.; Murphree, Oddist D. & Angel, Charles. (U Arkansas, Medical Ctr, Little Rock) **Biochemistry of nervous dogs.** *Pavlovian Journal of Biological Science*, 1974(Jul-Sep), Vol 9(3), 136-148.—Studied biochemical and behavioral differences between the A and E strains of pointer dogs. Nervous (E strain) dogs are more responsive to modification of serum creatine phosphokinase (CPK) in response to stress than are the normal (A strain) dogs. When not specifically subjected to stress, the serum CPK levels of both strains were highly related to age. Strain differences were also found for the cerebrospinal fluid acetyl cholinesterase activity levels in older animals. Tryptophan loading experiments, conducted in the presence and absence of tranlylcypromine, resulted in no readily observable behavioral modification in either strain, and the response of the cerebrospinal fluid 5-hydroxyindoleacetic acid levels was similar for the 2 strains. (36 ref)—*Journal summary.*

2486. Dement, William C. & Mitler, Merrill M. (Stanford U, Medical School) **An introduction to sleep.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix. 459 p. \$23.50.—Presents an overview of sleep, including discussions of the development of the EEG and study of the ascending reticular activating system, rapid eye movement sleep and sleep states, dissociative aspects of sleep and wakefulness, the temporal process in sleep, the psychology of sleep, and new directions in sleep research.

2487. Drewett, R. F. (Science Lab, Durham, England) **The meal patterns of the oestrous cycle and their motivational significance.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 489-494.

—Continuously monitored food intake throughout the estrous cycle of 6 female rats by operant methods. On the night of estrus the size of meals eaten was reduced, and the average intermeal interval was shorter; and even after meals of the same size, estrous Ss returned to eat again more quickly than dioestrous Ss. Results suggest that the way in which ovarian estrogens reduce food intake is by intensifying processes responsible for the short-term satiation of hunger without affecting the motivational processes responsible for its arousal. Signs of motivational arousal at estrus could thus be the result of a self-imposed nutritional deprivation, rather than a direct effect of ovarian hormones on sexual receptivity. (18 ref)—*Journal abstract*.

2488. Ely, Daniel L. & Henry, James P. (U Southern California) **Effects of prolonged social deprivation of murine behavior patterns, blood pressure, and adrenal weight.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 733-740.—Employed a behavioral monitoring technique using magnetic tagging for the prolonged observation of 6 colonies of control CBA mice ( $n = 102$ ) and 3 colonies of CBA mice that were socially isolated for 6 mo ( $n = 51$ ). After 40 days of social interaction in a population cage, several physiological and behavioral abnormalities were observed in the preisolated Ss. The males were hyperaggressive and failed to establish a stable social hierarchy, with a consequent high male mortality. Also, the preisolated Rank-1 males did not patrol their territory effectively in spite of greater overall activity. Phase drifts were found in both preisolated male and female circadian activity rhythms, together with elevated systolic blood pressures and adrenal weights. The females in the preisolated colonies had fewer pregnancies and an increased litter mortality compared with the control females. (20 ref)—*Journal abstract*.

2489. Fischel, Werner. [Problems of storage and synapse processes in the brain.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Feb), Vol 26(2), 65-69.—Presents a theory regarding storage of information in the human cortex and basal ganglions. The probable functions of transmitter substances and enzymes are discussed. It is hypothesized that information is stored in the diencephalon in the form of excitatory circuits, motor activities are stored in the basal ganglions, and enzymes somehow relate the two.—K. J. Hariman.

2490. Fowles, Don C. & Schneider, Robert E. (U Iowa) **Effects of epidermal hydration on skin conductance responses and levels.** *Biological Psychology*, 1974, Vol 2(1), 67-77.—Obtained simultaneous recordings of skin conductance responses (SCRs) and levels (SCLs) from 4 sites. A glycol solution at one site produced minimal hydration while agar jelly at another site which was presoaked with water produced maximal hydration. The other 2 sites were recorded with 2 standard electrolytes (agar jelly and Unibase cream). In 2 experiments with 12 female undergraduates in each, rapid and slow recovery SCRs were elicited over a period of 20-25 min. It is concluded that Unibase and agar have very different effects on skin conductance (SC) measurements and that the relationship between SC measures

and hydration is not monotonic. (24 ref)—*Journal abstract*.

2491. Frankignoul, M.; Juchmes, J.; Cession-Fossion, A. & Juchmes-Ferir, A. M. (U Liège, Belgium) **A study of the urinary elimination of catecholamines during effective physical exercises by normal subjects in relation to their anxiety and their aggressivity.** (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 393-410.—In 18 male students, the urinary elimination of catecholamines during physical exercises on an endless belt was correlated with certain psychological test data on anxiety, emotional instability, and aggressiveness. Results show that anxiety and emotional instability correlated significantly with the amount of noradrenaline excretion during moderate physical exercise. They also correlated with the amount of noradrenaline excretion before, during, or after a moderate or exhausting exercise. No correlations were discovered between catecholamine excretion and aggressiveness. It is suggested that sympathomimetic stimulation induced by physical exercise may be partially influenced by emotional instability (i.e., neurotic trends). (French, Dutch, German, Italian, & Spanish summaries) (23 ref)—*Journal abstract*.

2492. Freund, Kurt; Langevin, Ron & Zajac, Yaroslav. (U Toronto, Ontario, Canada) **Heterosexual aversion in homosexual males: A second experiment.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 177-180.—Investigated in 2 studies the theory that a fear of female genitals is a factor in male homosexuality. Study 1 showed that 28 homosexual and 48 heterosexual males responded with penile tumescence to pictures of isolated parts of the body of their preferred sex. In Study 2, 20 homosexual males who had been prearoused by pictures of male nudes did not respond to pictures of the vulva, the face, or the breasts of the mature female with penile volume changes different from those in response to sexually neutral slides. However, in terms of ratings on a 4-point scale for disgust, the vulva was rated significantly more disgusting than the breasts, which in turn were rated significantly more disgusting than the face and the sexually neutral pictures.—*Journal summary*.

2493. Gaebelein, Claude J. & Howard, James L. (U North Carolina, Medical School, Chapel Hill) **An improved respiratory system for curarized rats.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 427-429.—Describes a system in which peak expired CO<sub>2</sub> is continuously monitored from curarized rats, and an endotracheal tube is used to minimize dead air space. Results of blood gas analyses indicate that values obtained with this system are similar to values in noncurarized rats and that manipulation of expired CO<sub>2</sub> is an effective means of altering blood gas values.

2494. Gattoni, Renata C. & Izquierdo, Ivan. (Ctr de Neurochimie, Strasbourg, France) **The effect of conditioning and pseudoconditioning on RNA metabolism of rat hippocampus and neocortex.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 67-80.—Conducted a study with 120 albino rats as experimental Ss in which, after a 25-min session of conditioned avoidance in a shuttle-box, there was an increase of hippocampal and neocortical RNA concentration, together with an increase of uridine incorporation into cold- and hot-phenol-extractable



hippocampal RNA. 15-min conditioning sessions had no appreciable effect on any of these variables. After either 15 or 25 min of pseudoconditioning there was a fall of hippocampal RNA concentration together with an increase of hippocampal acid ribonuclease activity. In Ss pseudoconditioned for 25 min there was an increase of uridine uptake by both hippocampal and neocortical cold- and hot-phenol-extractable RNA and an enhancement of neocortical acid ribonuclease activity. Results show that changes in brain RNA metabolism caused by both behavioral variables are clearly different. Whereas conditioning seems to stimulate precursor incorporation into hippocampal RNA primarily, pseudoconditioning appears to stimulate first acid ribonuclease activity and RNA labeling only secondarily as a rebound effect both in hippocampus and neocortex. (36 ref)—*Journal abstract*.

2495. Gramsbergen, Albert. (U Hosp, Groningen, Netherlands) **Neuro-ontogeny of sleep in the rat.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Reviews the background and development of the use of the rat in sleep studies. Research in the development of behavioral states and of behavioral-state-specific EEG patterns in the rat is discussed with relation to the underlying neurophysiological mechanisms of behavior.

2496. Greenblatt, Robert B. (Medical Coll Georgia) **The psychogenic and endocrine aspects of sexual behavior.** *Journal of the American Geriatrics Society*, 1974(Sep), Vol 22(9), 393-396.—Posits that defective sexual adjustment can be managed more easily when there is some understanding of the respective roles of psychogenic and endocrine factors in sexual behavior. Sexual problems are discussed under the headings of maleness and femaleness, sex interest in the female, sexual inadequacy, and sexual gluttony. It is argued that only after differentiation of the psychogenic and endocrine factors can proper therapy be started.—*Journal abstract*.

2497. Hilgard, Josephine R. (Stanford U) **Sequelae to hypnosis.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 281-298.—From a group of 260 undergraduates who had been given the Harvard Group Scale of Hypnotic Susceptibility, Form A, an interview sample of 120 Ss yielded evidence that 15% had some kind of reaction to hypnosis that endured an hour or longer following an individual Form C session subsequent to group hypnosis. If those with short-term reactions lasting from 5 min to 1 hr are added, the number with some lingering effect rises to 31%. Although these symptoms following laboratory hypnosis were not severe, their presence is of importance both for theoretical and practical reasons. Although sequelae to hypnosis were more frequent among those with unpleasant reactions to earlier childhood anesthesia, the difference did not reach statistical significance. (German, French, & Spanish summaries) (23 ref)—*Journal abstract*.

2498. Hucklebride, Frank H. & Nowell, Norman W. (U Hull, England) **Plasma catecholamine response to physical and psychological aspects of fighting in mice.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 35-40.—Ex-

posed male Tuck TO strain albino mice to a short period of attack by a trained fighter each day for 5 days. On the 6th and subsequent days half of the Ss were exposed merely to the presence of a trained fighter while the other half were exposed to continued physical attack. On Days 6, 7, and 9 Ss were anesthetized immediately after the exposure period, and a blood sample was taken for assay of plasma epinephrine and norepinephrine levels. Plasma epinephrine levels were significantly elevated above the control level on all days. Plasma norepinephrine was also elevated, but the increase reached significance only on Day 9. Plasma catecholamine levels of Ss given previous experience of physical attack but exposed only to the presence of a trained fighter on the day of blood sampling were similar to those of controls on all occasions. It is suggested that, unlike adrenal corticosterone release which is induced by a relatively nonspecific state of hyperalertness or arousal, adrenomedullary epinephrine release is stimulated only under the specific circumstances which, for the mice in the present experiment, were not met by a psychological stimulus. (32 ref)—*Journal abstract*.

2499. Jernstedt, G. C. & Newcomer, Jeffrey P. (Dartmouth Coll) **Blood pressure and pulse wave velocity measurement for operant conditioning of autonomic responding.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 393-397.—Describes a system for measuring a correlate of the blood-pressure information obtained with conventional sphygmomanometric systems. The procedure involves the measurement of speed of propagation through the arterial system of the pressure pulse from the heart's contraction. This speed, the pulse wave velocity, is closely related to cuff-derived blood pressure. Many of the problems present with current sphygmomanometric systems are absent with this apparatus and procedure. Data collected from 2 Ss with the apparatus confirm earlier studies which indicate that pulse wave velocity is correlated with sphygmomanometrically measured blood pressure and is a valuable cardiovascular response measure.—*Journal abstract*.

2500. Jouvet, Michel. (School of Medicine, Lyon, France) **The role of monoaminergic neurons in the regulation and function of sleep.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Discusses empirical evidence which indicates that the sleep-waking cycle appears to be regulated by 2 monoaminergic systems: (a) some serotonergic neurons are responsible for slow-wave sleep and for the priming of paradoxical sleep and (b) some catecholaminergic neurons play a role in cortical arousal and in paradoxical sleep. From the existence of these antagonistic systems, different mechanisms underlying insomnia or decrease of waking are postulated.

2501. Kotses, Harry; Glaus, Kathleen D. & Fisher, Leslie E. (Ohio U) **Effects of subject recruitment procedure on heart rate and skin conductance measures.** *Biological Psychology*, 1974, Vol 2(1), 59-66.—Attempted to determine whether the method employed to recruit Ss influences subsequent autonomic behavior. Skin conductance (SC) and heart rate (HR) measures were recorded from 60 female undergraduates equally

divided among 4 groups: a volunteer group, a pay group, an S-pool group, and a coerced group. Response comparisons were made between groups during a 10-min adaptation period followed by 20, 5-sec bursts of 75-db white noise. Tonic levels and specific response magnitudes were scored for both SC and HR responses, and spontaneous SC activity was evaluated. Differences between the groups were observed in terms of HR and SC basal levels and conclusion that autonomic behavior during a recording session is strongly influenced by subject recruitment procedure.—*Journal abstract.*

2502. Kutscher, Charles L. & Miller, Dean G. (Syracuse U) **Age-dependent polydipsia in the SWR/J mouse.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 71-79.—In 5 experiments both absolute (ml) and relative water intakes (ml/100 g body weight) increased with age in the SWR/J mouse, and more so in the females than in the males. The well-defined circadian rhythm of drinking in this strain was not altered by the development of polydipsia. In females, the increase in water intakes was accompanied by a decrease in intakes of isotonic and hypertonic NaCl solutions in a single tube test. (21 ref)

2503. Lamprecht, Friedhelm; Matta, Raymond J.; Little, Betsy & Zahn, Theodore P. (NIMH Lab of Clinical Science, Bethesda, MD) **Plasma dopamine-beta-hydroxylase (DBH) activity during the menstrual cycle.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 304-310.—Measured plasma DBH activity in 6 women, 6 days/wk, over a complete menstrual cycle. The Ss rested for ½ hr before giving blood samples. DBH was assayed by a double enzymatic method. DBH activity increased during the follicular phase of the cycle, reaching a peak soon after ovulation, then decreased to a minimum during the premenstrual period. It is concluded that the activity of this enzyme does not seem to parallel the levels of estrogen or progesterone, nor those of peripheral indicators of autonomic activity (e.g., skin conductance and heart rate). However, the Surgency scale on the Nowlis Adjective Check List of Mood showed comparable changes over the cycle. (43 ref)—*Journal abstract.*

2504. Little, Betsy C. & Zahn, Theodore P. (NIMH, Lab of Psychology, Rockville, MD) **Changes in mood and autonomic functioning during the menstrual cycle.** *Psychophysiology*, 1974(Sep), Vol 11(5), 579-590.—The autonomic nervous system activity and mood ratings of 5 18-24 yr old female students and 7 27-42 yr old married women were studied 6 days/wk for a complete menstrual cycle. The daily procedure consisted of a resting period, a series of 5 mild tones, time-estimation (TE) and a reaction-time (RT) trials, and a final resting period. Significant increase in heart rate (HR), respiration rate, and body temperature, and a significant decrease in resting skin conductance (SC) were found during the luteal phase. During the ovulatory phase there were significant increases in autonomic responsivity, as shown by greater amplitude of SC response in the TE and RT situations as well as in faster SC drop-rate and greater HR variability. All measures coincided with a significant peak in feelings of elation and vigor. Significant age effects were that older Ss had higher basal body temperatures, less marked HR variability, and lower levels of SC, particularly in the luteal phase. Results are

discussed in terms of the psychophysiological effects of estrogen and progesterone. (54 ref)—*Journal abstract.*

2505. Lux, H. D. (Max-Planck-Inst for Psychiatry, Munich, Germany) **The kinetics of extracellular potassium: Relation to epileptogenesis.** *Epilepsia*, 1974(Sep), Vol 15(3), 375-393.—Results of an experiment with adult cats and a review of the literature support the hypothesis that an increase in extracellular cortical potassium is a result rather than a cause of epileptiform activity. 2 mechanisms by which potassium might be related to hyperactivity deserve particular attention. The potassium concentration in a small area surrounding a frequently discharging membrane may increase sufficiently to depolarize and finally excite terminal and synaptic regions of afferent fibers. This may explain "synaptic backfiring" and repetitive, recurrent excitation of thalamo-cortical afferent fibers following the primary discharges of interictal paroxysms. Previous experiments show that stimulation of some cortical afferents has a dual effect which consists of a small transient potassium increase followed by a longer lasting decrease in extracellular potassium, possibly by stimulating potassium uptake in terminal regions. Cortical excitability can be particularly high during declining potassium activity. Consequences of this mechanism (e.g., terminal afferent hyperpolarization and an increase in evoked transmitter release) may be considered in view of the considerable synaptic drive that initiates paroxysmal neuronal discharges. (French, German, & Spanish summaries) (35 ref)—*Journal summary.*

2506. Mangan, G. L. (U Oxford, England) **Personality and conditioning: Some personality, cognitive and psychophysiological parameters of classical appetitive (sexual) GSR conditioning.** *Pavlovian Journal of Biological Science*, 1974(Jul-Sep), Vol 9(3), 125-135.—Correlated a number of personality, cognitive, and psychophysiological measures taken from 25 male volunteers with classical (sexual) galvanic skin response acquisition and extinction rates. The data were factor analyzed. The acquisition and extinction factors identified were indexed by the psychophysiological (conditioned and unconditioned stimuli) variables. Cognitive and personality dimensions accounted for a negligible amount of variance. (29 ref)—*Journal abstract.*

2507. Offerhaus, R. E. **Heart rate variability, binary choice capability in psychiatry: Research report, January 1974.** Noordwijkerhout, Holland: "St Bavo" Psychiatric Center, [1974]. 477 p.—Discusses the development, testing, statistical analysis, and evaluation of an automated system for measuring mental stability through heart-rate variability.

2508. Ohman, Arne. (U Uppsala, Sweden) **The relationship between electrodermal and digital vasomotor responses in aversive classical conditioning.** *Biological Psychology*, 1974, Vol 2(1), 17-31.—32 psychology students, exposed to a tone conditioned stimulus (CS), shock unconditioned stimulus (UCS) simple delayed conditioning paradigm with an interstimulus interval of 8 sec, were compared in skin conductance and finger pulse volume responses to a sensitization control group of 32 Ss given unpaired CS-UCS presentations. Magnitude, probability, and amplitude of anticipatory and UCS omission responses were measured. Significant condi-



tioning effects for both these types of response were observed using magnitude and probability measures of the 2 effector systems. Between-S correlations showed significant positive relationships between vasomotor and electrodermal CS responses in the sensitization group and early in conditioning training. Later in training this relationship disappeared, indicating a learned dissociation of the response systems during classical conditioning. Within-S correlations showed that the 2 response systems developed quite independently over trials. (43 ref)—*Journal abstract*.

2509. Pauley, J. Donald; Reite, Martin & Walker, Stephen D. (U Colorado, Medical School, Denver) **An implantable multi-channel biotelemetry system.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 153-160.—Describes a totally implantable multichannel biotelemetry system developed for recording physiological information from a monkey infant living unrestrained in its social group. The FM carrier transmits electro-oculogram, electromyogram, heart rate, body temperature, and EEG information. The system would be useful in any situation requiring recording of multivariable physiological data from a completely unrestrained and unhampered experimental subject. (French summary) (17 ref)

2510. Peavler, W. Scott. (U Delaware) **Pupil size, information overload, and performance differences.** *Psychophysiology*, 1974(Sep), Vol 11(5), 559-566.—As a test of the hypothesis that pupil dilation during performance is partially due to a task related anxiety component, pupillary patterns were measured while 16 paid female college students processed digit strings of various lengths for immediate recall. Information overload resulted in a leveling of the dilation pattern which suggested a momentary suspension of processing effort. In addition, significant correlations were observed between individual differences in pupil size and recall performance. (30 ref)—*Journal abstract*.

2511. Peltzman, Philip & Goldstein, Phillip J. (U California, San Francisco) **Intrauterine monitor telephone system.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 419-423.—Describes the circuits and configurations of a low-cost custom-designed data system which uses a standard switched telephone line to transmit intrauterine physiologic data obtained during human labor.

2512. Petre-Quadens, Olga & Schlag, John D. (Eds.). (Born-Bunge Research Foundation, Antwerp, Belgium) **Basic sleep mechanisms.** New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.

2513. Petre-Quadens, Olga. (Born-Bunge Research Foundation, Antwerp, Belgium) **Sleep in the human newborn.** In O. Petre-Quadens & J. D. Schlag (Eds.), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Discusses data which indicate that quiet and active sleep in newborn infants are not homogeneous entities but that both states should be divided into 2 different stages. On the basis of behavioral differences, active sleep is divided into a primitive sleep state and paradoxical sleep. Quiet-sleep states are differentiated by their EEG characteristics.

2514. Ray, William J. (Pennsylvania State U) **The relationship of locus of control, self-report measures,**

**and feedback to the voluntary control of heart rate.** *Psychophysiology*, 1974(Sep), Vol 11(5), 527-534.—40 male internal and external locus of control undergraduates were instructed to control their heart rate (HR) on 8 trial pairs. Each trial pair consisted of an increase and a decrease HR condition with the order being counterbalanced across Ss. On the last 4 HR control trials, Ss were given visual feedback concerning the time interval between each heart beat via a light panel of 16 check lights. Results show (a) feedback significantly increased the magnitude of the interbeat-interval changes across all Ss; (b) the internal locus of control Ss were able to increase their HR better than the external locus of control Ss and the external locus of control Ss were better able to decrease HR as compared with the internals; and (c) self-report measures demonstrated that external and internal locus of control Ss adopted different strategies for controlling HR, and these strategies were related to previous psychophysiological research not requiring the direct control of HR.—*Journal abstract*.

2515. Robinson, Charles E. (General Motors Corp, Warren, MI) **A chemical model of long-term memory and recall.** *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 14-17.—Offers a qualitative model in which the memory trace is represented by antigen- and antibody-like molecules localized in cerebral cells analogous to those of the immunological system. The capability of the immunoneurological system is explored to determine whether it can perform the logical operations of memory. Instead of speaking of the logic of neural nets, the logic of F. O. Schmitt's (1964) "molecular nets" is investigated. The possibility that the operations of memory rely on a mechanism not involving alterations in neural circuitry is considered. This mechanism is able to account for recall as well as storage.—*Journal abstract*.

2516. Rzepka, Jan. [Neuropsychological concept of the stages of consciousness.] (Polh) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 5-16.—Supports P. Cauchard's view that consciousness can now be discussed in terms of neuropsychology. On this basis several stages of consciousness within the human psyche can be distinguished which are closely involved with the structural and functional capacity of the human brain. Cauchard's 5 stages of consciousness are defined and discussed from this viewpoint: bioconsciousness, neuroconsciousness, the state of vigilance, attentive consciousness, and cogitative consciousness, the last being a synthesis of all previous stages. (35 ref)—*English summary*.

2517. Schlumpf, Margaret et al. (U Zurich, Switzerland) **A fluorometric micromethod for the simultaneous determination of serotonin, noradrenaline and dopamine in milligram amounts of brain tissue.** *Biochemical Pharmacology*, 1974(Sep), Vol 23(17), 2437-2446.—Describes an assay technique which permits quantification and spectral analysis of milligram amounts of the amines in rat and mouse brain. Protein weight is used as a reference system for concentration calculations. Data from a series of amine determinations on various areas of rat and mouse brain are included. (18 ref)

2518. Shader, Richard L.; Harmatz, Jerold S. & Tammerk, Hedy-Ann. (Massachusetts Mental Health Ctr, Psychopharmacology Lab, Boston) **Menarcheal age and personality: The choice of a statistical test of relationship.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 321-326.—Contends that psychosomatic studies relying upon correlational statistics or assumptions of linearity may be difficult to interpret correctly. For instance, the relationship of menarcheal age to personality may best be conceptualized according to an arbitrary classification which permits an analysis of variance. Although interesting differences were evidenced between 3 purportedly similar samples of young women, no consistent relationship was found between menarcheal age and selected personality measures.—*Journal abstract.*

2519. Sherman, A. & Gebhart, G. F. (U Iowa, Medical School) **Regional levels of GABA and glutamate in mouse brain following exposure to pain.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 673-675.—Conducted a study with 60 male CFI mice of the effects of pain on regional brain levels of  $\gamma$ -aminobutyric acid (GABA) and glutamate. Gas-chromatographic analysis revealed no significant differences in these substrates in subcortical areas. In the cortical areas, pain produced a significant elevation of GABA levels and a small but significant decrease in glutamate levels. Neither of these changes was observed in Ss pretreated with morphine before exposure to pain. Restraint stress failed to produce the same changes. The ratio of GABA to glutamate was a reliable index of exposure to pain.

2520. Solomon, George F.; Amkraut, Alfred A. & Kasper, Phyllis. (California Dept of Mental Health, Fresno) **Immunity, emotions and stress: With special reference to the mechanisms of stress effects on the immune system.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 209-217.—Experimental findings suggest that stress and central nervous system lesions affect thymus-derived lymphocytes (T cells) and play a role in cell-cell interaction or the release of mediators from reacting lymphocytes. It is concluded that stress may ultimately be found to affect the macrophage, a hormone-sensitive cell that plays a role in afferent, central, and efferent limbs of the immune system.

2521. Steriade, Mircea; Deschenes, Martin; Wyzinski, Peter & Halle, Jacques-Yves. (U Laval, Faculté de Médecine, Québec, Québec, Canada) **Input-output organization of the motor cortex and its alterations during sleep and waking.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Discusses data from numerous experiments on various brain structures in the cat and monkey which analyzed alterations in the reactivity of the structures and their mechanisms during different stages of sleep and waking. Research on cell identification, spontaneous firing, evoked discharges, and inhibitory events is reported.

2522. Sterman, Maurice B. & Clemente, Carmine D. (VA Hosp, Sepulveda, CA) **Forebrain mechanisms for the onset of sleep.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Discusses evidence from the literature concerning the evolution and mechanics of the system whereby activation of elements within the

basal forebrain region can influence ongoing behavior and initiate sleep. Several explanations are considered, and it is proposed that elements in the basal forebrain region exert fundamental influence on other brain structures (possibly the thalamus and midbrain reticular formation), thereby providing for the onset and regulation of normal sleep patterns.

2523. Thompson, Richard W.; Piroch, Joan; Fallen, Dave & Hatton, Dan. (Western Washington State Coll) **A central cholinergic inhibitory system as a basis for tonic immobility (animal hypnosis) in chickens.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 507-512.—4 experiments provided support for the hypothesis that tonic immobility (TI) in chickens, which may be analogous to response suppression in the rat, is a result of fear and is mediated by central cholinergic systems. A total of 124 experimental and 54 control White Leghorn cockerel chicks were the Ss. Exp I established that scopolamine, a central and peripheral acting anticholinergic, will reduce the duration of TI, whereas methylscopolamine, which acts only peripherally, will not. Exp II established a dose-response curve for scopolamine and TI. Exp III demonstrated that scopolamine increased activity and that this increase may be a factor in reducing the duration of TI. Exp IV showed that physostigmine, which blocks acetylcholinesterase and allows longer action of acetylcholine at the synapse, increased the duration of TI. (18 ref)—*Journal abstract.*

2524. Woods, Ralph L. & Greenhouse, Herbert B. (Eds.). **The new world of dreams.** New York, NY: Macmillan, 1974. xix, 439 p. \$12.95.—Presents a collection of 130 papers on what people dream about, the history of dream theories, and scientific research on dreams. Topics include sexual, racial, and cultural differences in dream content; political, military, musical, medical, and other types of dreams; the characteristics of paranormal dreams; physiological and psychological interpretations of dreams; and methods of dream research.

### Genetics

2525. DeFries, J. C.; Hegmann, J. P. & Halcomb, R. A. (U Colorado, Inst for Behavioral Genetics) **Response to 20 generations of selection for open-field activity in mice.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 481-495.—20 generations of directional selection in mice resulted in high and low lines with more than a 6-fold difference in mean activity and virtually nonoverlapping distributions. A correlated response to selection occurred with respect to open-field defecation, low-activity lines having average defecation scores about 3 times higher than those of high-activity lines. Samples of these lines should provide useful research material for investigations by other behavioral biologists.

2526. Dobzhansky, Theodosius. (U California, Davis) **Is genetic diversity compatible with human equality?** *Social Biology*, 1973(Sep), Vol 20(3), 280-288.—Discusses environmentalism and hereditarianism in relation to the role of biology in demonstrating that people are unequal. It is argued that genetic diversity can be made compatible with equality of opportunity.

2527. Inouye, Eiji. (U Tokyo, Medical School, Inst of Brain Research, Japan) **Some considerations in the**



**methodology of human behavior genetics.** *Social Biology*, 1973(Sep), Vol 20(3), 241-245.—Describes some relevant issues in the analysis of genotypes underlying behavioral variation. Pertinent research techniques and their limitations are discussed. (25 ref)

2528. Katzev, Richard D. & Mills, Susan K. (Reed Coll) **Strain differences in avoidance conditioning as a function of the classical CS-US contingency.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 661-671.—Examined rates of shuttle box avoidance responding in 3 strains of rats as a function of classical and instrumental contingencies in 2 experiments. Ss were a total of 126 female albino Fischer, Lewis, and Long-Evans rats. In Exp I, during classical conditioned-stimulus-unconditioned-stimulus (CS-UCS) pairings in the absence of an avoidance contingency, there were large differences between the 3 strains in rates of anticipatory responding to the CS. The same pattern of differences was observed in Exp II when the avoidance contingency was added. None of the instrumental contingencies of CS termination, UCS termination, or the avoidance contingency differentially affected the strains. Classically elicited anticipatory responses and their compatibility with the required avoidance response were viewed as central factors in both the acquisition and maintenance of skeletal avoidance responses. (26 ref)—*Journal abstract*.

2529. Kutscher, Charles L. (Syracuse U) **Strain differences in drinking in inbred mice during ad libitum feeding and food deprivation.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 63-70.—Results of 2 experimental replications of total food deprivation in SWR/J, CBA/J, C3H/HeJ, DBA/2J, BALB/cJ, A/J, and C57BL/6J mouse strains paralleled those of  $\frac{1}{2}$  normal intake except that in the former condition DBA/2J mice showed a significant decrease in water intake. Food-deprivation polydipsia was seen in some individual SWR/J and CBA/J mice as well as in the C3H/HeJ strain but was very rare in the other 4 strains. (21 ref)

2530. Mills, Susan K. & Katzev, Richard D. (Reed Coll) **Differences in strains of rats during extinction of shuttle box avoidance responding.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 672-680.—In 2 experiments differences between strains of rats in the extinction of shuttle box avoidance responding were examined as a function of the classical conditioned stimulus-unconditioned stimulus (CS-UCS) and instrumental CS termination contingencies. Ss were a total of 68 female albino Fischer, Lewis, and Long-Evans rats. When classical CS-UCS pairings were given on all trials, responding declined somewhat. When this contingency was altered by omitting shock entirely or preventing the pairing of CS and shock, behavior weakened even further. Whereas responding was indistinguishable under both prompt and delayed CS termination during the paired-shock procedure, it was generally higher under prompt CS termination during the no-shock and unpaired-shock procedures. However, the strains differed widely during extinction, with Fischer rats responding more often during the paired and unpaired procedures and Long-Evans rats more often in the no-shock procedure. (22 ref)—*Journal abstract*.

## PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

2531. Barker, Lewis M. & Smith, James C. (Baylor U) **A comparison of taste aversions induced by radiation and lithium chloride in CS-US and US-CS paradigms.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 644-654.—Describes 3 experiments with a total of 454 albino male Charles-River rats. Conditioned taste aversions induced by ionizing radiation and lithium chloride (LiCl) were compared with both forward (CS-UCS, conditioned stimulus-unconditioned stimulus) and backward (UCS-CS) conditioning paradigms. Taste aversions were produced when a saccharin CS preceded or followed a 100-r radiation UCS by as much as 6 hrs, but a 2%-of-body-weight, .15-mol LiCl UCS was effective only in CS-UCS pairings. It is argued that the ineffectiveness of an LiCl stimulus in UCS-CS pairings was not attributable to differences in the "strength" of the respective LiCl and radiation doses in that these doses yielded comparable aversions in forward pairings. These results are related to inadequacies of a "sickness" model of taste aversion conditioning. (22 ref)—*Journal abstract*.

2532. Blundell, John E. & Leshem, Micah B. (U Leeds, England) **Central action of anorexic agents: Effects of amphetamine and fenfluramine in rats with lateral hypothalamic lesions.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 81-88.—The effects upon food intake of 3 dose levels of fenfluramine and amphetamine were compared in 25 male hooded rats with bilateral or unilateral lesions of the lateral hypothalamus. 12 Ss served as sham-lesioned controls. Unilateral lesions produced little modulation of drug action, but bilateral lesions brought about opposite effects on amphetamine and fenfluramine anorexia. At 8 wks after operation amphetamine anorexia was significantly diminished in bilaterally lesioned Ss, whereas fenfluramine anorexia was significantly enhanced. Further tests carried out at 14 and 20 wks after operation showed that amphetamine regained its anorexic potency in lesioned Ss, while the enhanced potency of fenfluramine remained. Results are consistent with the belief that these 2 anorexic agents operate through separate sites and mechanisms of action. (21 ref)—*Journal abstract*.

2533. Colasanti, Brenda K.; Craig, Charles R. & Hartman, Elizabeth R. (West Virginia U, Medical Ctr) **Differential effects of pentylenetetrazol on REM sleep in naive and cobalt-epileptic rats.** *Psychopharmacologia*, 1974, Vol 37(2), 151-157.—Produced chronic experimental epilepsy in 5 adult female Sprague-Dawley rats by implanting cobalt wire into the right parietal cortex. 5 Ss treated similarly with glass rods were used as controls. All Ss were simultaneously prepared with permanent cortical and temporalis muscle electrodes for EEG and electromyogram recording. Administration of 15 mg/kg intraperitoneal pentylenetetrazol every 15 min until the appearance of generalized convulsions resulted in the lowering of the chemical seizure threshold expected for the cobalt-treated Ss. EEG recordings collected over the 24-hr period after the 1st injection revealed the presence of a more pronounced suppression of rapid eye movement (REM) sleep in the cobalt-epileptic Ss. This effect

was due to a reduction in the total number of REM sleep episodes. The latencies to REM onset in these Ss were markedly reduced. Results further support the usefulness of cobalt experimental epilepsy in the rat for the study of human seizure disorders in comparison with acute seizure models. (24 ref)—*Journal abstract*.

2534. Costall, B. & Naylor, R. J. (U Bradford, Postgraduate School of Studies in Pharmacology, England) **The importance of the ascending dopaminergic systems to the extrapyramidal and mesolimbic brain areas for the cataleptic action of the neuroleptic and cholinergic agents.** *Neuropharmacology*, 1974(May), Vol 13(5), 353-364.—Assessed the effects on neuroleptic and cholinergic catalepsy in male Sprague-Dawley rats of disruption to catecholaminergic systems by  $\alpha$ -methylparatyrosine and by surgical lesion of the ascending dopaminergic pathways to the extrapyramidal and/or mesolimbic brain areas. Results support a dopaminergic-cholinergic balanced control of catalepsy which involves both extrapyramidal and mesolimbic dopaminergic systems. (32 ref)

2535. Crowley, William R. & Hard, O. Byron. (Rutgers State U, Inst for Animal Behavior, Newark) **Male copulatory behavior induced in female rats by peripheral electrical shock.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 129-131.—Conducted a study with a total of 30 ovariectomized Sprague-Dawley rats. Peripheral skin shock, like administration of testosterone propionate (TP), increased the display of male copulatory patterns in a limited number of Ss. Shock treatment alone led to moderate rates of mounting with thrusting and display of intromission patterns by 2 of the 3 responding females in this group. TP treatment alone resulted in fewer male responses than did shock treatment and failed to produce the intromission pattern. In 8 Ss in which both TP and shock were given, all showed high rates of male mounting, and all displayed the intromission pattern. Augmentation of nonspecific arousal by peripheral shock appears to facilitate the display of male sexual behavior in females as it does in males. (20 ref)—*Journal abstract*.

2536. Gerlach, J.; Nielson, M. & Randrup, A. (Sct Hans Mental Hosp. Research Lab, Roskilde, Denmark) **Effect of desipramine on rat cortex slices incubated with  $^3\text{H}$ -dopamine.** *Psychopharmacologia*, 1974, Vol 37(4), 341-349.—Results of incubating male SPF Wistar rat cortex slices with  $^3\text{H}$ -dopamine ( $^3\text{H}$ -DA) suggest that desipramine may exert a double mechanism of action on the final step in the noradrenaline biosynthesis: (a) an inhibition of the  $^3\text{H}$ -DA uptake at the level of the noradrenergic cell membrane and (b) an inhibition of the intraneuronal transport of  $^3\text{H}$ -DA to sites where it is converted to  $^3\text{H}$ -noradrenaline, concomitant with an increased intraneuronal  $^3\text{H}$ -DA accumulation. (25 ref)

2537. Gisler, Roland H. (Ciba-Geigy Ltd, Pharmaceuticals Div, Biological Research Lab, Basel, Switzerland) **Stress and the hormonal regulation of the immune response in mice.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 197-208.—Exposure of mice to different types of acute stress (acceleration, ether anesthesia, restraint, and overcrowding) or injection of ACTH resulted in an increase of plasma corticosteroid levels. This was associated with a decreased immune reactivity

of their spleen cells. Hypophysectomy of cell donors resulted in a persistent depression of immune responsiveness, which was restored by treatment with somatotrophic hormone. (43 ref)

2538. Haag, Claudia; Jerhoff, Beverly & Kirkpatrick, Jay F. (U Oregon, Medical School) **Ovarian hormones and their role in aggression inhibition among male mice.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 175-177.—Studied the role of ovarian steroids on aggressiveness in male Swiss white mice, as well as the possibility of interspecies action of mammalian pheromones. Ss were paired and tested for aggressiveness after being smeared with urine from female mice, rats, rabbits, and humans. Urine from intact and sexually mature animals caused a decrement in aggression, while ovariectomized or sexually immature animals did not produce an aggression-inhibiting urine. Urine from ovariectomized animals given injections of estradiol (.1 mg/day) for 5 days, and other estrogens, caused nonaggression. Heavy perfume did not stop aggression, supporting the theory that nonaggression is not the result of simple masking of male odors. Progesterone (1 mg/day for 5 days) was ineffective in inhibiting aggression. It is concluded that an interspecies action of this aggression-inhibiting pheromone appears to exist among mice, rats, rabbits, and to some degree, humans.—*Journal abstract*.

2539. Karpiak, Stephen E.; Rapport, Maurice M. & Bowen, Florry P. (Columbia U, Coll of Physicians & Surgeons) **Immunologically induced behavioral and electrophysiological changes in the rat.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 313-322.—Intraventricular injection into 60 male albino Holtzman rats of antiserum to rat synaptic membrane fraction (anti-SMF) produced recurrent epileptiform activity bilaterally in the caudate nuclei, as well as behavioral alterations, on 2 caudate-mediated tasks involving body orientation. No change was seen on a control task previously reported to be unaltered by caudate lesions. Ss either injected with antiserum to erythrocytes or uninjected had normal EEGs and behavioral responses. It is concluded that antibodies directed against the synaptosome membrane fraction are capable of producing behavioral alterations as well as relatively long-lasting epileptiform activity in rats. (French & German summaries) (44 ref)—*Journal abstract*.

2540. Kettlewell, Neil M.; O'Connell, Michael F. & Berger, Laurence H. (U Montana) **Bilateral nictitating membrane conditioning in rabbits under asymmetrical levels of cutaneous afferent activity.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 27-33.—Results of appropriate tests in 3 experiments with a total of 42 New Zealand albino rabbits suggest that the 2 eyes did not function independently in learning, regardless of the disparity in cutaneous afferent activity level between them, due to central transfer.

2541. Mendelson, Joseph et al. (U Kansas) **Effects of partial ageusia and anosmia on thresholds for stimulus-bound feeding and drinking in rats.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 1-19.—Results of a number of studies suggest that stimulus-bound feeding and drinking may be dependent upon the oronasal sensations which normally accompany feeding and drinking. 7 adult male albino rats bearing electrodes in the lateral hypothala-



mus were given daily threshold tests for stimulus-bound feeding and drinking in their home cages. After their thresholds stabilized they were subjected to anosmia by suction of the olfactory bulbs, or to partial ageusia by bilateral transection of the lingual, chorda tympani, and lateral branch of the glossopharyngeal nerves. None of these denervations, either separately or in combination, had any consistent effect on the thresholds. In 2 Ss self-stimulation was also studied and was only moderately reduced by the denervations. Implications of these data are discussed in terms of current theories of the mechanisms underlying stimulus-bound behaviors. (22 ref)—*Journal abstract*.

2542. Novin, Donald; Sanderson, John D. & Vanderweele, Dennis A. (U California, Los Angeles) **The effect of isotonic glucose on eating as a function of feeding condition and infusion site.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 3-7.—Results of a study with 18 female New Zealand rabbits show that duodenal infusions of glucose suppressed feeding only in the free-feeding S, while hepatic-portal infusions suppressed feeding only in the food-deprived S. Both suppressive effects of isotonic glucose were eliminated by bilateral, subdiaphragmatic vagotomy. Results suggest that at least 2 loci can act to reduce eating following glucose intake and that the locus of the effect is dependent upon the feeding condition or nutritional state of the animal. (22 ref)

2543. Rosenberg, Kenneth M. (State U New York, Oswego) **Effects of pre- and postpubertal castration and testosterone on pup-killing behavior in the male rat.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 159-161.—Evaluated the role of testosterone in the development of pup-killing behavior by manipulating the age at castration and the schedule of replacement therapy with 116 male Purdue-Wistar rats. Within the prepubertal (Day 30) castrates, those which received replacement therapy with testosterone killed more than the placebo-treated Ss. Also, the sham-castrated controls killed more than the Day 30 placebo-treated castrates but did not differ from the testosterone-treated castrates. A similar pattern of results was obtained for the postpubertal (Day 60) castrates except that the castrates which received replacement therapy did not kill more than the placebo-treated Ss. It is concluded that castration either before or after puberty reduced the incidence of pup-killing in adulthood, and replacement therapy with testosterone was sufficient to maintain the behavior.—*Journal abstract*.

2544. Stevenson, I. H. & Turnbull, M. J. (U Dundee, Scotland) **A study of the factors affecting the sleeping time following intracerebroventricular administration of pentobarbitone sodium: Effect of prior administration of centrally active drugs.** *British Journal of Pharmacology*, 1974(Apr), Vol 50(4), 499-511.—Studied factors affecting the duration of anesthesia following intracerebroventricular administration of pentobarbitone to male and female rats. A dose-dependent loss of righting reflexes was produced. Younger rats were the most sensitive to pentobarbitone and females were more sensitive than males. The duration of anesthesia was not affected by induction or inhibition of hepatic drug-metabolizing processes. The effects of pentobarbitone

were prolonged or shortened by central nervous system depressant or stimulant drugs, respectively. Withdrawal of depressant drugs following chronic administration resulted in the development of a cross-tolerance to pentobarbitone.—*Journal abstract*.

2545. Tangri, K. K.; Bhargava, A. K. & Bhargava, K. P. (King George's Medical Coll, Lucknow, India) **Interrelation between monoaminergic and cholinergic mechanisms in the hypothalamic thermoregulatory centre of rabbits.** *Neuropharmacology*, 1974(May), Vol 13(5), 333-346.—Results of observing adult albino rabbits suggest an interaction between adrenergic and nicotinic mechanisms as well as between tryptaminergic and muscarinic systems in hypothalamic thermoregulation for the hyperthermic and hypothermic responses, respectively. (37 ref)

2546. Williams, John M.; Hamilton, Leonard W. & Carlton, Peter L. (Rutgers State U, Rutgers Coll) **Pharmacological and anatomical dissociation of two types of habituation.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 724-732.—Notes that both the exploration of a novel environment (an operant response) and the startle response (an elicited response) share certain functional characteristics (e.g., both response measures wane as a function of exposure and show spontaneous recovery). This commonality has led to the assumption that both measures can be used as an index of a common process of habituation. Results of the present 2 experiments with a total of 96 CFE and 10 Sprague-Dawley male albino rats show that scopolamine (but not methyl scopolamine) greatly impaired habituation of exploration but had no direct effect upon habituation of startle. Medial septal lesions impaired the rate of habituation in both cases. These differential effects imply that (a) contrary to previous conceptualizations, the 2 measures of habituation do not reflect a unitary process; and (b) anticholinergic drugs and medial septal damage do not influence the same neural substrate in terms of behavioral inhibition. (16 ref)—*Journal abstract*.

#### Brain & Electrical Stimulation & Lesions

2547. Almlie, C. Robert & Golden, Gregory T. (Ohio U) **Infant rats: Effects of lateral hypothalamic destruction.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 81-90.—Male infant Holtzman rat pups lesioned at 7-21 days of age died during Stage II of the lateral hypothalamic recovery syndrome (LHRS). 5 Ss who were lesioned at 25 days recovered, showing an LHRS nearly identical to that of adults, with permanent loss of hydrational controls for thirst and depressed body weight. Recovered Ss had retarded linear body growth, minimal carcass fat, abnormal stomachs, and enlarged adrenal and pituitary glands. (19 ref)

2548. Aronson, Lester R. & Cooper, Madeline L. (American Museum of Natural History, New York, NY) **Olfactory deprivation and mating behavior in sexually experienced male cats.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 459-479.—Compared pre- and postoperative behavior of 8 male cats in Exp I. After bulbectomy there were no decrements in mating behavior; rather, small but significant increases in sexual activity occurred (e.g., increased frequency and duration of intromission and

decreased initial and intromissive mount latencies). Exp II tested the hypothesis that this increase in sexual activity resulted from a decrease in the amount of test time that the desensitized Ss spent in related activities. Sniffing, grooming, and scratching were measured in 5 bulbectomized and 4 sham operates. The same increase in sexual behavior appeared in the bulbectomized Ss as in Exp I. Additionally, there were significant decreases in frequency and duration of sniffing the room and sniffing the female. The sham operates remained unchanged. The probability that complete anosmia was achieved in these experiments was supported by detailed histological examination. Results are discussed in relation to the pronounced decrements following bulbectomy in several species of rodents. (60 ref)—*Journal abstract*.

2549. Ball, Gordon G.; Micco, David J. & Berntson, Gary G. (Rockefeller U, New York, NY) **Cerebellar stimulation in the rat: Complex stimulation-bound oral behaviors and self-stimulation.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 123-127.—Carried out an extensive stimulation-mapping study of 328 cerebellar sites in 82 male Sprague-Dawley rats. It was found that complex oral behaviors (eating, grooming, and gnawing) as well as self-stimulation could be obtained from a region including the rostro-ventral anterior lobe vermis, fastigial nucleus, and superior cerebellar peduncle. The behaviors, differing in several respects from hypothalamic-elicited behaviors, appeared only in the presence of the appropriate goal object, thus ruling out simple motor automatisms. Results suggest that the traditional view of the cerebellar role of improving the coordination of individual muscle movements and posture may need to be expanded. The cerebellum may act to facilitate and coordinate complex chains of species-specific behavior patterns. (28 ref)—*Journal abstract*.

2550. Bass, Robert W. (Brown U) **Detection of electrical brain stimulation at hypothalamic and septal sites in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 458-465.—Studied the detectability of electrical brain stimulation in 4 male Charles River CD strain rats using a "yes/no" psychophysical procedure. For each S, either septal or hypothalamic stimulation served as the discriminative stimulus, and stimulation at the other site served as the reinforcement for all correct responses. Detection thresholds were determined for 5 different train durations. The psychometric functions obtained were S-shaped and highly reminiscent of those seen in classical psychophysics. Threshold intensity was a monotonically decreasing function of train duration in the range 30-240 msec. Expressed in terms of log charge per stimulus presentation, threshold was a linear function of log stimulus duration in this range. Results demonstrate partial temporal summation. (19 ref)—*Journal abstract*.

2551. Blass, Elliott M.; Nussbaum, Alan I. & Hanson, Donald G. (Johns Hopkins U) **Septal hyperdipsia: Specific enhancement of drinking to angiotensin in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 422-439.—Conducted 3 experiments with a total of 126 hyperdipsic and 123 normal female Sprague-Dawley rats. Ss made hyperdipsic by destruction of the septal nuclei drank more water than normal Ss to thirst stimuli considered to be mediated, at

least in part, by angiotensin. Specifically, they drank more than normal Ss to caval ligation, hypotension induced by the  $\beta$ -adrenergic agonist isoproterenol, intraperitoneal injections of renin, and intravenous infusions of angiotensin. Overdrinking was enhanced by nephrectomy when renin or angiotensin were introduced exogenously, but nephrectomy reduced drinking to hypotension. Septal hyperdipsic Ss drank more water than normal Ss when polyethylene glycol was delivered intraperitoneally but not subcutaneously. They did not drink more to cellular dehydration produced by the intravenous or intragastric injection of hypertonic saline or sucrose. The contributions of the septum to angiotensin-mediated drinking and to nonhomeostatic determinants of drinking are discussed, as are the possible mechanisms controlling drinking to intravascular depletions. (38 ref)—*Journal abstract*.

2552. Brunelli, Marcello; Magni, Franco; Moruzzi, Giuseppe & Musumeci, Daniela. (U Pisa, Inst of Physiology, Italy) **Effects of pontine stimulations on sleep and waking behaviors of the pigeon.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.

2553. Carson, Virginia G. & Wenzel, Bernice M. (Chapman Coll) **Telemetered heart rates of immunosympathectomized and/or adrenal-medullectomized mice during behavioral tasks.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 449-457.—Studied the effects of immunosympathectomy and/or adrenal medullectomy in Swiss-Webster mice in the open field and in each S's home environment. Heart rates (HRs) were monitored via telemetry. Mobility and defecation in the open field were not significantly affected by either immunosympathectomy or adrenal medullectomy. Adrenal medullectomy did affect the relationships between HR and mobility or defecation. The negative correlation between HR and activity of 23 adrenal-intact (AI) Ss became insignificantly positive for 17 adrenal-medullectomized (AM) Ss. Defecating control AI Ss had high HRs, and defecating immunosympathectomized (IS) AM Ss had low HRs. The IS Ss were able to achieve HRs as high as those of controls (>800 bpm) when stressed, but these HRs became significantly lower than those of controls in a short time. (23 ref)—*Journal abstract*.

2554. Cohen, Ira L. & Mendelson, Joseph. (Rutgers State U, New Brunswick) **Schedule-induced drinking with food, but not ICS, reinforcement.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 21-29.—Studied the development of schedule-induced drinking in 5 male hooded rats trained to respond on variable-interval schedules in which food and intracranial stimulation served as reinforcers. The typical postreinforcement schedule-induced drinking pattern appeared after food rewards but not after intracranial-stimulation rewards. Results help to specify the boundary conditions within which schedule-induced drinking will emerge.—*Journal abstract*.

2555. Crawshaw, Larry I. & Carlisle, Harry J. (John B. Pierce Foundation Lab, New Haven, CT) **Thermoregulatory effects of electrical brain stimulation.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol



87(3), 440-448.—Electrical stimulation of various loci in the hypothalamus, septum, or rostral forebrain of 23 female Sprague-Dawley rats frequently produced an increase, and occasionally a decrease, in body temperature. Stimulation while the Ss were working for radiant heat reinforcement in a cold environment rarely affected the rate of response or reinforcement. There was no consistent relation between the magnitude of the temperature change induced by electrical stimulation and other behaviors such as grooming, huddling, and self-stimulation. Thus, electrical stimulation effected changes in body temperature but did not affect motivational components of temperature regulation. (25 ref)—*Journal abstract*.

2556. Dean, P. & Weiskrantz, L. (U Oxford, England) **Loss of preoperative habits in rhesus monkeys with inferotemporal lesions: Recognition failure or relearning deficit?** *Neuropsychologia*, 1974(Jul), Vol 12(3), 299-311.—Measured *Encountertapes*, a 9 rhesus monkeys with inferotemporal lesions on a series of object discrimination tasks given 1 day to 4 wks before operation. Data were analyzed in 2 ways—either by considering only the 1st retention trial on each task or by comparing rates of relearning with new learning after the operation. The aim of both analyses was to demonstrate the existence of a retention defect independent of slower postoperative learning. The 2 measures agreed in or no signs of retention were evident either 1 or 4 wks after inferotemporal removal. Results are consistent with the operation producing a modality-specific retrograde amnesia. (French & German summaries) (23 ref)—*Journal abstract*.

2557. Edwards, Michael A. & Adams, David B. (Wesleyan U) **Role of midbrain central gray in pain-induced defensive boxing of rats.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 113-121.—Pain-induced defensive boxing behavior in 12 male DA agouti rats and 7 of their F<sub>1</sub> hybrids was impaired or abolished by lesions of the midbrain central gray at the level of the superior colliculus. Lesions which left part of this region intact along with its lateral and dorsal connections did not produce boxing deficits despite destruction of anterior, posterior, or ventral connections. 12 other Ss were controls. On the basis of these data and comparison to data on affective defense in the cat, it is suggested that this region may function as a modal command system or a patterning mechanism independent of the forebrain for pain-induced defensive boxing in the rat and affective defense in the cat. The central gray was necessary for freezing and escape behaviors as well as pain-induced defensive boxing, which leads to speculation about its role in committing the S to one or another of these 3 alternative responses to pain or threat. (26 ref)—*Journal abstract*.

2558. Franklin, K. B. & Herberg, L. J. (Inst of Neurology, London, England) **Ventromedial syndrome: The rat's "finickiness" results from the obesity, not from the lesions.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 410-414.—6 obese, finicky female hooded rats with lesions of the hypothalamic ventromedial nucleus (VMH) and 7 sham-lesioned controls progressively lost weight on an unpalatable diet until at a critical basal level they increased their

intake to prevent further loss of weight. The critical basal body weight was similar in both groups and showed no change in the controls when they were subsequently lesioned and retested. At weight levels below the critical basal level the feeding behavior of lesioned and unlesioned Ss was similar, and finickiness could be demonstrated only when body weight exceeded it. The basal level bore no relation to the plateau level of body weight reached by Ss on a free diet. Suggestions that the VMH excites as well as inhibits feeding seem untenable in view of the failure of VMH lesions to impair defense of body weight in the nonobese rat. (17 ref)—*Journal abstract*.

2559. Gonzalez, Larry P. & Maule, William F. (U Houston) **Transfer of stress-induced effects—a critique.** *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 30.—Refutes results of P. V. Laird et al's (see PA, Vol 50:8408) study on transfer of stress-induced effects in goldfish, since much of their support was derived from unpublished results. While it is important to determine behavioral limits within which the transfer phenomenon exists, premature publication of any new test of these limits is unjustified.

2560. Hutton, Robert S.; Wenzel, Bernice M.; Baker, Theodore & Homuth, Martha. (U Washington) **Two-way avoidance learning in pigeons after olfactory nerve section.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 57-62.—In 2 experiments 15 adult homing pigeons with bilaterally sectioned olfactory nerves reached criterion performance in a 2-way shock avoidance sooner than did 13 sham-operated Ss and 14 unoperated controls. The conditioned stimulus (CS) was red light added to a background of green houselight; the unconditioned stimulus (UCS) was footshock, and the avoidance response was the act of moving from one compartment to another. In Exp I intertrial responses delayed CS onset. In Exp II intertrial interval was fixed, and intertrial responses had no effect. Differences in rate of extinction were not significant, but the lesioned groups showed a consistent tendency toward a slower rate. Heart rate was recorded from each S while partially restrained during simulated trials in which the CS was presented, but UCS was not. Data suggest that the experimental Ss were less likely to habituate to the CS. (18 ref)—*Journal abstract*.

2561. Jacquet, Yasuko F. & Lajtha, Abel. (New York State Research Inst for Neurochemistry & Drug Addiction, Ward's Island) **Paradoxical effects after microinjection of morphine in the periaqueductal gray matter in the rat.** *Science*, 1974(Sep), Vol 185(4156), 1055-1057.—Paradoxical, concurrent hyper-, and hyporeactivity of a profound nature to specific stimuli occurred when 10 µg morphine was microinjected bilaterally into the periaqueductal gray matter of the rat brain. Both effects at this site were dose-dependent. The hyperreactivity (to previously neutral auditory and visual stimuli) was obtained only with intracerebrally injected morphine and never with intraperitoneally injected morphine or with other opiates administered either way. Rapid tolerance to toxic doses of morphine developed at this site, as well as cross-tolerance of the hyporeactivity to painful stimuli between routes (intracerebral to intraperitoneal) of morphine administration. Both the hyper- and hyporeactivity were fully reversible by intracerebral

injection of naloxone in the periaqueductal gray. Thus, the periaqueductal gray appears to be a major pathway for morphine action. (15 ref)—*Journal abstract*.

2562. Julien, R. M. & Laxer, K. D. (U California, Medical School, Irvine) **Cerebellar responses to penicillin-induced cerebral cortical epileptiform discharge.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 123-132.—In 50 locally anesthetized, paralyzed cats with penicillin-induced foci in sensorimotor cortex, simultaneous microelectrode recordings were made in the cerebellum and in the anterior sigmoid gyrus near the site of the penicillin injection. Cerebellar recordings were made from Purkinje cells (P-cells) and from cells located in the dentate nucleus. Data reveal distinct patterns of cerebellar responsiveness to the developing epileptogenic focus. Within 15 min after penicillin injection, high frequency (100-140 cyc/sec) P-cell discharges were evoked throughout the cerebellar cortex by focal "spike" activity of the cerebral cortex. These P-cell discharges outlasted short (2-10 sec) epileptiform bursts; however, if P-cell discharges ceased during periods of sustained focal discharge, prolonged (up to 60 sec) convulsive episodes developed and became synchronous and maximal in both cerebral hemispheres. P-cell discharge did not reappear until after termination of the seizure. In the dentate nucleus, epileptiform activity evoked complex patterns of cellular activity. In contrast to the P-cells, cells in the dentate nucleus discharged at high frequencies during prolonged epileptiform episodes. The proposed role of the cerebellum in the control of cortical excitability is discussed. (French summary) (35 ref)—*Journal summary*.

2563. Kaelber, William W. & Mitchell, Clifford L. (U Iowa) **The presence and absence of the "tegmental response" in the cat: A lesion and degeneration comparison after stimulation studies.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 143-148.—The caudal distribution of axons undergoing degeneration after lesions produced through a single, chronically implanted bipolar electrode was compared in 2 groups of cats (totaling 26) that had been trained to escape stimulation of the mesencephalic or most rostral pontine tegmentum. This investigation was prompted by the fact that all but 1 S in which the mesodiencephalic junction was involved by the stimulating electrode exhibited a tegmental response—a consistent and pronounced flexion of the head, body, and extremities, concave to the side stimulated—whereas this was absent in the ponto-mesencephalic group. Both groups had considerable degeneration along the central tegmental fasciculus but, whereas the red nucleus, nucleus pontis centralis superior, and the predorsal fascicle had heavy axonal destruction in the Ss with the tegmental response, there was practically none in those without such responses.—*Journal abstract*.

2564. Kapp, Bruce S.; Kaufman, Jeffrey D. & Repole, Dennis A. (U Vermont) **Hippocampal stimulation and memory: Effects of stimulation parameters and reinforcement magnitude.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 47-55.—Examined the extent to which postconditioning stimulation-induced hippocampal seizure activity is a necessary condition for the production of retrograde amnesia in rats. In 5 experiments a total of 105 male Sprague-Dawley rats received dorsal hippo-

campal stimulation at several different current intensities immediately following 1-trial passive avoidance conditioning. 34 Ss served as controls. Results suggest that current intensities far in excess of those which produce hippocampal seizure activity were a necessary condition for the production of retrograde amnesia. Reinforcement magnitude was not a significant variable at hippocampal seizure threshold current intensities. Current intensities insufficient for the production of retrograde amnesia, but sufficient for the production of dorsal hippocampal seizure activity, produced a spread of seizure activity into the ventral hippocampal formation. Results suggest that caution be exercised in attributing a role to the hippocampus in memory consolidation processes in the rat. (22 ref)—*Journal abstract*.

2565. Kolb, Bryan. (Pennsylvania State U, Animal Behavior Lab) **Social behavior of rats with chronic prefrontal lesions.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 466-474.—Studied the social behavior of adult male Wistar albino rats in 6 experiments following medial frontal ( $n = 20$ ) or orbital frontal ( $n = 14$ ) lesions. 34 Ss served as controls. While both lesion groups showed transient increases in emotionality, only the Ss with orbital frontal lesions showed changes in social behavior. They were more aggressive in male-male aggression and shock-induced aggression but failed to differ from controls on tests of gregariousness, territorial aggression, and predatory aggression. Data may provide support for C. M. Leonard's (1969) suggestion that the orbital frontal cortex of rats and monkeys is homologous. (27 ref)—*Journal abstract*.

2566. Kolb, Bryan; Nonneman, Arthur J. & Singh, R. K. (U Western Ontario, London, Canada) **Double dissociation of spatial impairments and perseveration following selective prefrontal lesions in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 772-780.—Reports results of 2 experiments with 27 male Wistar and 27 male hooded Long-Evans rats. Lesions to the medial frontal cortex produced severe deficits on spatial reversal learning and on delayed response, while lesions of the orbital frontal cortex produced perseverative response tendencies on a differential reinforcement of low rates 20-sec schedule and on barpressing extinction. Results are strikingly similar to those resulting from dorsolateral frontal and orbital frontal lesions, respectively, in rhesus monkeys. (24 ref)—*Journal abstract*.

2567. Krikstone, Barry J. & Levitt, Robert A. (St Michael's Coll) **Comparisons between drinking induced by water deprivation or chemical stimulation.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 547-559.—Compared the motivation to ingest water produced by 15 or 23 hrs of water deprivation or by chemical injection of carbachol or angiotensin into the brain in male Long-Evans rats. Comparisons were made of tolerance for quinine adulteration of the water (Exp I with 50 Ss), of lick rate on a variable interval schedule (Exp II with 52 Ss), and of barpressing rate on a variable interval schedule (Exp III with 52 Ss). When Ss that had been water deprived and Ss that had been chemically stimulated drank similar volumes of water, they behaved similarly in other thirst-motivated tasks. Failure to equate the volume drunk in a similar consummatory situation probably accounts for



previously reported differences in performance on other thirst-motivated tasks. (20 ref)—*Journal abstract.*

2568. **Lamprecht, Friedhelm et al.** (NIMH Lab of Clinical Science, Bethesda, MD) **Serum dopamine-beta-hydroxylase (DBH) activity and blood pressure response of rat strains to shock-induced fighting.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 298-303.—Conducted an experiment with 250 rats from 4 genetically normotensive strains and 2 strains with a genetic predisposition to develop hypertension. Significant differences were found among the strains in terms of both blood pressure response to shock-induced fighting and peripheral sympathetic nerve activity, as reflected in serum DBH activity. In addition, strains with low levels of serum DBH activity did not exhibit significant blood pressure changes after fighting, whereas strains with high serum DBH levels showed significant falls in blood pressure. It is concluded that serum DBH levels are a useful index of sympathetic nerve function in that they are related to hemodynamic responses to stress. (16 ref)—*Journal abstract.*

2569. **Miczek, Klaus A.; Brykczynski, Terry & Grossman, Sebastian P.** (Carnegie-Mellon U) **Differential effects of lesions in the amygdala, periamygdaloid cortex, and stria terminalis on aggressive behaviors in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 760-771.—In 3 experiments, with a total of 113 male albino Sprague-Dawley rats, it was found that small lesions in the periamygdaloid cortex, cortical amygdaloid nucleus, or bed nuclei of the stria terminalis reduced or eliminated attacks and signs of dominance in fights which were generated by isolated housing and the omission of food reward. The same lesions had little or no effect on pain-induced or reflexive "fighting" or on mouse-killing. Small lesions in the lateral or central amygdaloid nuclei significantly inhibited pain-induced "aggression," but did not modify attack behavior or dominance in fights that occurred in situations not involving painful stimulation. These lesions also did not alter mouse-killing behavior. Results suggest that the periamygdaloid cortex and cortical amygdaloid nucleus, as well as the stria terminalis, may be part of a neural system which influences intraspecies aggression in male rats. (39 ref)—*Journal abstract.*

2570. **Miller, Ralph R.; Ott, Clifford A.; Berk, Alvin M. & Springer, Alan D.** (Brooklyn Coll, City U New York) **Appetitive memory restoration after electroconvulsive shock in the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 717-723.—Previous studies have demonstrated that noncontingent aversive stimulation can produce recovery from amnesia induced by electroconvulsive shock (ECS) for passive avoidance training. The present 2 experiments with a total of 120 male albino Sprague-Dawley rats examined the stimulus characteristics necessary to restore appetitive memory after ECS. In a 1-trial appetitive task, posttraining ECS proved to be an effective amnesic agent. Memory was restored by (a) 1 60-sec exposure to the appetitive reinforcer outside of the training situation and (b) 3 135-sec exposures to the training apparatus in the absence of the reinforcer. These results indicate that the "reminder effect" is not a consequence of generalization of learning that occurs

during the reminder treatment. Data suggest that stimuli specific to the training situation are potential agents for reversing experimental amnesia. It is concluded that this class of recovery agents is better characterized as reminders than as stressors. A mechanism for recovery from experimental amnesia is proposed. (17 ref)—*Journal abstract.*

2571. **Moruzzi, Giuseppe.** (U Pisa, Inst of Physiology, Italy) **Neural mechanisms of the sleep-waking cycle.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Presents results of experiments on chronic decerebrate and *cerveau isolé* cats which lead to the conclusion that 2 ascending systems arising in the brain stem—the activating reticular system and the deactivating structures of the lower brain stem—modulate cerebral activities which are also reciprocally organized and able to cause a sleep-waking cycle.

2572. **Nachman, Marvin & Ashe, John H.** (U California, Riverside) **Effects of basolateral amygdala lesions on neophobia, learned taste aversions, and sodium appetite in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 622-643.—Reports results of 8 experiments with a total of 327 male Sprague-Dawley rats. Lesions to the basolateral amygdala produced permanent impairment in Ss' ability to learn a taste aversion. When lesions were administered after Ss had already learned an aversion, there was complete loss of the aversion. Ss with amygdala lesions also had a diminished neophobic response when presented with a novel solution and showed a more generalized aversion to water after a sucrose-sickness trial. Whether a solution was novel or familiar affected the learning of an aversion for controls more than it did for Ss with amygdala lesions. Ss with amygdala damage also showed less sodium appetite than normals in response to desoxycorticosterone acetate injections. These results indicate that rats with amygdala lesions have deficits in recognizing the significance of stimuli. (49 ref)—*Journal abstract.*

2573. **Nonneman, Arthur J. & Kolb, Bryan E.** (U Kentucky) **Lesions of hippocampus or prefrontal cortex alter species-typical behaviors in the cat.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 41-54.—8 mongrel cats with lesions of hippocampus or of prefrontal cortex showed changes in 2 experiments in several species-typical behavior patterns. Both hippocampal and frontal operates were submissive to 8 intact controls during social pairings, but the nature of the submissive behavior differed qualitatively in the 2 groups. Ss with hippocampal ablation showed little affective response to social threat or to a threatening cat model, whereas Ss with frontal lesions responded appropriately to threat. Both lesions affected some components of the Ss' response pattern to the odor of cat urine. Hippocampal removal enhanced the occurrence of the gape response and retarded intersession habituation of the sniff and nose-lick components. Frontal cortex ablation eliminated the gape response but did not affect habituation. Results support the hypothesis that both hippocampus and prefrontal cortex are involved in the assessment of the biological significance of environmental stimuli.—*Journal abstract.*

2574. Norman, Robert J. et al. (U California) **Classical eyeblink conditioning in the bilaterally hemispherectomized cat.** *Experimental Neurology*, 1974(Sep), Vol 44(3), 363-380.—Studied the classically conditioned eyeblink response in 9 cats with various forebrain lesions. The most extreme of these were 3 chronically prepared diencephalic Ss in which the central hemispheres were separated from the thalamus and removed bilaterally. Conditioning was established using a 400-msec duration auditory conditioning stimulus (CS) followed by a brief cutaneous shock to the eyelid as the reinforcing stimulus. The electromyogram (EMG) was recorded bipolarly from orbicularis oculi, and integrated EMG for the CS interval served as an objective measure of conditioned response magnitude. All of the experimental Ss learned a conditioned blink response which appeared qualitatively similar to that obtained in the 4 controls. All preparations showed extinction when reinforcement was discontinued, discriminated between 2 stimuli within the same sensory modality, showed discrimination reversal, and retained the acquired response over days. Results indicate that telencephalic structures are not necessary for the acquisition and maintenance of a classically conditioned response. (25 ref)—*Journal abstract*.

2575. Numan, Michael. (Rutgers State U, Inst of Animal Behavior, Newark) **Medial preoptic area and maternal behavior in the female rat.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 746-759.—Reports results of 3 experiments with a total of 92 postpartum lactating female Wistar rats. Medial preoptic area lesions severely disrupted maternal behavior, whereas lesions of the stria terminalis and medial cortico-hypothalamic tract knife cuts were without effect. Parasagittal knife cuts that severed the mediolateral connections of the preoptic-anterior hypothalamic continuum also severely disrupted maternal behavior. The lesions and knife cuts which disrupted maternal behavior had no effect on female sexual behavior. It is concluded that the medial preoptic area and its lateral connections are essential for the normal display of maternal behavior in postpartum lactating female rats. Evidence also indicates that independent neural mechanisms for the control of maternal behavior and sexual behavior exist within the hypothalamus of female rats. (46 ref)—*Journal abstract*.

2576. Ohi, Shuzo. (Tokyo U of Education, Japan) **[The effect of actinomycin D on avoidance learning in goldfish: I.]** (Japn) *Annual of Animal Psychology*, 1972, Vol 22(2), 61-70.—Investigated the role of ribonucleic acid (RNA) synthesis in the acquisition of an avoidance task. 129 goldfish received intracranial injection of actinomycin D either 30 min before or immediately after a session of 2-way avoidance training. The injection and drug training were repeated every other day. The drug interfered with the rate of acquisition after 3 injections of 2 µg, or after 4 injections of 1 or .5 µg. The drug had no effect on general activity at these dosages. The interference of actinomycin with the avoidance response suggests that the synthesis of RNA is necessary for learning. (English summary) (20 ref)—*S. Nakajima*.

2577. Rose, Mitchell D. (Tufts U) **Pain-reducing properties of rewarding electrical brain stimulation in the rat.**

*Journal of Comparative & Physiological Psychology*, 1974 (Oct), Vol 87(4), 720-728.—In 4 experiments with 13 male Charles River rats, electrodes implanted along the medial forebrain bundle were screened for self-stimulation and stimulation-induced analgesia. Analgesia was defined by changes in unconditioned or escape responses to footshock. Almost all electrodes produced both self-stimulation and analgesia or neither. Thresholds for the 2 effects were highly correlated. Brain stimulation produced an analgesic aftereffect comparable in duration with the poststimulation enhancement of performance in self-stimulation (the priming effect). The refractory period of neurons underlying analgesia, assessed by behavioral means, was similar to that previously found for the priming effect in self-stimulation (.8-1.2 msec). Results suggest a common neural system mediating electrical analgesia and the priming effect of self-stimulation. (25 ref)—*Journal abstract*.

2578. Rudy, Thomas A. (U Wisconsin, School of Pharmacy, Madison) **A versatile restraining device for the unanesthetized cat.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 167-170.—Describes a device which prevents the cat from reaching the head and neck regions with its paws and which restrains the body in a relatively fixed position. Free air flow to most of the animal's body is maintained, and the animal is able to assume normal feline postures, to perform operant responses with its forepaws, and to eat and drink while in the restraining device. The device should prove particularly useful in those studies requiring chemical or electrical stimulation of the brain in the awake cat.

2579. Schwartz, Myrna & Telitelbaum, Phillip. (U Pennsylvania) **Dissociation between learning and remembering in rats with lesions in the lateral hypothalamus.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 384-398.—10 female Sprague-Dawley albino rats which had recovered regulatory feeding after lesions in the lateral hypothalamus (LH) were tested for retention of a taste aversion acquired prior to the lesions. All 10 Ss retained the aversion. 2 of these Ss provided evidence that preoperative memory can be lost following lesions but subsequently recovers. The same 10 recovered LH-lesioned Ss were exposed to a taste-aversion training procedure identical to that used prior to the lesion, but with novel flavors. 7 of the 10 failed to acquire the new taste aversion. 3 additional Ss served as unoperated controls. It is concluded that rats with lateral hypothalamic damage are thus capable of remembering previously learned taste aversions but unable to learn new ones. (17 ref)—*Journal abstract*.

2580. Thompson, Robert & Ledoux, Joseph E. (Louisiana State U) **Common brain regions essential for the expression of learned and instinctive visual habits in the albino rat.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 78-80.—In an experiment with a total of 61 male albino Wistar rats, different groups were subjected to discrete lesions in 1 of 10 different areas of the brain which have previously been found to be implicated in retention of learned brightness and pattern discrimination habits. When tested for the rodent's predictable (instinctive) preference for the dark, 8 groups showed deficient preference scores and 2 showed preference scores comparable to that of the control



group. Those groups with lesions of brain structures not implicated in retention of learned visual discrimination habits exhibited normal preference scores. Data suggest the existence of common as well as diverse neuroanatomical substrata necessary for the expression of both classes of adaptive behavior.—*Journal abstract.*

2581. Villablanca, Jaime. (U California, Mental Retardation Program, NPI, Los Angeles) **Role of the thalamus in sleep control: Sleep-wakefulness studies in chronic diencephalic and athalamic cats.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.

2582. Wise, Roy A. & James, Linda. (Sir George Williams U, Montreal, Quebec, Canada) **Rat ethanol intake: Suppression by intracranial surgery and facilitation by intracranial stimulation.** *Psychopharmacologia*, 1974, Vol 37(2), 179-184.—Implantation of stimulating electrodes into the lateral hypothalamus of 32 male Wistar rats suppressed subsequent home-cage ethanol intake. Lateral hypothalamic stimulation overcame this influence, returning Ss to the levels of 16 unimplanted, unstimulated controls. The effects of surgery were temporary; the 8 implanted controls reached the intake levels of the 8 stimulated and unimplanted controls after 60 days of ethanol exposure. Controls that were given pentobarbital or ether anesthesia without surgical insult drank as much as unimplanted controls.—*Journal abstract.*

### Drug Effects

2583. ———. **Cocaine.** *PharmChem Newsletter*, 1972, Vol 1(3), 3-4.—Presents a 3-mo summary of 50 drug samples found on the street in Georgia, Illinois, and New England. A description of the pharmacology, history, and effects of cocaine is also presented.

2584. ———. **Diazepam.** *PharmChem Newsletter*, 1973, Vol 2(3), 1, 4.—Describes the pharmacology, hazards and adverse effects, possibilities of addiction, and metabolism of diazepam (Valium). A table of 182 substances including descriptions of actual and alleged contents, origins, date of 1st reported appearance, and street prices is included for the month of March 1973.

2585. ———. **Mescaline.** *PharmChem Newsletter*, 1972, Vol 1(4), 1-3.—Describes the pharmacology, behavioral, physiological, and psychological effects, mechanisms and metabolism, and history and uses of mescaline. A table of 65 substances recently appearing on the illicit market with descriptions of alleged and actual contents, origins, and street prices is included.

2586. ———. **Methadone.** *PharmChem Newsletter*, 1972, Vol 1(5), 1-2.—Describes the history, pharmacology, effects, and uses of methadone. A table of 75 substances recently appearing on the illicit drug market with descriptions of actual and alleged contents, origins, and street prices is included.

2587. ———. **Methaqualone—A Dr. Jekyll and Mr. Hyde?** *PharmChem Newsletter*, 1973, Vol 2(1), 1, 4.—Describes the history, effects, and dangers of methaqualone (Quaalude). A table of 261 substances appearing on the illicit drug market during a 4-mo period in 1973 with descriptions of the alleged and actual contents,

origin, date of 1st appearance, and street price is included.

2588. ———. **MDA.** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(Oct), Vol 25(1), 10 p.—Describes the history, chemistry, pharmacology, and effects of 3,4-methylenedioxymphetamine (MDA), a hallucinogen which is chemically related to mescaline and amphetamine. A review of 20 articles is presented to show potential benefits and dangers of MDA. (20 ref)

2589. ———. **Psilocybin demand creates new drug deception.** *PharmChem Newsletter*, 1973, Vol 2(2), 1, 4.—Describes the pharmacology, history, effects, and uses of psilocybin. A 4-mo summary of analyses of 410 drug samples currently appearing on the illicit drug market is presented, and a table of 149 substances with descriptions of alleged and actual contents, origin, date of 1st appearance, and street prices is included.

2590. Abel, Ernest L. (New York State Dept of Mental Hygiene, Research Inst on Alcoholism, Buffalo) **Drugs and behavior: A primer in neuropsychopharmacology.** New York, NY: John Wiley & Sons, 1974; ix, 229 p.—Discusses the basic principles of pharmacology in the context of the nervous system and of drug receptor theory and emphasizes the factors that affect drug action. The structural and functional bases of behavior are explored; mechanisms of cellular drug transport, drug effects, antagonism, tolerance, and physical dependence on drugs are described; and genetic factors, sex differences, and age biological rhythms are emphasized. (21 p ref)

2591. Agmo, A. J. (U Uppsala, Inst of Zoophysiology, Sweden) **The relation between sexual behavior and seminal fructose in intact and castrated rabbits.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 41-45.—Studied seminal fructose and sexual behavior in 5 intact and 12 castrated, testosterone treated rabbits. Both seminal fructose and the intensity of sexual behavior increased after testosterone treatment. The dose-response relations were quite different for the 2 variables. A dose of 7.5 mg testosterone propionate (TP) injected subcutaneously every 3rd day during the experiment restored the sexual behavior to precastration levels, whereas a dose of 30 mg TP was insufficient to give seminal fructose concentrations comparable to those in the intact Ss. There were no correlations between sexual behavior and seminal fructose in castrated or intact Ss. Data seem to support the idea of different hormonal mechanisms controlling sexual behavior and activity in the accessory sexual glands. (21 ref)—*Journal abstract.*

2592. Agué, C. (Sandoz Ltd, Basle, Switzerland) **Cardiovascular variables, skin conductance and time estimation: Changes after the administration of small doses of nicotine.** *Psychopharmacologia*, 1974, Vol 37(2), 109-125.—3 tobacco cigarettes with known content of nicotine and 1 lettuce-leaf cigarette were smoked by 24 paid, male medical students who were habitual smokers; at different times of day and at fixed rates of smoking. Changes in psychophysiological parameters were automatically recorded during the 60 min which followed smoking. Heart rate and forearm blood flow increases were dose dependent, the latter occurring only after smoking at the fast rate. Skin vasoconstriction, as

measured by decreases in temperature, was more reactive to environmental stimuli than to drug effects. Significant increases in skin conductance levels lasting throughout the experimental session occurred immediately after smoking. Diphasic effects of nicotine were obtained with the 2 largest doses at different times of day. This finding is discussed in relation to possible unspecific nicotine effects upon a preexisting level of activation. Nicotine did not influence subjective time estimates. This is discussed in terms of disruption of the timing task and a gradual reorganization towards presmoking estimates. (32 ref)—*Journal abstract*.

2593. Ahtee, Liisa. (U Helsinki, Finland) **Catalepsy and stereotypies in rats treated with methadone: Relation to striatal dopamine.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 221-230.—Administered methadone subcutaneously for 8 wks to male Wistar rats, inducing catalepsy and stereotyped behavior. Acute administration produced catalepsy but not stereotypies in control Ss. After 5 wks of chronic administration methadone still produced dose-dependent catalepsy. All Ss showed stereotypies which appeared after 4-5 days and were at their maximum after 5-6 wks of chronic administration. Naloxone administered before methadone completely prevented the appearance of catalepsy and stereotypy. Reserpine pretreatment prevented the appearance of stereotypies. 2 hr after methadone, the striatal homovanillic acid concentration of Ss receiving methadone for 8 wks was increased to about the same degree as in control Ss receiving the same dose of methadone as a single injection. Results suggest that the primary effect of methadone is catalepsy which causes increased dopamine production as a compensatory mechanism. The additional dopamine is a probable cause of stereotyped behavior in Ss which were partially tolerant to the cataleptic effect of methadone. (35 ref)—*Journal abstract*.

2594. Algeri, Sergio & Cerletti, Chiara. (Istituto di Ricerche Farmacologiche "Mario Negri," Milan, Italy) **Effects of l-dopa administration on the serotonergic system in rat brain: Correlation between levels of l-dopa accumulated in the brain and depletion of serotonin and tryptophan.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 191-197.—Following administration of an acute intraperitoneal (ip) dose of 200 mg/kg levodopa in Sprague-Dawley rats, the concentration of this aminoacid increased rapidly in whole brain to 10 µg/g, and this new level was maintained for at least 20 min. At the same time, there was a significant depletion of serotonin (5HT) which was correlated with the level of dopa in the brain. The level of brain tryptophan (TP) also decreased. If levodopa was given orally at a dose of 250 mg/kg, an increased concentration of this drug in the brain was still seen, but the levels reached were 20 times less than the levels obtained after ip administration. In this situation the brain levels of 5HT and TP were unchanged. The chronic administration of levodopa did not cause accumulation of the drug in the brain nor did it affect the concentrations of 5HT and TP. (28 ref)—*Journal abstract*.

2595. Alsum, P. & Goy, R. W. (Wisconsin Regional Primate Research Ctr, Madison) **Actions of esters of testosterone, dihydrotestosterone, or estradiol on**

**sexual behavior in castrated male guinea pigs.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 207-217.—Treated 46 prepuberally castrated male guinea pigs in adulthood with estradiol benzoate, testosterone propionate, dihydrotestosterone propionate, or corn oil (vehicle control). Both corn oil and estradiol benzoate were ineffective in augmenting or inducing any aspect of adult male sexual behavior. Dihydrotestosterone propionate and testosterone propionate were both effective in establishing the complete male sexual behavior pattern, although they differed in the manner in which they affected specific components. Ss treated with testosterone propionate showed more nonintromissive but not more intromissive mounts than Ss treated with dihydrotestosterone propionate. The average frequency of thrusts/intromission was greater for Ss treated with dihydrotestosterone propionate than for Ss treated with testosterone propionate. (26 ref)—*Journal abstract*.

2596. Andén, Nils-Erik & Strömbom, Ulf. (U Göteborg, Sweden) **Adrenergic receptor blocking agents: Effects on central noradrenaline and dopamine receptors and on motor activity.** *Psychopharmacologia*, 1974, Vol 38(2), 91-103.—Phenoxybenzamine, but not phentolamine or propranolol, blocked central noradrenaline receptors in flexor reflex experiments on male Sprague-Dawley rat spinal cords using clonidine. None of these 3 drugs blocked dopamine receptors in experiments on turning of unilaterally striatectomized rats induced by apomorphine. The α-methyltyrosine-induced disappearance of noradrenaline in the central nervous system of rats and of female NMRI mice was accelerated by phenoxybenzamine at doses related to the functional changes. The disappearance of dopamine was decelerated by phenoxybenzamine, but not by phentolamine or propranolol. The effects of the adrenergic receptor blocking agents on motor activity were studied in a model in which clonidine potentiated the activation induced by apomorphine in reserpine-treated mice. Phentolamine and propranolol reduced the stimulation seen both after apomorphine alone and in combination with clonidine. Phentolamine blocked the peripheral effects of clonidine but did not markedly diminish the effects of clonidine induced by the receptor stimulants. Phenoxybenzamine blocked the clonidine-induced potentiation without interfering with the apomorphine-induced stimulation and can thus be used as a blocking agent of central and peripheral noradrenaline receptors in behavioral experiments. (31 ref)—*Journal abstract*.

2597. Archer, John. (U Sussex, School of Biological Sciences, Brighton, England) **The effects of testosterone on the distractibility of chicks by irrelevant and novel stimuli.** *Animal Behaviour*, 1974(May), Vol 22(2), 397-404.—Trained a total of 60 male Warren Sex-link chicks in 2 experiments to run for a food reward in a runway; half the sample were subsequently injected intramuscularly with testosterone enanthate (Ts) and half with the oil vehicle only (Cs). 2 days later, Ss were given a series of tests in the runway to investigate the effect which changing the color or pattern of either the runway walls or the food dish had on their times to run and feed continuously. Results demonstrate that Ts showed more pronounced decreases in running times when the color or pattern of the food dish was changed.



but Cs showed more pronounced decreases in running times following changes in the walls of the runway. Findings support predictions derived from R. J. Andrew's (1972) hypothesis that testosterone increases persistence of activated search specifications.—*Journal abstract.*

2598. Banerjee, Utpal. (U Malaya, Faculty of Medicine, Kuala Lumpur, Malaysia) **Modification of the isolation-induced abnormal behavior in male Wistar rats by destructive manipulation of the central monoaminergic systems.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 573-579.—Isolated male Wistar rats exhibited muricide ( $n = 22$ ), friendly ( $n = 36$ ), or indifferent ( $n = 36$ ) behavior when exposed to mice. Ss from each category were treated with  $\alpha$ -methyl-p-tyrosine, 6-hydroxydopamine, or electrolytic lesions of the midbrain-raphé nucleus and reexposed to mice at regular intervals. 36 aggregated controls were treated similarly. All 3 treatments rendered the indifferent Ss more reactive and aggressive after 6-hydroxydopamine and midbrain-raphé lesion. Friendly Ss became less reactive posttreatment, then recovered, but never exhibited aggression. Muricide Ss were virtually unaffected by any treatment. 12 controls showed aggressive and muricide behavior both after 6-hydroxydopamine and midbrain-raphé lesions. (16 ref)—*Journal abstract.*

2599. Banerjee, Utpal. (U Malaya, Faculty of Medicine, Kuala Lumpur, Malaysia) **Programmed self-administration of potentially addictive drugs in young rats and its effects on learning.** *Psychopharmacologia*, 1974, Vol 38(2), 111-124.—122 young white Norwegian rats were trained in a conditioned avoidance (CAR) or a maze-learning paradigm, under the chronic influence of 9 potentially addictive drugs administered in drinking water in a step-up dosage schedule. Ss' growth was variably impeded by all drugs except ethanol and meprobamate (MPB). Compared to the water controls, acquisition of CAR was accelerated by amphetamine (AMP) and medazepam (MZP), significantly delayed by morphine and pentobarbitone (PNB), and marginally affected by ethanol, phenobarbitone (PHB), flurazepam (FZP), nitrazepam, and MPB. Except for AMP, PHB, and MPB, performance generally improved upon withdrawal of the drugs. Extinction of the acquired CAR was achieved in all but 2 groups during drug-treatment but not in the drug-free state. In the Y-maze experiment, the rate of maze learning was generally impeded by all drugs relative to that of the water controls. Ethanol-, FZP-, MZP-, and morphine-treated Ss exhibited significant impairment upon withdrawal of the drugs; the AMP-, MPB-, and PNB-treated Ss improved in maze-performance during withdrawal. (40 ref)—*Journal abstract.*

2600. Baskin, S. L.; Hinkamp, D. L.; Marquis, W. J. & Tilson, H. A. (Medical Coll Pennsylvania, Philadelphia) **Effects of taurine on psychomotor activity in the rat.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 591-594.—Conducted a series of experiments with a total of 52 male Sprague-Dawley rats in which taurine, a proposed neurotransmitter, had distinctive effects on psychomotor activity. Intraperitoneal injection of taurine caused a dose-dependent depression of habituated psychomotor activity. Intraventricular administration of taurine result-

ed in a depression of psychomotor activity peaking at approximately 20 min, followed by a brief stimulation in activity occurring at 60-70 min after infusion. Larger doses of taurine prolonged the depressant effect and appeared to mask the following stimulant effect. The behavioral properties observed for taurine suggest a functional role for taurine in the central nervous system. (18 ref)—*Journal abstract.*

2601. Beach, Frank A. & Orndoff, Robert K. (U California, Berkeley) **Variation in the responsiveness of female rats to ovarian hormones as a function of preceding hormonal deprivation.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 201-205.—Tested 11 ovariectomized female Long-Evans rats for the display of lordosis behavior 30 days after gonadectomy. Ss were then tested 7, 14, 21, and 81 days later following estrogen and progesterone treatment. Finally, on Day 88 Ss were tested after either estrogen and progesterone treatment or after progesterone alone. The response to estrogen and progesterone treatment was limited on the 1st test and on the 5th test, which occurred after 2 mo without hormone treatment. When hormone treatment was repeated at 7-day intervals (Tests 2-4) the tendency to show lordosis increased markedly. On the final test Ss given both hormones showed lordosis, while those which received only progesterone did not. Data suggest that the response to estrogen decreases after estrogen deprivation.—*Journal abstract.*

2602. Beaton, J. M.; LeBlanc, A. E. & Webster, C. D. (U Alabama, Birmingham) **The effects of *d*-amphetamine on the inter-response times of rats and guinea-pigs on a modified Sidman discriminated avoidance schedule.** *Psychopharmacologia*, 1974, Vol 37(3), 199-203.—Trained 4 male Wistar rats and 4 male guinea pigs under a barpress avoidance schedule. The guinea pigs acquired the avoidance response more rapidly than the rats. Bovet-Gatti dextroamphetamine profiles were similar in both species in that there was a significant increase in responding before the stimulus light and click were presented, and the interresponse times of efficient responses were shorter. Data indicate that guinea pigs may be better Ss than rats for psychopharmacological work involving discriminated barpress avoidance behavior.—*Journal abstract.*

2603. Benton, David; Kyriacou, Charalambos P.; Rick, John T. & Taberner, Peter V. (University Coll Wales, Swansea) **Behavioural interactions between imidazoleacetic acid and  $\gamma$ -hydroxybutyric acid in rats and mice.** *European Journal of Pharmacology*, 1974(Aug), Vol 27(3), 288-293.—Injected Wistar albino rats and LACG mice intraperitoneally with hypnotic doses of imidazoleacetic acid (IMA) and  $\gamma$ -hydroxybutyric acid (GHB) either singly or in combination. GHB, a normal metabolite of GABA in the brain, was the more potent drug in the rat and IMA, a normal metabolite of histamine, the more potent drug in the mouse. IMA given 30 min prior to the GHB produced a potentiation of the hypnotic effects in the rat. When the drugs were given either simultaneously or in the reverse order, no potentiation was observed. Since the potentiation was specific to the rat, it is proposed that the effect may reflect differences in the activities of histamine-metabolizing enzymes between the 2 species. (25 ref)—*Journal abstract.*

2604. Bert, J. & Balzamo, E. (National Ctr for Scientific Research, Inst of Neurophysiology & Psychophysiology, Marseille, France) [Differential effects of parachlorophenylalanine on sleep in two primates, *Papio papio* and *Papio hamadryas*.] (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 161-166.—Found that parachlorophenylalanine (PCPA) induced a decrease of sleep duration in 6 *Papio papio* and 6 *Papio hamadryas*, but that this effect was partly different in the 2 species of baboons. The difference seemed to be related to normal sleep characteristics proper to each species. This suggests a biochemical specificity in the functioning of anatomically identical nervous structures. However, 5-hydroxytryptophan effects were identical in the 2 species. In both species, PCPA did not have the same effect upon the various stages of slow-wave sleep. Stage 2 was particularly modified, the mean duration of its episodes increasing while their number remained unchanged. This effect suggests an inhibitory influence of the serotonergic system upon the catecholaminergic arousal system.—*English summary*.

2605. Blend, M. J. & Benefiel, W. L. (Mt Carmel Mercy Hosp, Div of Nuclear Medicine, Detroit, MI) The effects of cyproterone acetate on luteinizing hormone (LH) and follicle stimulating hormone (FSH) serum levels in the male rat. *Michigan Academician*, 1974(Spr), Vol 6(4), 389-398.—Studied the effects of the anti-androgen cyproterone acetate (Cyp-A) at a low oral dosage on LH and FSH in 40 intact and 40 castrated male rats. Ss were fed 10 ppm Cyp-A in dry meal for 56 days; 20 castrate and 20 intact animals did not differ from controls in weight, well-being, or food consumption. Ss were sacrificed, and blood samples, pituitary, prostate, testes, liver, and kidneys taken. No significant differences were found among groups in relative weights of organs other than decreased prostate in castrate groups. LH levels were significantly and FSH nonsignificantly higher in all groups other than intact controls. Results are contrasted with earlier findings that much higher doses of Cyp-A reduced levels of FSH and sometimes LH.—*R. D. Kahoe*.

2606. Blumenthal, David S.; Burke, Robert & Shapiro, Arthur K. (New York Hosp—Cornell U Medical Ctr, Payne Whitney Clinic, NY) The validity of "identical matching placebos." *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 214-215.—Conducted a laboratory simulation of the double-blind clinical study in which inactive control drugs are described as "identical matching placebos." For 5 of 6 drug categories, 52 Ss (medical students and school staff members) simulating Es or patients significantly differentiated active drug from placebo based on physical characteristics of the medications. Many of the identical matching placebos were not in fact identical but were different from the active drug in physical properties such as texture, color, and thickness. Results suggest that the assumption that "identical matching placebos" as used in a study should be tested by preliminary comparison of the placebo with the active drug. It is recommended that active drug and control be administered as capsules, that research assistants be minimally aware of the experimental design of the study, that the Federal Drug Administration or

National Institutes of Health formulate standard capsules for use in controlled clinical evaluation studies, and that the placebo contain active ingredients to mimic the side effects of the active drug.—*Journal abstract*.

2607. Boggan, William O. & Schlesinger, Kurt. (Medical U South Carolina) Pharmacological correlates of ECS induced disruption of a passive avoidance task in mice. *Behavioral Biology*, 1974(Sep), Vol 12(1), 127-134.—Examined the effects on C57BL/6J mice of various intraperitoneally administered drugs (reserpine, 5-hydroxytryptophan, levodopa, physostigmine, atropine, amino-oxyacetic acid, and thiosemicarbazide) known to alter different putative neurotransmitter systems, on electroconvulsive shock (ECS) disruption of the performance of a passive avoidance task. Reserpine, physostigmine, and amino-oxyacetic acid decreased the effectiveness of ECS while 5-hydroxytryptophan and levodopa increased the effectiveness of ECS. Data are interpreted as a drug-induced alteration of memory consolidation processes and/or a drug-ECS interaction. (33 ref) —*Journal abstract*.

2608. Bradley, P. B. & Dray, A. (Medical School, Birmingham, England) Morphine and neurotransmitter substances: microiontophoretic study in the rat brain stem. *British Journal of Pharmacology*, 1974(Jan), Vol 50(1), 47-56.—Reports that microiontophoretically-applied morphine either increases or decreases activity of single neurones in the brain stem of urethane-anesthetized rats. These effects were often powerful, but occurred with different time courses. Desensitization to morphine excitation was often observed after repeated and prolonged applications; this may be related to tolerance observed after chronic morphine administrations in intact animals. No desensitization was found with inhibition of neurones by morphine. Excitation of microiontophoretically-applied noradrenaline, 5-hydroxytryptamine, or acetylcholine was often reduced by applications of morphine but was sometimes potentiated. Neither the inhibitory effects of these neurotransmitters or the excitation of neurones by glutamate for homocysteic acid was modified by morphine. *Journal abstract*.

2609. Broverman, Donald M.; Klaiber, Edward L.; Vogel, William & Kobayashi, Yutaka. (Worcester State Hosp, Research Inst of Life Sciences, MA) Short-term versus long-term effects of adrenal hormones on behaviors. *Psychological Bulletin*, 1974(Oct), Vol 81(10), 672-694.—Hypothesizes that short-term exposures to stress facilitate performances of serially repetitive, overlearned tasks and impair performances of perceptual restructuring tasks, while long-term exposures to stress produce the opposite behavioral effects. These effects are attributed, in part, to the length of exposure of the central nervous system to stress-elicited adrenal hormones (epinephrine and cortisol). Short-term exposures are believed to induce states of central adrenergic dominance that favor performances of serially repetitive, overlearned tasks at the expense of perceptual restructuring tasks. Longer exposures are thought to result in a shift to central cholinergic dominance that favors the opposite pattern of performances. A physiological model is presented that accounts for the shift from central adrenergic to central cholinergic dominance. Experimental procedures derived from the model promote the



reversal of some of the behavioral and physiological effects of a long-term stressor. (5 p ref)—*Journal abstract.*

2610. Bürki, Hans R. et al. (Research Inst Wanda, Sandoz Research Unit, Berne, Switzerland) **Effect of single and repeated administration of clozapine on the metabolism of dopamine and noradrenaline in the brain of the rat.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 180-190. —Compared the action of clozapine on the synthesis and disappearance of catecholamines in male RAC rat brain with that of 4 neuroleptics: haloperidol, chlorpromazine, loxapine, and HF-2046. Clozapine enhanced the dopamine (DA) content of the striatum while the typical neuroleptics decreased the DA level, probably as a consequence of turnover stimulation. Upon repeated administration, the DA-enhancing effect of clozapine became more pronounced while the DA turnover stimulation caused by neuroleptics diminished. Single or repeated doses of clozapine did not interfere with DA turnover stimulation induced by the administration of haloperidol or loxapine. It is thought that clozapine stimulated the synthesis of striatal DA more strongly than its disappearance, and that it did not primarily block DA receptors. Clozapine stimulated the turnover of noradrenaline in the brain stem, but this effect was markedly diminished upon repeated administration. (39 ref)—*Journal abstract.*

2611. Carey, R. J. & Goodall, E. B. (VA Hosp, Syracuse, NY) **A conditioned taste aversion induced by  $\alpha$ -methyl-*p*-tyrosine.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 595-600. —In Exp I 20 male Sprague-Dawley rats treated with either 450 mg/kg or 100 mg/kg injections of  $\alpha$ -methyl-*p*-tyrosine ( $\alpha$ -MPT) spaced 12 hrs apart acquired an aversion to a .1% saccharin solution in a 2-bottle choice with water. Ss treated with either saline or 4 injections of 100 mg/kg of  $\alpha$ -MPT without saccharin present exhibited a complete preference for the saccharin solution. In Exp II with 20 Ss, the saccharin aversion induced by the 4 100 mg/kg  $\alpha$ -MPT injection procedure persisted after telencephalic norepinephrine had returned to normal levels. Thus,  $\alpha$ -MPT was found to be a highly effective drug for inducing a taste aversion at dose levels which did not produce obvious signs of toxicity. —*Journal abstract.*

2612. Carlier, E.; Nowaczyk, T.; Valatx, J. L. & Juvancz, P. (U Claude-Bernard, Lyon-Cedex, France) **[The development of sleep in newborn rat separated from its mother: Effects of  $\alpha$ -methyl-dopa.]** (Fren) *Psychopharmacologia*, 1974, Vol 37(3), 205-215. —Studied the development of paradoxical sleep (PS) in 41 neonatal rats separated from their mothers 3-21 days after birth and fed artificially by a chronically implanted gastric catheter. Results show that in these Ss the development of PS differed quantitatively from Ss remaining with their mothers, the daily duration of PS being decreased. The PS-suppressing effects of  $\alpha$ -methyl-dopa were studied after single or multiple intragastric, subcutaneous, or intraperitoneal injections. The maximal daily decrease in PS (90%) occurred with 2250 mg/kg doses.  $\alpha$ -Methyl-dopa in the newborn produced permanent waking with increased motor activity but without change in the heart rate. From the 9th-10th days an initial transient sedation with a marked bradycardia was produced (2-3 hrs), followed by a secondary selective

suppression of PS for 12-15 hrs. (20 ref)—*English abstract.*

2613. Champoux, Ronald & Upton, L. George. (U Michigan, Speech Clinic) **Oral motor nerve block: Some implications for research in speech.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 344-349. —Discusses the effects of a bilateral hypoglossal nerve block on speech and possible implications of the technique for research in speech pathology. The risks involved are essentially the same as those associated with sensory nerve blocks when performed by someone well-trained in the administration of regional anesthesia. (18 ref)

2614. Chesher, G. B. & Jackson, D. M. (U Sydney, NSW, Australia) **Anticonvulsant effects of cannabinoids in mice: Drug interactions within cannabinoids and cannabinoid interactions with phenytoin.** *Psychopharmacologia*, 1974, Vol 37(3), 255-264. —Tested the anticonvulsant activity of orally administered  $\Delta^9$ -tetrahydrocannabinol (THC),  $\Delta^9$ -THC, cannabidiol (CBD), and cannabinol (CBN) in male QS and C57 strain mice utilizing electroshock and chemoshock methods. THC afforded no protection from chemoshock seizures and was effective against electroshock only in high doses (160-200 mg/kg). CBD and CBN were without effect in both tests. Administration of THC significantly potentiated the anticonvulsant effectiveness of phenytoin against electroshock seizures, and this effect was further potentiated by the concurrent administration of CBD. While the potentiation of phenytoin by THC (50 mg/kg) was of the order of 1.5 times, the combination of THC and CBD (each 50 mg/kg) produced a 4-fold potentiation. Neither within-cannabinoid interaction nor cannabinoid potentiation of phenobarbitone effectiveness could be demonstrated in chemoshock tests. The mechanism of the cannabinoid facilitation of phenytoin is unknown, but it possibly involves activity at central nervous system level rather than being a metabolic interaction. This drug interaction may have potential clinical significance. (25 ref)—*Journal abstract.*

2615. Chesher, G. B.; Jackson, D. M. & Stormes, G. A. (U Sydney, NSW, Australia) **Interaction of cannabis and general anaesthetic agents in mice.** *British Journal of Pharmacology*, 1974(Apr), Vol 50(4), 593-599. —Reports that a cannabis extract, equivalent to 10 mg/kg of  $\Delta^9$ -tetrahydrocannabinol (THC), prolonged both pentobarbitone and ether anesthesia in mice when administered 20 min before the anesthetic. After 8 daily doses of the extract, an acute dose of cannabis still significantly potentiated the duration of anesthesia induced by the pentobarbitone but not that induced by the ether. Acute doses of cannabidiol,  $\Delta^9$ -THC and  $\Delta^9$ -THC (10 mg/kg or higher), significantly prolonged the duration of pentobarbitone anesthesia, while cannabinol was inactive. Various combinations of cannabinoids showed that  $\Delta^9$ -THC and cannabidiol had additive effects, while cannabinol showed a consistent tendency to reduce the prolongation of anesthesia produced by the other cannabinoids. A 2nd cannabis extract, with a different cannabinoid ratio, was inactive. Based on pretreatments with drugs known to affect catecholaminergic and serotonergic systems, it is concluded that cannabis-induced prolongation of pentobarbitone anesthesia is not

mediated by an effect on these systems.—*Journal abstract.*

2616. Chin, Jane H.; Crankshaw, D. P. & Kendig, Joan J. (Stanford U, Medical School) **Changes in the dorsal root potential with diazepam and with the analgesics aspirin, nitrous oxide, morphine and meperidine.** *Neuropharmacology*, 1974(May), Vol 13(5), 305-316.—Compared the effects of 4 analgesics and a tranquilizing muscle relaxant on the peripherally evoked negative dorsal root potential (DR V) in 47 intact and anesthetized cats. Diazepam, nitrous oxide, aspirin, and meperidine increased the area of DR V. Anesthesia with nitrous oxide blocked the effects of the analgesics but not those of diazepam. Spinal transection reduced the effects of both diazepam and morphine. The actions of the drugs on the positive DR VI component were similar to those on DR V except for the effects of aspirin and of small doses of morphine. Results support a possible role for enhancement of presynaptic inhibition in the actions of the drugs tested. They also emphasize the necessity for caution in interpreting drug studies performed in the presence of anesthetic agents or spinalization. (26 ref)—*Journal abstract.*

2617. Cicero, T. J.; Meyer, E. R. & Bell, R. D. (Washington U, Medical School) **Effects of phenoxybenzamine on the narcotic withdrawal syndrome in the rat.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 601-607.—Determined the effects of various  $\alpha$ - and  $\beta$ -adrenergic blocking agents on the narcotic withdrawal syndrome in a series of experiments with male Holtzman rats implanted with morphine pellets.  $\alpha$ -Adrenergic blockers caused a dose-dependent suppression of 2 behavioral responses characteristic of precipitated narcotic withdrawal in the rat: diarrhea and, most notably, wet-dog shakes. The  $\beta$ -adrenergic blocker, propranolol, did not effect the expression of the narcotic withdrawal syndrome. The effects of  $\alpha$ -blockers on withdrawal behavior did not appear to be due to the slight degree of sedation produced by the highest doses of the drugs, because pentobarbital and promethazine, in doses sufficient to induce marked sedation and anesthesia, did not decrease the severity of withdrawal. In fact, pentobarbital appeared to exacerbate the abstinence syndrome. (18 ref)—*Journal abstract.*

2618. Clineschmidt, Bradley V.; McGuffin, Jodie C. & Werner, A. Barbara. (Merck Inst for Therapeutic Research, West Point, NY) **Role of monoamines in the anorexigenic actions of fenfluramine, amphetamine and p-chloromethamphetamine.** *European Journal of Pharmacology*, 1974(Aug), Vol 27(3), 313-323.—Female CFE Carworth rats pretreated intraperitoneally with methergoline, cyproheptadine, cinanserin, methysergide, or chlorimipramine were partially protected against the reduction in food intake elicited by a subsequent injection of 6 mg/kg of fenfluramine. With the exception of methergoline, none of these compounds attenuated the anorexigenic action of 3 or 1.5 mg/kg of fenfluramine. Prior treatment with  $\alpha$ -methyl-p-tyrosine (AMPT) diminished the anorexic activity of 6 mg/kg of amphetamine, but this compound was ineffective against 3 or 1.5 mg/kg. The anorexigenic action of amphetamine, 6 or 3 mg/kg, was reduced by prior administration of haloperidol, whereas 1.5 mg/kg of amphetamine was not

affected. Ss pretreated with chlorimipramine, AMPT, and haloperidol were also tested with p-chloromethamphetamine (PCMA). Results indicate that PCMA cannot be classified as either primarily fenfluramine-like or amphetamine-like in its mode of action. It is concluded that 5-hydroxytryptamine (5-HT) is involved in the anorexigenic effect of high doses of fenfluramine, that catecholamines (principally dopamine) are important in the action of high dose levels of amphetamine, and that the anorexia which follows low doses of fenfluramine and amphetamine occurs via mechanisms not involving 5-HT, norepinephrine, or dopamine. (29 ref)—*Journal abstract.*

2619. Cohen, Michael J. & Rickles, William H. (U California, Medical School, Los Angeles) **Performance on a verbal learning task by subjects of heavy past marijuana usage.** *Psychopharmacologia*, 1974, Vol 37(4), 323-330.—Randomly selected 30 male, heavy users of marihuana and gave them paired-associate learning in a  $2 \times 2$  state-dependent learning design. No significant effects were found between marihuana and placebo groups on trials to criterion, and recall of the task 7 days later was not state-dependent. Results are compared to a previous study using light usage Ss that reported a state-dependent effect. The effects of Ss' past marihuana-usage history and the drug's acute effects on learning and recall are discussed.—*Journal abstract.*

2620. Consolo, Silvana; Ladinsky, Herbert; Peri, Giuseppe & Garattini, Silvio. (Istituto di Ricerche Farmacologiche "Mario Negri," Milan, Italy) **Effect of diazepam on mouse whole brain and brain area acetylcholine and choline levels.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 266-268. A single intravenous dose of diazepam (5 mg/kg) increased whole brain acetylcholine levels. Choline levels, choline acetyltransferase, and acetylcholinesterase activities were not affected. Diazepam increased acetylcholine levels in the hemispheres and diencephalon but not in the cerebellum or mesencephalon. This short-lasting biochemical action precludes a correlation with the long-lasting action of diazepam against pentylenetetrazole.

2621. Cooper, Barrett R.; Cott, Jerry M. & Breese, George R. (U North Carolina, Medical School, Chapel Hill) **Effects of catecholamine-depleting drugs and amphetamine on self-stimulation of brain following various 6-hydroxydopamine treatments.** *Psychopharmacologia*, 1974, Vol 37(3), 235-248.—Examined changes in electrical self-stimulation responding in male Sprague-Dawley rats with electrodes implanted in the lateral hypothalamus following 6-hydroxydopamine (6-OHDA) treatments which depleted brain dopamine (DA), norepinephrine (NE), or both of these catecholamines. Acute depression of self-stimulation occurred after treatments which reduced brain DA. A chronic deficit in self-stimulation responding occurred in Ss treated with 6-OHDA in combination with pargyline to reduce both brain amines, while responding of Ss in which brain DA was reduced returned to levels observed prior to 6-OHDA treatment.  $\alpha$ -Methyltyrosine caused a significant reduction in responding of Ss depleted of brain DA. Administration of U-14624 failed to affect self-stimulation in spite of an additional 70% reduction of brain NE content. The response to dextroamphetamine was significant.



cantly reduced in Ss with brain DA selectively depleted.  $\alpha$ -Methyltyrosine antagonized the increased self-stimulation responding following administration of dextroamphetamine to reserpinized rats while U-14624 did not. Results support the hypothesis that central dopaminergic fibers have an important involvement in the maintenance of self-stimulation of brain. (39 ref) —*Journal abstract.*

2622. Cox, Tom. (U Nottingham, England) The effects of physostigmine during the acquisition of avoidance behaviour as a function of the intersession interval. *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 387-394.—Trained and tested 217 male Sprague-Dawley rats on an avoidance task in a shuttle box. The change in the performance of the controls over 2 sessions was a U-shaped function of the interval between the sessions. The change in performance of Ss injected intraperitoneally with physostigmine prior to the 2nd session was also a U-shaped function of the intersession interval, although the drug impaired avoidance behavior. Results are consistent with those of M. D. Hamburg (1967) and of G. B. Biederman (1970) and support the contention that cholinergic mechanisms in the brain are involved in the control of avoidance and escape behavior in the rat. They do not necessarily support the hypothesis advanced by J. A. Deutsch (1969, 1971) to describe a biochemical basis of learning and memory. (25 ref)—*Journal abstract.*

2623. Creese, Ian. (Johns Hopkins U, Medical School) Behavioural evidence of dopamine receptor stimulation by piribedil (ET495) and its metabolite S584. *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 55-58.—Found that piribedil and its catechol metabolite S584 induced enhanced stereotyped behavior and locomotor activity in 12 adult rats treated as neonates with intraventricular 6-hydroxydopamine. These same Ss also showed an enhanced behavioral response to apomorphine (a directly acting dopamine agonist), but a blocked behavioral response to amphetamine (an indirectly acting dopamine agonist). This suggests that the dopaminergic action of piribedil is postsynaptic in origin and may be mediated via its active metabolite S584. (15 ref) —*Journal abstract.*

2624. Czaja, John A.; Goldfoot, David A. & Karavolas, Harry J. (Wisconsin Regional Primate Research Ctr, Madison) Comparative facilitation and inhibition of lordosis in the guinea pig with progesterone,  $5\alpha$ -pregnane-3,20-dione, or 3 $\alpha$ -hydroxy- $5\alpha$ -pregnane-20-one. *Hormones & Behavior*, 1974(Sep), Vol 5(3), 261-274.—Conducted 5 experiments to evaluate the major  $5\alpha$ -reduced metabolites of progesterone, tentatively identified in neural tissue of the guinea pig, for their ability to facilitate and inhibit lordosis responses of adult female spayed guinea pigs after estradiol benzoate (EB) pre-treatment.  $5\alpha$ -dihydroprogesterone was an effective facilitative agent, but at doses of .05-3 mg administered 12-60 hrs after estradiol, it was not as potent as one and  $5\beta$ -pregnane-3,20-dione, evaluated at only 1 dose level (.18 mg) and at 1 time interval after estradiol (36 hr), had moderate facilitative effects, but they were not as effective as  $5\alpha$ -dihydroprogesterone. The inhibitory influences of the metabolites studied were weak

relative to progesterone when given at doses of 0.6 mg 1 hr after EB. However, when  $5\alpha$ -dihydroprogesterone was given at a higher dose (3.6 mg) it was an effective inhibitor of the lordosis response. Results indicate that this metabolite has behavioral influences similar to those of progesterone for both facilitation and inhibition of estrus. (16 ref)—*Journal abstract.*

2625. Dantzer, R. & Baldwin, B. A. (INRA, Station de Pharmacologie, Toulouse, France) Effects of chlordiazepoxide on heart rate and behavioural suppression in pigs subjected to operant conditioning procedures. *Psychopharmacologia*, 1974, Vol 37(2), 169-177.—Subjected a group of 4 Large White male pigs in each of 2 experiments to a punishment discrimination (conflict) or to a nonreinforcement procedure. Conflict behavior was evidenced by the suppression of operant responding and the occurrence of a marked decrease in heart rate during the presentation of the conditioned stimulus. Ss in the nonreinforcement procedure showed no consistent changes in heart rate, although an important decrease occurred in response rate. Chlordiazepoxide was administered to establish whether it would attenuate the response suppression in either procedure. The drug produced a weak attenuation of conflict in terms of the operant and heart-rate responses at the maximum dose used (20 mg/kg) and a small disinhibiting effect on the nonreinforced responding at 10 mg/kg. Such effects were less clear-cut than usually reported in other species. (16 ref)—*Journal abstract.*

2626. Darley, C. F.; Tinklenberg, J. R.; Roth, W. T. & Atkinson, R. C. (VA Hosp, Palo Alto, CA) The nature of storage deficits and state-dependent retrieval under marihuana. *Psychopharmacologia*, 1974, Vol 37(2), 139-149.—Presented 10 20-word lists to 48 adult male paid volunteers before giving them an oral dose of marihuana. Another 10 lists were presented to them following drug administration. Ss studied half of each set of 10 pre- and 10 postdrug lists using an overt fixed-rehearsal procedure and half using their normal covert free-rehearsal procedure. On Day 1 an immediate-recall test followed each of the 20 lists presented. The marihuana-induced deficit in immediate-recall performance on Day 1 for free-rehearsal lists was not eliminated when the fixed-rehearsal procedure was used. Thus, marihuana intoxication impaired the storage of information even when overt rehearsal in the drug and no-drug states was equated. 3 days later, half of the Ss were given marihuana and the rest a placebo. All Ss were then administered delayed recall, recognition, and order tests on the words presented on Day 1. Delayed recall performance was asymmetrically state dependent, whereas delayed recognition performance was not. (18 ref)—*Journal abstract.*

2627. Dixon, Paul W.; Roper, Roy E. & Ahern, Elsie H. (U Hawaii, Hilo Coll) A preliminary study of the use of moxocautery for punishment and medical reasons as a discriminant of personality differences in Japanese nationals. *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 28-35.—Discusses the use in Chinese and Japanese medicine of moxocautery, said to have curative qualities resulting from the stimulation of peripheral nerves and blood vessels. Moxocautery has also been used as a form of

punishment for Japanese children. 25 Ss who had previously received moxocautery were tested with a version of the Edwards Personal Preference Scale. Females who had received moxocautery as punishment showed relatively poor socialization. (15 ref)—R. D. Nance.

2628. Driscoll, P. & Bättig, K. (Swiss Federal Inst of Technology, Behavioral Science Inst, Zurich) **Effects of nicotine on the shuttlebox behavior of trained guinea pigs.** *Psychopharmacologia*, 1974, Vol 38(1), 47-54.—Measured the comparative effects of 3 subcutaneous doses of nicotine (.075, .15, and .3 mg/kg) on the shuttlebox behavior of 16 highly trained guinea pigs, using 50-trial sessions and a 15-sec conditioned stimulus-unconditioned stimulus interval. It was found that nicotine counteracted the characteristic intrasession performance decrement seen with this species and, in addition, that the various doses of nicotine could be differentiated from each other and the control (physiological saline) in this test. Results were obtained through the measurement of response latencies and the recording of intertrial responses which, for the purposes and conditions of this and future studies of this type, were more effective parameters than the measurement of avoidance frequency alone. (17 ref)—*Journal abstract*.

2629. Ellinwood, Everett H. & Balster, Robert L. (Duke U, Medical Ctr, Behavioral Neuropharmacology Section) **Rating the behavioral effects of amphetamine.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 35-41.—Derived a 9-point rating scale with a highly standardized protocol for assessing the continuum behavioral effects of amphetamine (e.g., hyperactivity, stereotypy, and dyskinetic-reactive effects) in 2 experiments with a total of 30 female Sprague-Dawley rats. Dose-response curves for intraperitoneal dextro- and levoamphetamine were obtained demonstrating a 4:1 potency ratio of dextro- to levoamphetamine. The capability of the rating scale to assess antagonism of dextro-amphetamine by pimozide suggests that this scale may be a useful quantitative measure of neuroleptic activity of drugs. (22 ref)—*Journal abstract*.

2630. Elonen, Erkki; Mattila, Mauri J. & Saarnivaara, Laila. (U Helsinki, Finland) **Cardiovascular effects of amitriptyline, nortriptyline, protriptyline and doxepin in conscious rabbits.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 178-188.—When tricyclic antidepressants were slowly injected intravenously to conscious rabbits, all 4 drugs studied immediately lowered blood pressure and increased heart rate. Amitriptyline and doxepin proved most potent and provoked severe arrhythmias on electrocardiogram. When the drugs were given during noradrenaline infusion their effects remained similar. Results suggest that in acute experiments the cardiotoxicity of tricyclic antidepressants does not correlate to their inhibitory effects on noradrenaline uptake. (33 ref)

2631. Elsmore, Timothy F. & Manning, Frederick J. (Walter Reed Army Inst of Research, Washington, DC) **Time course and dose-response effects of orally administered delta-9-THC on interval schedule performance of the rat.** *Life Sciences*, 1974(Aug), Vol 15(3), 481-489.—In 2 experiments with 4 male Wistar albino rats in each Ss that had been trained on fixed or variable

interval schedules of food reinforcement were given oral administrations of 4, 8, 16, and 32 mg/kg of  $\Delta^9$ -tetrahydrocannabinol at various times prior to experimental sessions. The 2 lower doses either had no effect or increased response rates up to 8 hrs postadministration. The 2 higher doses suppressed responding, with a maximum effect about 24 hrs postadministration. Responding recovered to baseline levels about 30 hrs after drug administration.—*Journal abstract*.

2632. Engel, J.; Strömbom, U.; Svensson, T. H. & Waldeck, B. (U Göteborg, Sweden) **Suppression by  $\alpha$ -methyltyrosine of ethanol-induced locomotor stimulation: Partial reversal by L-Dopa.** *Psychopharmacologia*, 1974, Vol 37(3), 275-279.—Gave ethanol (2.4 g/kg) or saline intraperitoneally to female NMRI mice separately or 3 hrs after  $\alpha$ -methyltyrosine. Some Ss also received levodopa in various doses 2 hrs before ethanol or saline. All received an inhibitor of peripheral dopa decarboxylase 30 min before levodopa. Immediately after the last injection the locomotor activity was recorded every 5 min for 1 hr. The ethanol-induced stimulation of locomotor activity was suppressed by  $\alpha$ -methyltyrosine and partially reversed by levodopa. The reversal appeared to be optimal at a low dose of levodopa, which by itself did not appear to influence the locomotor activity. Results support the view that central catecholamines are involved in the stimulatory action of ethanol on locomotor activity. (17 ref)—*Journal abstract*.

2633. Ferraro, Douglas P. & Grilly, David M. (U New Mexico) **Effects of chronic exposure to  $\Delta^9$ -tetrahydrocannabinol on delayed matching-to-sample in chimpanzees.** *Psychopharmacologia*, 1974, Vol 37(2), 127-138.—Trained 3 groups of 4 chimpanzees on a 20-sec delayed matching-to-sample task and then exposed them to a 152-day chronic drug regimen. 2 Ss in each group were drug naive. The other 2 had experienced 45 doses of  $\Delta^9$ -tetrahydrocannabinol (THC) 4 mo prior to the present experiment. One group of Ss served as nondrug controls. A 2nd control group received an oral dose of 1.0 mg/kg THC following each matching-to-sample session. The experimental group was given the same dose of THC prior to each daily session. The initial administrations of the drug before but not after each session produced a significant decrease in matching-to-sample accuracy. During the course of the chronic drug regimen, experimental Ss recovered very slowly from this initial impairment in matching-to-sample performance. The extent to which the experimental Ss recovered seemed to depend upon their preexperimental drug histories. The drug-experienced Ss developed complete tolerance within 5 wks while the previously drug-naive Ss did not so do even after 5 mo exposure to the drug. (22 ref)—*Journal abstract*.

2634. File, Sandra E. & Pope, J. H. (City of London Polytechnic, England) **The action of chlorpromazine on exploration in pairs of rats.** *Psychopharmacologia*, 1974, Vol 37(3), 249-254.—Conducted an experiment with 100 male hooded rats. When 2 Ss were placed in a hole-board, the number of headdips made by each S was twice the number made when tested alone, but was the same for pairs of drugged (2 mg/kg chlorpromazine) and undrugged Ss and for pairs where only 1 S was drugged. This contrasted with the reduction of headdipping



produced by chlorpromazine in single Ss. However, chlorpromazine still reduced general motor activity, regardless of whether the partner was drugged or not. The activity of the undrugged Ss was affected by the partner's state and was lower when the partner was drugged.—*Journal abstract.*

2635. Frankel, D.; Khanna, J. M.; Kalant, H. & LeBlanc, A. E. (U Toronto, Ontario, Canada) **Effect of acute and chronic ethanol administration on serotonin turnover in rat brain.** *Psychopharmacologia*, 1974, Vol 37(2), 91-100.—In male Wistar rats treated acutely and chronically with ethanol, brain serotonin (5-HT) turnover was determined by measuring in the same Ss the rate of accumulation of 5-HT and the rate of decline of 5-hydroxyindoleacetic acid in the brain after administration of the monoamine oxidase inhibitor pargyline-HCl. In the acute study, 5-HT turnover was not altered after a single 4 g/kg oral dose of ethanol. In 2 separate studies, it was shown that chronic administration of ethanol in the form of a liquid diet for 32 days also did not alter brain 5-HT turnover, even when the Ss had developed a significant degree of tolerance to the motor-impairing effects of ethanol. Results suggest that tolerance to ethanol is unrelated to any change in brain 5-HT turnover. (33 ref)—*Journal abstract.*

2636. Frankenheim, Jerry M. (U Western Australia, Nedlands) **Effects of repeated doses of  $\Delta^1$ -trans-tetrahydrocannabinol on schedule-controlled temporally-spaced responding of rats.** *Psychopharmacologia*, 1974, Vol 38(2), 125-144.—Observed the effects of chronic daily intraperitoneal injections of a marihuana (cannabis) constituent,  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC), on the temporally spaced leverpressing of 4 male Wistar rats maintained under a differential reinforcement of low rates of responding schedule of water reinforcement. A different chronic dose was given to each S. During the test session following the 1st drug injection, the 2 Ss which received the lower doses (5.62 or 10.0 mg/kg) showed lengthy periods of no leverpressing, and the 2 Ss receiving the higher doses (17.8 or 31.6 mg/kg) showed almost no leverpressing. In the case of the lower doses, the response rate between the long pauses was increased. With repeated injections, tolerance developed to the drug-induced cessation of responding at all dose levels, but increased sensitivity to the response rate-increasing effect was observed, particularly with the 10.0 and 17.8 mg/kg doses. These behavioral effects were probably not mediated by drug-induced changes in body temperature regulation. The increased sensitivity to the rate-increasing effect of  $\Delta^1$ -THC with repeated injection may be related to the "reverse tolerance" to marihuana's psychological effects that has been reported in man. (3 p ref)—*Journal abstract.*

2637. Frumkin, Kenneth. (Edgewood Arsenal, Biomedical Lab, Aberdeen, MD) **Physical dependence in rats after low morphine doses.** *Life Sciences*, 1974(Aug), Vol 15(3), 455-462.—Investigated the minimum level of morphine administration necessary to produce physical dependence in rats. 24 male Sprague-Dawley rats received low doses of morphine (10 mg/kg) intraperitoneally once daily for 1, 3, or 5 days. 24 Ss served as saline controls. Naloxone given intraperitoneally 1 hr after the last morphine injection produced

significant withdrawal signs after only 3 days. (20 ref)—*Journal abstract.*

2638. Gilbert, R. M. (Addiction Research Foundation, Toronto, Ontario, Canada) **Schedule-induced ethanol polydipsia in rats with restricted fluid availability.** *Psychopharmacologia*, 1974, Vol 38(2), 151-157.—Spaced feeding of individual food pellets to 6 food-deprived male hooded rats at 1-min intervals caused excessive drinking of 5 and 10% alcohol solutions, even though the solutions were available for only a 10-sec portion of each interval and even though the portion of availability occurred anywhere in the interval unpredictably from one interval to another. It is concluded that schedule-induced ethanol polydipsia is not necessarily a postreinforcement phenomenon.—*Journal abstract.*

2639. Goldstein, Dora B. & Kakihana, Ryoko. (Stanford U, Medical School) **Alcohol withdrawal reactions and reserpine effects in inbred strains of mice.** *Life Sciences*, 1974(Aug), Vol 15(3), 415-425.—Male C57BL/6J, DBA/2J, BALB/cJ, and Swiss-Webster mice were treated with ethanol for 3 days by inhalation of alcohol vapor and daily intraperitoneal injections of pyrazole. The alcohol-adapted Ss received 3.8% alcohol in their drinking water for 1 wk and 7.5% for the next 16 or 19 wks. During the inhalation period, C57BL Ss had lower blood alcohol levels than DBA, and alcohol-adapted Ss had slightly lower blood levels than controls. On withdrawal, Ss were examined repeatedly for convulsions elicited by handling. The withdrawal scores of C57BL Ss were significantly lower than those of DBA, BALB, or Swiss-Webster Ss, more so than could be accounted for by the difference in blood alcohol levels. Ss of 3 strains were treated with reserpine and observed for behavioral effects, including convulsions on handling. Strain differences in reserpine effects closely paralleled the strain differences in alcohol withdrawal seizures. (19 ref)—*Journal abstract.*

2640. Goudie, A. J.; Taylor, M. & Wheeler, T. J. (University Coll North Wales, Bangor) **Chronic anorexic and behavioural effects of the fenfluramine metabolite, norfenfluramine: An evaluation of its role in the actions of fenfluramine.** *Psychopharmacologia*, 1974, Vol 38(1), 67-74.—Conducted 2 experiments involving administration of norfenfluramine by intraperitoneal and subcutaneous routes, respectively, to 8 male hooded rats. 8 other Ss served as saline controls. Behavioral effects were assessed by time sampling categorization on Days 1 and 14 of a 20-day chronic study and anorexic effects by daily weighing. Norfenfluramine was found to be a potent anorexiant to which tolerance was established fairly quickly. It also possessed sedative properties after acute administration but marked stimulant properties after 14 days chronic administration. These results are similar to those previously reported in a study of fenfluramine, although the behavioral effects of norfenfluramine were more marked. Results implicate norfenfluramine in the anorexic and behavioral effects of fenfluramine and provide indirect confirmation of the suggestion made in an earlier paper that fenfluramine may have chronic stimulant properties. (29 ref)—*Journal abstract.*

2641. Gray, Gary D.; Davis, Harry N. & Dewsbury, Donald A. (U Florida) **Effects of L-dopa on the**

heterosexual copulatory behavior of male rats. *European Journal of Pharmacology*, 1974(Aug), Vol 27(3), 367-370.—Administered 175 mg/kg levodopa plus 50 mg/kg Ro 4-4602 intraperitoneally to 20 male Long-Evans rats in Exp I. The drug combination prolonged the time required for copulation. Levodopa alone produced similar though smaller, nonsignificant effects. Dose dependent increases in time required for copulation were obtained in Exp II in 24 males given 100, 150, and 200 mg/kg levodopa plus Ro 4-4602. It is suggested that levodopa acts to inhibit heterosexual copulatory behavior in sexually vigorous males.—*Journal abstract*.

2642. Griffiths, Peter J.; Littleton, John M. & Ortiz, Aurelio. (King's Coll, U London, England) **Changes in monoamine concentrations in mouse brain associated with ethanol dependence and withdrawal.** *British Journal of Pharmacology*, 1974(Apr), Vol 50(4), 489-498.—Reports that chronic administration of ethanol to mice by inhalation induced tolerance to ethanol and produced an increase in the concentration of brain monoamines. Withdrawal of ethanol from dependent mice caused behavioral changes associated with a further transient rise in brain monoamine concentrations which then declined to control levels. Inhibition of the withdrawal syndrome by the administration of ethanol postponed the changes in monoamines associated with withdrawal. Administration of inhibitors of catecholamine synthesis before withdrawal of ethanol modified the withdrawal syndrome.—*Journal abstract*.

2643. Hollister, Leo E. (VA Hosp, Palo Alto, CA) **Clinical pharmacology of marihuana.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Presents a review of marihuana research with human Ss. Topics discussed include methodological problems (e.g., dosages); constituents, metabolites, and homologs; pharmacokinetics; clinical syndromes; physiological, biochemical, and psychological effects; therapeutic uses; adverse effects; and comparisons of marihuana with other drugs. (73 ref)

2644. Jacob, Joseph J.; Tremblay, Evelyne C. & Colombel, Marie-Claude. (Inst Pasteur, Service de Pharmacologie, Paris, France) **[Enhancement of nociceptive reactions by naloxone in mice and rats.]** (Fren) *Psychopharmacologia*, 1974, Vol 37(3), 217-223.—Studied the effects of graded doses of naloxone in Swiss G, Swiss E, and Cobs River mice and in Sprague-Dawley and Sherman rats. Enhancements of nociceptive reactions were observed provided the control reaction times were long enough, a condition which was fulfilled for the jumping reaction at different temperatures of the hot plate (50-80°C in mice and 55°C in rats), but for the licking reaction only at the lowest temperature (50°C in mice). Nalorphine had no such overt action. As low subcutaneous doses of naloxone (.1-1 mg/kg) were effective, the enhancement is accounted for by interactions at the level of the specific opioid receptors, some of which are suggested. The phenomenon might be relevant to the interpretation of the mechanisms of precipitated abstinence. (15 ref)—*Journal abstract*.

2645. Jacobs, B. L.; Eubanks, E. E. & Wise, W. D. (Princeton U) **Effect of indolealkylamine manipulations on locomotor activity in rats.** *Neuropharmacology*,

1974(Jul), Vol 13(7), 575-583.—Conducted a series of 6 experiments with a total of 81 experimental and 45 control male Sprague-Dawley rats. 6-fluorotryptophan produced a small, but significant decrease in activity. Neither variations in the dietary content of levotryptophan nor systemic injections of levotryptophan had any effect on activity. However, pretreatment with the monoamine oxidase inhibitor, pargyline, caused levotryptophan injections to produce a syndrome characterized by large increases in activity, tremor, rigidity, hyperreactivity, stereotyped head movements, and a general sympathetic response. Pretreatment with spiroperidol, a presumed specific dopamine-receptor blocker, abolished all signs of the syndrome except for the rigidity and hyperreactivity. By contrast, the noradrenergic receptor blockers, phenoxybenzamine and propanolol, had no observable effect on the syndrome. (22 ref)—*Journal abstract*.

2646. Janiec, W.; Korczak-Dziuba, K. & Herman, Z. S. (Silesian School of Medicine, Katowice, Poland) **Effect of phenothiazine neuroleptic drugs and tricyclic antidepressants on phosphodiesterase activity in rat cerebral cortex.** *Psychopharmacologia*, 1974, Vol 37(4), 351-358.—Investigated the activity of phosphodiesterase (PDE) in male Wistar rat cerebral cortex following the administration in vitro and in vivo of various concentrations of neuroleptic phenothiazine drugs and tricyclic antidepressive drugs. PDE activity was inhibited by phenothiazine neuroleptic drugs (fluphenazine > trifluoperazine > thiopropazine > chlorpromazine = thioridazine). Tricyclic antidepressants nortriptyline, chlorimipramine, protriptyline, imipramine, and desipramine caused 60-80% inhibition of PDE activity. The phenothiazine compounds inhibited the high-affinity PDE activity more than the PDE activity of low affinity to the substrate. Results suggest that the mechanism of the neuroleptic action of phenothiazine drugs is partially connected with their influence on cyclic 3',5'-adenosine monophosphate metabolism. (28 ref)—*Journal abstract*.

2647. Jarvik, Lissy F. et al. (U California, Ctr for Health Sciences, Los Angeles) **Chromosome examinations after medically administered lysergic acid diethylamide and dextroamphetamine.** *Diseases of the Nervous System*, 1974(Sep), Vol 35(9), 399-407.—Data from 8 24-45 yr old Ss demonstrate that the addition of LSD *in vitro* leads to chromosome damage in excess of that observed in cultures without added LSD even though all the *in vitro* studies were conducted on blood cultures derived from patients who had already received the drug *in vivo*. No evidence for measurable detrimental effects of LSD and dextroamphetamine was observed when the 2 drugs were administered under medical supervision.

2648. Jhamandas, K. & Surak, M. (Queen's U, Kingston, Ontario, Canada) **Modification of brain acetylcholine release by morphine and its antagonists in normal and morphine-dependent rats.** *British Journal of Pharmacology*, 1974(Jan), Vol 50(1), 57-62.—Investigated changes in the spontaneous release of cortical acetylcholine (ACh) following injection of morphine and its antagonists in the normal and morphine-dependent rats. Administration of naloxone or nalorphine in dependent, but not in normal, rats produced an increase



in the release of cortical ACh. Injection of morphine in normal rats produced a decrease in ACh release but similar injections in the morphine-dependent rats did not produce this effect. The relationship between the observed effects and the dependence on narcotic analgesics is discussed.—*Journal abstract.*

2649. Jori, Armanda et al. (Istituto di Ricerche Farmacologiche "Mario Negri," Milan, Italy) **Effect of piribedil and one of its metabolites on the concentration of homovanillic acid in the rat brain.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 245-248.—Administered piribedil and its metabolite (pyrimidyl-2')-1-(dihydroxy-3', 4' -benzyl) -4-piperazine dichlorhydrate (PdHBP) to female Charles River rats in intraperitoneal doses of 7.5-240 mg/kg. Both drugs, like apomorphine, decreased the level of homovanillic acid (HVA) in the rat striatum. The effect appeared rapidly and lasted for about 2 hrs. Piribedil antagonized the rise of striatal HVA elicited by chlorpromazine, haloperidol, and fenfluramine. Piribedil, PdHBP, and apomorphine did not counteract the increase of striatal HVA induced by dextroamphetamine. (25 ref)—*Journal abstract.*

2650. Julien, R. M. & Kavan, Eva M. (U California, Medical School, Irvine) **Electrographic studies of isoflurane (Forane).** *Neuropharmacology*, 1974(Jul), Vol 13(7), 677-681.—In 7 chronically implanted cats, anesthetic concentrations of isoflurane induced spontaneous high-voltage spike activity. Significant residual behavioral or electrographic disturbances were not observed over a 14-day period. In 10 acutely implanted Ss, evoked responses recorded in primary somatosensory pathways were little affected by anesthetic concentrations of isoflurane, while those recorded in structures of the diffuse projection system were markedly large-sized.

2651. Karniol, Isac G. et al. (Escola Paulista de Medicina, São Paulo, Brazil) **Cannabinol interferes with the effects of  $\Delta^9$ -tetrahydrocannabinol in man.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 172-177.—Investigated the possible interaction between cannabidiol (CBD) and  $\Delta^9$ -tetrahydrocannabinol ( $\Delta^9$ -THC) in human beings. In a double-blind procedure, 40 male medical doctor and student volunteers were assigned to 1 of 8 experimental groups that received per oral route placebo; 30 mg  $\Delta^9$ -THC; 15, 30, or 60 mg CBD; and mixtures of 30 mg  $\Delta^9$ -THC plus either 15, 30, or 60 mg CBD, respectively. Pulse rate, time production tasks, and psychological reactions were measured at several time intervals after drug ingestion. 30 mg  $\Delta^9$ -THC alone increased pulse rate, disturbed time tasks, and induced strong psychological reactions in the Ss. 15-60 mg CBD alone provoked no effects. CBD was efficient in blocking most of the effects of  $\Delta^9$ -THC when both drugs were given together. CBD also decreased the anxiety component of  $\Delta^9$ -THC effects in such a way that the Ss reported more pleasurable effects. (21 ref)—*Journal abstract.*

2652. Kessler, Christopher C. **The effect of magnesium pemoline on learning in the planarian.** *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 31-33.—Conditioned 2 groups of planarians (*Dugesia dorotocephala*) to contract to light. 1 group was housed in spring water and the other in spring water containing magnesium pemoline (MP). The MP group learned conditional responses at a significantly higher rate than

had the control group. No significant difference was found between groups in any other response measures.

2653. Landauer, Ali A.; Pocock, Derek A. & Prott, F. W. (U Western Australia, Nedlands) **The effect of medazepam and alcohol on cognitive and motor skills used in car driving.** *Psychopharmacologia*, 1974, Vol 37(2), 159-168.—Gave questionnaires, motor-skill, and cognitive tests to 3 groups of 12 healthy male undergraduate paid volunteers after administration of either 0, 10, or 20 mg of medazepam (Nobrium). Tests were given both before and after experimental intoxication with 1 ml/kg bodyweight of diluted ethanol. On most tests medazepam did not interact with alcohol: no synergistic or antagonistic drug reaction was observed. A greater subjective fatigue rating by the drug groups was not confirmed by objective measures. The use of psychoactive drugs with ambulant patients is discussed, and it is concluded that medazepam medication has no detrimental effect on driving ability.—*Journal abstract.*

2654. Lassen, J. Buus. **Evidence for a noradrenergic and dopaminergic mechanism in the hyperactivity produced by 4,  $\alpha$ -dimethyl-m-tyramine (H 77/77) in rats.** *Psychopharmacologia*, 1974, Vol 37(4), 331-340.—Subcutaneous doses of H-77/77 (2.5 and 5 mg/kg) produced locomotion, sniffing, rearing, head twitch, and various grooming movements in rats. The H-77/77-hyperactivity was antagonized by the tyrosine hydroxylase inhibitor H-44/68 (250 mg/kg), the dopamine- $\beta$ -hydroxylase inhibitor FLA 63 (40), the noradrenaline (NA) receptorblockers aceperone (1.1) and phenoxybenzamine (0.8), the thymoleptics imipramine (.7), desipramine (6.3), chlorimipramine (1.5), amitriptyline (.1), nortriptyline (1.0), protriptyline (.7), and doxepine (.3) as well as the neuroleptics chlorpromazine (.015), thioridazine (.7), perphenazine (.008), chlorpromazine (.03), haloperidol (.02), spiramide (.03), pimozide (.04), and clozapine (.014). Results indicate that release of catecholamines, especially NA, is involved in the mediation of H-77/77-induced hypermotility and that NA-membrane-blocking thymoleptics inhibit uptake of H-77/77 into brain NA neurons. Activation of both dopamine and NA receptors are necessary for the production of the H-77/77 behavioral syndrome, as selective blockade of either system can prevent it. (37 ref)—*Journal abstract.*

2655. LeBlanc, A. E. & Cappell, Howard. (Addiction Research Foundation, Toronto, Ontario, Canada) **Attenuation of punishing effects of morphine and amphetamine by chronic prior treatment.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 691-698.—In a previous study L. Parker et al (see PA, Vol 50:548) found that the gustatory aversion normally produced by morphine did not occur when rats were first made dependent on the drug. Their explanation of this phenomenon was that dependent, withdrawn animals are in an "unnatural need state" such that a taste stimulus paired with morphine will become preferred by pairing with a beneficial need-replenishing event. This explanation was examined in the present 2 experiments with a total of 180 male Wistar rats. In Exp I the Parker et al results were supported in a conceptually similar experiment. In Exp II it was shown that analogous results could be produced with amphetamine, a drug upon which physical dependence has not been unequivocally

demonstrated and for which the regulation of self-administration does not follow the morphine pattern. Since the evidence for a "need" artificially induced by amphetamine withdrawal was not strong, the hypothesis that these data reflect preference for a substance associated with need reduction may be questioned. Of the various explanations for the phenomenon, only one involving the concept of drug tolerance has no arguments against it. (16 ref)—*Journal abstract*.

2656. Livingston, Andrew. (VA Hosp, Pavlovian Research Lab, Perry Point, MD) **Effect of dopamine on diuresis and its role in forming a renal CR.** *Pavlovian Journal of Biological Science*, 1974(Jul-Sep), Vol 9(3), 160-168.—Studied the effect of dopamine on diuresis and formation of a renal conditioned response in 4 female mongrel dogs. In 3 dogs with externalized ureters, dopamine produced changes in renal secretion and cardiac rates. When the conditional stimulus (normal saline and tone) was given after several months of training with the conditional signal and the dopamine injection, there was no significant CR change in the heart rate or any urine components. It is concluded that in spite of the great increase of urine volume and composition of the above substances, there was no significant signal increase resulting from the intramuscular injection of dopamine.—*Journal summary*.

2657. Marcus, Anthony M.; Klonoff, Harry & Low, Morton. (U British Columbia, Div of Forensic Psychiatry, Vancouver, Canada) **Psychiatric status of the marihuana user.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 31-39.—Reports findings from medical and psychological evaluations of 43 female and 38 male 19-31 yr old marihuana smokers. In view of previous findings on marihuana obtained in laboratory studies, Ss reported remarkably few adverse effects. It is stressed that self-reports of the effects of drugs cannot be taken at face-value. A method of classification of adverse and nonadverse drug effects is suggested. (19 ref)—*F. Auld*.

2658. Marcus, Richard & Kornetsky, Conan. (Boston U, Medical School, Behavioral Pharmacology Lab) **Negative and positive intracranial reinforcement thresholds: Effects of morphine.** *Psychopharmacologia*, 1974, Vol 38(1), 1-13.—Implanted 7 male CDF strain Charles River albino rats with electrodes aimed for aversive structures and 14 Ss with electrodes aimed for positive structures. Negative (aversive) and positive (self-stimulation) intracranial reinforcement thresholds were determined using a "double staircase" psychophysical procedure. Morphine raised aversive thresholds at all doses tested, while the drug lowered positive reinforcement thresholds at low or moderate doses. Results suggest the possible involvement of central motivational systems in the mediation of morphine-induced analgesia, in the narcotic "high," and in narcotic addiction. (33 ref)—*Journal abstract*.

2659. Maugh, Thomas H. **Marihuana (II): Does it damage the brain?** *Science*, 1974(Aug), Vol 185(4153), 775-776.—Examines the literature concerning the controversial possibility that marihuana may be a health hazard. 2 objective conclusions may be reached from data accumulated over 5 yrs of research: (a) there is probably little or no damage associated with a single or a

few uses of marihuana and (b) there is evidence that suggests danger from long-term, heavy use of the drug. Concerning the latter, empirical data show that the psychoactive constituent of cannabis, tetrahydrocannabinol (THC), has a high affinity for brain and lipophilic tissue and will be absorbed and stored by them for long periods. It is contended that continued presence of THC in the brain produces the "amotivational syndrome": apathy and sluggishness in mental and physical responses, flattening of affect, loss of interest in personal appearance, physical exhaustion, loss of time sense, difficulty with recent memory, and mental confusion. These symptoms have persisted in some individuals for as long as 24 mo after withdrawal of the drug, and investigators have suggested that these individuals may have suffered irreversible brain damage. Observation of larger samples of heavy marihuana users is urged since the adverse effects are manifested in only a fraction of susceptible users.—*B. McLean*.

2660. Mayer, H. (Heidelberg U, Ludolf-Krehl Clinic, W Germany) **[Correlation of blood pressure and aggressivity.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 363-371.—Studied the correlation between Factor 2 (aggressivity) of the Freiburg Personality Inventory (FPI-2) and blood pressure under the influence of various standardized stressors, in particular the Lee Delayed Auditory Feedback (DAF). 48 student Ss were chosen on the basis of their extreme anxiety and aggressivity scores and divided into 4 groups of 12 each: aggressive-anxious, aggressive-nonanxious, nonaggressive-anxious, and nonaggressive-nonanxious. Each S was tested without drugs, with 10 mg of diazepam (Valium), and with placebo. Es recorded the groups' mean values of blood pressure amplitudes with and without DAF. In a 2nd test series, only the stay in the laboratory was used as stressor, and the values of the adaptation time periods were taken as criteria and correlated to aggressivity. Results of the tests are analyzed in detail. They indicate (a) a significant correlation between blood pressure values under DAF and laboratory stress on one hand and aggressivity scores on the other; (b) a correlation between extreme aggression scores and diastolic high RR-reaction scores, and (c) the elimination of high RR-reaction scores by diazepam therapy. (English summary)—*T. Fisher*.

2661. Morrison, Cathleen F. (Tobacco Research Council Lab, Harrogate, England) **Effects of nicotine on the observed behaviour of rats during signalled and unsignalled avoidance experiments.** *Psychopharmacologia*, 1974, Vol 38(1), 37-46.—Conducted 3 experiments with a total of 25 pairs of Sprague-Dawley and F1 hybrid rats. Ss which had been chronically injected subcutaneously with nicotine or with saline during avoidance training were observed during subsequent avoidance experiments. Among those trained and tested on an unsignalled schedule, lever-holding and crouching were frequent, and the stimulant effects of nicotine, though consistent, were small. When a warning signal preceded each shock or a feedback signal followed each response lever-holding and crouching were reduced. In these experiments the Ss tested with saline were inactive, but they tended to lie down rather than crouch during their



periods of immobility. Nicotine-treated Ss in the signaled experiments were active with high levels of sniffing and grooming behavior. It is suggested that the lever-holding and crouching in the unsignaled experiment were both aspects of freezing behavior.—*Journal abstract.*

2662. Morrison, Cathleen F. (Tobacco Research Council Lab, Harrogate, England) **Effects of nicotine and its withdrawal on the performance of rats on signalled and unsignalled avoidance schedules.** *Psychopharmacologia*, 1974, Vol 38(1), 25-35.—Conducted 3 experiments with a total of 42 pairs of Sprague-Dawley and F1 hybrid rats. Ss were trained while under the influence of subcutaneously administered nicotine on a Sidman avoidance schedule. When saline was substituted for nicotine the Ss which had been trained on an unsignaled schedule showed poor avoidance and took significantly more shocks than their saline-trained partners. When the schedule included either a warning signal preceding each shock or a feedback signal following each response this dependence did not develop. It is suggested that dependence on nicotine is related to the stressfulness of the situation and that the behavioral disruption found in its absence is due to an accentuation of the normal warmup process and not to dissociation of learning. (17 ref)—*Journal abstract.*

2663. Noble, Ralph. (Wisconsin Regional Primate Research Ctr, Madison) **Estrogen plus androgen induced mounting in adult female hamsters.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 227-234.—Administered either estradiol benzoate (EB), dihydrotestosterone propionate (DHTP), testosterone propionate (TP), androstenedione (AD), EB + DHTP, or estrone (E<sub>1</sub>) + DHTP to 49 ovariectomized hamsters daily. All androgens were administered in doses of 1 mg/day for the 1st 24 days and 2 mg/day for the last 14 days. The EB dose was 6 µg/day and the E<sub>1</sub> dose was 100 µg/day. Ss were tested to the behavior 1 time/wk starting on Day 10 and for female behavior on Day 39. 100% of the EB + DHTP Ss, 67% of the E<sub>1</sub> + DHTP Ss, 55% of the AD Ss, 33% of the TP Ss, 29% of the DHTP Ss, and none of the EB Ss mounted during at least 1 test. Only 1 of the E<sub>1</sub> + DHTP Ss showed the intromission pattern displayed by most of the Ss that mounted. A median in the of 21-31 days preceded the onset of mounting and did not differ among treatment groups. (20 ref)—*Journal abstract.*

2664. Nurimoto, Seiichi; Suzuki, Shogo; Hayashi, Goro & Takeda, Mikio. (Tanabe Seiyaku Co, Safety Research Lab, Osaka, Japan) **Homobenzomorphan compounds with a potent narcotic antagonist property.** *Japanese Journal of Pharmacology*, 1974(Jun), Vol 24(3), 461-469.—Tested the antagonistic activity of morphine-induced analgesia and respiratory depression of the 2'-hydroxy-6,10-dimethyl-7,8-homobenzomorphans in mice and rabbits. It was found that the order of antagonistic activity was *N*-cyclopropylmethyl (trans isomer TA-414 and cis isomer TA-576) > *N*-allyl (trans isomer TA-412) > *N*-dimethylallyl (trans isomer TA-413 and cis isomer TA-415) with respect to the influence of replacing antagonistic substitution on the tertiary nitrogen. The properties of TA-414 and TA-576 in this regard were higher than those of nalorphine but slightly less than levallorphan. The narcotic antagonist action of TA-414

was of long duration, comparable to that of nalorphine. TA-414 was entirely lacking an agonistic (analgesic) activity even at large doses, while TA-576 equaled nalorphine and pentazocine in the potency of agonistic activity in mice. Conclusively, TA-414 appears to belong in the category of a pure antagonist such as naloxone. (44 ref)—*Journal abstract.*

2665. Ostrenga, James A. **Methylphenidate—ritalin.** *PharmChem Newsletter*, 1973, Vol 2(7), 1, 4.—Describes the pharmacology of methylphenidate (Ritalin), including drug interaction effects, adverse reactions, potential for misuse, and its primary use as medication for hyperkinesia. A table of 164 substances with descriptions of alleged and actual contents, origins, date of 1st reported appearance, and street prices is included for September 1973.

2666. Oswald, Ian. (U Edinburgh, Scotland) **Pharmacology of sleep.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Discusses research on the effects of drugs—including the monoamine oxidase inhibitors, the benzodiazepine hypnotics, and the tricyclic antidepressants—on human sleep. The rebound of paradoxical sleep above normal after repeated consumption and then withdrawal of some drugs, the behavioral correlates of this rebound, and the need for chronic pharmacological studies of sleep are cited.

2667. Palmer, G. C. & Manian, A. A. (U New Mexico, Medical School) **Inhibition of the catalytic site of adenylate cyclase in the central nervous system by phenothiazine derivatives.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 651-664.—In rat and rabbit neuronal and glial-enriched cerebral cortex fractions, the dihydroxylated analogs of chlorpromazine, prochlorperazine, perphenazine, and promazine along with the dioxo form of chlorpromazine were the most potent inhibitors of either basal activity or fluoride activation of the enzyme. 7,8-dihydroxychlorpromazine and 7,8-dioxochlorpromazine exerted profound antagonism of norepinephrine-sensitive adenylate cyclase in neuronal and glial-enriched fractions. Data suggest that the actions of specific metabolites of phenothiazines may account for additional intracellular effects following experimental or therapeutic administration of any parent compound. (45 ref)

2668. Parker, Robert B. (Parke, Davis & Co, Research & Development Div, Ann Arbor, MI) **Mouse locomotor activity: Effect of morphine, narcotic antagonists, and the interaction of morphine and narcotic antagonists.** *Psychopharmacologia*, 1974, Vol 38(1), 15-23.—Investigated the effects on Swiss-Webster mice of subcutaneous cyclazocine, levallorphan, diprenorphine, nalorphine, naloxone, and naltrexone in regard to their activity as antagonists of morphine-induced locomotor activity and their ability to stimulate locomotor activity themselves. All 6 compounds antagonized the effect of morphine, but only cyclazocine and levallorphan produced any significant stimulation of locomotor activity by themselves at the doses tested. Results indicate that changes in mouse locomotor activity can be used successfully to monitor the interaction between morphine and narcotic antagonists and that locomotor activity studies can also be used

to study the stimulant (agonist) properties of narcotic antagonists. (16 ref)—*Journal abstract.*

2669. Payne, A. P. (U Glasgow, Scotland) **A comparison of the effects of androstenedione, dihydrotestosterone and testosterone propionate on aggression in the castrated male golden hamster.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 21-26.—In 2 experiments a total of 55 (including 7 unoperated controls) adult male hamsters were isolated for 6 wks, and their aggressive responses to intact intruders placed into the home-cage observed while they received subcutaneous oil administration (control), testosterone propionate, dihydrotestosterone, or androstenedione. All 3 androgens elicited significantly higher levels of aggression in the castrated males than oil alone. Of the 3, androstenedione was the most effective and dihydrotestosterone the least, although on somatic considerations androstenedione was the least potent androgen. (48 ref)—*Journal abstract.*

2670. Pohorecky, Larissa A.; Jaffe, Lee S. & Berkeley, Hope A. (Rockefeller U, New York, NY) **Ethanol withdrawal in the rat: Involvement of noradrenergic neurons.** *Life Sciences*, 1974(Aug), Vol 15(3), 427-437.—Induced ethanol dependence in male Sprague-Dawley rats by maintaining them for 3 wks on a liquid diet containing ethanol. When ethanol was abruptly replaced with sucrose in the diet, Ss showed withdrawal symptoms. 8 hours later, the accumulation in brain and heart of <sup>3</sup>H-norepinephrine and of <sup>3</sup>H-norepinephrine metabolites was greater than in Ss not undergoing withdrawal. If the rate of ethanol withdrawal was slow (i.e., the ethanol in the diet was replaced gradually with sucrose over a 3-day period) less accumulation of <sup>3</sup>H-norepinephrine and <sup>3</sup>H-norepinephrine metabolites occurred in heart and in brain than as a result of abrupt withdrawal. Results indicate that (a) gross withdrawal symptoms and the accompanying activation of noradrenergic neurons can be blocked during withdrawal by an acute dose of ethanol and (b) ethanol withdrawal can be modified by altering the rate of withdrawal. It is concluded that the withdrawal symptoms and the activation of noradrenergic neurons during withdrawal are caused by the sudden lack of ethanol in the system. (19 ref)—*Journal abstract.*

2671. Poitou, P. & Guerinot, F. (Lab de Biologie Clinique et Expérimentale Inst Gustave-Roussy, Villejuif, France) **Effect of lithium on central metabolism of 5-hydroxytryptamine.** *Psychopharmacologia*, 1974, Vol 38(1), 75-80.—The intraperitoneal administration of lithium carbonate for 5 days to Sprague-Dawley rats increased the synthesis rate of brain serotonin without modifying the brain level of the amine. This increase was not due to a modification of the free tryptophan in the blood. The level of serotonin and 5-hydroxyindoleacetic acid remained unchanged in 7 areas of brain. Results are discussed in comparison with the results of the other authors on the same subject. (22 ref)—*Journal abstract.*

2672. Raiteri, Maurizio; Levi, Giulio & Federico, Rodolfo. (U Cattolica, Istituto di Farmacologia, Rome, Italy) **d-Amphetamine and the release of <sup>3</sup>H-norepinephrine from synaptosomes.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 237-240.—Studied the release of <sup>3</sup>H-norepinephrine from male Wistar rat brain synaptosomes by a superfusion technique which

prevents re-uptake of the released amine. Dextroamphetamine had a minimal stimulatory effect on <sup>3</sup>H-norepinephrine release and was a potent uptake inhibitor. It is suggested that dextroamphetamine may act primarily by inhibiting norepinephrine re-uptake at adrenergic synapses.

2673. Ratcliffe, Bruce E. M.D. *PharmChem Newsletter*, 1973, Vol 2(5), 1, 4.—Describes the history, pharmacology, psychological and physiological effects, and adverse reactions of 3,4-methylenedioxymphetamine (MDA). A table of 141 substances with descriptions of actual and alleged contents, origins, date of 1st reported appearance, and current street prices is included for June 1973.

2674. Rosen, A. J. & Freedman, P. E. (U Illinois) **The effects of p-chloroamphetamine on instrumental conditioning in the rat.** *Neuropharmacology*, 1974(Jul), Vol 13(7), 585-590.—40 male Holtzman albino rats were given 60 training trials in a multiple continuous reinforcement (CRF) schedule under either drug (p-chloroamphetamine, 3.5 mg/kg intraperitoneally) or placebo conditions. A comparable 60-trial testing phase followed in which half of the Ss continued under the training injection conditions and the other half were switched to the alternative injection. Drugged Ss displayed slightly inferior discrimination performance in training as a result of elevated responding in extinction. No differences between groups were obtained on CRF performance. In the testing phase, extinction performance was similarly affected by both concurrent testing and prior training-phase conditions. Data suggest that p-chloroamphetamine administration results in a selective disruption of responding to stimuli correlated with nonreward and that this effect tends to persist for long periods of time. (21 ref)—*Journal abstract.*

2675. Rummo, Nicholas & Sarlanis, Kiriako. (Environmental Protection Agency, Chapel Hill, NC) **The effect of carbon monoxide on several measures of vigilance in a simulated driving task.** *Journal of Safety Research*, 1974(Sep), Vol 6(3), 126-130.—In a 2-hr vigilance task in a driving simulator, Ss under low blood levels of carbon monoxide (CO) were significantly slower in responding to lead car speed changes and nonsmokers made significantly fewer steering wheel corrections. There was no decrement under CO in responding to a dashboard warning light or in maintenance of lane position.

2676. Salvatore, Santo. (Brown U, Hunter Lab of Psychology) **Performance decrement caused by mild carbon monoxide levels on two visual functions.** *Journal of Safety Research*, 1974(Sep), Vol 6(3), 131-141.—Used 6 20-27 yr old volunteers to determine the effects of mild levels of carbon monoxide (CO) on the time necessary to detect static and dynamic visual targets. In the static phase, S adapted for 1 min to an illumination of 17 ft-L and detected low-contrast targets when the ambient illumination dropped to .02 ft-L. In the dynamic phase, the illumination was constant at 6 ft-L and S detected the targets moving into the visual field. There was a significant decrement in target detection time due to CO for the dynamic task, indicating some constriction of the visual field. The CO-related decrement for the static task was not statistically significant.—*Journal abstract.*



2677. Sandman, Curt A.; Beckwith, Bill E.; Gittis, M. M. & Kastin, Abba J. (Ohio State U) **Melanocyte-stimulating hormone (MSH) and overtraining effects on extradimensional shift (EDS) learning.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 163-166.—Treated 24 male Holtzman albino rats with MSH or a diluent control solution and tested them with a visual discrimination problem. After acquisition of the visual discrimination, half of the Ss were overtrained, and all of the Ss were tested with a spatial EDS problem. Overtraining significantly disrupted performance of the EDS. A subproblem analysis indicated that MSH resulted in inferior performance of the changed dimension of the EDS. Overtraining together with MSH treatment resulted in the poorest performance of the changed dimension of EDS. Thus, overtraining and MSH were not additive, and it is possible that MSH may exert a paradoxical effect on behavior under certain conditions.—*Journal abstract*.

2678. Sanger, D. J.; Key, Marilyn & Blackman, D. E. (U Birmingham, England) **Differential effects of chlor-diazepoxide and d-amphetamine on responding maintained by a DRL schedule of reinforcement.** *Psychopharmacologia*, 1974, Vol 38(2), 159-171.—5 male hooded rats pressed a lever and obtained food pellets on a schedule of differential reinforcement of low rates (DRL) which required that responses were spaced at least 15-sec apart in order for them to produce reinforcement. When responding had stabilized, the effects of intraperitoneal dextroamphetamine and chlor-diazepoxide were assessed. Low doses of both drugs increased response rates while higher doses decreased them. Reinforcement frequency showed a dose related decrease after both drugs. When interresponse times (IRTs) were analyzed it was found that both drugs shifted the peak of the distribution towards shorter IRTs but that chlor-diazepoxide also produced a specific increase in the percentage of responses after very short IRTs (bursts). When IRTs were divided into those following a reinforced response (hit) and those following a nonreinforced response (miss) it was found that bursts normally followed only misses and that chlor-diazepoxide consistently increased the number of bursts following misses only. Amphetamine did not affect bursts in any consistent way. (24 ref)—*Journal abstract*.

2679. Schmitt, H.; Le Douarec, J.-C. & Petillot, N. (Ecole de Médecine, Paris, France) **Antagonism of the antinociceptive action of xylazine, an  $\alpha$ -sympathomimetic agent, by  $\alpha$ -adrenoceptor and cholinergic blocking agents.** *Neuropharmacology*, 1974(May), Vol 13(5), 295-303.—Results of a study with rats and mice suggest the involvement of receptors with properties in common with classical  $\alpha$ -adrenoceptors in the antinociceptive action of xylazine administered intraperitoneally and intracerebroventricularly, but these receptors seem to be distinct. In the hot-plate test, central cholinergic mechanisms could be involved as well as peripheral mechanisms. (24 ref)

2680. Schmitt, H.; Le Douarec, J.-C. & Petillot, N. (Ecole de Médecine, Paris, France) **Antinociceptive effects of some  $\alpha$ -sympathomimetic agents.** *Neuropharmacology*, 1974(May), Vol 13(5), 289-294.—Intraperitoneal xylazine, clonidine, and LD2855 were potent

antinociceptive agents on the hot-plate test in mice and on the test of electrical stimulation of rat's tail. In contrast, classical  $\alpha$ -sympathomimetic agents naphazoline, tetryzoline, and oxymetazoline were devoid of any antinociceptive action by parenteral route. However, intracerebroventricular administration of naphazoline in rats and of naphazoline, tetryzoline, and oxymetazoline in mice induced a strong antinociceptive effect. (20 ref)

2681. Seiser, Richard L. & Houser, Vincent P. (VA Hosp. Psychotropic Drug Lab, Perry Point, MD) **Effects of scopolamine methylbromide on shock-induced gastric lesions in the unrestrained rat.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 147-151.—In 2 experiments with a total of 130 male Sprague-Dawley rats, Ss were subjected to a 6-hr shock stress session. A perch-contingent yoked design compared the degree of gastric pathology exhibited in Ss subjected to an avoidance-avoidance conflict, with yoked Ss receiving equivalent amounts of noncontingent shock. There were no differences in the amount of gastric lesion formation produced by these 2 procedures. Scopolamine methylbromide (.50 and 1.0 mg/kg) significantly decreased ulcer development (i.e., percentage of Ss exhibiting pathology, number of lesions per S, and severity of lesioning) in all groups tested. (19 ref)—*Journal abstract*.

2682. Simpson, Lance L. (Columbia U, Coll of Physicians & Surgeons) **The effects of lithium and physostigmine on rat brain acetylcholinesterase activity.** *Psychopharmacologia*, 1974, Vol 38(2), 145-150.—Conducted studies with male Wistar rats to determine whether lithium could inhibit acetylcholinesterase (AChE) and whether repeated injections of physostigmine, a known cholinesterase inhibitor, could result in tolerance. It was found that lithium had no anticholinesterase activity in vivo (100 or 200 mg/kg intraperitoneal LiCl) and slight anticholinesterase activity in vitro. The latter effect was evident only under markedly unphysiological conditions (i.e., concentrated lithium and dilute acetylcholinesterase). It was also found that repeated injections of physostigmine (.75 mg/kg) did not result in tolerance to the anti-cholinesterase effects of the drug. A single challenge dose of physostigmine in vivo or a series of concentrations of physostigmines physostigmine vitro resulted in similar inhibition of AChE from Ss which had or had not received a 5-day regimen of repeated physostigmine injections. The relationship of these findings to the treatment of mania is discussed.—*Journal abstract*.

2683. Snowden, Charles T. & Wampler, Richard S. (U Wisconsin, Madison) **Effects of lateral hypothalamic lesions and vagotomy on meal patterns in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 399-409.—Studied meal patterns with liquid diets in 4 female Carworth CFE albino rats with lateral hypothalamic (LH) lesions and in 4 Ss with sham lesions, both before and after vagotomy. LH Ss reduced total intake following lesions but showed no differences from controls after vagotomy on measures of total daily intake, mean meal size, and frequency of feeding. Identical frequency distributions of meal sizes and intermeal interval durations were found in LH and control Ss after vagotomy. However, although sham-lesioned Ss showed significant positive correlations

between meal size and subsequent intermeal-interval durations in all phases of the experiment, the LH Ss showed no such correlation following vagotomy. Thus, indices of microregulatory controls may be more sensitive in indicating feeding deficits. (25 ref)—*Journal abstract*.

2684. Stadnicki, Stanley W.; Schaeppi, Ulrich; Rosenkrantz, Harris & Braude, Monique C. (Mason Research Inst, Worcester, MA) **Crude marihuana extract: EEG and behavioral effects of chronic oral administration in rhesus monkeys.** *Psychopharmacologia*, 1974, Vol 37(3), 225-233.—Treated 3 rhesus monkeys daily with oral crude marihuana extract (CME) containing  $\Delta^9$ -tetrahydrocannabinol (THC), cannabidiol, and cannabinol, but no  $\Delta^8$ -THC. CME with the equivalent of THC 12.5 mg/kg or more caused sedation, ptosis, ataxia, huddled posture, spontaneous jerky body movements and increased EEG synchrony without an initial phase of increased motor activity. Thereafter, THC 12.5 mg/kg in 2 Ss produced specific EEG changes including the appearance of protracted trains of activity in thalamus and cerebellar nuclei. THC 37.5 mg/kg or more, in all 3 Ss, caused slow waves in hippocampus, amygdala, and septum. EEG manifestations after oral treatment were therefore different from those previously observed following intravenous injection or smoke inhalation. The 2 Ss that became tolerant after 50 daily treatments with THC 37.5 mg/kg responded to termination of treatment with withdrawal signs manifested by increased aggressiveness. One of the 2 exhibited "hallucinations" and increased periods of EEG desynchronization. Withdrawal signs were, therefore, more severe for behavioral than for EEG effects. (17 ref)—*Journal abstract*.

2685. Stewart, W. J.; Blampied, N. M. & Hughes, R. N. (U Tasmania, Hobart) **The effects of scopolamine on performance on a geometric progressive ratio schedule.** *Psychopharmacologia*, 1974, Vol 38(1), 55-66.—Trained 6 female rats to respond on a geometric progressive ratio schedule until performance was stable. They were then injected intraperitoneally with the anticholinergic drug scopolamine at doses of .05, .1, .25, 1.0 and 2.0 mg/kg. 2 controls were administered atropine methyl nitrate (1-20 mg/kg). Increasing doses of scopolamine typically produced first an increase, then a decrease in behavior compared with baseline levels, measured by total number of responses, total number of reinforcements, and final completed ratio per session. Atropine methyl nitrate had no effect on the behavior of the control Ss. Results indicate that the effects of scopolamine are due to its central action. The inverted-U dose-response curve found for scopolamine resembled that found for chlor-diazepoxide, phenobarbital, and dextroamphetamine on progressive schedules. (35 ref)—*Journal abstract*.

2686. Stoll, Raymond E.; Paolino, Ronald M. & Bousquet, William F. (Purdue U) **Possible role of pheromones in modifying drug response in the mouse.** *Life Sciences*, 1974(Aug), Vol 15(3), 543-549.—Significant differences in the duration of response of 22-day-old male and female Swiss-Webster mice to hexobarbital and zoxazolamine were obtained, within sex, depending upon whether group-caged Ss were housed in rooms with Ss of the same or opposite sex. As there was no physical contact between Ss, these findings suggest that pheromones or other modes of sexual communication may have been operative.—*Journal abstract*.

2687. Summy-Long, Joan & Severs, Walter B. (Pennsylvania State U, Coll of Medicine, Hershey) **Angiotensin and thirst: Studies with a converting enzyme inhibitor and a receptor antagonist.** *Life Sciences*, 1974(Aug), Vol 15(3), 569-582.—Produced thirst in implanted male Sprague-Dawley rats by relative cellular dehydration or hypovolemia. An angiotensin receptor antagonist (sar(1)-ala(8)-angiotensin II P-113) or a converting enzyme inhibitor SQ-20, 881, SQ was given to thirsty Ss by intracerebroventricular (IVT) or peripheral routes. P-113 infused intravenously or injected IVT did not alter the drinking response to either thirst stimulus. The latter treatment reduced the drinking response to IVT angiotensin II ( $p < .005$ ). SQ given intramuscularly, IVT, or by both routes did not alter relative cellular dehydration thirst. Injection of SQ IVT did alter hypovolemic thirst, whereas a significantly enhanced response occurred after intramuscular SQ. The IVT treatment with SQ markedly reduced drinking after IVT angiotensin I. Data demonstrate that inhibition of angiotensin receptors or converting enzyme does not prevent appropriate drinking responses to primary thirst stimuli. (28 ref)—*Journal abstract*.

2688. Takayanagi, Issei; Sato, Takao & Takagi, Keijiro. (U Tokyo, Faculty of Pharmaceutical Sciences, Japan) **Action of 5-hydroxytryptamine on electrical activity of Auerbach's plexus in the ileum of the morphine dependent guinea pig.** *European Journal of Pharmacology*, 1974(Jul), Vol 27(2), 252-254.—Guinea pigs were made morphine dependent by daily subcutaneous doses of morphine hydrochloride. Effective concentrations of 5-hydroxytryptamine on Auerbach's plexus of Ss in the abstinence syndrome were significantly smaller than those of normal and morphine-treated Ss, while the responses to nicotine and caerulein were unchanged. Results suggest that withdrawal of morphine excites the M-receptors in Auerbach's plexus.

2689. Ten Ham, Martinijn & De Jong, Yeb. (National Inst of Public Health, Bilthoven, Netherlands) **Tolerance to the hypothermic and aggression-attenuating effects of  $\Delta^9$ - and  $\Delta^8$ -tetrahydrocannabinol in mice.** *European Journal of Pharmacology*, 1974(Sep), Vol 28(1), 144-148.—Investigated the effects of repeated administration of  $\Delta^9$ - and  $\Delta^8$ -tetrahydrocannabinol ( $\Delta^9$ - and  $\Delta^8$ -THC) on temperature and aggression of 60 isolated aggressive 60 male Swiss-Webster mice. In Exp I intraperitoneal  $\Delta^9$ -THC, 10 mg/kg, caused significant hypothermia and diminished aggression. Acute tolerance to the hypothermic effect developed which could be overcome by doubling the dose. In the same Ss no tolerance to the aggression inhibiting effect was seen. In Exp II  $\Delta^9$ - and  $\Delta^8$ -THC were compared. Both compounds caused a dose-dependent decrease of body temperature. The effect of  $\Delta^9$ -THC on body temperature was about 1.5 times as strong as that of  $\Delta^8$ -THC. Tolerance to the hypothermic effect appeared in 1 day for the 10 mg/kg dose and in about 3 days in the 25 mg/kg group. (17 ref)—*Journal abstract*.

2690. Tonge, Sally R. (Liverpool Polytechnic, School of Pharmacy, England) **Noradrenaline and 5-hydroxytryptamine metabolism in six areas of rat brain during post-amphetamine depression.** *Psychopharmacologia*,



1974, Vol 38(2), 181-186.—Mature male Wistar rats were given dextroamphetamine sulphate (200 mg/l) in the drinking water for a period of 3 wks. The drug was then withdrawn, and the Ss were killed 12, 24, 36, and 48 hrs later. Pronounced behavioral depression was observed 12 hrs after the withdrawal of amphetamine; 24 hrs after withdrawal, behavior was substantially normal but depression recurred at 36 hrs. Recovery appeared to be complete after 48 hrs. Fluorimetric determinations showed that noradrenaline (NA) and 5-hydroxytryptamine (5-HT) concentrations were reduced by the chronic administration of amphetamine in the cortex, hippocampus, thalamus-hypothalamus, and midbrain. NA concentrations were also reduced in the pons-medulla. 12 and 36 hrs after withdrawal, there was a further reduction in NA concentrations in the cortex, hippocampus, midbrain, and striatum. 5-HT concentrations in the cortex and striatum were lower 12 and 36 hrs after the withdrawal than during chronic amphetamine treatment; 36 hrs after withdrawal, concentrations in the hippocampus and the pons-medulla were also lower than during drug treatment.—*Journal abstract.*

2691. Trabucchi, M.; Cheney, D.; Racagni, G. & Costa, E. (NIMH Lab of Preclinical Pharmacology, St Elizabeths Hosp, Washington, DC) **Involvement of brain cholinergic mechanisms in the action of chlorpromazine.** *Nature*, 1974(Jun), Vol 249(5458), 664-666.—Monitored the effect of chlorpromazine and haloperidol on the turnover rate of acetylcholine (ACh) in the occipital cortex and striatum of male Sprague-Dawley rats to determine whether when dopamine receptors are blocked, the synthesis of ACh in the rat brain is increased. The amount of ACh synthesized in the striatum of rats receiving chlorpromazine or haloperidol was significantly increased, but there was no similar increase in the occipital cortex. Data suggest that these 2 drugs affect some neuronal mechanism that is important in the control of striatal ACh synthesis and less important in occipital cortex ACh synthesis. (19 ref)

2692. Trojnar, W.; Cytawa, J.; Frydrychowski, A. & Luszawska, D. (Gdańsk Medical School, Poland) **Intragastric self-administration of morphine as a measure of addiction.** *Psychopharmacologia*, 1974, Vol 37(4), 359-364.—Results of experiments carried out on 15 male Wistar albino rats show that instrumental conditioning reinforced with direct intragastric infusion of morphine could be used for the investigation of addiction. (19 ref)

2693. Truitt, Edward B. & Braude, Monique C. (George Washington U, Medical School) **Preclinical pharmacology of marihuana.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Presents a review of recent research on the pharmacological actions (e.g., EEG, behavioral, and neurochemical effects), tolerance, and possible therapeutic uses of marihuana in both animal and human Ss. (233 ref)

2694. Vetulani, Jerzy; Reichenberg, Krystyna & Wiszniewska, Grazyna. (Vanderbilt U, Medical School) **The ineffectiveness of desipramine pretreatment on behavioral effects of 6-hydroxydopamine in nialamide-pretreated rats.** *Psychopharmacologia*, 1974, Vol 38(2), 173-180.—Nonanesthetized male Wistar rats pretreated

with intraperitoneal nialamide were injected intravenicularly with 6-hydroxydopamine (6-OHDA) into both lateral brain ventricles. Some Ss received desipramine 1 hr before 6-OHDA. 6-OHDA increased the locomotor activity and produced behavioral stimulation lasting for several hours. On the following days the open-field performance of the Ss receiving 6-OHDA was markedly depressed. Half of the Ss receiving 6-OHDA died between Day 3 and Day 10 after the injection. Desipramine pretreatment did not affect the behavioral changes or mortality produced by 6-OHDA, although it counteracted the depletion of brain noradrenaline brought about by 6-OHDA. It is concluded that the behavioral changes observed after 6-OHDA injection in nialamide-pretreated Ss are related to the action of 6-OHDA on dopamine and not on noradrenaline neurons. (31 ref)—*Journal abstract.*

2695. Warburton, D. M. (U Reading, England) **The effects of scopolamine on a two-cue discrimination.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 395-404.—Trained a total of 40 Sprague-Dawley albino rats with a tone, light or tone-light combination as the discriminative stimulus. These groups were tested after intraperitoneal doses of scopolamine; it was found that groups trained with a single cue were more sensitive to the drug than double-cue groups, although their predrug responding was similar. A similar pattern was found among individuals in the double-cue groups in which there was a significant correlation between dependency on a single cue (as shown in transfer tests) and drug sensitivity. Results are interpreted in terms of scopolamine-induced changes in stimulus sensitivity produced by a modification of the neural mechanisms controlling attention. (24 ref)—*Journal abstract.*

2696. Wauquier, Albert; Niemegeers, Carlos J. & Lal, Harbans. (Janssen Pharmaceutica, Research Lab, Beerse, Belgium) **Differential antagonism by naloxone of inhibitory effects of haloperidol and morphine on brain self-stimulation.** *Psychopharmacologia*, 1974, Vol 37(4), 303-310.—Haloperidol (.16 mg/kg or morphine sulfate (40 mg/kg), injected subcutaneously, completely suppressed barpressing for brain self-stimulation in adult male Wistar rats implanted with electrodes in the lateral hypothalamus. Haloperidol also caused catalepsy and ptosis while morphine produced catalepsy with exophthalmia. Naloxone in a dose (5 mg/kg) which was ineffective when given alone, differentially reversed the morphine effects but was without any reversing influence on the actions of haloperidol. (16 ref)—*Journal abstract.*

2697. Weisinger, Richard S.; Parker, Lorne F. & Skorupski, Joseph D. (U Melbourne, Vic, Australia) **Conditioned taste aversion and specific need states in the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 655-660.—In 3 experiments, a total of 151 female Wistar rats were allowed to consume either sucrose or saline prior to being made ill by injection of either insulin or formalin, or by exposure to X rays. A 2-bottle preference test between sucrose and saline revealed that formalin was an effective agent in conditioned aversions to sucrose but not to saline. Similarly, injections of insulin were effective in producing conditioned aversions to saline but not to sucrose. X-

irradiation produced strong aversions to either solution. Results are discussed with regard to the specific need states that insulin and formalin produce. (20 ref)—*Journal abstract*.

2698. Wilcox, George L.; Andry, Diane K. & Luttges, Marvin W. (U Colorado) **Cycloheximide effects on electroencephalographic and evoked responses in mice.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 81-92.—40 implanted mice were treated with various intraperitoneal doses of cycloheximide (CXM) 30 min prior to tests using a sequence of slowly repeated light flashes interrupted by a brief auditory stimulus. Both evoked and EEG responses were recorded. The tests were repeated 24 hrs later without additional drug treatments. CXM, especially in high doses, caused alterations in the Ss' brain electrical activity. The alterations persisted for at least 24 hrs after CXM treatments. The time course of these effects did not correspond to the time course of CXM effects on brain protein synthesis or polysome disaggregation. Results suggest that memory deficits often associated with the protein-synthesis inhibition by CXM may be due, in part, to disturbances in the electrical activity of the brain. While not critical for learning or short-term memory, these electrical alterations may be related to neural mechanisms of long-term memory storage and retrieval. (20 ref)—*Journal abstract*.

2699. Wishart, Thomas B. & Walls, Elwood K. (U Saskatchewan, Saskatoon, Canada) **Reduction of stimulus-bound food consumption in the rat following amphetamine administration.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 741-745.—Studied the effects of intraperitoneal administration of dextroamphetamine on stimulus-bound food consumption in 30 male satiated rats. Lateral hypothalamic stimulation which resulted in feeding was either programmed to occur at regular intervals or delivered by the S's response (self-stimulation). Stimulus-bound food intake was reduced by dextroamphetamine, 3.0 or 4.0 mg/kg dosages being sufficient to cause almost complete anorexia. Reflexive sniffing and chewing of food and self-stimulation behaviors were unaffected. Results indicate that amphetamine selectively interacts with the adrenergic feeding system of the lateral hypothalamus to produce an inhibition of food consumption. (17 ref)—*Journal abstract*.

2700. Wong, David T. et al. (Eli Lilly & Co, Lilly Research Lab, Indianapolis, IN) **A selective inhibitor of serotonin uptake: Lilly 110140, 3-(p-trifluoromethylphenoxy)-N-methyl-3-phenylpropylamine.** *Life Sciences*, 1974(Aug), Vol 15(3), 471-479.—Results of tests show that Lilly-110140 is a highly selective inhibitor of serotonin uptake into synaptosomes of whole rat brain. The drug should be useful in studying the function of serotonergic neurons and may be helpful in clarifying the role of serotonin in certain types of mental depression. (17 ref)

2701. Woods, James H. & Tessel, Richard E. (U Michigan, Medical School) **Fenfluramine: Amphetamine congener that fails to maintain drug-taking behavior in the rhesus monkey.** *Science*, 1974(Sep), Vol 185(4156), 1067-1069.—Intravenous fenfluramine, over a dose range of .003-3 mg/kg of body weight, failed to maintain self-injection behavior in 9 rhesus monkeys that had

initiated and maintained responding for cocaine or methohexital. This absence of a positive reinforcing effect could not be attributed to a slow onset of drug effect or to the use of behaviorally inactive doses. It is concluded that fenfluramine, because of its distinctive properties, may produce fewer problems of human abuse than do amphetamine-type agents. (22 ref)—*Journal abstract*.

2702. Zis, A. P.; Fibiger, H. C. & Phillips, A. G. (U British Columbia, Div of Neurological Sciences, Vancouver, Canada) **Reversal by L-dopa of impaired learning due to destruction of the dopaminergic nigro-neostriatal projection.** *Science*, 1974(Sep), Vol 185(4155), 960-962.—18 male Wistar rats receiving bilateral stereotaxic intracerebral injections of 6-hydroxydopamine into the zona compacta of the substantia nigra failed to learn a 1-way active avoidance response. 16 other Ss served as controls. Small doses of levodopa (1.5 mg/kg) in combination with a peripheral decarboxylase inhibitor reversed this impairment in the experimental Ss. Ss with lesions which acquired the avoidance response during levodopa administration retained this response when drug treatment was discontinued. Results suggest that the dopaminergic nigro-neostriatal projection serves a critical function in the acquisition of learned instrumental responses. (32 ref)—*Journal abstract*.

2703. Zornetzer, S. F.; Gold, M. S. & Hendrickson, J. (U Florida, Medical School) **Alpha-methyl-p-tyrosine and memory: State-dependency and memory failure.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 135-141.—Evaluated the effects of  $\alpha$ -methyl-p-tyrosine (AMPT) on memory of a single-trial inhibitory avoidance response in a total of 130 male Swiss-Webster mice. AMPT did not prevent the establishment of memory storage nor did it prevent retrieval of either short- or long-term memory. AMPT did produce a state-dependency, however, such that a mismatch between the drug state during training and the drug state during retention testing produced an apparent amnesia. (16 ref)—*Journal abstract*.

## ANIMAL PSYCHOLOGY

2704. Baptista, Luis F. (Museum of Vertebrate Zoology, Berkeley, CA) **The effects of songs of wintering white-crowned sparrows on song development in sedentary populations of the species.** *Zeitschrift für Tierpsychologie*, 1974(Feb), Vol 34(2), 147-171.—Studied song dialects of the white-crowned sparrow (*Zonotrichia leucophrys nuttalli*) in California. 7 birds, out of approximately 450 sampled, sang songs typical of the migratory subspecies *pugetensis* which winters in the area. These birds sang from 1 to 3 themes of *nuttalli* and/or *pugetensis*. One individual also sang a song including syllables taken from songs of both these races. Based on morphological and behavioral grounds, 6 of these birds were identified as *nuttalli* presumably "misimprinted" with songs sung by wintering individuals of *pugetensis*. 5 males were mated, 4 of them to females of *nuttalli*. 2 of these females, after injection with testosterone, sang the local *nuttalli* dialects. This indicates that the songs learned by females were not influenced by the "atypical" themes sung by their mates, and that singing



the "incorrect" song by the males proved no barrier to their finding mates of the local subspecies. Possible explanations for the phenomenon of song "misimprinting" are discussed. (German summary) (36 ref)—*Journal summary*.

2705. Baylis, Jeffrey R. (Museum of Vertebrate Zoology, Berkeley, CA) **The behavior and ecology of *Herotilapia multispinosa* (Teleostei, cichlidae).** *Zeitschrift für Tierpsychologie*, 1974(Feb), Vol 34(2), 115-146. —Describes the ecology and the feeding, defensive, and social behavior of the small cichlid fish native to Central America.

2706. Crowell, Charles R. & Brown, Judson S. (U Iowa) **An electrifiable restraining cage for small animals.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 851-854. —Describes an adjustable restraining device for small animals which provides for rapid confinement and release, minimizes discomfort to the S, and does not require removing the S's hair or using special electrodes to present shock.

2707. Guillery, R. W. (U Wisconsin, Medical School) **Visual pathways in albinos.** *Scientific American*, 1974(May), Vol 230(5), 44-54. —Albinos of several mammalian species exhibit genetic anomalies in which reduced retinal pigmentation is combined with congenital visual system abnormalities, including abnormally layered lateral geniculate nuclei and termination of some optic nerve fibers in the wrong hemisphere of the brain. Several features of the central visual pathways in these anomalous individuals are described. The relation between the pigment deficit and the abnormality of the visual pathway is discussed. —P. Tolin.

2708. Hara, M. (Tokyo U of Education, Faculty of Education, Japan) **[Imprinting in ducklings: Influence of movement confinement.]** (Japn) *Annual of Animal Psychology*, 1973(Dec), Vol 23(1), 39-42. —Confirmed the effect on imprinting in ducklings of the following response during initial exposure. 40 Ss 14-20 hrs old were placed in a runway for 20 min. Ss that were allowed to follow a moving blue cube demonstrated, in a test 48 hrs later, the following response more frequently and for longer durations. The Ss that were prevented from following in the initial exposure did not show imprinting any more than control groups that were not exposed to the cube initially. —S. Nakajima.

2709. Hopkins, Carl D.; Rossetto, Michelangelo & Lutjen, Ann. (Rockefeller U, New York, NY) **A continuous sound spectrum analyzer for animal sounds.** *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 313-320. —Employed a continuous spectrum analyzer for the analysis of vocalizations of birds and other animals. Use of a commercially available, real-time spectrum analyzer required the construction of a display system which is described. Sound spectrograms are produced of comparable quality to those of traditional spectrum analyzers, but the system offers greater flexibility in analysis parameters and the advantages of continuous operation. (German summary)—E. Furchtgott.

2710. Hughes, B. O.; Wood-Gush, D. G. & Jones, R. Moreley. (ARC Poultry Research Ctr, Edinburgh, Scotland) **Spatial organization in flocks of domestic fowls.** *Animal Behaviour*, 1974(May), Vol 22(2), 438-445.

—Describes 7 experiments, with 2 flocks of 600 female birds of the Shaver 288 strain, in which the movements of individual birds were recorded by marking different samples with colored tags and photographing the flock at fixed intervals. The films were analyzed, the positions of the marked Ss were plotted, and the probability of the observed distributions occurring by chance was calculated. The movements of individuals lay on a continuum ranging from apparent randomness at one extreme to clear nonrandomness at the other. In all experiments most Ss were sighted in most camera fields, indicating that their movements were incompatible with the accepted definition of a delineated home range. Results are explained by postulating strain differences in aggressiveness and assigning an important role to illumination level. —*Journal abstract*.

2711. Hutcheson, J. Stanford & Mills, Kenneth C. (U North Carolina, Chapel Hill) **A compact and inexpensive drinkometer for use with small animals.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 179-181. —Describes a device which permits electrical isolation of the animal from the recording system. Data correlating licks with daily water intake (ml) and temporal consumption patterns are provided for several Long Evans rats.

2712. Lynch, Carol B. (Wesleyan U) **Environmental modification of nest-building in the white-footed mouse, *Peromyscus leucopus*.** *Animal Behaviour*, 1974(May), Vol 22(2), 405-409. —Exposure of 110 white-footed mice to low ambient temperature (5° vs 26°C) during a 5-day test resulted in the building of larger nests. The weight of cotton used by the S was employed as an index of nest size. Ss which had been acclimated to 5°C for 6 wks prior to testing built larger nests at 5°C and smaller nests at 26°C than did warm-acclimated Ss. Warm-acclimated Ss maintained for 6 wks under 9 hrs daily light built larger nests at both 5 and 26°C than did Ss kept under 16 hrs light. This pattern of response to environmental conditions approximating winter (low ambient temperature and short photoperiod) indicates that nesting is a component of the physiological-behavioral complex of cold adaptation. (15 ref)—*Journal abstract*.

2713. Mason, P. R. (South African Inst for Medical Research, Johannesburg) **Size and other factors determining planarian behaviour.** *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 8-13. —Conducted experiments on the planarian *Dugesia neumani* to determine its normal kline-kinetic activity. Results indicate that (a) the size of the planarian used exerted a strong influence on the findings; (b) seasonal variations in activity were apparent; and (c) there were no variations due to temperature, experimental starting time, and lunar cycles.

2714. Mueller, Helmut C. (U North Carolina, Chapel Hill) **Food caching behaviour in the American kestrel (*Falco sparverius*).** *Zeitschrift für Tierpsychologie*, 1974(Feb), Vol 34(2), 105-114. —Conducted laboratory studies of food-caching behavior and attempts to retrieve food by *Falco sparverius* (falcon). In spite of severe restraints on the time available to the Ss, caching occurred on 63% of the available opportunities and attempts to retrieve were observed on 65% of the available opportunities. Errors in retrieving behavior were uncommon. Caching and retrieving behavior

appeared spontaneously in hand-reared birds and persisted for as long as 3 yrs without any reinforcement. Caching appeared to be correlated with deprivation, but retrieving did not appear to be correlated with deprivation interval. Neither caching nor deprivation appeared to show a circadian rhythm. Caching may be influenced by previous hunger and frustration, while retrieving may be influenced by hunger and anticipation of food. Intact mice, which are better for storage, were cached more frequently, and retrieving attempts were made more often than with skinned and eviscerated mice, which desiccate rapidly. (German summary) (33 ref)—*Journal summary*.

2715. Murphree, Oddist D. & Johnson, Jack B. (VA Hosp, North Little Rock, AR) **An inexpensive activity measuring device for small animals.** *Pavlovian Journal of Biological Science*, 1974(Jul-Sep), Vol 9(3), 169-171. —Describes a device which utilizes the tilting of balanced cages to actuate a single microswitch coupled to an impulse counter for each cage. The system has functioned well for several years.

2716. Noirot, Elaine. (Lab de Psychologie expérimentale, Bruxelles, Belgium) **Nest-building by the virgin female mouse exposed to ultrasound from inaccessible pups.** *Animal Behaviour*, 1974(May), Vol 22(2), 410-420. —Observations of 8 naive virgin female albino mice indicate that when they were exposed to an inaccessible litter, so that they perceived the odor and the ultrasounds from the pups, their nest-building behavior underwent changes different from changes occurring in 8 controls exposed to an inaccessible adult female. Ss exposed to a litter built their nest as near as possible to the pups. Other characteristics of their nest-building behavior were influenced differently according to the type of ultrasound that the pups were emitting. In a condition where pups were mainly calling in response to cold, Ss built heavier nests than did controls. When calls in response to handling were given by the pups, Ss built lighter nests than controls. There was some suggestion that the Ss exposed to ultrasounds from handled pups tended to chew the nest-material more than either controls or Ss exposed to ultrasound from cooled pups. (18 ref) —*Journal abstract*.

2717. Rowe-Rowe, D. T. (Natal Parks, Game & Fish Preservation Board, South Africa) **Flight behaviour and flight distances of blesbok.** *Zeitschrift für Tierpsychologie*, 1974(Feb), Vol 34(2), 208-211. —Recorded flight distances of 1 male and 4 female adult blesbok in a small nature reserve in Africa.

2718. Rusak, Benjamin & Zucker, Irving. (U California, Berkeley) **Fluid intake of rats in constant light and during feeding restricted to the light or dark portion of the illumination cycle.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 91-100. —In Exp 1, 14 mature Sprague-Dawley rats restricted to eating and drinking during the light phase of a 12:12 light-dark (L-D) cycle (L-drinkers) consumed much smaller volumes of saccharin and NaCl than did 14 Ss whose feeding and drinking was restricted to the dark phase (D-drinkers). The patterns of fluid intake within the respective 12-hr feeding periods were markedly different for L- and D-drinkers, and the food-fluid ratios were significantly lower for D- than for L-drinkers. It is concluded that illumination affects fluid

intake independently of changes in food intake. In Exp II, intake of a wide concentration range of saccharin solutions was decreased in 20 male ad lib fed Ss housed in constant light (L-L); differences in fluid intake between the L-L and L-D groups varied directly with the hedonic value of the saccharin solutions. In Exp III, 8 L- and 8 D-drinkers did not differ in their preference for saccharin over water in 2-bottle tests. The necessity for controlling and specifying environmental illumination in studies of ingestive behavior is emphasized, and various methodological considerations related to illumination cycles are discussed. (27 ref)—*Journal abstract*.

2719. Smotherman, William P. et al. (Northern Illinois U) **Maternal responses to infant vocalizations and olfactory cues in rats and mice.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 55-66. —In 2 experiments, 10 lactating female Long-Evans rats and 14 lactating female C57BL/10 mice, respectively, were tested for retrieval of young in a Y-maze using the home cage as a start box. Retrieval-eliciting stimuli compared were (a) a pup emitting ultrasounds, (b) a tape loop of neonatal vocalizations, (c) a chilled pup which could not emit ultrasounds, and (d) an empty maze arm to control for random and/or exploratory activity. For both rats and mice the absence of any olfactory cue in the maze arms was accompanied by an absence of differential choice behavior. Given the presence of olfactory cues neonatal ultrasounds were effective directional cues for retrieval. The rat seemed incapable of utilizing olfactory cues alone for directional information, whereas the mouse utilized vocalizations and olfactory cues equally well. (18 ref)—*Journal abstract*.

2720. Tanaka, Toshihiko & Ono, Yoshiaki. (Kagawa Prefectural Science Museum, Japan) **[A preliminary experiment on ant lion behavior in removing obstacles from the nest.]** (Japn) *Annual of Animal Psychology*, 1973(Dec), Vol 23(1), 27-38. —Studied obstacle-removing behavior in 130 larvae of *Hagenomyia micans* and 22 larvae of *Myrmeleon formicarius*. The obstacle, a piece of rubber eraser, was placed in the middle of the nest, and the distance that the object had been moved was measured 1 day later. The size of obstacle removed was related to body size of the Ss, and the distance removed was proportional to nest size. *M. formicarius* demonstrated the removal behavior less frequently than *H. micans*. (English summary)—*S. Nakajima*.

2721. Vezie, Tom & Martin, R. Chris. (U Missouri, Kansas City) **A method for identifying individual subjects within a group of fish.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 87-88. —To identify individuals within a group of 38 fathead minnows, several dyes were tested for the distinctiveness of marking, duration of marking, toxicity, and effects upon individual and social behavior. Several of the dyes, including common food coloring, proved to be effective.

2722. Wallen, Kurt & Glickman, Stephen E. (U California, Berkeley) **Effect of peripheral anosmia on ventral rubbing in the gerbil.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 569-572. —Tested 8 male gerbils (*Meriones unguiculatus*) for rate of ventral rubbing before and after Ss were rendered peripherally anosmic by bathing the nasal epithelium with a 5% solution of zinc sulfate. 10 additional Ss served as saline controls. After



induction of peripheral anosmia, Ss showed marked reduction in the rate of ventral rubbing, indicating that similar findings previously obtained after bilateral removal of the olfactory bulbs were due to deprivation of olfactory input and not some more general concomitant of a central nervous system lesion.—*Journal abstract.*

2723. **Watson, Flora M.; Henry, James P. & Halmeyer, Gary C.** (U Southern California, Medical School) **Effects of early experience on emotional and social reactivity in CBA mice.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 9-14.—CBA agouti mice were handled and others were not in conjunction with their being reared in groups or isolation until adulthood. Emotional reactivity was assessed at 120 days of age by their activity in the open field, followed by measurement of plasma corticosterone levels, and social interaction was observed during their 15 wks in a Reimer-Petrus population cage. Handling and socialization produced a significant increase in open field activity, with the handled-socialized Ss being the most active. Isolated Ss had significantly higher plasma corticosterone levels than socialized Ss, but the difference between handled and nonhandled males was not significant. The handled-socialized Ss developed the most stable social hierarchy in the population cage, successfully differentiated roles, and had the lowest increase in systolic blood pressure. Isolated males failed to develop normal social behavior, and severe fighting was observed throughout the 15 wks; moreover, these Ss had a higher elevation of systolic blood pressure than the socialized Ss. (23 ref)—*Journal abstract.*

### Learning & Motivation

2724. **Syme, G. J.; Pollard, J. S.; Syme, Lesley A. & Reid, Robyn M.** (Ruakura Animal Research Station, Hamilton, New Zealand) **An analysis of the limited access measure of social dominance in rats.** *Animal Behaviour*, 1974(May), Vol 22(2), 486-500.—Notes that the limited access situation in which only 1 of 2 or more Ss can gain access to a reward during a restricted time-period is an accepted measure of dominance in the rat. The present 3 experiments with a total of 14 male hooded rats attempted to validate the technique by establishing the relationship between individual and competitive performance in order to determine whether priority of access had been measured. The generality of the competitive orders was examined by altering the competitive response while retaining the same reward. In view of the data collected for both time and weight-gain measures in food and water competition, it is doubtful whether the limited access competitive technique can be considered a valid measure of dominance for the laboratory rat. (31 ref)—*Journal abstract.*

2725. **Ayres, John J.; Benedict, James O.; Glackenmeyer, Richard & Matthews, William.** (U Massachusetts, Amherst) **Some factors involved in the comparison of response systems: Acquisition, extinction, and transfer of head-poke and lever-press Sidman avoidance.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 371-379.—Head poking, a suggested natural escape reaction to shock for the rat, was compared to lever-pressing in a Sidman avoidance study. 3 experiments were conducted with a total of 32 naive

male Holtzman albino rats. Both responses could be emitted at any time, but only one was effective in a given session. Acquisition and extinction of the 2 responses were compared under both signaled and unsignaled avoidance. Then, a test for transfer was conducted in which acquisition conditions were reinstated, but the effectiveness of the responses was reversed. 3 differences between responses were noted: (a) head poking was superior in reducing shock rates under signaled conditions; (b) head poking was more resistant to extinction, especially under signaled conditions; and (c) under unsignaled conditions, Ss were unable to learn to head poke if they had previously learned to leverpress. Findings (a) and (c) were pursued in later experiments. Finding (a) depended on the location of the warning signal with respect to the response system. When the leverpress required approach to the warning signal, the head poke was superior. But when the head poke required approach to the warning signal, the 2 responses were equally effective. (18 ref)—*Journal abstract.*

2726. **Barrera, F. J.** (U North Carolina, Chapel Hill) **Centrifugal selection of signal-directed pecking.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 341-355.—In 2 experiments a total of 12 male White Carneaux pigeons were exposed to a schedule of stimulus-correlated food presentations. When key pecks terminated trial signals and cancelled the delivery of food, pecking was either gradually or rapidly redirected away from the keys, depending on whether the food-omission contingency was introduced from the outset or after exposure to a response-independent baseline. In all cases, the food-omission contingency substantially reduced or eliminated pecking at the keys. (36 ref)—*Journal abstract.*

2727. **Bissell, Howard S. & Scavio, Michael J.** (California State U, Fullerton) **A minicomputer program for the resolution of response frequency and latency in classical conditioning preparations.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 439-442.—Describes a classical conditioning program capable of controlling stimulus events and recording response data in experiments using the rabbit's nictitating membrane and/or jaw-movement responses. The system's extreme accuracy in latency measurement cannot be duplicated either by conventional hand-scoring methods involving oscillographic records or by other minicomputer conditioning programs.

2728. **Brush, Michael E. & Schaeffer, Robert W.** (Auburn U) **Effects of water deprivation on schedule-induced polydipsia.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 69-72.—12 food-deprived male Sprague-Dawley albino rats, randomly assigned to 3 equal groups, were successively exposed to (a) baseline conditions with water freely available in both the experimental chamber and the home cage and (b) baseline and free-reinforcement schedule (FFI-60-sec) conditions with water freely available in the experimental chamber and available on a free or limited basis in the home cage. Prior to experimental sessions, Group 1 had continuous access to water in the home cage, whereas Groups 2 and 3 were 12- and 22-hrs water deprived, respectively. Results indicate that water deprivation increased the probability of the development of

schedule-induced polydipsia but had no augmentative effect on either asymptotic intake level or rate of development of the phenomenon.—*Journal abstract.*

2729. Chantrey, David F. (U Keele, England) **Stimulus preexposure and discrimination learning by domestic chicks: Effect of varying interstimulus time.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 517-525.—Conducted a series of experiments with a total of 199 Ross strain chicks in which groups of Ss were preexposed to moving objects on Days 1-5 after hatching. Only 1 object was visible at a time, and the time between the appearance of one stimulus and the immediately succeeding appearance of the other was called the "interonset time." Ss which had been preexposed to both discriminanda in rapid alternation (interonset time of 1/4 min) learned a subsequent discrimination task more slowly than Ss familiar with neither stimulus; Ss preexposed to both discriminanda at separate times (interonset time of 30 min) learned the discrimination faster than Ss familiar with neither stimulus. The evidence suggests that the proportions of slow-learning and fast-learning Ss in a group were changed by varying interonset time. (25 ref)—*Journal abstract.*

2730. Christensen, Carol M.; Caldwell, Donald F. & Oberleas, Donald. (Wayne State U) **Establishment of a learned preference for a zinc-containing solution by zinc-deficient rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 415-421.—24 zinc-deficient, male Holtzman albino rats were trained to associate a novel-tasting solution with the partial amelioration of their deficiency. For 4 days, Ss were permitted to drink only a distasteful acetic acid solution containing a small quantity of zinc. When later offered a choice between a solution associated with the deficiency (distilled water) and an acetic acid solution, the Ss strongly preferred the latter. This contrasted sharply with choices of zinc-deficient Ss which had no previous experience with the acid-zinc solution. This group showed a strong aversion to the taste of the acid. Results also show (a) a positive correlation between weight gain during the 4-day education period and preferences for the acid-zinc solution, (b) a unique dietary sampling pattern among deficient Ss with prior exposure to zinc, and (c) a strong resistance to extinction of consumption of the novel acidic solution when zinc had been deleted.—*Journal abstract.*

2731. Cohen, David H. (U Virginia, Medical School) **Effect of conditioned stimulus intensity on visually conditioned heart rate change in the pigeon: A sensitization mechanism.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 495-499.—In visually conditioned heart-rate change in 30 White Carneaux pigeons, increasing the conditioned stimulus intensity enhanced performance. The effect, which only appeared at high intensity levels, was obtained during acquisition and with rigorous maintenance of constant stimulus conditions. A similar effect was obtained with 10 sensitization control Ss. Evidence is presented that the stimulus intensity effect during conditioning may have totally reflected increased sensitization such that the locus of the effect was upon performance rather than conditioning per se. (18 ref)—*Journal abstract.*

2732. Cohen, Perrin S. & Looney, Thomas A. (Northeastern U) **Mirror control of responding on fixed-ratio schedules in pigeons.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 113-115.—Reports that one of 3 White Carneaux pigeons exposed to multiple fixed ratio-fixed ratio (FR-FR) reinforcement schedules attacked a mirror target during postreinforcement pauses preceding the higher FR schedule. The same mirror-image stimulation, on the other hand, reduced reinforcement rate for all 3 pigeons by selectively increasing postreinforcement pauses preceding the higher FR schedule. This indicates that in studies of reinforcement schedules with pigeons, mirror-image stimulation from surfaces commonly present in standard test chambers (e.g., one-way mirrors, metal walls) may interact with schedule parameters to control postreinforcement behavior other than attack.—*Journal abstract.*

2733. Davis, Hank & Burton, Jo-Ann. (U Guelph, Ontario, Canada) **The measurement of response force during a lever-press shock-escape procedure in rats.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 433-440.—Gave 3 naive male Wistar albino rats extensive exposure to an escape procedure in which shocks were scheduled to occur 30 sec apart. The amount of downward force exerted on the lever was continuously recorded and compared with traditional discrete measurement in which only responses above an arbitrary force threshold were recorded. Ss typically remained in contact with the lever throughout the shock-free intertrial interval. Shock onset reliably occasioned a brief lurch from and return to the lever, which resulted in a leverpress escape response being recorded. Lever contact, which occupied an average of 90% of session time, showed great stability in force after a brief period of instability after each shock terminated. In general, continuous measurement revealed considerably different results than discrete measurements of on-lever behavior. For example, continuous lever contact fluctuating near response threshold was often recorded as discrete responding, and sustained lever contact occurring below response threshold was omitted from discrete measurement.—*Journal abstract.*

2734. Davis, Michael. (Yale U, Medical School) **Sensitization of the rat startle response by noise.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 571-581.—In a series of 6 experiments with a total of 160 male Sprague-Dawley albino rats, it was found that the startle response showed a progressive increase in amplitude when tones were presented against a high level of background noise. This sensitization effect was not a result of repetitive exposure to tones but rather a result of continuous exposure to noise. The size of the effect was directly related to noise intensity and required about 30-45 min to reach a maximum. The effect did not dissipate when the noise was maintained but did dissipate once the noise was turned down. Results are discussed in terms of the experimental conditions under which repetitive stimulus exposure produces either sensitization or habituation of the startle reflex.—*Journal abstract.*

2735. DeCasper, Anthony J. & Zeiler, Michael D. (Emory U) **Time limits for completing fixed ratios: III. Stimulus variables.** *Journal of the Experimental Analysis*



of *Behavior*, 1974(Sep), Vol 22(2), 285-300.—White Carneaux pigeons received food only if they took longer than a specified time to begin and complete a fixed ratio. In Exp I with 4 Ss, ratios with shorter durations had no stimulus consequence: in Exp II with 4 additional Ss, these ratios ended with a stimulus change. In both studies, the mean time to complete the ratio exceeded requirements of less than 30 sec, approximately matched requirements of 30 sec, and fell progressively short of matching thereafter. The various effects resembled those of temporal differentiation experiments involving single responses. Although both number of ratios and time separating successive food presentations increased along with ratio duration, control experiments showed that differential reinforcement of duration, rather than either form or reinforcer intermittency, accounted for the performance. Exp II also studied the effects of adding a stimulus that signaled when the required time had elapsed. The stimulus produced durations that matched even the most stringent requirements. This precision was not maintained when the stimulus was removed. Temporal differentiation schedules seem to have similar effects regardless of the response class and temporal property involved. (21 ref)—*Journal abstract*.

2736. Delprato, Dennis J. & Meltzer, Richard J. (Eastern Michigan U) **Type of start box and goal box distinctiveness in self-punitive running of rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 548-554.—A total of 96 male Sprague-Dawley rats were first trained to escape shock in an alley by running to a safe goal box. In Exp I either a trapdoor-floored start box or a guillotine-door start box was used in different groups. In extinction, nonpunished and punished subgroups were tested in each of the start-box conditions. Punishment produced faster running speeds than nonpunishment (self-punitive effect) only with the trapdoor. The trapdoor start box was used in Exp II, and independent groups of Ss were trained to escape to a goal box that was either very dissimilar or similar to the shock area. Nonpunished and punished subgroups were extinguished in each goal box condition. Self-punitive running was more likely with the dissimilar goal box.—*Journal abstract*.

2737. Dutch, J. (Victoria U, Wellington, New Zealand) **Comparison of the reinforcing properties of conditioned and discriminative stimuli in new and previously experienced environments.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 85-86.—Drinking in 64 male Sprague-Dawley rats was either preceded or accompanied by a tone. When barpressing was subsequently conditioned to the tone, it was found that more barpresses were made in a totally new environment than in the environment in which conditioning of the tone had taken place. Within each environment, there was no difference in the effectiveness of the tone stimuli.—*Journal abstract*.

2738. Farthing, G. William. (U Maine, Orono) **Behavioral contrast with multiple positive and negative stimuli on a continuum.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 419-425.—After an initial period of nondifferential training, 6 female Silver King pigeons were trained on a go-no-go discrimination involving 12 line tilts from vertical

clockwise to horizontal. Responses to the 1st 6 tilts (positive stimuli) were reinforced on a variable-interval 1-min schedule, whereas responses to the other 6 tilts (negative stimuli) were extinguished. During the 1st several discrimination sessions, the highest response rate was typically to one of the positive stimuli that was relatively close to the negative stimuli or at an intermediate distance, rather than to one of the positive stimuli most distant from the negative stimuli. This effect decreased with extended training up to 50 or 80 sessions.—*Journal abstract*.

2739. Force, Donald D. & LoLordo, Vincent M. (Dalhousie U, Halifax, Nova Scotia, Canada) **Transfer of control of the pigeon's key peck from food reinforcement to avoidance of shock.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 251-259.—Initially trained 8 male White Carneaux pigeons to peck a white key for food under a variable-interval 1-min schedule of reinforcement. Then, a shock-avoidance schedule was initiated, and food was no longer available in the experimental situation. Under the avoidance schedule, each peck on the key postponed shock for 40 sec. A warning signal, consisting of tone and red houselights, was presented after 30 sec without a response. If no response occurred, a shock was delivered 10 sec after warning-signal onset. Shocks were delivered every 10 sec in the presence of the warning signal until a response was made. The warning signal was terminated only by a response. Keypecking of all 8 Ss came under control of the avoidance schedule, and responding continued throughout the 20-day avoidance training period. (34 ref)—*Journal abstract*.

2740. Giulian, Dana; Snowdon, Charles T. & Krom, Larry S. (Rockefeller U, New York, NY) **A completely automated closed-field maze series for rats.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 183-187.—Describes a device for rats in which movements across a maze field of insulated floor plates are monitored by a transistor amplifying-detection circuit. Complete automation eliminates observer involvement and provides a reliable and inexpensive means for testing large numbers of animals. Further modification of the system permits analysis of the direction in animal movements.

2741. Griffin, Patrick; Honaker, L. Michael; Jones, Daniel E. & Pynes, Leonard T. (U Alabama) **Preference for signaled vs unsignaled shock in pigeons with implanted electrodes.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 141-143.—In an experiment with 2 adult male Silver King pigeons, treadle presses produced changeover from a program of unsignaled, unavoidable, and inescapable shock to a program in which shock was preceded by a 5-sec visual and auditory preshock signal. Different houselight colors were correlated with the 2 programs. Both Ss, albeit marginal in 1 S, spent more session time in the signaled shock program when the above conditions prevailed than if (a) only the stimulus correlated with the signaled shock program (but not the preshock signal) occurred or (b) neither preshock signal nor correlated stimulus occurred.—*Journal abstract*.

2742. Grott, Robert & Neuringer, Allen. (Reed Coll) **Group behavior of rats under schedules of reinforcement.** *Journal of the Experimental Analysis of Behavior*,

1974(Sep), Vol 22(2), 311-321.—Conducted 4 experiments with a total of 24 Long-Evans and 12 Fisher naive female rats. Groups of 3 Ss were placed in a chamber containing 1 response lever and 1 water dispenser. A variety of schedule conditions were explored including fixed ratio, extinction, satiation, fixed interval, fixed time, differential reinforcement of low rates, and discrimination learning. Each group was treated as a single unit, with the collective lever responses emitted by the 3 Ss being the main dependent variable. Group responding was controlled by the reinforcement schedules in an orderly and consistent manner. However, the groups often paused less and responded faster than individual Ss working under identical conditions. (22 ref)—*Journal abstract*.

2743. Hall, Geoffrey. (U Sussex, Lab of Experimental Psychology, Brighton, England) **Strategies of simultaneous discrimination learning in the pigeon.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 520-529.—Trained 16 White Carneaux pigeons in Exp I on a simultaneous discrimination between red and orange. After they had mastered the problem they were presented on occasional test trials with 2 red or with 2 orange stimuli. On those test trials when both stimuli were positives (S+) the Ss tended to peck always to 1 key. On trials with 2 negative stimuli (S-) the Ss chose the other key. Results suggest that the Ss used the presence of the S- on their preferred side as a cue for pecking to the other side. Exp II investigated the role of the S+ with 16 additional Ss. Transfer tests involving the introduction of a neutral stimulus suggested that Ss varied in the extent to which they relied upon the S+. Some Ss showed no preference for the S+ over the neutral stimulus. However, when required to learn a discrimination between the old S+ and the neutral stimulus, Ss given the old S+ as the positive learned more rapidly than those given the neutral stimulus as the positive.—*Journal abstract*.

2744. Hara, Masataka. (Tokyo U of Education, Japan) **[Imprinting in chicks: Effects of first exposure and movement confinement.]** (Jpn) *Annual of Animal Psychology*, 1972, Vol 22(2), 51-60.—Studied the effect of the "following response" on imprinting. 40 White Leghorn chicks 14-20 hrs old were individually exposed to a 15-cm red cube continuously moving at a speed of 13 cm/sec in a runway. When tested 48 hrs later, the Ss that were allowed to move freely during the 1st exposure to the cube followed the cube after the shortest latency, for the longest period of time, and most frequently. The Ss confined in a glass container during the 1st exposure did not show any more following responses than the unexposed Ss. Results support the law of effort. (English summary) (16 ref)—*S. Nakajima*.

2745. Hughes, Larry F.; Dunlap, William P. & Dachowski, Lawrence. (Louisiana State U, Medical Ctr, Kresge Hearing Research Lab of the South) **Reward magnitude and partial reinforcement effects in a single runway.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 563-570.—The partial reinforcement acquisition effect (PRAE) in running speeds and the frustration effect (activity following nonreward compared with reward) were measured simultaneously in an alley whose goal-box floor was a stabilimeter.

Experimental groups of 9 male Charles River albino rats each received 50 or 100% reinforcement combined factorially with 3 magnitudes of reward (1, 3, or 9 pellets). A control group of 18 Ss was never rewarded. The size of the PRAE was a direct function of reward magnitude, and crossing of 50 and 100% curves was found for all alley segments, including the goal segment. The frustration effect (FE) was present by the 2nd day of training for the 3- and 9-pellet groups, and the size of the FE was directly related to reward magnitude. The present study is unique in that (a) the findings were free from the effects of reward contrast, (b) behavior antecedent to the goal indicated that incentive was effectively manipulated, and (c) an unrewarded control group was used. (31 ref)—*Journal abstract*.

2746. Hunsicker, James P. & Reid, Larry D. (Bradley U) **"Priming effect" in conventionally reinforced rats.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 618-621.—Ran 15 male albino rats in alleys for water reinforcement with intertrial intervals (ITIs) similar to the intervals typically used in studies of intracranial reinforcement. When deprived over 15 hrs Ss ran faster with very short ITIs (7 sec) than with longer ITIs (95 sec). Comparisons with rats described in other studies running for intracranial reinforcement leads to the conclusion that, regardless of what kind of reinforcer is used, rats run faster for a reinforcer when ITIs are only seconds long rather than over a minute. (17 ref)—*Journal abstract*.

2747. Kamin, Leon J. & Galoni, Stephen J. (Princeton U) **Compound conditioned emotional response conditioning with differentially salient elements in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 591-597.—R. Rescorla and A. R. Wagner's model of conditioning (1972) implies that, if 2 conditioned-stimulus (CS) elements are independently conditioned to asymptote and then compounded, reinforcement of the compound should reduce the conditioned strength of each element. Further, the more salient element should lose more strength and should ultimately show less conditioned strength than the less salient element. 4 groups of 8 male Holtzman albino rats each, in a conditioned emotional response procedure, provided 2 independent tests of this deduction at different levels of CS salience. Data in each case appear consistent with the model's prediction, significantly so in 1 case. Data in other aspects confirm deductions drawn from the model.—*Journal abstract*.

2748. King, Glen D.; Schaeffer, Robert W. & Pierson, Stephen C. (Auburn U) **Reinforcement schedule preference of a raccoon (*Procyon lotor*).** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 97-99.—Gave a male raccoon a choice to respond for food pellets on either a fixed interval (FI) 30-sec schedule or a fixed ration (FR) schedule, the response requirement of which was systematically varied. S preferred the FR schedule only when the rate of reinforcement on the FR schedule exceeded the rate of reinforcement on the FI schedule by a factor of 2. The highly efficient responding of the S on the FI schedule was noted as encouragement for using this species more frequently in operant learning paradigms.—*Journal abstract*.



2749. Kruger, Brian M. (Wright State U) **Self-punitive running in the rat following start box fear conditioning: Shock intensity effects.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 555-562. —In Phase 1 of an experiment with 240 female hooded rats, buzzer-alone presentations or buzzer-shock pairings were given in the start box of a 4-ft straight alley. Phase 2 consisted of runway test trials during which there was no shock in the alley or there was shock in the last 2 ft. Shock levels employed in each phase were 0, 40, 53, and 70 v. All Phase 1 nonshock Ss ceased running by Trial 3. In general, for Ss shocked in Phase 1, running speed and the number of Ss completing all 60 trials were greater for shocked than nonshocked Phase 2 conditions. In addition, the stronger the Phase 1 shock, the greater the number completing all trials and the faster the speeds. Phase 2 shock intensity was not a significant factor. (15 ref)—*Journal abstract*.

2750. Kuch, Dennis O. (McMaster U, Hamilton, Ontario, Canada) **Differentiation of press durations with upper and lower limits on reinforced values.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 275-283. —12 naive male albino rats received food following leverpress durations between  $t$  and  $t + t'$  sec where  $t$  was 2, 4, or 8 sec and  $t'$  was 25t, .50t, or 1.00t sec. Modal press durations were greater than  $t$  but less than  $t + t'$  in all cases. Distributions of press durations were lower and broader for larger values of  $t$ . Lower  $t' / t$  ratios produced lower median press durations and relatively narrower press-duration distributions. Median press duration was a power function of  $t$  within a  $t' / t$  ratio condition, corresponding to previous results for latency, interresponse time, and response durations. —*Journal abstract*.

2751. Lattal, Kennon A. (West Virginia U) **Combinations of response-reinforcer dependence and independence.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 357-362. —Investigated the contribution of the response-reinforcer dependency to the control of behavior. 4 experienced White Carneaux pigeons were trained to keypeck under a variable-interval schedule of reinforcement. With the total number and temporal distribution of reinforcer deliveries in experimental sessions constant, the effects of varying the percentage of response-independent reinforcement were examined. At different times, 100, 66, 33, 10, or 0% of the scheduled reinforcers were delivered dependent upon keypecking, and the remainder were delivered independently of responding. Response rates were related to the percentage of response-dependent reinforcement, with lower response rates associated with smaller percentages of response-dependent reinforcement. Results suggest that the response-reinforcer relation exerts control over behavior in a manner similar to that exerted by other parameters of reinforcement. —*Journal abstract*.

2752. Leftwich, Debra & May, James G. (Child Study Ctr, New Orleans, LA) **Effects of conditioned aversive stimuli presented during tonic immobility in guinea pigs.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 513-516. —The duration of and susceptibility to tonic immobility were measured in 3 groups of albino and pigmented guinea pigs ( $N = 27$ )

while a train of intense tone bursts was presented. In 1 group, the tone bursts had been previously associated with painful shock stimuli. The 2nd group had previously experienced the tone bursts alone, and the 3rd group had previously received shocks without the train of tone bursts. Results indicate that both groups which had previously received shock exhibited increased susceptibility to immobilization, and the no-shock group showed a decline in duration when tone bursts were presented. Results could not be easily interpreted to support the fear hypothesis. Explanations involving "sensitization" and "learned helplessness" are proposed. —*Journal abstract*.

2753. Li, Mei-Chih. (National Cheng-Chi U, Taipei, Taiwan, Republic of China) **The effect of spontaneous recovery and interference on rats' retention of discriminations.** *Acta Psychologica Taiwanica*, 1973, Vol 15, 41-45. —Trained 36 albino male rats successively to learn 2 discriminative problems to the same learning criterion. The problems were comparable to the A-B, A-D paradigm in verbal learning. Retention of either discrimination was tested in 8 sessions over a 2-day interval. Results confirm interference theory and the crowding effect. Proactive inhibition increased with time while retroactive inhibition decreased, then both became approximately equal. —*Journal abstract*.

2754. Long, Carolyn K. & Allen, Joseph D. (U Georgia) **Stimulus compounding in pigeons.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 95-97. —Trained 2 male White King pigeons on a 3-ply multiple schedule in which reinforcement was available on a variable interval 1-min schedule for 2 of the components and extinction was in effect for the 3rd component. Ss associated with reinforcement were either a tone or a light and the S-delta associated with the extinction component was the absence of tone and light. After response rates stabilized, testing for summation was conducted with both steady-state and extinction test procedures. Both of these procedures involved 1-min presentations of the compound tone and light. Results indicate that summation did not emerge under the steady-state test conditions but did emerge under extinction test conditions. —*Journal abstract*.

2755. Lydersen, Tore & Cheney, Carl D. (Utah State U) **Fixed-ratio discrimination effects of extinction and satiation.** *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 26-29. —Trained 3 White King pigeons under conditional discrimination procedures in which fixed-ratio (FR) 30 and FR 60 were randomly scheduled on the center of 3 response keys. Reinforcement was contingent upon a left-side key response on FR-30 trials and upon a right-side key response on FR-60 trials. Following stable performance, the behavior was placed under either extinction or Ss were allowed to continue responding until satiated. Results show that under both procedures responding subsequently ceased, but no systematic effects were found upon the accuracy of the discrimination. The absence of an effort upon accuracy by extinction and satiation in the present task is consistent with results of prior conditional discrimination research in which exteroceptive stimuli were used. —*Journal abstract*.

2756. Marcucella, Henry. (Boston U) **Signalled reinforcement in differential-reinforcement-of-low-rate schedules.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 381-390.—At several fixed and variable minimum reinforced interresponse times (IRTs), a stimulus was added to differential-reinforcement-of-low-rate (DRL) schedules to signal the availability or nonavailability of reinforcement to 30 male Sprague-Dawley albino rats. As the minimum reinforced IRT increased, the rate of unreinforced responding decreased. Changing from fixed to variable minimum IRT in the basic DRL schedule further decreased the rate of unreinforced responding. Both effects were to some degree reversible. For fixed minimum reinforced IRTs of 30 sec or shorter, most unreinforced responses terminated IRTs just short of that required for reinforcement. The minimum reinforced IRT and the number of short response latencies to the onset of the signal were negatively correlated. Both of these analyses suggested that at values of 30 sec or shorter, Ss discriminated the availability of the reinforcer more on the basis of time than on the basis of presence or absence of the signal. (21 ref)—*Journal abstract.*

2757. Matthews, T. James; McHugh, Thomas G. & Carr, Lucille D. (New York U) **Pavlovian and instrumental determinants of response suppression in the pigeon.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 500-506.—Exp I demonstrated the formation of a discriminated punishment effect in the absence of a conditioned emotional response. Electric shocks were delivered at random intervals to 3 naive male White Carneaux pigeons pecking for food on a variable-interval schedule. During a 1-min visual conditioned stimulus (CS), scheduled shocks were delayed until a response occurred (punishment). Differential suppression to the CS was observed in addition to overall suppression. Suppression was related to shock intensity. In Exp II with the same Ss, CS suppression was related to the CS and was not an artifact of response pattern or discrimination of shock patterns. The punishment contingency without the CS did not suppress behavior, and the CS without the punishment contingency did not relieve suppression.—*Journal abstract.*

2758. McAllister, Wallace R.; McAllister, Dorothy E.; Weldin, Garry H. & Cohen, Jeffrey M. (Northern Illinois U) **Intertrial interval effects in classically conditioned fear to a discrete conditioned stimulus and to situational cues.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 582-590.—In Exp I fear was classically conditioned in a total of 240 female hooded and Sprague-Dawley rats with a discrete conditioned stimulus (CS) at intertrial intervals (ITIs) of 15, 45, 75, 105, 165, or 225 sec and in Exp II, with an additional 144 Ss, with or without a discrete CS at ITIs of 165, 225, or 285 sec. The amount of fear conditioned to situational cues and to the discrete CS plus situational cues was then measured by the learning of a hurdle-jumping response which allowed escape from the fear-eliciting stimuli. Results suggest that as ITI was lengthened fear conditioned to situational cues alone and to the discrete CS increased. However, following conditioning with a discrete CS, fear elicited by situational cues increased with ITI but then decreased, presumably because a

discrimination had been formed between the situational cues and the compound of CS plus situational cues.—*Journal abstract.*

2759. McMillan, John C. (Franklin D. Roosevelt VA Hosp, Montrose, NY) **Average uncertainty as a determinant of observing behavior.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 401-408.—After discrimination training on a multiple variable-interval (VI) extinction schedule of food reinforcement, 6 male White Carneaux pigeons were placed on the uncued or mixed version of the same schedule. Ss were allowed to make an optional "observing response" that converted the uncued schedule to the corresponding cued schedule by providing a 20-sec exposure to the appropriate discriminative stimulus. The schedule consisted of 100 40-sec components, and the probability that any one of them would be a VI component was systematically varied between .00 and 1.00. Results show that the amount of observing behavior was an inverted-U function of the probability of the VI component. Few observing responses occurred at probabilities of .00 or 1.00, and maximum responding occurred at a value less than .50. (21 ref)—*Journal abstract.*

2760. Meisch, Richard A. & Thompson, Travis. (U Minnesota) **Rapid establishment of ethanol as a reinforcer for rats.** *Psychopharmacologia*, 1974, Vol 37(4), 311-321.—Daily 6-hr sessions were run during which each leverpress by 7 male Sprague-Dawley rats produced brief access to water, or to 8% ethanol on experimental days. Food pellets were presented noncontingently on a 1-min fixed-time schedule during the last 4 hrs of each session. A stable baseline of water responding developed, characterized by little or no responding during the 1st 2 hrs followed by high rates and schedule-induced polydipsic drinking during the last 4 hrs. Following the development of a stable water baseline, 8% ethanol was substituted for water on alternate days. Ss' responding for ethanol during the 1st 2 hrs of a session substantially exceed water baseline rates, indicating that ethanol had been established as a reinforcer. Subsequently, when food pellet presentations were discontinued, and the ethanol concentration was increased from 8 to 16 to 32%, ethanol intake persisted at values exceeding water control levels. Results confirm that ethanol was functioning as a reinforcer. (24 ref)—*Journal abstract.*

2761. Morgan, M. J. (U Cambridge, England) **Effects of random reinforcement sequences.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 301-310.—Exposed 10 naive male hooded rats to a random sequence of reinforcement on 2 levers, such that there was no way to predict from the previous reinforcement which lever would deliver reinforcement next. The Ss showed a tendency to repeat the choice that had just produced reinforcement, despite the absence of an overall contingency that differentially reinforced such repetition. This tendency decreased with continued exposure to the schedule. Runs of successive reinforcements on a lever increased the probability of pressing that lever, but only slightly, and only in the earlier phases of training. The more quickly a press was made after reinforcement the more likely it was to be on the lever that had delivered that reinforcement. Repetition of a choice followed by reinforcement should be viewed as a



naturally occurring behavior in the rat, but not necessarily as a behavior that will continue without differential reinforcement of repetition.—*Journal abstract.*

2762. Morgan, M. J. (U Cambridge, Psychological Lab, England) **Resistance to satiation.** *Animal Behaviour*, 1974(May), Vol 22(2), 449-466.—Reviews the phenomenon of resistance to satiation, in which instrumental behavior continues in the absence of the consummatory response towards which it was originally directed. These findings illustrate, along with other data, that consummatory and instrumental activities are not determined by a single intervening drive variable. One account of the relationship between consummatory and instrumental activities is that instrumental responding is maintained by the reinforcing effects of consummatory activities and will only gradually disappear when that reinforcement is withdrawn. This suggests that satiation is highly related to extinction of behavior by nonreward, and evidence for this possibility is presented. (105 ref)—*Journal abstract.*

2763. Pencer, Edward L. (St Francis Xavier U, Antigonish, Nova Scotia, Canada) **Persistence in the absence of primary motivation in the albino rat.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 787-792.—Trained 24 male Holtzman rats under either partial reinforcement (PRF) or continuous reinforcement (CRF). Ss were subsequently pre-fed their daily ration in the form of reward pellets and immediately run in the same task under a CRF schedule. Results reveal that PRF-trained Ss persisted in the satiated state relative to CRF controls. These results, termed the satiation effect, present difficulties to theories of persistence which address only extinction tests. An interpretation utilizing a modification of A. Amsel's (1962) frustration hypothesis is advanced. Implications of this proposal for a general theory of persistence and the methodological advantages of the satiation technique are discussed.—*Journal abstract.*

2764. Pert, Agu & Gonzalez, R. C. (Biomedical Lab, Edgewood Arsenal, MD) **Behavior of the turtle (*Chrysemys picta picta*) in simultaneous, successive, and behavioral contrast situations.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 526-538.—4 experiments on reward and learning in a total of 99 painted turtles yielded the following patterns of results: negative simultaneous contrast, positive behavioral contrast, a positive relation between magnitude of reward and resistance to extinction, and a gradual decrement in performance as a function of abrupt reduction in magnitude of reward, but no suggestion of negative successive contrast. This pattern is the same as that of analogous experiments with fish and quite different from that of analogous experiments with rats. Its bearing on the interrelations among the various contrast phenomena and on the problem of phyletic differences in learning is discussed. (39 ref)—*Journal abstract.*

2765. Quirt, B. Michael & Cohen, Jerome S. (Oxford Regional Hosp Ctr, Woodstock, Ontario, Canada) **Effects of intermittent and constant punishment on resistance to punishment in a free operant situation for the albino rat.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 539-547.—Trained

male Wistar albino rats (10 experimental and 9 control Ss) to barpress for food reinforcement in a 2-bar cyclic response chain situation. Responding on 1 bar led also to a punishment (footshock) on either an intermittent or constant schedule. Both punishment schedules led to increased responding on the nonpunished bar and to initial response suppression followed by recovery on the punished bar. For Ss on the intermittent schedule, the response increase on the nonpunished bar was seen only after a punishment on the other bar. Similar effects were found for transfer time between the 2 bars. The effects of punishment on response to both bars were more pronounced for the intermittent punishment groups. Results are discussed in terms of the motivational constructs of A. Amsel and of R. K. Banks.—*Journal abstract.*

2766. Robinson, Paul W. & Shelley, Monte F. (Brigham Young U) **The effects of total darkness on schedule control.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 391-400.—Investigated the effect of total darkness on the keypecking of 8 naive male homing pigeons under fixed-ratio, variable-ratio, fixed-interval, and variable-interval schedules of food reinforcement. Ss were divided into groups of 2, with each group conditioned to peck under 1 of the 4 schedules of reinforcement. Under an ABAB procedure, all Ss experienced alternating light and dark conditions. The house- and keylights were (a) maintained at full intensity for the 1st 30 1-hr sessions, (b) faded out and disconnected over Sessions 31 through 50, (c) totally illuminated for Sessions 51 to 60, and (d) disconnected again for the final 10 sessions. Responding under the ratio schedules increased from 20 to 108% in the dark, and responding under the interval schedules in the dark decreased by 37 to 93%. (21 ref)—*Journal abstract.*

2767. Shipley, Robert H. (U Missouri, Medical School) **Extinction of conditioned fear in rats as a function of several parameters of CS exposure.** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 699-707.—Employed Pavlovian fear acquisition and extinction procedures in a factorial design which varied conditioned-stimulus (CS) duration in acquisition, the number and duration of CS exposures in extinction, and total CS exposure across extinction trials. Ss were 128 female Blue Spruce hooded rats. Suppression of licking for water served as the measure of residual fear. The data revealed that suppression of licking was an inverse function of total nonreinforced CS exposure irrespective of the number and duration of extinction exposures used to amass that total. The effect of total nonreinforced CS exposure was not significantly influenced by the duration of the CS utilized in acquisition training. The discrepancy between the obtained results and predictions derived from several theories of extinction is discussed. (22 ref)—*Journal abstract.*

2768. Siegel, Shepard & Domjan, Michael. (McMaster U, Hamilton, Ontario, Canada) **The inhibitory effect of backward conditioning as a function of the number of backward pairings.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 122-124.—Independent groups of a total of 39 male albino rats received classical conditioning acquisition following 0, 5, 10, 25, or 50 preexposures to the conditioning stimuli in a backward-

paired manner (the unconditioned stimulus preceding the conditioned stimulus). In both the conditioned suppression situation with rats an eyelid conditioning situation with 59 male New Zealand rabbits, backward preexposure retarded acquisition (in agreement with earlier findings). Furthermore, increasing backward-paired experience with the conditioning stimuli was associated with increasingly deleterious effects on acquisition performance. Results are contrary to suggestions that backward-conditioning-induced retardation of subsequent acquisition results only from extensive backward preexposures, with fewer such preexposures producing excitatory effects.—*Journal abstract.*

2769. Sinclair, J. D. (State Alcohol Monopoly, Research Lab, Helsinki, Finland) **Rats learning to work for alcohol.** *Nature*, 1974(Jun), Vol 249(5457), 590-592.

—6 male albino rats from 3 strains (AA, Sprague-Dawley, and ANA) who exhibited consistent high preferences for alcohol over water and standard rat food were tested in an operant conditioning and reversal experiment in a 2-bar Skinner box. All 6 Ss met the criterion for learning to work for alcohol within the 1st 3 nights. A reversal test was then designed by switching the alcohol and water bars; all but 1 S learned the reversal. Motivation for alcohol was studied in an AA rat and a Sprague-Dawley rat which had learned to work for alcohol by adding weights progressively to the response bars. Both rats pressed the alcohol bar until over 140 g were attached, although responding by the Sprague-Dawley rat decreased as a linear function of the weight added. Because food and water were freely available and no shaping was used, results cannot be attributed to motivation from hunger or thirst or to shaping procedures; it appears that learning was reinforced by obtaining alcohol *per se* to drink. (15 ref)—*L. Gorsey.*

2770. Slotnick, Burton M. & Katz, Howard M. (NIMH, Bethesda, MD) **Olfactory learning-set formation in rats.** *Science*, 1974(Aug), Vol 185(4153), 796-798.

—In 2 experiments, 12 rats trained on 16 2-odor discrimination problems showed rapid acquisition of a learning set and 1-trial learning by the end of the problem series. Learning to sample odor cues before responding and adoption of a "win-stay, lose-shift" strategy probably accounts for the virtually errorless learning. It is concluded that learning-set performance of rats trained with odor stimuli is comparable to that reported for primates trained on visual cues.—*Journal abstract.*

2771. Staddon, J. E. (Duke U) **Temporal control, attention, and memory.** *Psychological Review*, 1974(Sep), Vol 81(5), 375-391.—Notes that animals do not usually respond for food at times when it is not available (e.g., the time just after food delivery on periodic schedules). Consequently, food acquires inhibitory aftereffects (inhibitory temporal control) on such schedules so that its omission elevates subsequent response rate (omission effect). Previous data, results of an experiment with 4 male White Carneaux pigeons, and arguments are presented to show that temporal control depends on the properties of memory and attention. Maintained reinforcement-omission effects reflect temporal overshadowing of neutral events (e.g., food omission) by more salient and memorable events (e.g., food). Disinhibition of delay

and reinforcement-magnitude context effects can also be analyzed in these terms. (65 ref)—*Journal abstract.*

2772. Stahl, Jeanne M. & Ellen, Paul. (Georgia State U) **Factors in the reasoning performance of the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Sep), Vol 87(3), 598-604.—4 experiments, investigating the performance of a total of 25 male Long-Evans hooded rats on the Maier 3-table reasoning task, demonstrated that the reasoning solution did not depend on either stimuli associated with the apparatus (olfactory and tactile) or internal spatial orientation cues (vestibular) to the locus of the food. The exploratory experience was critical for performance, and it is suggested that the reasoning solution involved the integration of separate past experiences rather than merely being a response to some specific cue in the situation.—*Journal abstract.*

2773. Strouthes, Andrew; Volo, Alfred M. & Unger, Thomas. (State U New York, Binghamton) **Hunger, thirst and their interactive effects on the rat's drinking in a saccharin-water choice.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 153-157.—Conducted an experiment and 2 replications of it with a total of 222 Sprague-Dawley albino rats. Ss preferred water to 1.0% saccharin and drank large volumes of it, provided that hours of water deprivation (thirst) exceeded hours of food deprivation (hunger). All others (i.e., undeprived, equally hungry and thirsty Ss, and those whose hunger exceeded thirst) preferred 1.0% saccharin but drank small amounts relative to the amounts of water drunk by the thirsty Ss. Results suggest that thirsty Ss drank saccharin primarily for water, and to a lesser extent and only with experience for the sensory stimulation which saccharin provided. Hungry Ss drank it primarily for the sensory stimulation. Saccharin in a choice with water seems to provide a means for the determination of the momentarily dominant drive state in naive rats. (15 ref) *Journal abstract.*

2774. Thomas, G. V. & Cameron, G. N. (U Stirling, Scotland) **Response rate, reinforcement frequency, and behavioral contrast.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 427-432.—3 experienced male homing pigeons responded for food on a multiple schedule in which periods of green-key illumination alternated with periods of red-key illumination. When behavior had stabilized with a variable-interval 2-min schedule of reinforcement operating during both stimuli, low rates of responding were differentially reinforced during the green component. Response rates during the green component fell without changing the frequency of reinforcement, but there were no unequivocal contrast effects during the red stimulus. The frequency of reinforcement during the green component was then reduced by changing to a variable-interval 8-min schedule without reducing the response rates in that component, which were held at a low level by the spacing requirement. Again, the conditions during the red stimulus were unchanged, but response rates during that stimulus increased. Results show that reductions in reinforcement frequency, independently of response rate, can produce interactions in multiple schedules. (20 ref) —*Journal abstract.*

2775. Watanabe, Shigeru & Ogawa, Takashi. (Keio U, Tokyo, Japan) **An experimental analysis of mirror image reversal effects in pigeons.** *Annual of Animal Psychology*.



1973(Dec), Vol 23(1), 1-13.—Studied the mirror-image reversal effect in the pigeon, using tilted lines. 16 Ss learned keypecking response under monocular vision. One group was presented with a single oblique line, and the other group discriminated an oblique line from its mirror image. Generalization was tested in extinction with full-length lines and half-length (radius) lines. When tested with the untrained eye, the mirror-image reversal appeared in the discrimination-training group, but not in the single-stimulus training group. Whether an S uses the upper half or lower half of a line as a cue for responding seems to depend on which half of the line was presented on the side of the eye used in training. Results support an explanation in terms of attention.—*S. Nakajima.*

2776. Wheatley, Kimbal L. & Thomas, David R. (U Colorado) **Relative and absolute density of reinforcement as factors influencing the peak shift.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 409-418.—4 groups of 6 naive domestic pigeons each were given nondifferential training on multiple variable-interval variable-interval reinforcement schedules and then were switched to differential training involving a multiple schedule in which reinforcement density was reduced in 1 of the 2 components. The multiple schedules used in the 4 groups had the mean inter-reinforcement intervals of 1 min and .1 min in the 2 components changed to 1 min, 5 min; 2.5 min, 2.5 min changed to 2.5 min, 5 min; 12 sec, 12 sec changed to 12 sec, 24 sec; and 12 sec, 12 sec changed to 12 sec, 60 sec. In subsequently administered wavelength generalization tests, some peak shifts were observed in each condition and occurred occasionally in the absence of behavioral contrast or rate reduction in the less-reinforced component. The best predictor of peak shift was a high proportion of total responses emitted during the more-reinforced component at the end of differential training.—*Journal abstract.*

2777. Wilkie, Donald M. & Ramer, Donald G. (U British Columbia, Vancouver, Canada) **Errorless discrimination established by differential autoshaping.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 333-340.—In Exp I, 16 naive King pigeons exposed to a differential autoshaping procedure pecked a key in the presence of the stimulus associated with reinforcement but did not peck, or pecked infrequently, in the presence of the stimulus associated with nonreinforcement. In Exp II, 2 additional Ss were exposed to a differential autoshaping procedure in which 1 stimulus was associated with reinforcement and 2 stimuli were associated with nonreinforcement. Ss initially responded in the presence of 1 stimulus associated with nonreinforcement but never responded in the presence of the 2nd stimulus associated with nonreinforcement. They were subsequently exposed to an autoshaping procedure in which reinforcement followed both these stimuli. The number of stimulus-reinforcement pairings required to establish pecking in the presence of the stimulus during which responses had not previously occurred suggested that such stimuli are inhibitory. These findings have implications for autoshaping, errorless discrimination, inhibition, and theories of discrimination byproducts. (23 ref)—*Journal abstract.*

2778. Will, Bruno. (U Louis Pasteur, Lab de Psychophysiologie, Strasbourg, France) **Development of "strategies" utilized by albino rats in operant conditioning.** *Animal Behaviour*, 1974(May), Vol 22(2), 370-375.—Conducted an operant-conditioning study of 32 male Wistar rats over a period of 6 mo. Observations showed that different Ss progressively adopted a highly stable behavior which could be called a "strategy." Each one of these strategies enabled the S to obtain, in a defined manner, a certain number of reinforcements within a given period. Despite their different efficiencies, each one of these strategies could be considered as correct. It is shown that the duration of the conditioning session and the mean yield per stimulus depended on the choice of a given strategy. (15 ref)—*Journal abstract.*

2779. Willis, Richard D.; Van Hartesveldt, Carol; Loken, Kristen K. & Hall, Deborah C. (U Florida) **Motivation in concurrent variable-interval schedules with food and water reinforcers.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 323-331.—Reinforced the leverpressing of 4 food- and water-deprived male Long-Evans hooded rats on concurrent variable-interval schedules. Food reinforced one response, and water reinforced the other. Response rates in baseline were higher in the food component than in the water component. After response patterns and body weights had stabilized, Ss were given access to either food only, water only, both food and water, or neither food nor water (baseline) before daily sessions. Giving food before a session decreased percent time in the food component, decreased overall response rates for food, and increased overall response rates for water. Giving both food and water before a session resulted in a combination of prefeeding and prewatering effects. More food and more water were consumed when both were available than when only one was available before a session. (26 ref)—*Journal abstract.*

2780. Wiltz, Robert A. (Comprehensive Mental Health Board of Central Illinois, East Peoria) **Combining stimuli signalling response-dependent food and shock.** *Journal of the Experimental Analysis of Behavior*, 1974(Sep), Vol 22(2), 363-370.—Exposed 3 naive male hooded rats to a multiple schedule in which separate presentations of light and tone alternated with periods during which light and tone were absent. In Phase 1, light and tone each signaled identical variable-interval (VI) schedules of food delivery. In Phase 2, light and tone signaled separate but concurrent VI schedules of food and shock delivery. In both phases, the absence of light and tone was associated with the differential reinforcement of other behavior. Test presentations of light, tone, and a light-plus-tone combination indicated that in both phases, light-plus-tone controlled higher response rates than either light or tone alone. The combination continued to control enhanced responding even when the test stimuli signaled VI schedules of food and fixed-ratio schedules of shock. In these latter sessions, enhanced control by the combination increased shock frequency with no corresponding change in food frequency. Apparently, the level of behavior controlled by the absence of 2 single stimuli may be more important than the consequences of responding in determining the

effects of combined-stimulus presentations.—*Journal abstract.*

2781. Woodard, W. T. & Bitterman, M. E. (U Hawaii) **A discrete-trials/fixed-interval method of discrimination training.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 389-392.—Describes an efficient new method of discrimination training which has several advantages over older free-operant and discrete-trials procedures. Illustrative data on reversal learning in pigeons and goldfish are presented.

2782. Woodard, William T. & Bitterman, M. E. (U Hawaii) **Autoshaping in the goldfish.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 409-410.—Classically conditioned the target-striking response of 12 goldfish to target-light color, the effectiveness of the pairing (of color and reinforcement) being demonstrated by appropriate controls.

2783. Wookey, P. E. & Strongman, K. T. (U Exeter, Washington-Singer Lab, England) **Schedules of reward shift in the double runway.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 373-386.—80 male food-deprived Lister hooded rats received 62 trials in a double runway. On Trials 1-30, reward in the 1st goal box (GB1) was either always 2 food pellets or always zero pellets. All Ss received 2 pellets in the 2nd goal box (GB2). On Trials 31-62 Ss in each preshift group (GB1 reward or GB1 nonreward) were shifted to the opposite GB1 reward level on 0, 25, 50, 75, or 100% of occasions. GB2 reward remained unaltered in all cases. For Ss experiencing reward decrease, second runway (A2) run and goal speeds after nonreward were generally enhanced, both within-group and in comparison with never-rewarded controls. Comparisons of speeds after increased reward with those of always rewarded controls revealed no difference on A2 start or run but indicated impairment of A2 goal performance. With the 50% schedule of reward increase, A2 run speeds after nonreward exceeded those of never rewarded controls. Results are discussed with reference to J. H. McHose's contrast account of double runway phenomena and with A. Amsel's frustration theory. (16 ref)—*Journal abstract.*

2784. Zentall, Thomas R. & Hogan, David E. (U Pittsburgh) **Memory in the pigeon: Proactive inhibition in a delayed matching task.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 109-112.—Studied proactive inhibition in 3 experiments with 1 White Carneaux female pigeon, using a modified delayed matching-to-sample task. Proactive inhibition was defined as disruption in matching performance produced by the presentation of a stimulus prior to the sample stimulus (relative to control trials without prior stimulus presentation). In Exp I, with a prior stimulus which was not presented as one of the comparison stimuli, temporary disruption in matching performance was found with a 5-sec delay between sample and comparison stimuli but not with a 0-sec delay. In Exp II, with a prior stimulus which was later presented as the incorrect comparison stimulus, long-lasting disruption was found with a 5-sec delay but again not with a 0-sec delay. Exp III demonstrated a direct relation between the magnitude of proactive inhibition and length of the delay. These results offer some support for an interference

theory of forgetting, but also suggest that it may not be the identity of the 2 stimuli but, rather, the order of the 2 stimuli which is lost.—*Journal abstract.*

### Social & Sexual Behavior

2785. Anderson, Clark O. & Mason, William A. (U California, Primate Research Ctr, Davis) **Early experience and complexity of social organization in groups of young rhesus monkeys (*Macaca mulatta*).** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 681-690.—Found that 2 6-member social groups of young rhesus monkeys, one socially deprived and the other raised with mother and age-mates, showed marked differences in the complexity of social organization. Compared to deprived Ss, experienced Ss interacted more often as trios and larger subgroups, and the response structure of their triadic subgroups was more complex. Only in the experienced group did functional aspects of triadic interactions suggest that 1 individual recognized the status relations between the other participants. These findings indicate that early social experience affects levels of social competence that transcend variations in ethologically derived response patterns and that cannot be seen in arranged dyadic encounters.—*Journal abstract.*

2786. Barash, David P. (U Washington) **Neighbor recognition in two "solitary" carnivores: The raccoon (*Procyon lotor*) and the red fox (*Vulpes fulva*).** *Science*, 1974(Aug), Vol 185(4153), 794-796.—13 male raccoons and 7 male red foxes were trapped alive and exposed to each other in captivity. Ss of each species trapped close to one another demonstrated a higher frequency of initial dominance-subordinate relationships and lower frequencies of more intense aggressive interactions than did Ss trapped at greater distances from each other. This suggests the existence of neighbor recognition and thus a rudimentary social structure within these free-living solitary species.—*Journal abstract.*

2787. Bernstein, Irwin S. & Gordon, Thomas P. (U Georgia) **The function of aggression in primate societies.** *American Scientist*, 1974(May), Vol 62(3), 304-311.—Reviews the source and role of aggressive behavior in primate societies. Competition studies of male aggression show that unfamiliar conspecifics introduced to one another for the first time exhibit considerable hostility. To study this, 36 adult male rhesus monkeys were introduced into a single enclosure and observed. The ritualization and fighting that ensued are described. The maintenance of social order and the development of socialization and social roles are also described. It is concluded that ritualized aggression within groups limits the consequences of aggressive encounters and that social mechanisms controlling aggression between groups helps pressure the species. (42 ref)—R. S. Albin.

2788. Bridges, Robert S.; Goldman, B. D. & Bryant, L. P. (U Connecticut) **Serum prolactin concentrations and the initiation of maternal behavior in the rat.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 219-226.—Measured maternal behavior and serum prolactin in pregnant and virgin female Wistar rats. Pregnant rats were either ovariectomized or sham-ovariectomized on Day 17 of pregnancy, while virgin females were ovariectomized at the same age. 2 days after surgery, nests were rated and



the 3 treatment groups were tested for responsiveness to rat pups. Both pregnant treatment groups built superior nests compared to the virgin group and also responded more frequently to rat pups within a 1-hr test period than the virgin controls. Significantly more ovariectomized pregnant Ss responded to pups than did intact pregnant Ss. Serum prolactin levels did not differ among the 3 treatments nor did exposure to pups affect serum prolactin levels. Data suggest that high levels of serum prolactin during late pregnancy are not essential for the initiation of maternal behavior in the rat. (19 ref) —*Journal abstract.*

2789. Cook, W. T. & Siegel, P. B. (Allied Mills Industries Poultry, Summer Hill, NSW, Australia) **Social variables and divergent selection for mating behaviour of male chickens (*Gallus domesticus*).** *Animal Behaviour*, 1974(May), Vol 22(2), 390-396.—Heterosexual or unisexual contact of juvenile male chickens from 2 lines divergently selected for male mating frequency and from a control line had little, if any, influence on their subsequent mating behavior. The interaction of Lines  $\times$  Social Environments for mating behavior was not significant, showing that lines responded in a similar manner to the environments. It is hypothesized that selection for low cumulative number of completed matings (CNCM) was primarily for higher neural thresholds, whereas selection for high CNCM affected loci operative after neural thresholds were attained. The magnitude of the sexual component of a court was dependent on the genetic background of the population, being less in the low-mating than in the high-mating line. (18 ref)—*Journal abstract.*

2790. Davis, Roger E.; Harris, Colin & Shelby, Jessie. (U Michigan, Mental Health Research Inst) **Sex differences in aggressivity and the effects of social isolation in the anabantoid fish, *Macropodus opercularis*.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 497-510.—Evaluated aggressiveness in Exp I in 10 male and 10 female adult anabantoid fish by measuring (a) the frequency of aggressive displays that individuals made toward a mirror image stimulus following varying periods of social isolation; (b) the display frequency in brief, unisexual and bisexual bouts with live opponents; and (c) the reinforcing effects of mirror image stimulation on performance of an approach response. In Exp II isolation up to 7 days increased aggressivity in both 6 males and 6 females. Males performed lateral display toward a mirror image or a live conspecific more frequently than females. Mirror image stimulation also was a stronger positive reinforcer in males than in females. (25 ref)—*Journal abstract.*

2791. Deets, Allyn C. (U Pittsburgh, Lab of Clinical Science) **Age-mate or twin sibling: Effects on interactions between monkey mothers and infants.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 748-763.—Examined the effects of the twin sibling relationship upon interactions between mother and infant. 12 rhesus monkey infants were reared with a mother and nonsibling peers; 8 had an age-mate or twin sibling, while 4 control infants did not. The sibling pairs were formed by fostering newborns 2 to a mother; the control infants were fostered 1 to a mother. Findings indicate that the infants did not engage in as much interaction with

their mothers throughout a 7-mo period of observation on a wide range of indexes, including such basic behaviors as a contact with the mother's ventrum and nipples. The mothers rearing twins spent less time cradling their infants and less frequently rejected them. There were a few additional differences, notably in the area of restrictive behavior, but it is concluded that the differences in maternal behavior were principally a reaction to the differences in infant behavior. (27 ref) —*Journal abstract.*

2792. Drickamer, Lee C. (Williams Coll) **Contact stimulation, androgenized females and accelerated sexual maturation in female mice.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 101-110.—In Exp I adult female mice previously given 100  $\mu$ g of testosterone propionate on Day 1 of age were placed with 21-day-old females producing an acceleration of vaginal introitus and 1st vaginal estrus in the young females. Young test females placed with intact adult males attained 1st estrus at 27.9 days of age while test females placed with neonatally androgenized females matured at 30.5 days of age and single control females matured at 34.0 days of age. Androgenized females caused an acceleration of maturation in young females, but not by the production of an acceleratory pheromone as in adult intact males. Exp II demonstrated that contact stimulation with the young females by neonatally androgenized adult females was equal in quantity and similar in quality to the contact by normal adult males. In Exp III young females were exposed to the continued presence of a neonatally androgenized adult female and a daily sample of male-soiled bedding containing the maturation-accelerating pheromone; these females matured at 28.1 days of age. Contact stimulation may explain the acceleration of sexual development produced by placing young female mice with neonatally androgenized adult females. (24 ref)—*Journal abstract.*

2793. Eaton, G. Gray & Resko, John A. (Oregon Regional Primate Research Ctr, Beaverton) **Plasma testosterone and male dominance in a Japanese macaque (*Macaca fuscata*) troop compared with repeated measures of testosterone in laboratory males.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 251-259.—In 2 experiments, plasma testosterone levels measured by radioimmunoassay did not correlate with dominance rank or aggressive behavior in 21 adult males of a natural troop of Japanese macaques. Data were replicated during 2 consecutive breeding seasons. Levels of male dominance and aggressive behavior were highly correlated from year to year, but testosterone levels of individual males were not. Individual levels of testosterone were also not correlated in 5 laboratory males sampled every 15 min over a 2-hr period. Laboratory males showed multiple, apparently random peaks but the mean testosterone level of 11.73 ng/ml did not vary significantly throughout the 120-min study period. By demonstrating that the stress of blood collection did not depress plasma testosterone titers in laboratory males, data validate the method used in the study of the natural troop. (33 ref)—*Journal abstract.*

2794. Ewbank, R.; Meese, G. B. & Cox, J. E. (U Liverpool, Faculty of Veterinary Science, England) **Individual recognition and the dominance hierarchy in**

- the domesticated pig: The role of sight. *Animal Behaviour*, 1974(May), Vol 22(2), 473-480.—Studied the role of sight in the dominance hierarchy of groups of 8 Large White or Large White  $\times$  Landrace pigs by the induction of temporary blindness using opaque contact lenses or hoods. The effect of blindness was examined in 3 social situations: (a) 8 previously unacquainted, blinded Ss were simultaneously introduced; (b) groups of Ss with a known social order were blinded and (c) a single S within a group of known social order was blinded. Contact lenses had a minimal effect on the hierarchy formation while both lenses and hoods had no effect on the established groups. The hoods prevented hierarchy formation among the unacquainted Ss. It is suggested that sight alone is not necessary for hierarchy maintenance and that the hoods stopped the formation of a hierarchy by an effect other than the deprivation of sight (e.g., by covering pheromone-producing areas). (15 ref)—*Journal abstract*.
2795. Harkins, Steve; Becker, Lee A. & Wright, Dennis C. (U Missouri) Gregariousness and aggression in wild and domestic rats. *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 119-121.—Observed 10 pairs of wild and domestic rats (*Rattus norvegicus*) in an open field. Domestic pairs engaged in more gregarious contact and were less variable in their contact scores than wild rats ( $p < .01$ ). Domestic rats were more active and produced fewer boluses than wild rats. Unlike the wild pairs, domestic rats did not engage in aggressive behaviors. Results support the hypothesis that, in the laboratory, social behaviors of domestic rats, including behaviors related to social dominance, are different than the social behaviors of wild rats.—*Journal abstract*.
2796. Herrenkohl, Lorraine R. (Temple U) Mousekilling in virgin, pregnant and lactating rats. *Physiology & Behavior*, 1974(Jul), Vol 13(1), 171-173.—Virgin, early and late pregnant, and early lactating ( $n = 20$  in each) Sprague-Dawley rats were presented with a mouse for 30 min a day for 2 consecutive days. Mousekilling was observed on only 2 trials. Generally, rat and mouse ignored each other, even when rat pups lived with lactating rats. It is suggested that to better assess the effects of reproductive state on predation, studies are needed that vary strain (use of high mousekillers), hunger conditions, and type of mouse. (21 ref)
2797. Huang, Diana & Hazlett, Brian A. (U Michigan) Submissive distance in the golden hamster *Mesocricetus auratus*. *Animal Behaviour*, 1974(May), Vol 22(2), 467-472.—In a total of 20 male golden hamsters, observations on S pairs indicated that the average distance at which the Ss showed submissive behavior patterns was significantly variable. This distance was significantly higher in Ss which had been isolated than in those which had been housed in groups of 4. Also, this distance was affected significantly for isolates by the previous amount of experience they had had in the observation box. Ranking Ss by distance at which they showed submissive patterns was negatively correlated with a ranking by dominance. (21 ref)—*Journal abstract*.
2798. Hurley, Ann C. & Hartline, Peter H. (U California, San Diego) Escape response in the damselfish *Chromis cyanea* (Pisces: pomacentridae): A quantitative study. *Animal Behaviour*, 1974(May), Vol 22(2), 430-437.—Models of different sizes, shapes, and colors evoked oriented escape responses in schools of damselfish in their natural coral-reef habitat. Divers filmed these responses; from the films, the distance of the school from the model at the instant of response (reaction distance) was calculated. For a given model, reaction distance was independent of the speed of the model's approach. Darker-colored models were more effective in causing escape than lighter-colored models, suggesting contrast as an important feature of the stimulus. Larger models were more effective than smaller ones. Habituation to repeated stimuli was absent for intertrial intervals from .5 to 4 min. Natural behavior of damselfish suggests that cues such as sound, vibration, and details of shape, colors, and motion also play a role in triggering escape. (24 ref)—*Journal abstract*.
2799. Johnston, Robert E. (Cornell U) Sexual attraction function of golden hamster vaginal secretion. *Behavioral Biology*, 1974(Sep), Vol 12(1), 111-117.—A total of 6 sexually experienced and 16 sexually naive male hamsters (*Mesocricetus auratus*) were tested in their home cages for attraction to various female hamster odors. An odor was presented inside 1 stimulus bottle while a 2nd bottle was a clean control. Experienced and naive Ss were strongly attracted to the vaginal secretion of estrous as well as 1-day postestrous females and spent a large percentage of test time sniffing at this odor. The odor also elicited licking of the bottle top, even though the males could not lick the secretion. After standing in the air at 22°C for 12 or 24 hrs, the attractiveness of the vaginal secretion was greatly reduced. Males were not attracted to female urine odors. These 3 experiments demonstrate a sex-attractant function for the hamster vaginal secretion odor. (15 ref)—*Journal abstract*.
2800. Kaufmann, John H. (U Florida) Social ethology of the whiptail wallaby, *Macropus parryi*, in Northeastern New South Wales. *Animal Behaviour*, 1974(May), Vol 22(2), 281-369.—Reviews macropod studies from the literature and presents the taxonomy and description of the whiptail wallaby during joey, young-at-foot, subadult, and adult stages. The species' distribution and status; the study area and methods of observation from October 1966 to November 1967; individual, intra-, and intermob behavior; reproductive biology and mating behavior; home range and movements; and the ecology of social movements are detailed. Photographs and diagrams are included. (5 p ref)—B. McLean.
2801. Kunkel, Peter. (IRSAC Inst pour la Recherche Scientifique en Afrique Centrale, Lwiro, Zaïre) Mating systems of tropical birds: The effects of weakness or absence of external reproduction-timing factors, with special reference to prolonged pair bonds. *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 265-307.—Reviews breeding activities in tropical birds, showing that behavioral means are important in overcoming nonsynchronization of gonadic cycles of potential mates. Among these behaviors are colonial breeding, particularly elaborated courtship displays, and different mating types such as prolonged or permanent pair bond and a close group bond. (German summary) (244 ref)
2802. Maple, Terry; Erwin, J. & Mitchell, G. (U California, Davis) Sexually aroused self-aggression in a socialized, adult male monkey. *Archives of Sexual*



*Behavior*, 1974(Sep), Vol 3(5), 471-475.—Observed an abnormal but apparently successful sexual posture in an adult male rhesus monkey that bit its hands and leg when dismounting. This behavior followed each of several mounts but ceased toward the end of the series, culminating in ejaculation. The animal's rearing history suggests that early partial isolation may produce long-lasting abnormalities which, while unusual, need not seriously affect successful copulation.

2803. O'Connell, Richard H. (California State U, Northridge) **Spontaneous alteration and emotionality in rats with differential early experience.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 135-136.—Studied the relationship between emotionality measures and spontaneous alternation in 14 male Wistar albino rats which had been differentially handled as pups. Handled rats had less emotional open-field activity patterns over a 90-day period and alternated more than nonhandled rats.

2804. Petrinovich, Lewis. (U California, Riverside) **Individual recognition of pup vocalization by northern elephant seal mothers.** *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 308-312.—Using both playback of recorded pup distress vocalizations and observational data, it was found that female elephant seals (*Mirounga angustirostris*) could distinguish the distress vocalizations of their own from those of other pups. The possible adaptive significance of the specific recognition system is discussed. (German summary)

2805. Plaut, S. Michael; Thal, Arlene; Haynes, E. Eugene & Wagner, Joseph E. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Maternal deprivation in the rat: Prevention of mortality by nonlactating adults.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 311-320.—Conducted 4 experiments with rat litters permanently deprived of their mother at age 13 days. Some litters were housed with a male or virgin female. Although over 90% of the adult-deprived pups died between 18 and 21 days of age, most mortality was prevented by the presence of a nonlactating adult. Survival could be attributed largely to the opportunity for tactual contact between pups and the adult, even though a significant amount of mortality could be prevented even by housing maternally deprived pups with a female from whom they were separated by a double wire screen. Postmortem examinations at 17 days disclosed that maternally deprived litters housed with and without adults did not differ in weight, skeletal growth, or presence of solid food in the stomach. Pups without adults retained more urine than those housed with adults. However, no renal damage was found, and direct stimulation of urination did not prevent mortality. (20 ref)—*Journal abstract*.

2806. Reite, Martin; Kaufman, I. Charles; Pauley, J. Donald & Stynes, A. J. (U Colorado, Medical Ctr, Denver) **Depression in infant monkeys: Physiological correlates.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 363-367.—Separated 4 24-35 wk old pigtail monkeys from their mothers. The initial response was agitation, with elevated heart rate and body temperature. In the subsequent depressive reaction all 4 Ss experienced a night of impaired sleep and profound hypothermia. The next morning the 2 youngest Ss were severely depressed

behaviorally; the 2 older ones showed some but not all depressive behavioral characteristics. Relative bradycardia persisted, and in all Ss the maximum body temperature recorded on the day following separation was lower than any daily maximum during the baseline period. Possible explanations for the behavioral depression are considered. (15 ref)—*I. Davis*.

2807. Sambras, Hans H. (U Munich, W Germany) **[Das sexualverhalten der domestizierten einheimischen Wiederkäuer. (Sexual behavior of domesticated native ruminants.)]** (Germ) Berlin, W Germany: Paul Parey, 1973. 100 p.

2808. Sherrod, Lonnie. (Duke U) **The role of sibling associations in the formation of social and sexual companion preferences in ducks (*Anas platyrhynchos*): An investigation of the "primacy versus recency" question.** *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 247-264.—Analyzes roles of early and juvenile experiences in the development of mate preferences in ducks. In choice situations Ss exposed solely to their own variety during the juvenile period, irrespective of previous experience, exhibited a significant preference for own-variety Ss; Ss raised in mixed groups during the juvenile period did not show this preference. Ss which did not experience a switch in social experience, however, exhibited the most pronounced preferences. It is concluded that experience during the juvenile period was most important in determining both social and sexual companion preferences, though earlier experience was of some significance. Results are inconclusive concerning the importance of most recent experience vs experience during an earlier juvenile critical period. Preferences seem to be affected by a variety of factors such as length of contact with companions, social experience during the juvenile period, and whether or not experience of own kind has occurred. (German summary) (25 ref)—*E. Furchtgott*.

2809. Weygoldt, Von Peter. (Albert-Ludwigs U, Freiburg, W Germany) **[Courtship and mating of the whip scorpion *Charinus montanus*.]** (Germ) *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 217-223.—Observed, in a laboratory setting, the courting or prelude, formation of the spermatophore, and sperm transfer in the whip scorpion. The prelude consists of short and quick movements of the male, rushing forward to the female. Sperm transfer is achieved by the male pulling the female over the spermatophore. This behavior is very different from that of *C. brasiliensis* in which the male performs a spectacular dance behind its spermatophore. The different behavior of 2 closely related species during sperm transfer may be explained as an isolating mechanism. (English summary)—*E. Furchtgott*.

2810. Wise, Dale A. (Mount Holyoke Coll) **Aggression in the female golden hamster: Effects of reproductive state and social isolation.** *Hormones & Behavior*, 1974(Sep), Vol 5(3), 235-250.—Observed the aggressive behavior of 147 intact female hamsters toward males at various times during the estrous cycle, pseudopregnancy, pregnancy, and lactation. Estrous cycle females also were tested after varying periods of social isolation. Pregnant and especially lactating hamsters were more aggressive than pseudopregnant or estrous cycling females. Aggression tended to be higher on the day

preceding behavioral estrus of the estrous cycle, on Day 10 of pregnancy, and on the 1st 5 days of lactation. Except for pseudopregnancy, sexual behavior unaccompanied by aggression occurred during all reproductive conditions, and both sexual behavior and aggression occurred together on Day 10 of pregnancy and Day 1 of lactation. Changes in aggressive behavior associated with reproductive states were attributed to increased male interest, inhibition by ovarian hormones, and facilitation by prolactin. Increasing periods of social isolation were also associated with increased aggression. (44 ref) —*Journal abstract.*

2811. Yeo, Anthony G. (Brunel U, Uxbridge, England) **The acquisition of conditioned suppression as a function of interstimulus interval duration.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 405-416.—Investigated the effect of interstimulus interval (ISI) variation on the acquisition of a classically conditioned emotional response to footshock using a 1-trial conditioning procedure with 72 male hooded rats. The optimum ISI was found to be 10 sec, with a bidirectional gradient for conditioned suppression at ISI above and below 10 sec. Control groups demonstrated that conditioning was not a function of either pseudo-conditioning, sensitization or stimulus novelty. (22 ref) —*Journal abstract.*

### Sensory Processes

2812. Bronstein, Paul M. & Dworkin, Terry. (Brooklyn Coll, City U New York) **Replication: The persistent locomotion of immature rats.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 124-126.—In a series of both cross-sectional and longitudinal experiments, 15-day-old Sprague-Dawley albino rats were found to locomote persistently in both horizontally and vertically striped mazes. 30-day-old Ss displayed a within-trial decrement in activity typical of adult ambulation patterns. Data support the conclusion that 15-day-old rats may be behaviorally similar to adults with hippocampal lesions.—*Journal abstract.*

2813. Dormer, Kenneth J. (Marine Biomedical Inst, Galveston, TX) **A stimulation-recording technique for evaluating binaural sound processing in porpoises.** *IEEE Transactions on Bio-medical Engineering*, 1974(Sep), Vol 21(5), 399-405.—Describes a semiautomatic method developed to evaluate temporal and binaural aspects of the porpoise sonar receiving system at the level of the midbrain. Surgical and electronic techniques are combined to test this system and permit replication by digital computer. Pulsed-sound projectors binaurally simulate porpoise sonar clicks underwater, in an azimuth about their heads. Precise control of the interaural time differences and repetition rates of the projectors was by an oven-regulated crystal time delay generator. The determination of pulse amplitudes, the new surgical techniques used to protect the animal from bacteria and the hardware from seawater, and the stimulation and recording systems are described.—R. S. Kennedy.

2814. Fay, Richard R. (Wake Forest U, Bowman Gray School of Medicine) **Masking of tones by noise for the goldfish (*Carassius auratus*).** *Journal of Comparative & Physiological Psychology*, 1974(Oct), Vol 87(4), 708-716.

—Using a classical respiratory conditioning technique, tonal thresholds were measured for 4 goldfish at 5 frequency points between 100 and 1,200 Hz in quiet and under 3 levels of broadband noise. Masking was a linear function of noise level at all frequencies. Signal-to-noise ratios were lowest at 100 Hz (13 db) and increased linearly with log frequency at a rate of 3 db/octave. The values at frequencies above 200 Hz were about 2.5 db above those previously found for the cat and at 1,200 Hz were considerably below those for the rat. Below 200 Hz, however, the values fell below those reported for humans. This sensitivity of the fish in detecting signals in noise provides support for the notion that a mechanical frequency-to-place transformation at the periphery of an auditory system is not a necessary assumption in accounting for some aspects of frequency analysis. (31 ref) —*Journal abstract.*

2815. Jander, Rudolf & Quadagno, David M. (U Kansas) **An interval scale for measuring visual pattern discrimination of a mammal (*Rattus norvegicus*).** *Behavioral Biology*, 1974(Sep), Vol 12(1), 93-99.—10 male Long-Evans hooded rats, trained to horizontal or vertical stripes, were scored on visual stripe tilt discrimination in a series of binary choice tests. The resulting choice-percent-scales were linear measurements (interval scales) of the stripe tilt differences as perceived by the Ss. A crude model system for describing and explaining the binary choice behavior of rats is propounded. 3 main processes constitute this model system. The 1st determines the magnitude of similarity between any pattern offered and the previous training pattern. The 2nd compares these similarity-magnitudes by subtraction, and the 3rd injects evenly distributed noise into the system, thus accounting for the scatter in the choice behavior. The similarity functions (generalization gradients) for the edge orientation in the visual field of the rat range over  $\pm 90^\circ$ , which appears to be typical for both vertebrates and arthropods. (19 ref) —*Journal abstract.*

2816. Kagawa, Motomichi. (Chukyo U, Nagoya, Japan) **[An analysis of alcohol preference in rats with alcohol vs alcohol two-bottle method.]** (Japn) *Annual of Animal Psychology*, 1973(Dec), Vol 23(1), 15-25.—Studied the relative preference for 3, 5, 7, and 9% alcohol (by volume) solutions in white rats. 19 Ss drank from 2 bottles, containing different concentrations of alcohol, until all combinations of concentrations were tested in a counterbalanced order. Tap water was available from both bottles on alternate days. The Ss were classified into 3 types: those showing the maximal preference at relatively high, relatively low, and intermediate concentrations. The alcohol-alcohol 2-bottle method is considered to be a valid technique in determining the point of maximal preference. (English summary)—S. Nakajima.

2817. Rajecki, D. W. (U Wisconsin, Madison) **Effects of prenatal exposure to auditory or visual stimulation on postnatal distress vocalizations in chicks.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 525-536.—In 2 experiments with a total of 125 DeKalb hybrid White Leghorn chick embryos, Ss were exposed, without insult, to intermittent stimulation by either light or sound from Day 13 to Day 18 of incubation. Control Ss were incubated in relative quiet and darkness. All were



observed for tendency to emit distress calls in the presence and absence of the 2 stimulus modes in tests conducted 4-12 hrs after hatching. As measured by reduction in distress calling, results from both experiments show that Ss that had received prenatal stimulation in a particular sensory mode were most responsive to that mode. Prenatal exposure to sound seemed to produce stronger effects than prenatal exposure to light. Findings are discussed in the context of the possible consequences of normal parental stimulation of incubating eggs under natural conditions. (18 ref)—*Journal abstract*.

2818. Ridley, R. M. (Inst of Psychiatry, London, England) **Non-equivalence of vertical and horizontal planes in stripe discrimination by monkeys.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 407-408.—Tested 4 monkeys for direct and reversal transfer of a task presented in both vertical and horizontal planes. Transfer was found within but not across planes. (French & German summaries)

2819. Sternthal, David E. (U Waterloo, Ontario, Canada) **Olfactory and visual cues in the feeding behavior of the leopard frog (*Rana pipiens*).** *Zeitschrift für Tierpsychologie*, 1974(Mar), Vol 34(3), 239-246.—Analysis of cues used by the leopard frog in feeding behavior showed that Ss could discriminate between noxious and non-noxious prey using olfactory, visual, or compound (visual + olfactory) cues. Fastest responding occurred to compound and slowest to olfactory cues. (German summary) (25 ref)

## DEVELOPMENTAL PSYCHOLOGY

2820. Baumeister, Alfred A. & Maisto, Albert A. (George Peabody Coll for Teachers) **Interactive effects of age and familiarization in paired-associate learning.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 657-660.—Prior to learning a list of paired associates consisting of pictures of common objects, 40 preschool and 40 2nd graders were given 1 of 4 familiarization conditions: stimulus pretraining, response pretraining, irrelevant pretraining, and no pretraining. Results show that the 2nd graders exhibited positive transfer from familiarization to paired-associate learning due to nonspecific factors such as "warm-up." The preschoolers, however, displayed positive transfer due to more specific factors inherent in response and stimulus pretraining. These results suggest that the pretraining experience facilitated rehearsal by making available verbal labels. Results are consistent with (a) developmental hypotheses that emphasize growth in discriminative capacity and/or verbal mediation and (b) phase theories of paired-associate learning that emphasize stimulus and response learning stages.—*Journal abstract*.

2821. Beaudichon, Janine & Melot, Anne-Marie. (U René Descartes, Lab of Genetic Psychology, Paris, France) **[The emergence and function of soliloquy.]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 33-42.—Attempted to test 3 hypotheses originally formulated by L. S. Vygotsky: (a) The amount of soliloquy decreases with age. (b) There is a relation between the nature of the soliloquy and the nature of a

task. (c) The amount of soliloquy increases when an unforeseen problem requires a solution. Ss were 60 boys and girls in 3 age groups, 6, 8, and 10 yrs. They were presented with a series of tasks of varying complexity, including an unforeseen problem which required for its solution the transfer of prior learning. Analysis of audio and video recordings of S behavior shows that verbalization decreased significantly between 6 and 8 yrs ( $p < .01$ ). The most frequent category of speech was regulatory (rather than affective or entertaining). The nature of regulatory speech varied with the task and was related to it. Speech increased at 6 and 8 yrs, but not at 10, when the unforeseen problem arose. (31 ref)—A. Blasi.

2822. Borstelmann, L. J. (Duke U) **Classics in developmental psychology: Historical persons and studies of common textbook reference.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 661-664.—A survey of current textbooks in developmental psychology for common citation of pre-1940 publications reveals the historical significance of Darwin, Freud, Piaget, A. Gesell, G. S. Hall, and J. B. Watson as evidenced by contemporary reference to their multiple works. Others gain consensual citation from particular studies that represent landmark investigations. (44 ref)

2823. Braine, Martin D. (New York U) **Length constraints, reduction rules, and holophrastic processes in children's word combinations.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Aug), Vol 13(4), 448-456.—Examination of empirical claims indicates that there is no real evidence that the apparently elliptical character of many early word combinations is due to deletion of content, or that there is a performance constraint that prevents children producing the longer utterances that their grammars could generate. Evidence is presented that questions the presumption, implicit in the length-constraint claim, that a constituent is less likely to be expanded (without deletion) when there are co-occurring constituents. The special character of both early word combinations and holophrases is explained by a lexical-insertion process in which a word representing a salient feature of the communication is inserted into an inappropriately high node, because the child lacks complete control of rules to realize the communication more fully.—*Journal abstract*.

2824. Caldwell, Bettye M. (U Arkansas, Coll of Education) **Can young children have a quality life in day care?** *Young Children*, 1973(Apr), Vol 28(4), 197-208.—Views day care in the context of social evolution as a manifestation of the professionalization of child care and not simply as an ad hoc procedure created to perform desired social services. The history of day care in the US is briefly reviewed and research data from studies concerning the effect of day care on young children is summarized. Quality day care was associated with intellectual gains, with the acquisition of adaptive social skills, and with healthy physical and emotional development. (15 ref)—R. S. Albin.

2825. Carroll, Jackson W. & Jenkins, Gerald P. (Emory U, Candler School of Theology) **The development of religious commitment: Some exploratory research.** *Journal of Pastoral Care*, 1973(Dec), Vol 27(4), 236-252.—Describes an interview method used to gather

data about a person's religious history and significant experiences. Open-ended questions investigated 11 categories of experience including significant relationships, groups, important decisions, events over which the person had little control, temptations not acted on, values or philosophy of life, wishes, regrets, hopes, and religion. From summaries of the interview data, inferences are drawn about the person's self-concept, world view, and "ultimate concern." Case histories confirm a consistency among these 3 areas and illustrate how experiences, especially with significant others, play a crucial role in the development of self-concept, world view, and ultimate concern.—*B. Smith.*

2826. Claiborne, Robert. *God or beast: Evolution and human nature.* New York, NY: W. W. Norton, 1974. xiii, 260 p. \$7.95.—Delineates the inherited likes, dislikes, and tendencies which shape human behavior, drawing from studies of subhuman primates—apes and monkeys. Among the topics discussed are learning, family life, aggression, the creative impulse, and the sex relationship. (4 p ref)

2827. Cosby, Arthur G. (Texas A&M U) *Occupational expectations and the hypothesis of increasing realism of choice.* *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 53-65.—A 2-wave analysis of the dynamics of occupational expectations in a rural youth panel ( $N = 196$  male high school students) generally failed to support the hypothesis of increasing realism of choice. An analysis of 4 multiple regression equations indicated that (a) black youth tended to lower their levels of occupational expectations over time and (b) occupational expectations tended to vary with changes in occupational aspirations and educational expectations. However, family socioeconomic index, perception of occupational goal blockage, 3 measures of self-image, and change in perception of occupational goal blockage, were not associated with the dynamics of occupational expectation.—*Journal abstract.*

2828. Cramer, Bertrand. *Some sex differences in children between three and seven.* *Psychosocial Process*, 1970, Vol 1(2), 60-76.—Assessed sex differences once a year for 3 yrs in 25 male and 19 female 3-5 yr olds. Each assessment included an interview with the mother, an interview with the teacher, a play interview with the child, and 2 periods of observation of the child in the classroom. Girls showed a predominance of overcontrol of aggression, impulses, and affect, whereas boys showed a tendency toward lack of impulse control, particularly in regard to aggression. Girls showed a persistent predominance of sad affect, oral autoerotic behaviors, and a tendency toward social isolation and withdrawal. However, most behaviors were transitory. (22 ref)—*J. M. Kleinman.*

2829. Engen, Trygg; Lipsitt, Lewis P. & Peck, Marjorie B. (Brown U) *Ability of newborn infants to discriminate sapid substances.* *Developmental Psychology*, 1974(Sep), Vol 10(5), 741-744.—Observed taste preferences in newborn infants to determine (a) the ability of newborns to discriminate different sapid substances and different molar concentrations within those substances and (b) the role of immediate prior sucking and ingestion experience in altering subsequent oral behavior. Ss were 48 male and 48 female full-term,

single birth 1-3 day old infants. Results show that the sucking rate varied with the substance (glucose, sucrose, and water) delivered through the nipple and with the order in which the substances were presented within a test session. Amount of fluid delivery was controlled automatically by the infant's own sucking behavior, a procedure which provides a taste preference report as well as evidence of the discriminability of taste substances. It remains to be demonstrated that profound taste aversions, resulting in complete inhibition of sucking, are also present at this young age.—*Journal abstract.*

2830. Eysenck, Michael W. & Baron, Cynthia R. (Birkbeck Coll, U London, England) *Effects of cuing on recall from categorized word lists.* *Developmental Psychology*, 1974(Sep), Vol 10(5), 665-666.—Explored the retrieval-deficit hypothesis by comparing free-recall under cued and noncued conditions in 2 groups of 36 5- and 8-yr-olds. On a 16-word list containing either 2, 4, or 8 categories, Ss received 2 trials of noncued recall. The 2nd trial was immediately followed by a test for cued recall. A comparison between cued recall performance and noncued recall performance on Trial 2 indicates that the younger children benefited more than the older children from the cuing procedure. For both age groups, there were effects of cuing on both the number of categories recalled and the number of items per category recalled. Clustering was observed at both age-levels but appeared unrelated to recall performance. Some of the results are discussed in connection with a retrieval deficit hypothesis.—*Journal abstract.*

2831. Feeley, Joan T. (William Paterson Coll) *Interest and media preferences of middle-grade children.* *Reading World*, 1974(Mar), Vol 13(3), 224-237.—Attempts to identify and describe the content interest patterns and media preferences (print and TV) of today's middle-grade children to determine if these patterns and preferences are related to sex, race, or socioeconomic status (SES). A 50-item inventory of "things to watch and read" was presented to 250 boys and 282 girls in 4th and 5th grade. Results demonstrate that sex and SES continue to shape children's interests; traditional boy-girl patterns and class differences emerged. All Ss preferred to watch rather than to read content of all kinds. Implications for educators, publishers, TV producers, and government are discussed.—*R. S. Albin.*

2832. Flapan, Dorothy; Gunn, Gwen & Neubauer, Peter B. *Sources of information for developmental assessment.* *Psychosocial Process*, 1970, Vol 1(2), 98-115.—Compares developmental assessments derived separately from 5 sources of information, from combinations of the individual sources, and from an integration of all 5 sources. A nonclinical sample of 25 boys and 20 girls 3-4 yrs old was evaluated through mother interviews, teacher interviews, child interviews, observations of the child in school, and formal psychological testing. The psychological examination provided the least favorable assessment of both boys and girls. School observation provided the most favorable assessment for boys and child interviews the most favorable for girls. No single source of information gave a valid and reliable assessment of the child's development, although the mother interview and the teacher interview each made a major contribution;



an assessment based on the combination of these 2 interviews agreed with the overall evaluations for approximately 90% of the children studied. (16 ref)—J. M. Kleinman.

2833. Hendrick, Clyde; Hoving, Kenneth L. & Franz, Christine M. (Kent State U) **Children's likableness ratings of 22 trait adjectives.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 91-92.—Children in kindergarten and Grades 2, 4, and 6 ( $n = 12$ ) rated the likability of 22 common trait adjectives. The mean ratings and standard deviations are given for each trait. Analysis of variance revealed that only 2 of the 22 traits showed significant differences across grade levels. The data indicate that the evaluative meaning for this set of traits was remarkably stable and that the conventional meaning of common trait words was achieved at an early age.—*Journal abstract.*

2834. Kopp, Claire B.; Sigman, Marian & Parmelee, Arthur H. (U California, Los Angeles) **Longitudinal study of sensorimotor development.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 687-695.—Assessed the longitudinal performance of 24 healthy full-term infants from middle-class homes using an adapted version of scales by I. Casati and I. Lézine measuring stages of sensorimotor intelligence in children. The study focused on the rate of acquisition of differing sensorimotor behaviors, variability in the performance of these behaviors, and the relationship between performance on the various subtests. Results show that although there was an overall progression in stage development for the behaviors studied, occasional declines in performance were also present. Performance on one subtest was generally unrelated to performance on another subtest. In addition, longitudinal data on the development of object permanence compared favorably with previously reported results from a cross-sectional sample. (18 ref)—*Journal abstract.*

2835. Matheny, Adam P.; Dolan, Anne B. & Wilson, Ronald S. (U Louisville, Medical School) **Bayley's Infant Behavior Record: Relations between behaviors and mental test scores.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 696-702.—Analyzed ratings on Bayley's Infant Behavior Record and test scores from the Bayley Mental Scale for 60 female and 50 male infants over a 2-yr period, at ages 6, 12, 18, and 24 mo. Results show significant relationships between certain behaviors and mental test scores. Composite scores were calculated for 2 behavioral clusters—one composed of behaviors relating to Primary Cognition and the other to Extraversion—and these composite scores were correlated with both concurrent and subsequent mental test scores. The Extraversion composite was related to concurrent mental scores for females but not for males, and had no predictive utility for either sex. In contrast, the Primary Cognition composite was strongly associated with mental test scores both concurrently and predictively for both sexes, although the patterns were somewhat more cohesive for males. The Extraversion composite showed very little age-to-age stability, whereas the Primary Cognition score was stable from age to age, particularly for males. Results raise questions about the appropriateness of including social items in infant mental tests since these behaviors show neither stability nor prognostic

utility. Cognitive, task-oriented behaviors were more stable and had prognostic value approaching that of the mental test score itself. (21 ref)—*Journal abstract.*

2836. Mickish, Virginia. (DeKalb County Board of Education, Div of Instruction, Decatur, GA) **Children's perceptions of written word boundaries.** *Journal of Reading Behavior*, 1974(Apr), Vol 6(1), 19-22.—117 1st graders were asked at the end of the school year to mark word boundaries in a written sentence presented with no spaces between the words. Data indicate that many children at the end of their 1st yr of reading instruction had little idea of what words are. However, as the Ss became better readers, they were better at marking word boundaries.—*Journal abstract.*

2837. Musgrave, Peter W. & Reid, George R. (Monash U, Clayton, Vic, Australia) **Some measures of children's values.** *Social Science Information*, 1971(Feb), Vol 10(1), 137-153.—Studied children's values based on 311 male and 321 female 11-12 yr olds' reactions to mass media. 47% of the Ss were middle class and 53% were working class. Girls selected cross-sex models while boys did not. The choices of girls tended to be passive but boys made choices of male athletes and aggressive models. In moral values, killing, violence, and incompetence were evaluated as bad, helping people as good. Boys saw fighting crime as good while girls rated entertaining as good. Violence in general was seen as wrong, but more so by girls and working-class children than by boys and middle-class children; middle-class children were more accepting of capital punishment and boys were more tolerant of war. For the high IQ Ss, violence in war or police enforcement was more accepted than by low IQ Ss, but in instances of retribution or capital punishment the reverse was true. Girls liked watching TV violence somewhat less than boys but all Ss liked it. Sex influenced results more than IQ level and class had the least influence.—R. J. Anderson.

2838. Nanpon, Hubert. (U Haute-Bretagne, Rennes, France) **[Effect of age and information on verbal responses.]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 43-54.—Studied the effects of the amount of information and of age on the uncertainty of verbal responses. Both variables were expected to reduce uncertainty. In a sentence completion task information was defined in terms of the length of the verbal context preceding the response. Uncertainty was measured in 2 ways: (a) by the reaction time and (b) by the ratio between the number of different responses given by all Ss to a stimulus and the total number of responses to the same stimulus (indeterminacy). Ss were 21 preschoolers, 21 1st graders, and 21 adults. Indeterminacy and latency decreased with age; indeterminacy and latency decreased with the length of the stimulus, particularly in the adult group; and there was a positive significant correlation between latency and indeterminacy. Findings are interpreted in terms of learning the relations between the elements of speech, adults being more able than children to use the antecedent context.—A. Blasi.

2839. Ployé, P. M. **Does prenatal mental life exist?** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 241-246.—Discusses the possibility that the more difficult moments of pregnancy could leave imprints in the mind that are just as recognizable, and recoverable as

those left by the more undisturbed moments. The possibility that there could be ways of establishing that a prenatal imprint is, in fact, a genuine imprint and not something else also is discussed. The difficulty of finding the coding system to understand prenatal experiences is cited. Possible imprints of threats to the pregnancy are described. Suggestions for further research in this field are made.—*R. S. Albin.*

2840. **Pozner, Jay & Saltz, Eli.** (Wayne State U, Ctr for the Study of Cognitive Processes) **Social class, conditional communication, and egocentric speech.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 764-771. —Studied social class differences in ability to communicate conditional information using 132 5th-grade white children, who were divided into lower- and middle-socioeconomic-status (SES) groups of approximately equal IQ. Dyadic groupings were formed by combining lower- and middle-SES children into the 4 possible speaker-listener combinations. The task required speakers to use a conditional communication in describing the rules of a game to a listener. Results showed that as listeners, lower- and middle-SES children responded equally well to the communications of both lower- and middle-SES speakers. However, as communicators, the lower-SES children performed more poorly than the middle-SES children. Both lower- and middle-SES listeners had equally great difficulty complying with the instructions provided by the lower-SES communicators. The data suggest that SES differences cannot be attributed to lack of comprehension of the conditional logic. Instead, it appears that the lower-SES children were difficult to understand because of strong tendencies toward egocentric communication patterns.—*Journal abstract.*

2841. **Rosenthal, Bernard G.** (Illinois Inst of Technology) **Developments of self-identification in relation to attitudes toward the self in the Chippewa Indians.** *Genetic Psychology Monographs*, 1974(Aug), Vol 90(1), 43-142. —Studied the relation between the development of self-identification, self-evaluation, and recognition of Chippewa and white racial groups in all Chippewa 3-10 yr old children at Lac du Flambeau ( $N = 223$ ). Picture recognition tests and intensive interviews were conducted with all Ss. An Indian interviewer was used to check response reliability. Findings indicate that the Chippewa child evaluates himself more negatively than white children—69.6% of the Ss evaluated whites positively (e.g., good, clean, and nice) while only 14.9% did so for Indians. Ss did not appear to fully recognize the physical racial identity of whites and Indians until age 9, although 89% could generally recognize the groups at age 6. Recognition by the Ss that they were Indians appeared to be very slow—as late as 10 yrs of age, 36% still asserted that they were white. No more than 73% at any age ever acknowledged that they were Indian. Explanations for these findings are presented in terms of Chippewa history, socioeconomic conditions, and personality dynamics. (32 ref)—*Journal summary.*

2842. **Schlater, J. A.; Baker, A. Harvey & Wapner, S.** (Clark U) **Age changes in apparent arm length.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 75-77. —Assessed whether S. Wapner's 1959 finding, that overestimation of apparent head size was maximal in

early childhood and decreased with increase in age, is generalizable to other body parts. Age change in judged length of the outstretched arm was studied with 72 7-18 yr olds. All age groups underestimated arm length, with the magnitude of underestimation decreasing with increase in age—a pattern opposite to that found for head size. Although the age changes observed for both judged head size and arm length can be described as reflecting an increase in accuracy, such a formulation in terms of accuracy cannot explain why young children maximally overestimate head size and maximally underestimate arm length. It is suggested that future research should explore the possibility that these observed differences reflect differential organization of the body schema at different levels of development. (15 ref) —*Journal abstract.*

2843. **Ushiyama, Toshiko.** (Tokyo U of Education, Japan) **Effects of vicarious and direct reinforcement upon the occurrence of "jan-ken" behavior in kindergarten children.** [Japn] *Japanese Journal of Educational Psychology*, 1973(Jun), Vol 21(2), 79-89. —Exposed 2 groups of 30 6-yr-old boys and girls to 2 films, 1 group with random partial reinforcement, the other with total reinforcement, for imitation of "Jan Ken" behavior. Winners ate biscuits as reinforcer. Spontaneous imitating behavior was measured once after the 1st showing, and twice after the 2nd showing. Comparison of the 2 reinforcement schedules indicates that random partial reinforcement is significantly more effective ( $p < .01$ ), and that direct reinforcement intensifies the effect of vicarious reinforcement. (English summary)—*S. Choe.*

2844. **van Duijne, H. John.** (Northern Illinois U) **The facilitation of nonverbal behavior by means of self-instruction in early childhood.** *Journal of the Association for the Study of Perception*, 1974(Spr), Vol 9(1), 26-29. —Examined the relationship between age and the ability of 3-, 4-, and 5-yr-old Ss to verbalize self-instructions while performing a simple perceptual-motor task after being trained to verbalize the instructions without performing the task. Results show that this ability is significantly and directly associated with age, and that verbal responses become stronger in relationship to perceptual-motor responses with increasing age.

2845. **Vanfraechem-Raway, Renée.** (Free U Brussels, Belgium) **[An exploration of motor creativity in 15-18 year old adolescents.]** (Fren) *Revue Belge de Psychologie et de Pédagogie*, 1973(Sep), Vol 35(143), 79-88. —Explored creativity in body language shown by upper high school students of humanities. The test battery of W. Wyrick (1968) was used, which yields scores of motor fluidity and motor originality. The 6 parts present 6 situations, each conforming to 5 activity principles: (a) to evoke a measurable type of response, (b) to stimulate different types of movements, (c) to provide a problem that minimizes the element of fear, (d) to stimulate responses that do not require great dexterity of movement, and (e) to force the S to focus upon a new aspect of movement. 4 "tools for motivation" were used: balloon, hoop, ball, and mat. Differences in creativity proved to be a function of the role of the E, whether permissive or authoritarian. It is concluded that motor creativity can be developed if the teacher permits the individual to expand his creative sense, by providing a



group situation that does not inhibit him, in a climate of security and freedom. (30 ref)—*L. A. Ostlund.*

2846. **Vurpillot, Eliane.** (U René-Descartes, Paris, France) [*Les perceptions du nourisson. (Perceptions of the infant.)*] (Fren) Paris, France: Presses Universitaires de France, 1972. 208 p.

### Cognitive & Physical Development

2847. **Amalwa, Shizuko.** [A study on Piaget's concept of conservation.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 1-11.—Administered conservation tasks including substance, liquid, number, length, weight, and area to 286 kindergartners and 1st and 2nd graders. A common factor was found by the principal axis method, and 2 other factors, Weight and Area, were extracted by the varimax method in addition to the common factor. The comparison between the group given special training and a group which acquired conservation under natural conditions showed no differences in terms of the extinction rate. (English summary) (18 ref)—*S. Choe.*

2848. **Anastasiow, Nicholas J. & Hanes, Michael L.** (Indiana U, Inst for Child Study) **Cognitive development and the acquisition of language in three subcultural groups.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 703-709.—Investigated the relationship between cognitive development and language acquisition by administering a sentence repetition task and a discrimination, seriation, and numeration Piagetian task to a total of 67 black inner-city, white middle-class, and white rural children. Within each subcultural group, samples were drawn from each of 3 grade levels: kindergarten, 1st grade, and 2nd grade. Results indicate that when valid reconstructions from standard English to Negro non-standard English forms were considered correct, the performance of black inner-city and white middle-class children was nonsignificantly different. However, significant differences between the 3 groups were found on function-word omission scores and Piagetian task scores. Analyses of covariance were performed using Piagetian task scores as the covariate and function word omission scores as the dependent variable. Results support D. I. Slobin's (1973) proposition that the acquisition of semantic notions in language is predictable from cognitive development. (19 ref)—*Journal abstract.*

2849. **Arai, Kunihiro.** (Tokyo U of Education, Japan) [Development of number and its relation to judgment of length.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Jun), Vol 21(2), 102-110.—Observed performance of 6 tasks by 100 children: counting objects, taking out a given number of objects, comparing 2 number words, conservation of numbers and of length, and comparing lengths. Results confirm previous findings that judgment of length is contingent on conservation of numbers, that judgment of length is influenced by the number of segments (positively when the length of segments is equal and negatively when it is unequal), and that conservation of volume also depends on conservation of numbers. (English summary)—*S. Choe.*

2850. **Baron, Jonathan.** (McMaster U, Hamilton, Ontario, Canada) **Semantic components and conceptual development.** *Cognition*, 1973, Vol 2(3), 299-317.—Notes that several phenomena in the acquisition of word

meanings may be accounted for by a theory of component-by-component acquisition, a mechanism analogous to that proposed for phonological development. It is suggested that by defining a concept as an habitual plan, and a component as a subplan, this theory may be extended to acquisition of concepts in general. This theory may be applied to logical concepts, physical reasoning, moral reasoning, and verbal concepts. The ideas of component-by-component acquisition and of transfer of learning between concepts which share components provide an alternative to developmental stage theories. (French summary) (55 ref)—*Journal abstract.*

2851. **Brainerd, Charles J. & Kaszor, Peter.** (U Alberta, Edmonton, Canada) **An analysis of two proposed sources of children's class inclusion errors.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 633-643.—Examined the perceptual set and misinterpretation hypotheses about children's errors on the class inclusion problem in 2 experiments. 2 previously reported lines of evidence support the perceptual set hypothesis: J. F. Wohlwill's (see PA, Vol 42:13496) verbal facilitation effect and P. R. Ahr and J. Youniss's (see PA, Vol 44:8177) relative size of subclass effect. Wohlwill's verbal facilitation effect could not be replicated in either experiment. Ss were a total of 240 1st, 2nd, and 3rd graders in 3 Canadian public schools located in middle-class areas. Findings show Ahr and Youniss's relative size of subclasses effect to be a result of a false agreement between difference questions and stimulus arrays in which the 2 subclasses contain the same number of elements rather than from either a perceptual set or question misinterpretation. Concerning the misinterpretation hypothesis, an analysis of the present Ss' ability to recall the E's questions does not provide any support for this hypothesis. Misinterpretations of the E's questions proved rare, and the correctness of children's class inclusion judgments was found to be independent of the correctness of their recall of the E's questions. (15 ref)—*Journal abstract.*

2852. **Brainerd, Charles J.** (U Alberta, Edmonton, Canada) **Neo-Piagetian training experiments revisited: Is there any support for the cognitive-developmental stage hypothesis?** *Cognition*, 1973, Vol 2(3), 349-370.—In a previous review of the literature, S. Strauss (see PA, Vol 51:6870) concluded that neo-Piagetian training experiments support Piaget's hypothesis that mental growth is a stage-like process. It is argued that Strauss's choice of data to review was very selective. Analysis of other neo-Piagetian training data reveals no support for Strauss's conclusion. (102 ref)

2853. **Day, David E.** (U Massachusetts, Amherst) **Language instruction for young children: What ten years of confusion has taught us.** *Interchange*, 1974, Vol 5(1), 59-72.—Discusses 3 major ideas. (a) Nonstandard English is neither primitive nor deficient. To assert that it is contributes to racism, elitism, and ethnocentrism, and to try to correct it is a waste of time. (b) Language behavior matures in much the same way as other human behaviors, and teachers should pay close attention to the process of language development. (c) Language and thought are closely interrelated, and oral language

instruction should focus on that relationship. (55 ref)

—H. E. Yaker.

2854. Dupuy, Harold J. (US Dept of Health, Education & Welfare, Health Resources Administration, Rockville, MD) **The rationale, development, and standardization of a basic word vocabulary test.** *Vital & Health Statistics, Series 2*, 1974(Apr), No 60, 71 p. —Describes the conceptual representation of a basic word and the development of a test to measure the acquisition of an American-English basic word vocabulary. A test constructed from a 1% sample of basic words and administered to over 3,000 1st–12th graders indicates that there is an orderly acquisition of an increasing stock of basic words with increasing age and grade. Correlational, validity, and reliability data are presented. (23 ref)

2855. Esrov, Linda V.; Hall, James W. & LaFaver, Diane K. (Northwestern U) **Preschoolers' conceptual and acoustic encoding as evidenced by release from PI.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 89–90. —Results of 2 experiments with a total of 130 3–5 yr olds demonstrate the feasibility of using the release from proactive interference (PI) technique with preschool children. In Exp I, release from PI was found using pictures from the same taxonomic category. Exp II demonstrated encoding based on acoustic qualities using oral presentation of common rhyming words. —*Journal abstract.*

2856. Farray, Rubén. ("Pedro Henriquez Ureña" National U, Santo Domingo, Dominican Republic) **[Intradimensional and extradimensional shifts in learning of classification principles: A developmental study.]** (Fren) *Psychologica Belgica*, 1973, Vol 13(3), 247–264. —Studied intra- and extradimensional conceptual shifts with the same and different materials in Ss of both sexes aged 5, 7, 11, 15, and 22 yrs old. Each age group contained 64 Ss, half of Belgian and half of Dominican nationality. From ages 7–22 yrs intradimensional shifts were learned faster. However, in 5-yr-olds intradimensional shifts and extradimensional shifts with different material were learned faster than extradimensional shifts with the same material. Results are interpreted as consistent with a mediational learning theory. (English abstract) (25 ref)—S. Slak.

2857. Feigenbaum, Kenneth. (Antioch Coll, Human Ecology Ctr, Washington-Baltimore Campus) **A study of the relationship between physical transitivity and social transitivity.** *Genetic Psychology Monographs*, 1974(Aug), Vol 90(1), 3–42. —Determined the relationship between concrete transitivity using physical concepts (e.g., lengths of sticks) and social transitivity using social concepts (e.g., the perception of happiness) in 2 experiments. 45 (e.g., the perception of happiness) in 2 experiments. 45 kindergartners, 23 1st graders, and 44 3rd graders served as Ss in Exp I, and 84 kindergartners were Ss in Exp II. In Exp I, half of the Ss were tested for transitivity with colored sticks, and the other half performed discrimination, seriation, and transitivity tasks with photographs. Few age displaying varying degrees of happiness. Few age differences were found in the ability to perceive social and physical transitivity; however, older Ss performed the seriation task better than younger Ss. In Exp II, Ss performed both tasks with concrete objects—seriation of sticks and stick figures, transitivity of same-color sticks,

different colored sticks, and stick figures—and discrimination, seriation, and transitivity tasks with drawn faces and photographs. Transitivity tasks with fewer items were easier to solve than those with more items. Both social and concrete seriation problems produced errors. Findings are discussed in relation to Piaget's transitivity research and the role of optical distortion in physical transitivity. (24 ref)—*Journal abstract.*

2858. Hata, Yoshiko. [Study of the effect of verbal labeling in concept learning: II. Concept knowledge, abstraction ability and reversal-nonreversal shifts.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Jun), Vol 21(2), 116–121. —Conducted 2 experiments on labeling. Exp I involved 2 dimensions, animal and plant, and 2 values, bird and fish for the positive, and flower and tree for the negative. 144 1st graders learned to label concepts of both the values. Labeling facilitated concept identification in original, reversal shift, and nonreversal shift learning. Labeling relevant dimensional concepts facilitated original learning, and verbal ability was effective in reversal shift learning. In Exp II, 64 4th graders were selected for their ability to abstract, and 2 dimensions, square and circle, and 2 values, blue and red, of non-sense forms were used as stimuli. Labeling 2 value concepts in the initial 10 trials facilitated identification of 2 dimensional concepts in original learning, but not in shift learning.—S. Choe.

2859. Higashi, Toshiko; Tanaka, Hisako & Tsuchiya, Kazuko. (Japan Women's U, Tokyo) **[The cognitive development of sex role.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 48–53. —Studied sex role identification as cognitive development. 1,362 elementary and middle school children responded to a 22-item questionnaire concerning sex characteristics. Results indicate that sequential development in the cognition of sex role takes place in the order of external appearance, overt personal behavior, overt social behavior, and covert sex characteristics. (English summary)—S. Choe.

2860. Hoffman, Susan; Trabasso, Tom & Friedman, Morton. (U Florida) **Mental operations on number symbols by children.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 591–595. —48 4–6 yr old children made choices among colors that had been associated with numbers. Prior to learning 4 number-color associations, pretraining on counting and ordering objects was given to half of the Ss. Associations were established by either absolute (paired associate) or relative (choice discrimination) methods, and then tests involving "more or less" questions on each of the possible 6 color pairs were given. Numerical associations were acquired best with absolute training or counting-ordering pretraining. Using the Ss' justifications for their responses, the test data were fit by W. K. Estes's (see PA, Vol 40:9575) scanning model. Young children apparently possess an ordered numerical scale, can map this scale onto other nonquantitative symbols, and can generate, compare, and make ordinal decisions using these symbols.—*Journal abstract.*

2861. Jablonski, Eugene M. (U Missouri) **Free recall in children.** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 522–539. —Reviews traditional procedures and theories from adult free recall, as well as their implications for developmental free recall. Contemporary free-recall



research in children is presented, and important developmental variables are discussed. The need for a developmental theory to guide free-recall research in children is also discussed. (83 ref)—*Journal abstract*.

2862. Kewley-Port, Diane & Preston, Malcolm S. (Haskins Lab, New Haven, CT) **Early apical stop production: A voice onset time analysis.** *Journal of Phonetics*, 1974(Jul), Vol 2(3), 195-210.—Measured voice onset time (VOT) from spectrograms of apical stops produced by 3 young children acquiring American English, recorded at 12-wk intervals from 34-125 wks of age. Earlier data from children 6 mo to 4½ yrs old were also analyzed. Frequency distributions of apical stops along the VOT continuum were compared longitudinally across Ss and with distributions of adult productions of word-initial /d/ and /t/. Drawing on a physiological discussion of the control of timing between stop release and onset of vocal fold oscillation, a pattern of apical stop development is proposed. The earliest examples of stops, around 6 mo of age, had uniform distributions along the VOT continuum. Later the distributions of apical stops collapsed into an interval corresponding to that of American English /d/. The distributions for both /d/ and /t/ words were similar between the ages of 2 and 4½ yrs, but they did not correspond to those of adults. (22 ref)—*Journal abstract*.

2863. Kozrzewski, Janusz. [The level of mental development and personality traits of country and town children.] (Polh) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 33-58.—Administered tests of intelligence, perception and visual-motor coordination, and personality to groups of children. 117 Ss aged 4 mo to 15 yrs were from Karmanowice; other groups were from the country or from smaller towns. No cases of mental deficiency appeared among the Karmanowice Ss. Ss whose parents had received similar education showed little difference in intelligence regardless of where they lived. Of 47 4-10 yr old Ss, only 4 showed any defect in perception or visual-motor coordination. On the 16 Personality Factor Questionnaire, 8-12 yr old girls from Karmanowice showed lower Tension (Q<sub>1</sub>) than girls from smaller towns, and 8-12 yr old boys from Karmanowice showed higher Dominance than boys from smaller towns. Only 2 boys exhibited any behavior disorder, and no neurotic profile was discovered. (43 ref)—*English summary*.

2864. Kuhn, Deanna. (California State U, Fullerton) **Inducing development experimentally: Comments on a research program.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 590-600.—The popular "training" studies, most of which have been devoted to the attempt to experimentally induce conservation in nonconserving Ss, are discussed with respect to the logic underlying the method and surrounding theoretical and methodological difficulties. The following major difficulties are discussed: (a) ambiguity as to the intent of many of the studies; (b) lack of agreement on methodological criteria for inferring change, and ambiguity in actual application of even the most stringent (Genevan) criteria; (c) a related lack of theoretical agreement as to what a conservation judgment reflects; and (d) the difficulty of inducing cognitive restructuring by means of brief interventions. It is argued that whether the intent of

conservation training studies has been to elucidate Piaget's view of conservation attainment or to refute it, results have been similarly ambiguous and inconclusive, and researchers' interest in performing such studies has consequently declined. Several suggestions for modification of the training study research strategy are made. (36 ref)—*Journal abstract*.

2865. Kuo, Anna & Parsons, Jacquelynne E. (U California, Los Angeles) **Development of integration processes using ability and effort information to predict outcome.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 721-732.—Conducted 3 studies to examine developmental changes in the integration of ability and effort information to predict performance. Functional measurement procedures were used to determine whether it is possible to use some simple algebraic operation (e.g., addition or multiplication) to describe the way these cues are combined. A total of 176 6-11 yr old children and 24 adults (college students) were asked to predict how many puzzles a child could put together as a function of 3 levels of ability and 3 levels of effort. Results show a developmental progression in the integration process in which an additive rule characterized the responses of the youngest children, while a multiplicative rule characterized the responses of the older children and adults. Even the youngest children were able to use both cues in forming judgments and did not center on only 1 cue as would be predicted from Piaget. Also, effort was increasingly more important than ability in predicting outcomes. (18 ref)—*Journal abstract*.

2866. Mallen, Jan & Drew, Clifford J. (U Utah) **Classification behaviors in third and sixth grade lower and middle socio-economic status school children.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Apr), Vol 15(2), 123-131.—Compared the classificatory behaviors of low and middle socioeconomic status (SES) children in the 3rd and 6th grades of public school. 48 randomly selected students of Anglo-Saxon parentage were divided into 4 groups of 12 Ss; each group contained Ss from both grade and SES levels. Each group was exposed to an array of objects for which grouping on a conceptual, nonconceptual, or associational justification was possible. Results indicate that the school experience may serve to widen the cognitive strategy system of the lower SES child by the addition of the conceptual model. (20 ref)—*Journal summary*.

2867. McGeorge, C. (U Canterbury, Christchurch, New Zealand) **Situational variation in level of moral judgment.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 116-122.—Reports of research on L. Kohlberg's (see PA, Vol 48:2982) stages of moral judgment have assumed that level generalizes across responses and that a single major factor underlies Kohlberg's research, a significant variation was found from situation to situation in the responses of 40 12-yr-old boys and 23 university students to the moral judgment interview. Factor analysis indicated 2 factors underlying responses to the interview: an empathic or role-taking factor and one involving concepts of social rules and structures. Results emphasize the need for more detailed descriptions of moral development and more detailed scoring systems.—*Journal abstract*.

2868. McGhee, Paul E. (Fels Research Inst, Yellow Springs, OH) **Cognitive mastery and children's humor.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 721-730. —Reviews theory and research dealing with cognitive aspects of children's humor. Alternate means of defining cognitive mastery are discussed, and it is suggested that a Piagetian theoretical framework may offer the most promising approach to studying the relationship between cognitive mastery and the comprehension and appreciation of humor. Special attention is given to the operation of the cognitive congruency principle in children's humor. Suggestions for future theoretical and research efforts are made. (31 ref)—*Journal abstract*.

2869. Mori, Ichio. (Osaka Teacher's Coll, Scientific Educational Research Div, Japan) [On the formation of the concept of conservation in children.] (Jpn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 32-42.—From a population of 165 kindergartners, 1st graders, and mentally retarded children, an experimental sample was given training in conservation of substance. Results show significant training effect ( $p < .01$ ) for the experimental Ss compared with controls. In Exp II the experimental group of kindergartners was trained in conservation of weight, volume, and atomism, with similar results. It is concluded that these concepts can be acquired by synthetic judgment, and that the sequence of acquisition of these concepts is reversible. (English summary)—S. Choe.

2870. Nakano, Yasuhiko & Kajita, Masami. (U Nagoya, Faculty of Education, Japan) [Developmental study of problem-solving processes in choice task.] (Jpn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 12-20.—4 groups of Ss—18 kindergartners, 23 1st graders, 35 5th graders, and 18 college students—were given 2-choice tasks under different reinforcement schedules in order to find developmental trends in shift learning. The middle age-groups were significantly slower ( $p < .01$ ,  $p < .05$ ) in learning correct responses than the others. The youngest group showed not only reward maximization, but also strong pervasive response tendency. Trend analysis demonstrated an inverted U-shaped relationship between age and correct responses. It is concluded that the younger children attended to the dominant cue set associated with reinforcement but neglected the other cues and the mutually exclusive rule between these cue sets, and that the adults and older children logically operated these cue sets and the set relation defined by set theory. (English summary)—S. Choe.

2871. Owoc, Paul J. (National Program on Early Childhood Education, St Louis, MO) **On culture and conservation once again.** *International Journal of Psychology*, 1973, Vol 8(4), 249-254.—Explored possible relationships between conservation and the 3 variables of relationships between conservation and the 3 variables of milieu, schooling, and age. Ss for a liquid conservation task were 449 Nigerians in 4 age groups (6-7, 8-9, 11-13, and over 18 yrs), some rural, some urban, some with and some without schooling, from 3 different cultural-linguistic groups widely separated geographically. As expected, conservation ability was related to age, older Ss doing better than younger. No statistically significant differences appeared between rural and urban Ss. Among younger Ss, conservation appeared in significantly more

schooled than unschooled Ss ( $p < .05$ ). In Ss over 18 yrs old the difference between schooled and unschooled Ss in conservation approached significance at the .001 level. Results re-emphasize the difference in ability between schooled and unschooled Ss and the relationship between age and conservation ability. (French summary)—E. A. Gavin.

2872. Tamakawa, Kimiyo. (Tohoku U, Faculty of Education, Sendai, Japan) [A study of the development of the thinking faculty of preschool children: About the form of the presented questions and the forming of quantity concept.] (Jpn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 21-31.—Employed 612 kindergartners as Ss to study the process of the shift from visual-motor thinking to visual-figurative and verbal thinking and the effect of teaching the concept of weight as continuous quantity. Results show that the shift occurred in the latter half of the 5th yr of age when Ss adopted action level and outer speech and that teaching the concept of weight through communication was effective. (English summary)

2873. Walesa, Czeslaw. [The development of decision processes: Experimental tests of children at school age.] (Poln) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 101-142.—Studied the development of decision-making processes in primary school children. Exp I involved making a decision in a risk situation, to test the process of anticipating possible events and the correct choice of alternatives. Exp II and Exp III dealt with the processes of transforming signals into plausible and definite information and reaching a final diagnosis of the situation. Responses of the Ss were characteristic of particular stages of development. Hypotheses based on the study findings are discussed. —English summary.

### Emotional & Personality Development

2874. Beech, Robert P. & Schoeppe, Aileen. (New York U) **Development of value systems in adolescents.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 644-656. —Used the Rokeach Value Survey to assess the value systems of a total of 396 boys and 343 girls in Grades 5, 7, 9, and 11. The most striking result was the relative stability of the rankings over all grades, perhaps indicative of a core cultural pattern. An almost equal number of changes in instrumental values across grades were observed for both boys and girls. However, twice as many changes took place in terminal values for girls than for boys. The boys exhibited a more unitary theme of increasing achievement and the stereotyped feminine sex role. (39 ref)—*Journal abstract*.

2875. Esman, Aaron H. (Jewish Board of Guardians, New York, NY) **Transsexual identification in a three-year-old twin: A brief communication.** *Psychosocial Process*, 1970, Vol 1(2), 77-79.—Describes 3-yr-old female fraternal twins, one of whom identified herself as a boy and acted accordingly. It is suggested that this transsexual identification was a means of dealing with the fear of parental seduction.

2876. Halverson, Charles F. & Waldrop, Mary F. (NIMH, Child Research Branch, Bethesda, MD) **Relations between preschool barrier behaviors and early school-age measures of coping, imagination, and verbal**



**development.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 716-720.—Assessed the contemporaneous and longitudinal relations of coping with an experimental barrier situation at 2½ yrs of age by observing barrier performance of 43 male and 31 female preschool children. Analyses indicate that effective barrier behavior was related to other measures of coping, vigorous play behavior, and lack of fear at the preschool period. A follow-up study when Ss were in the early school-age period (7½ yrs old) revealed that competence in the experimental barrier situation was related to intelligence, coping, and socially effective behaviors for both sexes. Results suggest the feasibility of using responses to experimental barrier situations to assess coping behavior. (16 ref)—*Journal abstract*.

2877. Laird, Don R.; Laosa, Luis M. & Swartz, Jon D. (Educational Service Ctr, Corpus Christi, TX) **Inkblot perception and reading achievement in children: A developmental analysis.** *British Journal of Projective Psychology & Personality Study*, 1973(Dec), Vol 18(2), 25-31.—Studied the relationship between developmental indices in the Holtzman Inkblot Technique (HIT) and reading achievement. The Metropolitan Reading Test (MRT), a subtest of the Metropolitan Achievement Test, and the HIT were administered annually for 3 yrs to 98 2nd and 4th graders. Results indicate the HIT Factor I variables previously found to relate to developmental level—Form Definiteness, Movement, Integration, and Human—relate positively to reading comprehension, as do the remaining Factor I variables—Popular and Barrier. Partialling out the effects of intelligence from both HIT and MRT scores yields similar results for all variables. Partialling out intelligence from only the HIT variables also yields similar results. Form Definiteness and Barrier relate more closely to decoding ability and accuracy of perception than to reading comprehension. Location scores related negatively to reading comprehension for females only. (18 ref)—*Journal summary*.

2878. Mitchell, Edna. (Smith Coll) **The learning of sex roles through toys and books: A woman's view.** *Young Children*, 1973(Apr), Vol 28(4), 226-231.—Describes 2 major shaping influences of young children—parental attitudes and the commercial channel of nonchoice in toys and books—as they affect the development of sex identification. The need for such elucidation is based on the assumption that all education and consciousness-raising for women is wastefully remedial as long as the early experiences of childhood are not restructured. The development of a child in accord with predetermined sexual stereotypes is detailed. The use of sex-oriented toys is noted. It is concluded that the place to begin in helping women to learn how to develop their potential without an increased and unhealthy sense of martyrdom is with young children.—R. S. Albin.

2879. Moriya, Kelko; Mori, Makiko; Hirasaki, Yoshiaki & Sakanoe, Noriko. [The development of self-cognition: School children's diaries.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Dec), Vol 20(4), 205-215.—Analyzed diaries written by 11 children while they were in the 1st-5th grades. Classification of the contents in terms of how and what the children perceived of the self and of other people indicate (a) that self-concept develops in relation to other people, who are

seen as individuals in the 1st developmental sequence, as a group in the next, and as a group of which the child himself is a member in the final stage; (b) that the target of children's observation proceeds from the overt to the covert behavior of the self and others; and (c) that retrospective perception of the self begins with development of the ability to see the present self. (English summary)—S. Choe.

2880. Prendergast, P.; Zdep, S. M. & Sepulveda, P. (Girl Scouts of the USA, Washington, DC) **Self image among a national probability sample of girls.** *Child Study Journal*, 1974, Vol 4(3), 103-114.—Studied the relationship of self-image to race, social class, urbanicity, and age among a nationally representative sample of more than 1,800 9-17 yr old girls. As part of a larger personal interview, a total of 6 questions dealing with ability, appearance, and interpersonal relations were asked. Results show that on all of the items black girls rated themselves significantly higher than white girls rated themselves. There were no significant differences on the other variables. Results are discussed in terms of increasing racial pride and social defensiveness. (30 ref)—*Journal abstract*.

2881. Samuels, Shirley C. (Manhattanville Coll) **An investigation into the self-concepts of lower- and middle-class black and white kindergarten children.** *Journal of Negro Education*, 1973(Fal), Vol 42(4), 467-472.—Administered 2 child self-concept tests (Clark U-scale and Brown Test) during the 1st mo of school to 93 of 417 kindergartners, boys and girls, from white and black lower- and middle-class families in a New York City suburb. Results indicate ( $p < .05$ ) that black middle-class children had higher self-concepts than black lower-class children on both tests, while white middle-class children had higher self-concepts than white lower-class children on the Clark U-Scale only. Mother's church attendance and community group involvement were significantly related ( $p < .01$ ) to self-concept for lower-class, but not for middle-class children.—W. E. Sedlacek.

2882. Southwood, H. M. **The origin of self-awareness and ego behaviour.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 235-239.—Describes the process by which the mother communicates with her baby. Attention is drawn to the activity of the mother in establishing eye contact with her baby from the earliest days, to her imitation of the baby's facial expressions and sounds, and her encouragement of the baby to imitate her own expressions and sounds. It is suggested that the notion that people "think in our heads" is a derivative of this early identification of one's own face and eyes with mother's. It is concluded that the concept of the origin of the ego may be based upon this early communication.—*Journal summary*.

2883. Vasishta, V. S. **Diagnosis of good adjustment amongst secondary school children.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 40-50.—Compared the efficacy of 7 different methods for determining "good" adjustment among English secondary school children: Cattell High School Personality Questionnaire (HSPQ), Forms A and B; Rutter Scale; Thinking About Yourself (Bower); Sociometric Questionnaire; Junior Eysenck Personality

Inventory; and Stott's Adverse Pointers Questionnaire. 20 boys and 20 girls 13½ yrs old were divided by their headmaster into 2 groups, one "random" and the other "well adjusted." Results indicate that the Rutter Scale, the HSPQ (Form B), and the Sociometric Questionnaire, combined with information on socioeconomic status, could effectively identify children with good adjustment. —I. L. Zimmerman.

### Social Behavior & Family Relations

2884. Braun-Galkowska, Maria. [Features of personality conditioning family authority.] (Poln) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 59-74.—Studied personality factors of those wishing to dominate the family structure (rather than those who actually dominated) in 60 married couples who were administered the 16 Personality Factor Questionnaire. Men who wanted to dominate were more independent and intelligent than those who tended to subordinate themselves. Women who wanted to dominate were self-confident, aggressive, and less intellectual than subordinating women. Critical and aggressive men seemed dominating to women, and critical and aggressive women seemed dominating to men. (15 ref) —English summary.

2885. Chu, Cheng-ping. (National Taiwan U, Taipei, Republic of China) Parental attitudes in relation to young children's creativity. *Acta Psychologica Taiwanica*, 1973, Vol 15, 10-24.—Investigated the relationship between parental attitudes and young children's creativity, using 18 preschoolers and their parents. Children were given 3 modified creativity tests measuring fluency and originality. Parents completed the Parental Attitude Research Instrument (PARI). No unidimensional characteristics were found among the 3 creativity tests, indicating that to use a combined total creativity score is not appropriate. The assessment of PARI indicates that it is a worthy instrument which is sensitive to various factors. Some significant correlations were found between parental attitudes and children's creativity (e.g., mother's authoritarian score was related to child's picture-fluency, and father's equalitarian score was related to child's originality). Mother and father had different effects on their child because of sex differences. (46 ref)—Journal abstract.

2886. Deutsch, Francine. (Pennsylvania State U) Female preschoolers' perceptions of affective responses and interpersonal behavior in videotaped episodes. *Developmental Psychology*, 1974(Sep), Vol 10(5), 733-740.—Constructed an empathy measure to test whether 3- and 4-yr-old children can perceive affective states as indicated by H. Borke (see PA, Vol 47:686). 8 filmed episodes had congruous and incongruous stimulus features—4 episodes represented incongruity and 4 represented parallel congruous episodes where positive or negative affect was matched to the appropriate positive or negative interpersonal behavior. 48 female 2-5 yr old preschoolers were divided into high and average mental age groups and were asked to tell the story about each episode. Findings reveal that on the congruous episodes, there was a significant main effect of Mental Age for reasons for affective responses, for affective responses, and for intrapersonal behavior;

however, this main effect was only significant for the latter 2 measures on incongruous episodes. Ss scored significantly higher on the congruous than on the incongruous episodes. There was no significant main effect of Chronological Age for any measure. (22 ref) —Journal abstract.

2887. Deutsch, Francine. (Pennsylvania State U) Observational and sociometric measures of peer popularity and their relationship to egocentric communication in female preschoolers. *Developmental Psychology*, 1974(Sep), Vol 10(5), 745-747.—Tested the relationship between popularity and communicative egocentrism with female preschoolers, and assessed the relationship between communicative egocentrism and 2 popularity measures: (a) a realistic measure of actual classroom interaction and (b) a sociometric measure of preferred playmates. Ss were 60 white middle-class 3-5 yr old female preschoolers. Results indicate that communicative egocentrism was significantly related to the observational measure of peer popularity even when the common effect of IQ was removed. Communicative egocentrism, however, was not significantly related to the sociometric measure of popularity. The possibility of a curvilinear relationship existing between communicative egocentrism and a sociometric measure of popularity is advanced.—Journal abstract.

2888. Flavell, J. H. (U Minnesota, Inst of Child Development) The development of inferences about others. In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Describes recent ideas and research findings on the developmental aspects of social cognition, in particular the child's ability to endow others with inner psychological properties. 2 qualitative models of phenomena in this area are discussed: (a) an information-processing characterization of 4 classes of knowledge used to make inferences about another's inner properties and (b) an ability to represent and predict the visual acts and experiences of another. (4 p ref)

2889. Harré, R. (Oxford U, England) Some remarks on "rule" as a scientific concept. In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Proposes that there are no natural forces in men that lead automatically to the formation of a society, but that human social behavior is the cultural phenomenon of an intellectual response of a self-aware species to the problems of living. The concepts of "rule" and "rule following" are treated as tools for the analysis of human behavior, and psychology is polarized around the "old" paradigm—that a human being be treated for scientific purposes as an automaton—and the "new" paradigm—that a human being be treated as a plan-making, self-monitoring, goal-generating agent. (30 ref)

2890. Hendrickson, Norejane J. & Warchol, Barbara. (Florida State U) Young children's social maturity and their drawings. *Child Study Journal*, 1974, Vol 4(3), 115-123.—Tested V. Lowenfeld's (1957) idea that there is a relationship between a child's ability to participate in social situations and his drawing expressions. A sociometric technique developed by B. R. McCandless and H. R. Marshall (see PA, Vol 33:1032) was used to test 16 4- and 5-yr-old children. M. Parten's (1943) time-sample



observation method was modified to rate the Ss' social participation. Also, 5 selected drawings were obtained from each S to test Lowenfeld's idea. Results indicate that the Ss' drawings were not appropriate indicators of their social maturity.—*Journal abstract.*

2891. Michel, Andrée. (National Ctr for Scientific Research, Paris, France) [Masculine and feminine roles in the family: Examination of the classic theory.] (Fren) *Social Science Information*, 1971(Feb), Vol 10(1), 113-135.—Tested M. Zelditch's hypothesis that role specialization and differentiation are essential to the integration and stability of the familial system. In 46 of 56 societies studied, the male role was that of breadwinner-instrumental leader and the female role was that of housewife-expressive leader. 4 related hypotheses were tested in 450 French families by measuring 5 variables—wife's satisfaction, accord, communication, fulfillment plans and objectives, and realization of planned number of children. Results did not support the hypothesis. Role differentiation and specialization inhibited integration and functioning in these families. Role equality for all 5 variables produced more positive effects. Only in the area of fulfillment of plans and objectives was there any evidence that role specialization (i.e., the wife being solely responsible for the housework or specialization of roles in domestic matters) might have a positive effect.—*R. J. Anderson.*

2892. Oliver, Lincoln I. Parent ratings of behavioral patterns of youths 12-17 years: United States. *Vital and Health Statistics, Series 11*, 1974(May), No 137, 59 p.—Presents a descriptive analysis of the opinions of US parents regarding the general health, peer relations, mental development, and emotional health of their adolescent offspring—a representative sample of 6,768 youths 12-17 yrs old examined between 1966 and 1970 in the Health Examination Survey of the National Center for Health Statistics. Findings are reported by age and sex of the youth. Parental opinions of their children were in general favorable by a ratio of 6 to 1, although unfavorable responses were expressed about some aspects of behavior and development (i.e., children's tendency to exaggerate illness; existence of health problems; ability to make friends; reactions to entering 1st grade; and difficulties involved in their upbringing. (17 ref)—*Journal summary.*

2893. Secord, Paul F. & Peevers, Barbara H. (Queens Coll, City U New York) The development and attribution of person concepts. In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Considers the basic question of the nature of the person and of the self and examines, with reference to the attribution of person concepts, how people are conceptualized as individuals, how they are represented verbally, and how the conception of them relates to the observer and to the setting in which they are known. Actual descriptions of discrete actions are analyzed from a developmental point of view to determine the bearing they have on person-concept attribution.

2894. Steininger, Marion & Lesser, Harvey. (Rutgers State U, Camden) Sex and generation differences and

similarities in social attitudes. *Journal of Counseling Psychology*, 1974, Vol 21(5), 459-460.—79 male and 89 female college students and their parents (108 fathers and 138 mothers) responded to items dealing with social issues. Parents were more conservative on 21 of the 24 items, significantly so on 13. Sex differences were significant for 7 items and were interpreted in terms of self-serving attitudes and the tender-tough dimension. The generation gap was greatest for items closest to the daily lives of the respondents and may be both an expression of and a contributor to social change.—*Journal abstract.*

2895. Wynne, Edward. (U Illinois, Chicago Circle) Socialization to adulthood: Different concepts, different policies. *Interchange*, 1974, Vol 5(1), 23-35.—Analyzes some of the socialization problems faced by children from families earning \$15,000 or more a year where one or both parents have had higher education. To become effective adults, children must learn both cognitive and affective skills, but there is evidence that these skills are not learned. Several long-range research and development proposals are discussed as remedies for these socialization problems. Such proposals require major revisions in school and college policies. They also depend on involving a greater variety of persons and institutions in the socialization process. (60 ref)—*H. E. Yaker.*

2896. Zoberman, Nicole. (INRDP Ctr de Recherche de l'Education Spécialisée et de l'Adaptation Scolaire, Paris, France) [Parents' expectations vis-a-vis nursery school.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4), 239-246.—Studied whether parents' expectations of nursery school vary with social background as determined by the father's occupation. 2 classes of 22 pairs of parents of 5-6 yr old nursery school children were interviewed. Parents in the skilled workman class expected primarily an initiation in academic skills, whereas the middle-class-executive parents looked for the social and individual development of the child. (English summary)

### Adult Development & Aging

2897. Clemente, Frank & Sauer, William J. Race and morale of the urban aged. *Gerontologist*, 1974(Aug), Vol 14(4), 342-344.—Analyzed racial differences in morale for comparable samples of 721 black and 211 white residents of Philadelphia age 65 and over, using the Philadelphia Geriatric Center Morale Scale. An hypothesis suggesting blacks have lower morale than whites was derived from the literature and tested by regression analysis. The standardized partial regression coefficient was of negligible magnitude, and the hypothesis was rejected. Possible reasons for the failure of race to emerge as even a moderate predictor of morale include M. Messer's (1968) argument that elderly blacks view old age as a reward in itself and J. D. McCarthy and W. L. Yancey's (1971) contention that presumed racial differences in morale have received little actual empirical support. (28 ref)—*Journal abstract.*

2898. Hoppa, Mary E. & Roberts, Gary D. (Snohomish County Mental Health Services, Everett, WA) Implications of the activity factor. *Gerontologist*, 1974(Aug), Vol

14(4), 331-335.—Compared a total of 1,014 Senior Center attenders and nonattenders from 1 county who completed a modified version of the Social Needs Indicator Questionnaire. The type of activity was found to be a major factor in determining frequency of senior citizen needs. One implication is that service provision to senior citizens should not be totally of the "keep them occupied" variety but, as with all persons, it should allow for the type of activity which gives a feeling of usefulness, of a contribution to society, and of fulfillment to the individual.—*Journal abstract*.

2899. Schaie, K. Warner & Parham, Iris A. (U Southern California, Ethel Percy Andrus Gerontology Ctr) **Social responsibility in adulthood: Ontogenetic and sociocultural change.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 483-492.—Reports responses on a questionnaire scale of social responsibility over a 14-yr period for 161 Ss aged 21-84 yrs. Similar analyses were also made based on 3 independent random samples ( $N = 2,151$ ). Repeated measurement and independent random-sampling data were examined for changes occurring over the 2 7-yr periods 1956-1963 and 1963-1970. Comparisons were made for Ss retested and for those who left the sample panels (dropout effects). Results suggest that there are no stable ontogenetic patterns in the adult life course of reported social responsibility. Rather, evidence indicates an overall trend of reduced social responsibility over the period monitored but with specific patterns depending upon sex and generation membership. (39 ref)—*Journal abstract*.

2900. Thorson, James A.; Whatley, Lynda & Hancock, Karen. (Georgia Ctr for Continuing Education, Atlanta) **Attitudes toward the aged as a function of age and education.** *Gerontologist*, 1974(Aug), Vol 14(4), 316-318.—59 practitioners in service delivery to the aged and 61 graduate and undergraduate students completed Kogan's Attitudes Toward Old People scale as part of a continuing study. Results were compared in terms of Ss' age (from under 25 to over 55 yrs) and education (less than Grade 8 to graduate school). It was determined that younger and better-educated Ss had significantly more positive attitudes toward the aged than did those who had fewer years of education and were themselves older. Possible reasons for these differences in attitude are that the older Ss had given more thought to the negative aspects of aging, and those with less education may have had a different image of old age than the better-educated group.—*Journal abstract*.

2901. Woodward, Harriette; Gingles, Ruby & Woodward, John C. **Loneliness and the elderly as related to housing.** *Gerontologist*, 1974(Aug), Vol 14(4), 349-351.—Demonstrates that the degree of happiness and contentment with housing and not the type is the determining factor in feelings of loneliness among the elderly. A random sample of 390 older persons living in apartments, housing complexes, relatives' or friends' homes, and their own homes were interviewed concerning loneliness. These findings suggest that there are a number of housing possibilities for the elderly, and the type of housing is probably not the most important consideration.—*Journal abstract*.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

2902. Quen, Jacques M. (Cornell U, Medical School, NY) **Anglo-American criminal insanity: An historical perspective.** *Journal of the History of the Behavioral Sciences*, 1974(Jul), Vol 10(3), 313-323.—Examines the history of Anglo-American laws concerning the criminal responsibilities of the insane. It is concluded that legal and social attitudes are characterized by "a resonance between the wish to punish and the wish to protect and treat."

### Culture & Ethnology & Race Relations & Religion

2903. Abbott, Simon. (Inst of Race Relations, London, England) **Race studies in Britain.** *Social Science Information*, 1971(Feb), Vol 10(1), 91-101.

2904. Bowd, Alan D. (U Manitoba, Winnipeg, Canada) **Practical abilities of Indians and Eskimos.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 281-290.—Reviews literature concerning the practical abilities of American Indians and Eskimos. The review traces the development from a concern with assumed racial differences before World War II, to an examination of environmental correlates of abilities and methodological issues in the postwar period. The comparative strengths of native peoples' spatial, perceptual, and mechanical skills are related to contemporary developments in research and the need for educational change. Significant aspects of current research are considered to be (a) a growing emphasis on the study of practical abilities within a more holistic theoretical framework and (b) an increased awareness of cultural diversity among native populations. (French abstract) (47 ref)—*Journal abstract*.

2905. Chu, Cheng-Ping & Ryback, David. (National Taiwan U, Taipei, Republic of China) **Child-rearing practices in the Republic of China: A cross-cultural comparison.** *Acta Psychologica Taiwanica*, 1973, Vol 15, 6-9.—To compare child-rearing practices among some Asian countries, a 28-item questionnaire covering such areas as psychological security, feeding, weaning, toilet training, and socialization was administered to 167 Chinese students at National Taiwan University. Ss were asked to respond based on their general ideas about child-rearing practices and the experiences of their own homes. A chi-square analysis of comparisons with data obtained previously from Ethiopian and Thai students indicated many significant differences among the 3 cultures (e.g., Chinese mothers were closest to their infants but least sensitive to their needs, whereas Ethiopian parents were most responsive to children's cries but least able to make them feel secure).—*Journal abstract*.

2906. Crawford, Thomas J. (U California, Berkeley) **Sermons on racial tolerance and the parish neighborhood context.** *Journal of Applied Social Psychology*, 1974(Jan-Mar), Vol 4(1), 1-23.—Conducted a study of the racial attitudes of a group of white, Roman Catholic residents of a large midwestern city. 328 parishioners were interviewed before and after they heard 2 sermons opposing racial injustice and segregation. Results indicate that there was no significant relationship between pre- and postsermon change in a parishioner's attitude



toward racial integration and the prointegration intensity of the sermons he heard. However, variation in the prointegration intensity of sermons delivered was closely related to the socioeconomic status of the parishioners, suggesting that the priests' perception of parish norms may have influenced the contents of the sermon. The needs or functions that segregationist attitudes may serve were considered. The 3 strongest of 14 correlates of segregationist attitudes investigated were (a) belief that racial integration leads to neighborhood deterioration, (b) authoritarian aggression, and (c) perception of neighbors' attitudes toward integration. These 3 correlates appear to reflect object appraisal needs, externalization of inner conflict needs, and social adjustment needs, respectively. (20 ref)—*Journal abstract*.

2907. Croghan, Leo M. (Washington U) **A question of freedom.** *Journal of Religion & Health*, 1974(Jul), Vol 13(3), 201-206.—Presents a plea by a psychologist and ex-priest for reconsideration of the dogma of celibacy. Celibacy is viewed as a denial of human rights and freedom of choice. Reasons for a married priesthood are enumerated and discussed. Unmarried priests cannot participate effectively in civil rights issues since they have nothing to lose. They own no property and have no family or children, yet they propose to lead in neighborhood integration. Actions taken on celibacy by the Roman Catholic church are reviewed and a number of spokesmen are cited on the issue. The loneliness and occasional homosexuality found in the priesthood are considered. The "love of a man for a woman" is described as "the finest human expression of total caring." It is argued that church leaders who have stated that "we live in a world of change" must themselves show willingness to change in response to the increasing opposition to celibacy as a universal requirement for the priesthood.—*F. Hardt*.

2908. Derogowski, Jan B.; Ellis, Hadyn D. & Shepherd, John W. (U Aberdeen, Scotland) **A cross-cultural study of recognition of pictures of faces and cups.** *International Journal of Psychology*, 1973, Vol 8(4), 269-273.—Hypothesized that Africans would be more likely than Caucasians to recognize faces more easily than domestic objects. Ss were 12 male Rhodesians 20-45 yrs old, 12 Rhodesian females 19-38 yrs old, 12 Caucasian males 15-17 yrs old, and 12 Caucasian females 14-16 yrs old. The stimuli consisted of 3 sets of photographs, showing (a) cups and mugs, (b) Western and African male faces, and (c) Western and African female faces. Each S saw half of each set, with instructions to observe them carefully to be able to recognize them the next day; Caucasians were shown Western faces and Africans were shown Negro faces. 24 hrs later Ss were shown all the pictures in each set and asked to identify the ones that they had seen before. The hypothesis was not supported; only 1 set of scores showed a significant difference by race. Women recognized cups more often than they recognized faces. (French summary) (19 ref)—*E. A. Gavin*.

2909. Dunn, Joe R. & Lupfer, Michael. (Wesley Coll) **A comparison of black and white boys' performance in self-paced and reactive sports activities.** *Journal of Applied Social Psychology*, 1974(Jan-Mar), Vol 4(1), 34-35.—Tested M. Worthy and A. Markle's thesis (see

PA, Vol 45:4035) that whites excel at self-paced and blacks at reactive sports activities, by assessing the performance of 55 white and 122 black 4th-grade boys playing a modified soccer game. The research also explored the relationships between several dimensions of socialization (e.g., father presence-absence) and relative performance on the self-paced-reactive dimension. 2 significant correlations emerged: regardless of their own racial identity, boys who excelled at the self-paced activity tended to have several younger siblings and to attend schools with a sizeable representation of white students. Subsequent interviews revealed that black and white boys did not differ in their preference for self-paced and reactive sports activities. *Journal abstract*.

2910. Fortes, Meyer. (U Cambridge, England) **The first born.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Apr), Vol 15(2), 81-104.—Examines the role of the firstborn in the cycle of generations. The relationship of firstborns with parents, siblings, and the larger community is illustrated through a description of tribal and oriental cultures in general, and Tallensi, an African tribe, in particular. A review of ethnological data indicates that the advent of parenthood is experienced or at least customarily defined among many peoples as a life-stage fraught with conflict. The fulfillment and the promise of immortality it signifies is contrasted with the threat to the parent's vitality and potency it foreshadows. Thus, parenthood at once evokes the protective and tender impulses that will ensure the growth and survival of the offspring and sometimes stirs up impulses of hostility and resentment against its creator—the first-born. (61 ref)—*M. E. Pounsel*.

2911. Greenfield, Patricia M. (U California, Los Angeles) **Comparing dimensional categorization in natural and artificial contexts: A developmental study among the Zinacantecos of Mexico.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 157-171.—Studied cognitive processes among the Zinacantecos of Southern Mexico, focusing on the role of familiarity and cultural relevance in the development of categorization behavior. Results show that the ability to use verbal concepts in sorting and resorting an array of objects developed with age in both schooled and unschooled Zinacantecos. No aspect of sorting behavior showed a positive effect of familiarity of object domain. On the contrary, grouping and regrouping familiar objects (flowers) by color sometimes was done more poorly than grouping and regrouping unfamiliar objects (rods) because of the irrelevance of the color dimension to flower bouquets in the context of Zinacanteco culture. Although the species dimension was relevant to categorizing the culturally familiar flowers, its use as a basis for grouping developed after all other dimensions—color length, and circumference—probably because of its multidimensional perceptual qualities.—*Journal abstract*.

2912. Hilliard, Asa G. (San Francisco State Coll) **A helping experience in African education: Implications for cross-cultural work.** *Journal of Non-White Concerns in Personnel and Guidance*, 1974(Apr), Vol 2(3), 133-144.—Describes the 10-yr Monrovia Consolidated School System experimental project, which was begun by Liberian and American education planners as a means of improving the quality of education in Liberia's capital

city. The application of many of the principles in the Monrovia project to cross-cultural work in the US, particularly the consultant's role, is suggested.

2913. Hines, George H. (Victoria U Wellington, New Zealand) **The persistence of Greek achievement motivation across time and culture.** *International Journal of Psychology*, 1973, Vol 8(4), 285-288.—Conducted validation studies that showed significant correlation between the Thematic Apperception Test and the Lynn Questionnaire (LQ). The LQ was then administered, in the English or Greek form as appropriate, to 5 groups of Ss: (a) 55 Greeks living in Greece, (b) 38 Ss of Greek birth or parentage living in the US, (c) 26 Ss of Greek birth or parentage living in New Zealand, (d) 77 non-Greeks in the US, and (e) 287 non-Greeks in New Zealand. No statistically significant differences in achievement motivation appeared for any groups of Greek family origin. Greeks born in Greece but living in the US showed significantly higher achievement motivation levels ( $p < .01$ ) than non-Greek Americans, but Greeks born in the US did not. Greeks in New Zealand, whether born there or in Greece, showed significantly higher achievement motivation levels ( $p < .01$ ) than non-Greek New Zealanders. Results confirm the persistence of achievement motivation across generations and cultures. (French summary) (17 ref)—E. A. Gavin.

2914. Huang, Lily C. & Harris, Mary B. (Lake Superior Research Coll) **Altruism and imitation in Chinese and Americans: A cross-cultural experiment.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 193-195.—Conducted a field experiment with 130 Chinese in Taipei, Taiwan, and 115 Americans in Albuquerque, New Mexico, to determine the effects of observing a model on accepting and actually mailing a letter. It was predicted that Chinese, being more conformist, would help less than more "materialistic" Americans in the refusing model and helpful rewarded model conditions, and more in the no model and helpful unrewarded model conditions. However, the only statistically significant difference found was that a higher percentage of letters accepted by Chinese Ss were actually received.—*Journal abstract*.

2915. Krishnan, L. (Government New Girl's Degree Coll, India) **Attitude structure and change: An experimental study.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 6-15.—Measured attitudes toward religion (taken in the broadest sense). Included were valences of religious attitude, congruence-incongruence of attitude change, and sex differences in relation to these 2 factors. 3 hypotheses were tested. Ss were 110 16-22 yr old undergraduates, most of whom were Hindus. A Likert-type religious attitude scale was used. On the basis of scores obtained, Ss were classified into 6 valence groups. Results indicate that positivist males were significantly more likely to change than negativist males and that males and females were equally likely to change. (21 ref)—R. D. Nance.

2916. Lefebvre, André (Tien Educational Ctr, Taipei, Taiwan, Republic of China) **Self-concept of American Negro and white children.** *Acta Psychologica Taiwanica*, 1973, Vol 15, 25-30.—Hypothesized that urban black children have a lower self-concept than their white

counterparts. 40 black male 7th and 8th graders from an all-black parochial school and 40 white male 7th and 8th graders from an all-white parochial school were matched in terms of age, IQ, and socioeconomic status. Both groups were administered the Tennessee Self Concept Scale. Blacks scored significantly lower than whites on total scores and the following scales: Behavior, Physical Self, Personal Self, Moral-Ethical Self, Identity, and Self-Satisfaction. Scores on the other subscales were all in the expected direction.—*Journal abstract*.

2917. MacArthur, Russell. (U Alberta, Edmonton, Canada) **Some ability patterns: Central Eskimos and Nsenga Africans.** *International Journal of Psychology*, 1973, Vol 8(4), 239-247.—Administered various tests of cognitive ability to 2 groups of young students—65 Central Eskimos and 65 Nsenga Africans—as part of a large multicultural study of relationships between aptitude and environment. After normalizing most scores, principal factor analyses of the ability intercorrelations (for each sample separately) were followed by varimax and oblique higher-order promax rotation. For Eskimo Ss 8 1st-order factors accounted for 77% of the total variance; for Nsenga Ss, 7 factors accounted for 73% of the total variance. The factors for each sample correlated highly. While coefficients of congruence for Eskimos with Nsengas showed resemblance between the 2 samples, the factors were the same. Striking resemblance of 3rd-order factors to each other and to the 1st unrotated principal factor appeared. Results support extension of H. A. Witkin's differentiation theory. The Canadian Eskimos' hunting ecology and independence training appears to foster a broad spatial-field independence cluster of abilities and a distinctive cluster involving inductive reasoning from nonverbal stimuli. Agricultural ecology and socialization, tending toward conformity and obedience in Nsenga culture, goes with test results that show inductive reasoning task results merging with those of verbal and educational task results. (French summary) (26 ref)—E. A. Gavin.

2918. McMillen, David L. (Mississippi State U) **Confidence in stereotypes concerning ethnic groups.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 203-210.—To determine confidence in the accuracy of stereotypes, male Negro and Caucasian stimulus persons were presented to 60 male undergraduates. Half of the Ss were told that the E possessed an independent check on the accuracy of perceptions. The remaining half were not informed of an independent check. Significant differences in ratings of Negro and Caucasian stimulus persons occurred only when Ss thought no independent check was available. Findings suggest that Ss were not confident in the validity of their stereotyped view of Negroes.—*Journal abstract*.

2919. Meade, Robert D. & Brislin, Richard W. (Western Washington State Coll, Ctr for Cross-Cultural Research) **Controls in cross-cultural experimentation.** *International Journal of Psychology*, 1973, Vol 8(4), 231-238.—Points out that cross-cultural research is like other psychological research in the 3 categories of controls that it considers. With respect to stimulus or independent variables, comparability must be insured. Control of S variables calls for randomness of selection or for a particular state in the Ss under investigation.



Measurement or recording of the dependent variable requires taking into account possible constant errors and random errors. Cross-cultural research also has special problems of its own; e.g., persons in non-Western cultures do not always perceive as persons in Western cultures do, and at times it is not certain whether they are attending to the stimulus intended for them. Attention to previous learning, to sequential effects, to artificiality of the situation, and to special demand characteristics within one culture that are not found in others, provides challenge at the locus of the S. Since the same behavior may mean quite different things in different cultures, deciding which responses will be measured, and how, creates further problems for cross-cultural research. (French summary) (20 ref)—*E. A. Gavin.*

2920. **Miller, Louis.** (Ministry of Health, Jerusalem, Israel) **The special needs of minority groups.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 305-310.—Views a minority as a group which is smaller in size and has less power than the majority, and which has a rooted sense of its own identity and of being different. Clashes between majority and minority groups frequently result from threats to identity feelings. 2 principles which result in sociocultural change and homogeneity are presented: (a) there is a primitive drive toward cultural homogeneity which results in intraspecies aggressive attempts either to assimilate or to destroy anyone who is different and (b) all cultures are moving toward a common identity as a result of technological progress and change. The effect of these principles on the minority is discussed, and directions for mental health action with minorities are outlined.—*Journal abstract.*

2921. **Nussbaum, Kurt.** (Johns Hopkins U, Medical School) **Abnormal mental phenomena in the prophets.** *Journal of Religion & Health*, 1974(Jul), Vol 13(3), 194-200.—Discusses 3 borderline states between the normal and the abnormal: inspiration, ecstasy, and eidetic imagery. Inspiration is a state of excitement showing well preserved reality control. In ecstasy, perception of reality disappears and an episode of "psychotic paralysis" for one or more prominent ideas occurs. Eidetic imagery involves visions, dreams, and tactile or auditory experiences. Examples from the Old Testament of each of these types of behavior are given. Hallucination and revelation are contrasted and compared, the place of guilt in the prophets' calling considered, and schizoid withdrawal from the community analyzed. The contagion of frenzy is interpreted. Purposeful and useless prophesying are illustrated from Old Testament passages. Mania, paranoia, and depression found in some of the "great" or literary prophets are semantically investigated. It is also argued that valuable insights and guidance might be obtained from a psychotic state.—*F. Hardt.*

2922. **Orpen, Christopher.** (U Cape Town, South Africa) **Discrimination, work attitudes, and job satisfaction: A comparative study of whites and Coloureds in South Africa.** *International Review of Applied Psychology*, 1974(Apr), Vol 23(1), 33-45.—Compared work and needs satisfaction of 72 employed white and 62 employed Coloured (racially mixed) clerks in a situation where the latter were a minority subject to discrimina-

tion. Instruments used were Porter's (1963) work attitudes questionnaire, the Brayfield-Rothe (1951) index of job satisfaction, and a 7-point self-rating measure of overall job satisfaction and the extent to which Ss felt discriminated against by society in general. Results indicate that a conceptualization of job satisfaction which does not explicitly indicate recognition of the part played by the worker's frame of reference is inadequate. Serious doubts are raised concerning the validity of the implications of the need-fulfillment and 2-factor theories of job satisfaction. (33 ref)—*L. A. Ostlund.*

2923. **Servadio, Emilio.** (Psychoanalytic Ctr, Rome, Italy) **Peasant healers and the paranormal.** *Parapsychology Review*, 1974(Jul-Aug), Vol 5(4), 12-15.—Discusses an investigation of Lucania, a superstitious and economically backward area of southern Italy. Some unusual cases are presented and commented on from a psychoanalytic viewpoint. Information regarding 3 magical healers is included.

2924. **Smith, Donald E.** (Inst of Religion & Health, New York, NY) **The next decade of dialogue: Religion and health.** *Journal of Religion & Health*, 1974(Jul), Vol 13(3), 161-179.—Reinterprets the relationships between religion and psychology and offers some forecasts about the future. Both disciplines face dramatic and radical redefinitions. They must meet the "real" issues of overpopulation, new values, the interdependence of people, outer space, and permanently instituted wealth with its corresponding permanence of poverty. Mental health is relative and behavioral norms are shifting rapidly; many people begin to doubt the value of psychology as they doubt religion. Mental health and spiritual growth are considered to be largely identical concepts; the former is primarily social, the latter is individual. Psychology deals more with the social aspect. Collective images regarding the 2 disciplines are emerging; increasingly the psychologist is viewed as the "witch doctor" and the clergyman as "the fool." It is suggested that psychology has refused to deal with moral issues in the past, but is now asked to make such judgments. The goals of psychology and religion are similar and the boundaries between them are blurred. While psychology's alignment with science has been intense and desperate, it cannot deny its links with magic elements and it must ultimately deal with questions about the purpose of human existence.—*F. Hardt.*

2925. **Thomas, Charles W.** (U California, Third Coll, San Diego) **The significance of the E(thnocentrism) factor in mental health.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jan), Vol 2(2), 60-69.—Explores the concept of ethnicity as a basis for establishing more realistic and egalitarian practices in American life. There has been an intensive search among people of color for effective means of preventing psychological problems and of promoting psychological soundness through the use of ethnic awareness, identity, and pride. In an examination of the historical referent which has attached negative social values to ethnicity, it is argued that the contingencies of ethnicity as a means for achieving personal significance and social control require a new way of looking at the urban condition or any critical mass (e.g., college campuses, reservations,

penal institutions, or the military services) as an expression of the national fabric.—*M. E. Pounsel.*

2926. Thomas, David R. (U Waikato, Hamilton, New Zealand) **Social distance in Fiji.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 181-185.—Administered a social distance scale to 30 Fijian and 30 Indian women from rural areas in Fiji. In contrast to an earlier study, it was found that the Indian Ss showed consistently greater social distance towards ethnic outgroups than the Fijian Ss. The difference between the 2 groups was related to differences between the Fijian and Indian cultures, particularly to the differences in sex roles within the 2 cultures.—*Journal abstract.*

2927. Tygart, Clarence E. (California State U, Fullerton) **Work alienation and politics among clergy.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 103-114.—Investigated the neo-Marxian supposition that alienated work has effects for politics. Unlike M. Seeman's (see PA, Vol 41:10294) study which found no relationship, in the present sample of 321 clerical respondents work alienation explained 10% of the variance for politics. Results suggest the importance of respondents' ideological orientation for interpreting relationships between work alienation and politics. Among clergy with generally conservative ideology, there was no relationship between work alienation and politics. The strength of the relationship between work alienation and liberal politics for theologically liberal clergy was about the same as for the entire sample. The greatest increase in political liberalism or leftism was among neo-orthodox theologians who attributed a relatively smaller percentage of their total life interest to their work. (19 ref)—*Journal abstract.*

2928. Williams, Robert L. (U Washington) **The death of white research in the black community.** *Journal of Non-White Concerns in Personnel and Guidance*, 1974(Apr), Vol 2(3), 116-132.—Discusses and offers strategies for bringing about an end to the exploitation of the black community by insensitive researchers. Examples of misguided research that has been conducted in the black community are provided to illustrate the effect such research has had on the black community. A 3-pronged description of the individual who should be permitted to conduct research in black communities is offered: (a) the state of mind of the researcher, (b) his past research record as it relates to the black community, and (c) whether the research will provide direct and/or indirect benefits to the black community. (32 ref)—*M. E. Pounsel.*

2929. Wober, Mallory. (Makerere U, Kampala, Uganda) **On cross-cultural psychology.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 203-205.—Comments on an article by J. L. M. Dawson (see PA, Vol 48:2819) on theory and research in cross-cultural psychological studies. Tribute is paid to Dawson's studies of psychology in Africa, but several theoretical and interpretive points in the cited article are disputed.

#### Social Issues & Social Processes

2930. Amara, Roy. **Toward understanding the social impact of computers.** Menlo Park, CA: Institute for the Future, R-29, 1974. 136 p. \$10.—Describes the proceedings and recommendations of 4 workshops on various

aspects of the social significance and impact of computer technology, including computer models and simulations as aids to decision making, the use of computers in financial operations, perceptions and attitudes toward computers, and individual access to computers. A program for increasing understanding of how computers affect individual behaviors and perceptions and the potential societal benefits of computers is presented. (6 p ref)

2931. Boggs, David L. (Ohio State U) **An interpretive review of social science research on behaving—valuing patterns of low status people.** *Adult Education*, 1974, Vol 24(4), 293-312.—Derived from scholarly studies of behaviors of low-status Americans a theory-based perspective for interpreting their behaving-valuing patterns. Valuing is defined, from the point of view of the valuing S, as an activity tied to satisfaction of needs and assuagement of desires. L. Kreiberg's hypothesis that behaviors and values can be modified to the extent that they are serially independent, noncentral to self-concept, monitored by peers, and dependent upon external circumstances was found to be particularly useful in accounting for the malleability of conventional behaviors and values and the formation of new adaptive problem-solving ones among low-status people. Implications for adult basic education are discussed. (25 ref)—*Journal abstract.*

2932. Bottomley, Gillian. (Macquarie U, School of Behavioural Science, North Ryde, NSW, Australia) **Some Greek sex roles: Ideals, expectations and action in Australia and Greece.** *Australian & New Zealand Journal of Sociology*, 1974(Feb), Vol 10(1), 8-16.—Combined information from a literature review with fieldwork among 14 families of Greek descent in Sydney, Australia. The level of formal emancipation in Australia was found to affect visibly only a few highly educated individuals. A traditional Greek ideology is sustained by many families, but the structural prerequisites for patriarchal power concealing the informal power held by women are not found in the Australian urban setting. The traditional family model is sustained by close-knit networks that form moral communities closely linked with the Greek subculture in Sydney.—*Journal summary.*

2933. Brody, Eugene B. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Psychocultural aspects of contraceptive behavior in Jamaica: Individual fertility control in a developing country.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 108-119.—Analyzes the psychosocial and cultural factors which influence the self-regulation of fertility in developing countries, illustrated by data and case histories from Jamaica. Most of these variables have their roots in the family and household systems of the country and reflect the quality of lower socioeconomic status life and continuing exclusion from the cultural process of the dominant group. They include poor communication between sexual partners, a pattern of "strictness" in child rearing combined with conflicting nonverbal communications from parents, high value attached to the status and role of mother, negative perceptions of Jamaican men combined with a lack of alternative nonmaternal roles for women, socially sanctioned loose conjugal and household structures with little



pressure on men to assume responsibility for their children and multiple paternity, and reinforcement of anxiety about contraception as a consequence of cultural exclusion and lack of effective communication with societally powerful persons. These factors may diminish the influence of government-sponsored family planning campaigns. (20 ref)—*Journal abstract*.

2934. Brongersma, E. **Sexuality and the law.** *Journal of the American Institute of Hypnosis*, 1973(Sep), Vol 14(5), 210-221.—Considers that the law cannot legislate sexual morality and that society has no right to intervene in violations of the law which do not infringe on the rights of others (e.g., prostitution or pornography). The Speijer report, an analysis of the penal code and its relationship to sexual behavior in the Netherlands, is examined as a modern and enlightened approach.

2935. Bryan, William L. **Toward a viable environmental movement.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 387-401.—Considers that an adequate and effective environmental movement must focus on resolving problems in the relationship between man and his natural environment in a way that will end human exploitation. Once the environmentalist has set overall humanitarian goals, he should follow the strategies of successful political activists (e.g., choosing a popular issue and building grassroots support). (23 ref)

2936. Carte, Gene E. (Trenton State Coll) **Changes in public attitudes toward the police: A comparison of 1938 and 1971 surveys.** *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 182-200.—Reports that in 1938 the public wanted a police force that was disciplined, effective, well equipped, and nonpolitical. Little concern was expressed for police attention to the rights of minority groups. Responses reflected tolerance toward harsher treatment of Negroes, aliens, gangsters, and radicals; these responses conflicted with others which claimed high regard for constitutional rights. There was almost no interest in citizen participation in police policy making. The 1971 survey reflected other citizen concerns. While the public still expected competence and personnel quality, a desire was expressed for the police to be more representative of the communities they serve. Citizen participation in making police policy was felt to be desirable, and sympathy was expressed with the rights of the police as workers. The current trend toward increasing insularity of police work, arising from professional ideology and public pressure for police effectiveness, is seen as a source of growing antagonism between the police and some segments of the public.—R. S. Albin.

2937. Casler, Lawrence. (State U New York, Geneseo) **Is marriage necessary?** New York, NY: Human Sciences Press, 1974. ix, 249 p. \$8.95.—Presents an analysis and critique of the history, functions, and relevance of the institution of marriage. The necessity of including child-bearing and child-rearing within the framework of marriage is questioned, research on the parentless child is discussed, and the social and psychological implications of various alternatives to marriage that have recently emerged or will perhaps emerge (e.g., group marriage) are examined. (20½ p ref)

2938. Crawford, Thomas J. (U California, Berkeley) **Police overperception of ghetto hostility.** *Journal of*

*Police Science & Administration*, 1973(Jun), Vol 1(2), 168-174.—Compared the answers of 397 adult ghetto residents of a small industrial city to questions about their attitudes toward the police with the replies that police officers in the city predicted ghetto residents would make to 5 specific questions about the police. The response predicted by the police to each question was more antipolice than the actual public response. Possible explanations of this overestimation by the police of the amount of antipolice feeling are considered (e.g., invalid replies by the public, sample bias, self-fulfilling prophecy, and the projection by prejudiced police officers of their own hostility onto the minority groups they dislike). The implications of these findings for police recruitment are discussed.—R. S. Albin.

2939. Crockett, George W. **Justice, the courts and change.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 361-366.—Discusses the ways in which black judges are catalysts for progressive change in the judiciary system, particularly in the areas of individual rights and racism. A hearing involving a confrontation between police and a black militant group in which the author was the judge is described to illustrate these changes.

2940. Crowfoot, James E. & Chesler, Mark A. (U Michigan) **Contemporary perspectives on planned social change: A comparison.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 278-303.—Offers a typology of social change efforts based on an analysis of their divergent root assumptions about values and the nature of reality rather than a categorization of their various activities. 3 perspectives of planned social change—the professional-technical, the political, and the countercultural—are discussed in terms of such issues as their varying kinds of constituencies and resources. (93 ref)

2941. Eagly, Alice H. & Anderson, Pamela. (U Massachusetts, Amherst) **Sex role and attitudinal correlates of desired family size.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 151-164.—A survey conducted in 1971 with 386 undergraduates tested the hypothesis that persons approving of a relatively equivalent pattern of sex roles desire to have smaller families than do persons approving of less equivalent sex roles. Though the hypothesis was confirmed for the number of children that Ss desired to procreate, approval of sex role equivalence was 1 component of a more general pattern in which Ss who desired to procreate fewer children were nontraditional in their attitudes (e.g., favoring women's liberation movement ideas, and perceiving themselves as nonreligious). However, the role and attitudinal predictors related less strongly to the total number of children desired (i.e., the sum total of the number of children desired as a biological parent plus the number of adoptions desired). (24 ref)—*Journal abstract*.

2942. Fishbein, Martin & Coombs, Fred S. (U Illinois) **Basis for decision: An attitudinal analysis of voting behavior.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 95-124.—Proposes a psychological theory which suggests that a person's attitude toward any object is a function of his beliefs about the object and the evaluative aspects of those beliefs. Thus,

in the political arena, a person should like or dislike a given candidate because (a) he believes the candidate has certain personal characteristics, is affiliated with certain reference groups, or is for or against various issues; and (b) evaluate these characteristics, groups, and issues positively or negatively. Evidence from a local survey of 1,063 voters in the 1964 presidential election supports this theory and its application to voting behavior. In addition, data clearly indicate that voters do take partisan stands on some issues, do clearly discriminate between the candidates on certain issues, and do change their beliefs during the course of a campaign. (34 ref) —*Journal abstract.*

2943. Gamson, William A. (U Michigan) **Violence and political power: The meek don't make it.** *Psychology Today*, 1974(Jul), Vol 8(2), 35-41.—Analyzed 53 American social movements and found that groups had a better chance of success if they were willing and able to act violently when necessary. Successful movements sought limited goals rather than an overthrow of the system. Chances of success were also greater if the movement had a unified command and a bureaucratic structure. Groups employing only polite debate and seeking to involve many people in the decision-making process almost always experienced failure.—E. J. Posavac.

2944. Gitter, A. George & Mostofsky, David I. (Boston U.) **The Social Indicator: An index of the quality of life.** *Social Biology*, 1973(Sep), Vol 20(3), 289-297.—Elaborates a "social indicator" measurement model. Questions are raised to aid in an evaluation of this technique and the relative merits of using subjective and objective data are discussed.

2945. Gross, Alan E.; Schmidt, Michael J.; Keating, John P. & Saks, Michael J. (Ohio State U) **Persuasion, surveillance, and voting behavior.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 451-460.—4,392 undergraduates received 1 of 3 letters urging them to vote in a campus primary election. 2 letters suggesting that voting behavior would be monitored produced 37% turnout compared with 32% for a nonsurveillance letter and 26% for no-letter controls ( $n = 4,392$ ). Differences between groups were significant at ( $p < .01$ ). The letters also increased turnout in a runoff election held 1 wk after the primary; however there were no differences among the 3 letters.—*Journal abstract.*

2946. Harry, Joseph. (Wayne State U) **Urbanization and the gay life.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 238-247.—Collected data from a national sample of gay bars. Analysis indicated that gay bars are located in or near large cities and resort areas. It is noted that homosexuals tend to be subject to the same economic and cultural influences and processes as heterosexuals.

2947. Houston, Judith A. & Houston, Samuel R. (U Northern Colorado) **Identifying pornographic materials with judgment analysis.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 18-26.—Tested the Judgment Analysis (JAN) methodology for determining what is pornographic with 3 groups concerned with this issue. These groups included 28 doctoral students majoring in psychology, counseling, and guidance; 21 lawyers; and 25 police officers. JAN proved to be an effective

technique in the identification of policies. It is concluded that the problem of what is pornographic is a complex one, as evidenced by the many specific categorical and complex policies present in the 3 S groups.—*Journal abstract.*

2948. Jacob, Philip E. (U Pennsylvania) **Leadership and social change: Report on the Evaluative Conference on Comparative Studies of Leadership and Social Change.** *Social Science Information*, 1971(Feb), Vol 10(1), 155-162.—Reports on a conference study of the influence of values of leaders on community developmental change in India, Poland, the US and Yugoslavia. Internal homogeneity and cross-national equivalence were major concerns in interpreting 9 scales of values. It is noted that when behavior occurs in differing social and legal systems, indicator inconsistencies must be anticipated. Diverse leader values between countries were not closely associated with community activeness. It is concluded that cooperative cross-national study is worth the high cost if it provides both contact and results.—R. J. Anderson.

2949. James, William H. (University Coll London, Galton Lab, England) **Marital coital rates, spouses' ages, family size and social class.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 205-218.—Analyzed data from 2 surveys on human sexual behavior. Major findings were as follows: (a) When social class and the number of children are held constant, coital rates declined more rapidly with husband's age than with wife's age. (b) When duration of marriage is held constant, coital rate correlated positively with number of children. (22 ref)—E. B. Jaffa.

2950. Kelly, Joseph A. & O'Rourke, Thomas W. (U Illinois, Police Training Inst) **An appraisal of the attitudes of police officers toward the concept of police-community relations.** *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 224-231.—Analyzed responses to a 20-item survey form which assessed the attitudes and beliefs of 200 policemen who were about to receive workshop training in police-community relationships. A high degree of positivism characterized all responses. Attitudes were not influenced by any of the demographic variables (i.e., age, rank, police experience, previous police training, educational background, size of the police department, type of location, and ethnicity). The possibility that these reported highly positive attitudes are not actually reflected in police performance is discussed, and the significance for police training programs is considered.—R. S. Albin.

2951. Kinkade, Kathleen. **Power and the utopian assumption.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 402-414.—Discusses power sources and issues in communal groups, based on the author's 8 yrs of communal living. It is argued that the counterculture approach of pretending power does not exist is unrealistic; the problem is not how to escape from power but how to control it. Ways in which various communal groups have dealt with power issues are examined.

2952. Klein, Hillel & Last, Uriel. (Hadassah Medical School, Jerusalem, Israel) **Cognitive and emotional aspects of the attitudes of American and Israeli youth towards the victims of the holocaust.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2).



- 111-131.—Evaluated the actual knowledge and cognitive and emotional attitudes of groups of 308 7th- and 8th-grade Jewish schoolchildren in the US and Israel in 1968 after the 6-Day War. Ss were classified according to their degree of personal psychological involvement in the war. Marked differences between the Israeli and American groups were observed, with the Israeli Ss having a higher and more uniform knowledge of the war and associated events. In the American Ss, knowledge was related to the degree of psychological involvement. In both groups, a realistic attitude toward victims of the war predominated. Idealizing tendencies were only moderately prevalent. Emotions of anger and contempt appeared more frequently in the American Ss with a lesser degree of personal closeness to the events. Possible explanations for these differences are discussed in terms of the educational approach to the war, differences in the social norms of the 2 countries, and in the amount of direct contact with survivors. American Ss' responses may have been affected by the psychological conflicts associated with the position of Jewish children in US society, whereas Israeli responses may reflect a sense of identification with the continuity of the Jewish people, the danger of annihilation, and personal experiences during the war.—*Journal abstract*.
2953. Krug, Samuel E. & Henry, Thomas J. (Inst for Personality & Ability Testing, Champaign, IL) **Personality, motivation, and adolescent drug use patterns.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 440-445.—Examined interrelationships between patterns of drug abuse and personality and motivation for 285 college freshmen and 278 high school seniors. Ss completed the 16 Personality Factor Questionnaire, the Motivation Analysis Test, and a questionnaire regarding drug use. Drug users were significantly different from controls on 17 scales of the inventories. Significant sex differences were found with respect to drug behavior. Females used amphetamines more frequently than males and also showed greater multiple drug use. Child-rearing practices involving the neglect of discipline and absence of training in societal or ethical standards are suggested as significant in adolescent drug abuse.—*Journal abstract*.
2954. Leif, Irving P. **Bibliography.** *Current Sociology*, 1972, Vol 20(2), 57-138.—Presents an annotated bibliography of research on community power and decision-making, including sections on community power and theory, the methodology of community power, community studies, comparative community studies, and the study of community power and decision-making. The references serve as the basis for T. N. Clark's (1972) review of the field (see PA, Vol 53:Issue 2). (550 ref)
2955. Levin, Henry M. (Stanford U) **Educational reform and social change.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 304-320.—Argues that although most contemporary societies view the educational system as a powerful tool of social change, schools will always be used to reproduce society rather than to modify it. Educational reform can never be used as an independent force for changing social, economic, and political relationships. (29 ref)
2956. Mogulof, Melvin B. (Urban Inst, Washington, DC) **Advocates for themselves: Citizen participation in federally supported community organizations.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 66-76.—Discusses variations in the intensity of citizen participation in community organizations and variations in the decision structures for participation (e.g., advisory mechanisms or citizen control). It is concluded that although control mechanisms may have certain negative consequences for racial integration, citizen participation should be viewed as a policy goal as well as an instrument for achieving other goals.
2957. Myrick, Fred L. (U Alabama, Birmingham) **Homosexual types: An empirical investigation.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 226-237.—Analyzed the attitudes of homosexually oriented bar patrons. Findings indicate that homosexuality exists on a continuum ranging from complete concealment to complete disclosure. (27 ref)
2958. Nail, Richard L.; Gunderson, E. K. & Kolb, Douglas. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Motives for drug use among light and heavy users.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 131-136.—Reports reasons given for use of 6 illicit drugs—cannabis, opiates, hallucinogens, amphetamines, barbiturates, and cocaine—by 997 entrants to a US Navy drug rehabilitation facility. Specific reasons were divided into 2 categories: hedonistic and therapeutic. Ss were classified by level of involvement based upon light or heavy use of each drug. Reasons given by both light and heavy users of hallucinogens and cocaine were predominantly hedonistic. Heightened sentence and "psychedelic" experiences appeared to be the objective of hallucinogen users whereas heightened sexual pleasure was the primary motive for cocaine users. Reasons for using amphetamines, barbiturates, and opiates were almost exclusively therapeutic among heavy users. Amphetamines were used to improve functioning and relieve depression, and barbiturates to relieve anxiety. Reasons for using opiates included both of these components, and opiate users appeared to seek a pervasive feeling of well-being as well as "escape from reality." Reasons for cannabis use were diverse and suggested desires for intoxication, relaxation, social belongingness, and heightened sensory awareness.—*Journal abstract*.
2959. Neulinger, John. (City Coll, City U New York) **The psychology of leisure: Research approaches to the study of leisure.** Springfield, IL: Charles C Thomas, 1974. xxii, 216 p.—Describes various approaches to the study, measurement, and interpretation of leisure. Topics include a history of the concept of leisure, various research methodologies (e.g., time-budget studies and typological evaluations), the role of sex, age, socioeconomic, and religious variables in leisure, the formation of leisure attitudes, and the new leisure ethic. (14½ p ref)
2960. O'Day, Rory. (U Waterloo, Ontario, Canada) **Intimidation rituals: Reactions to reform.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 373-386.—The reaction of authority in social systems to the reform initiatives of a subordinate is viewed as a series of intimidation rituals. These rituals are divided into 2 major phases, each involving 2 distinct steps. The 1st phase, indirect intimidation, includes the rituals of nullification and isolation; the 2nd, direct intimidation,

involves the rituals of defamation and expulsion. A discussion of why these rituals for protest-suppression in organizations are powerful tools in the hands of the middle manager is presented. Attention is also given to various images projected by the organizational reformer and reasons for resistance to reform from within an organization. (21 ref)—*Journal abstract*.

2961. **Pernanen, Kai.** (Addiction Research Foundation, Toronto, Ontario, Canada) **Validity of survey data on alcohol use.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Discusses the use of coverage estimates for total alcohol consumption and for consumption of different types of alcoholic beverages as indicators of aggregate validity of central dependent variables in surveys of alcohol use. Estimates can be made by a comparison of yearly sales figures with survey estimates of annual consumption. Reasons for the lack of aggregate validity in many surveys are discussed, and the problems of noncoverage, selective reporting, and nonresponse are examined. (49 ref)

2962. **Polk, Barbara B.** **Male power and the women's movement.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 415-431.—Explores the power relationship between females and males, using 4 differing perspectives found in the contemporary women's movement: analysis of socially defined sex roles, conflicting cultures, power analysis, and the socialist perspective. The sources of male power suggested by these perspectives are identified, and the varying activities of the women's movement are discussed in terms of their potential impact on these forms of power.—*Journal abstract*.

2963. **Reiff, Robert.** (Albert Einstein Coll of Medicine, Yeshiva U) **The control of knowledge: The power of the helping professions.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 451-461.—Contends that the basis of professional power is not knowledge itself but the control of knowledge. Historically, the helping professions have been mandated and licensed by society to define who is deviant, ill, or needy and who is entitled to what help in the promotion of human welfare. It is argued that while the helping professions today have a vested interest in maintaining a commodity concept of their services, the very nature of their service policies deprives their clients of their rights as consumers. If a community wishes to reduce the power of the helping professions it will have to break up their monopolistic control. If the institutions of professionalism—its educational systems and organizations—were compelled to share their power with society, it would inevitably result in the democratization of knowledge. The potential for such a counterforce already exists in the demands for accountability and control by local communities of the poor, blacks, students, and the paraprofessional movement.—*Journal abstract*.

2964. **Sale, June S.** (Pacific Oaks Coll) **Family day care: A valuable alternative.** *Young Children*, 1973(Apr), Vol 28(4), 209-215.—Studied family day care in a multiracial, working-class area to understand the strengths and weaknesses of this system. 12 licensed and 10 unlicensed women cared for a total of 143 children. Once a month a student went to a family day care home for 4 hrs to work with the instructor and to learn

techniques of working with children. After 1 yr of work with the existing network of family day care mothers, it is concluded that this form of arrangement can and does offer excellent child care services.—R. S. Albin.

2965. **Sanville, Jean & Shor, Joel.** (Inst of the Los Angeles Society for Psychoanalytic Psychology, CA) **Leading ladies and gentlemen: Some clinical cues to transitional phases in husband-wife roles.** *Clinical Social Work Journal*, 1973(Sum), Vol 1(2), 67-77.—Presents clinical examples depicting the changing roles of husband and wife in American culture. Motivations for change, conflicts which often result during the phases of change, and some solutions to these conflicts are described.

2966. **Schmidt, L. L.** (Simon Fraser U, Burnaby, British Columbia, Canada) **Sex-role attitudes and differing life-styles of professional married women.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 197-206.—Surveyed 151 professionally-trained married women regarding current sex-role attitudes and preferences, selected biographical data, and life-style choice. An attempt was also made to determine relationships and/or differences existing among these variables and other psychological test data. It was found that Schmidt's Sex-role Inventory was a valid instrument in differentiating the traditional and liberationist groups, as well as differentiating among groups with differing life-styles, sex-role attitudes and preferences, and levels of cognitive dissonance. The Edwards Personal Preference Schedule and Study of Values also differentiated among the groups. (French summary) (20 ref)—*Journal abstract*.

2967. **Sloan, Lloyd R.; Love, Robert E. & Ostrom, Thomas M.** (U Notre Dame) **Political heckling: Who really loses?** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 518-525.—Hecklers (confederates) vocally attacked videotaped presentations of presidential contenders' (Nixon and Muskie) 1970 election eve broadcasts which were viewed by 229 undergraduates. Final agreement with the speaker depended upon viewer's initial opinion, the presence vs absence of hecklers, and the speaker himself. Heckling produced opposition to the speaker in initially neutral people and change toward neutrality for Os with initially extreme opinions. These effects were still observable 2 mo later, attesting to the importance and effectiveness of disruptive politics.—*Journal abstract*.

2968. **Steinbruner, John D.** (Harvard U) **The cybernetic theory of decision: New dimensions of political analysis.** Princeton, NJ: Princeton University Press, 1974. xi, 366 p. \$14.50.—Presents a discussion of the applicability and relevance of cybernetic decision theory to political events, and specifically, how decisionmakers deal with the uncertainty and fundamental value conflicts that arise in bureaucratic politics. An analysis of the issue of sharing nuclear weapons among North Atlantic Treaty Organization (NATO) allies is presented as an illustration. (17 p ref)

2969. **Stern, Etta G. & MacLennan, Beryce W.** (NIMH, Mental Health Study Ctr, Adelphi, MD) **Integrating minority and majority youth: A socio-drama group as a human relations model.** *Journal of Non-White Concerns in Personnel and Guidance*, 1974(Apr), Vol 2(3), 146-155.—Describes the role of a sociodrama group to



improve general human relations in schools affected by desegregation. The Racial Perceptions Inventory (Borus, Finan, and Stanton) was administered twice to the 20-member racially mixed group to learn whether apparent acceptance of each other within the group carried over to racial attitudes outside the group. Results of the 1st inventory show that whites generally responded positively far more than did blacks to statements favoring integration at all levels, not only in terms of school and community integration, but also in the social context; the 2nd inventory showed a reversal of these attitudes. It is suggested that since the attitudes reflected in the latter inventory did not mirror the behavior or opinions of the group in their improvisations, the apparent change was a result of a racial confrontation that had occurred in the school prior to inventory readministration. Improvisational theatre is seen as an effective means of bringing individual problems out into the open.—*M. E. Pounsel.*

2970. Sutcliffe, Claud R. (Williams Coll) **The effects of differential exposure to modernization on the value orientations of Palestinians.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 173-180.—Tested the hypothesis that differential exposure to modernization leads to differential preferences in value orientations, using interview data drawn, from 5 samples of Palestinians ( $N = 215$ ) ranging from traditional peasants to college students. In general, results support this hypothesis. However, the extent of the effect (and its direction in the case of activity orientation) varied according to the particular variable used as an indicator of exposure to modernization, as well as the particular question used as a measure of value orientations.—*Journal abstract.*

2971. Tate, Eugene; Hawrish, Ernest & Clark, Stanley. (St Thomas More Coll, U Saskatchewan, Saskatoon, Canada) **Communication variables in jury selection.** *Journal of Communication*, 1974(Sum), Vol 24(3), 130-139.—Studied the effect of age, sex, occupation, socioeconomic status, and appearance on jury selection in Canada. 50 lawyers were interviewed and asked to evaluate a jury list on a 7-point scale as to whether a juror could be definitely accepted or rejected for a given trial. Ss were shown pictures at the end of the interview. Results indicate that men were preferred over women, younger persons (between 20 and 30) were generally more acceptable, socioeconomic status did not make a significant difference, and appearance had an effect in only 1 of the 4 types of trials (false prospectus) where a conservative juror was preferred over a modish or rebellious one. (18 ref)—*P. Federman.*

2972. Toomey, Derek. (La Trobe U, Ctr for the Study of Urban Education, Bundoora, Vic, Australia) **What causes educational disadvantage?** *Australian & New Zealand Journal of Sociology*, 1974(Feb), Vol 10(1), 31-37.—Examines 2 views of the educational deprivation thesis based on evidence from Australia. The "strong" view states that pervasive differences in life-style characterize different socioeconomic strata and that these cause differences in children's abilities and personalities of a very general kind that go far beyond the ability needed for success in school learning. The "weak" view states that there are socioeconomic differences in the educational supportiveness of homes in matters closely connected with school learning and ambition, and that

these differences are not necessarily connected with far-reaching and pervasive life-style differences, although they do affect scholastic attainment. The Australian evidence is seen as supporting the weak view, but as insufficient to reject the strong view entirely.—*Journal summary.*

2973. Wackwitz, John H.; Pelfrey, Michael C. & Stenmark, David E. (U South Carolina) **The relationship of social and personality characteristics of hallucinogen use among college females.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 189-202.—Administered the Interpersonal Check List (ICL), the MMPI Lie scale, and demographic and drug history questionnaires to 53 female undergraduates at a southern state university. Ss were classified according to the degree of self-reported hallucinogenic drug use: heavy (had used hallucinogenic drugs on more than 10 occasions), moderate (fewer than 10 occasions), and none. Results show that (a) there were significant differences among the groups in self-perceptions of hidden, external, and ideal self; (b) only the Dominance-Self dimension of the ICL showed significant differences among the groups, with a trend to increasing dominance from nonusers to heavy users; (c) there were no significant differences between groups in background environment variables; and (d) there were important powerful relationships between hallucinogen use and peer-friendship cultures. (23 ref)—*L. Gorsey.*

2974. Waldmann, Silvia & Waldmann, Helmut. [The so-called expansion of consciousness: An analysis of drug use by adolescents.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 357-362.—Discusses theories concerning the reasons and motivations leading to drug use by adolescents. The expansion of consciousness; its effects of freeing perceived objects from their real, normal, and usual connection with the factual world; the intensified, heightened, and mostly irrational emotions and experiences; and the qualitative and quantitative sensory changes produced by the drugs are described and evaluated. (English summary) (24 ref)—*T. Fisher.*

2975. Wiener, R. S. (Northern Ireland Research, Inst, Belfast) **Consequences of a self-survey by a Belfast community.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 197-201.—Describes how a local community in Belfast, Ireland, designed and carried out a survey of unemployment in its area. The advantages of such local involvement and what hopefully can be achieved by it are discussed.

2976. Wiest, William M. & Janke, Lois D. (Reed Coll) **A methodological critique of research on psychological effects of vasectomy.** *Psychosomatic Medicine*, 1974(Sep-Oct), Vol 36(5), 438-449.—Discusses flaws in published research on the effects of vasectomy and suggests ethnically acceptable, rigorous research designs that will yield more definitive information about the psychological consequences of vasectomy. A discussion is included on the aspects of "a psychological risk" and the validity of the anxiety-reducing and health-promoting effects of the operation. (50 ref)—*Journal abstract.*

2977. Winnik, H. Z. ("Talbieh" Psychiatric Hosp, Jerusalem, Israel) **Drug addiction and law.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4).

366-372.—Discusses 3 laws pertaining to drug addiction in Israel, and notes that these laws have not reduced drug abuse. In fact, drug abuse is increasing because of immigration from Western countries, reduction in the barriers to Arab countries, and the fact that the laws have not been diligently enforced. This indulgent law enforcement reflects the following trends: (a) the composition of offenders is changing from professional consumers to casual white-collar and student users, (b) fewer offenders have previous convictions, and (c) the public increasingly accepts the use of "soft" drugs. The degree to which legal, educational, and social methods of preventing drug abuse should be applied are discussed, with emphasis placed on drug traffic control, public education, and rehabilitation of patients.—A. Olson.

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

2978. Abulkhanova-Slavaskaya, K. A. (USSR Academy of Sciences, Philosophical Inst, Moscow) [Does the problem of the individual exist for psychology?] (Russ) *Voprosy Filosofii*, 1972, No 7, 57-67.—Notes that current academic thought in psychology acknowledges the relationship between the mind and man's interaction with his social environment. Characteristic attributes of the mind are not inferred from abstract definitions developed through deductive techniques, but from man's social behavior. The features of man's social interaction are the basis for inferences about his intrapsychic behavior.—R. A. Meyer.

2979. Ben-Ami, Aharon (Ed.). (Haifa U, Israel) [Social psychology: Socialization, attitudes, groups: A reader.] (Hebr) Tel Aviv, Israel: Am Oved, 1974. 320 p.—Presents a collection of 24 readings for a textbook in social psychology emphasizing socialization, attitudes, and group processes.

2980. Benton, Alan A. & Druckman, Daniel. (U Illinois, Chicago Circle) **Constituent's bargaining orientation and intergroup negotiations.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 141-150.—Studied the bargaining behavior of 80 pairs of female undergraduates on a competitive reward-allocation task. Participants either bargained for themselves or represented the interests of a constituent as well as themselves. Representatives were given information indicating that their constituent expected them to win or to behave cooperatively, or they were given no information concerning their constituent's bargaining orientation. Findings indicate that representational role obligations tend to increase competition between negotiators. However, findings also reveal that this tendency is reduced when pressure to cooperate is applied by constituents to at least one of the representatives. Procedures that aid in the resolution of intergroup conflict are discussed. (18 ref)—*Journal abstract*.

2981. Jandt, Fred E. (State U New York, Brockport) **Communication and the simulation of social conflict.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Reviews recent simulation designs in the study of social conflict and issues

involved in the reliability, validity, and interpretation of man-machine and machine studies. The importance of the operating model on which the simulation is based and advantages of simulation techniques in comparison to gaming laboratory and field environment studies are discussed. (3 p ref)

2982. Lay, Clarry; Allen, Marlene & Kassirer, April. (York U, Toronto, Ontario, Canada) **The responsive bystander in emergencies: Some preliminary data.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 220-227.—Examined some of the characteristics of 2 groups of responsive bystanders (i.e., bystanders who helped a victim in an emergency situation). The sample included 101 Carnegie Hero Medal recipients and 147 Toronto Metropolitan Police Civilian Citation recipients. The data indicate that males directly intervened in emergencies more often than females and that the responsive bystander tended to act alone. The Carnegie analysis suggests that rural people were more heroic than urban people, although possible confounding factors are considered. (French abstract)—*Journal abstract*.

2983. Mischel, Theodore (Ed.). (State U New York, Binghamton) **Understanding other persons.** Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.

2984. Novaga, Marcello. (U Degli Studi di Milano, Facoltà Medica, Italy) [Prospects and limits of objective phenomenological experience during the interview.] (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 50-60.—Suggests that the observation of behavior patterns existentially experienced during the interview relationship should be a field of research to build a typology of behavioral responses during this conversational situation.

2985. Rabbie, J. M. (State U Utrecht, Inst of Social Psychology, Netherlands) [Effects of a competitive and cooperative intergroup orientation on within- and between-group behavior.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jun), Vol 29(4), 239-257.—Studied the attitudes represented by the "we-feelings" of members of competitive and cooperative groups. Competitive groups did not generally indicate a greater cohesion than cooperative groups. Overvaluation of the product of competitive groups did not seem to occur. Only when employers and employees in competitive groups simulated a reversal of responsibilities did pressure for conformity exceed similar pressures in cooperative groups. Competitive groups did not appear to have greater negative feelings to an outgroup than cooperative groups. Whether competitive or cooperative, the group with which a person becomes affiliated becomes more valuable to him with experience. The behaviors of the 2 groups should be considered in terms of the "mind-sets" of the workers. (English summary) (46 ref)—A. J. Ter Keurst.

2986. Raven, John. (Economic & Social Research Inst, Dublin, Ireland) **The need for an institute of social research.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 219-222.—Discusses the need for an institute of social research in Britain in order to improve standards of research in social psychology and its status in society and the profession.

2987. Sandberg, Irwin W. (Bell Telephone Lab, Murry Hill, NJ) **On the mathematical theory of interaction in**



**social groups.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Sep), Vol 4(5), 432-445.—Cites sociology as an area in which there are a great many verbal propositions concerning the behavior of human groups under various conditions. It is proposed that, if it makes sense to discuss and analyze social phenomena in terms of quantities that are not precisely defined in a mathematical sense (such as the levels of joint activity, interaction, and friendliness associated with a group), then it would seem worthwhile to consider what conclusions can be drawn from the nature and gross quantitative properties of sets of relations that appear to be translations of sets of verbal propositions into the language of mathematics. This question is considered in detail for a particular type of set of verbal propositions. (16 ref) *Journal abstract.*

2988. **Savvy, Joseph & Okun, Morris.** (Pennsylvania State U.) **Form of evaluation and audience expertness as joint determinants of audience effects.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 461-467.—Tested R. Martens and D. M. Landers's (see PA, Vol 49:787) conclusion that direct evaluation of performance and outcomes leads to greater performance impairment than indirect evaluation of outcomes only. Expert and nonexpert audiences (confederates) viewed 88 male undergraduates performing a motor task with visual information and knowledge of outcomes (direct evaluation), with no visual information but knowledge of outcomes (indirect evaluation), and the absence of both visual information and knowledge of outcomes (no evaluation). Contrary to Martens and Landers, with an expert audience, both direct and indirect evaluation impaired performance equally. Results indicate that at least 2 factors in social facilitation research, audience characteristics and form of evaluation, can be considered interactive determinants of evaluation potential. *—Journal abstract.*

2989. **Sherrod, Drury R.** (Kirkland Coll, Div of Social Sciences) **Crowding, perceived control, and behavioral aftereffects.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 171-186.—Conducted a laboratory experiment in which groups of 71 female high school students performed simple and complex tasks for 1 hr in 3 conditions of crowding: noncrowded, crowded, or crowded-with-perceived-control. Immediately afterward, all groups worked in a noncrowded situation on 2 additional tasks, one involving frustration tolerance and the other involving quality of proofreading performance. Conditions of crowding had no effect on simple or complex task performance. In the postcrowding situation, however, significant negative behavioral aftereffects were observed for the crowded groups on the frustration tolerance measure, though perceived control ameliorated these aftereffects. There were no significant aftereffects on the proofreading measure. were ref)—*Journal abstract.*

2990. **Tompkins, Phillip K.; Fisher, Jeanne Y.; Infante, Dominic A. & Tompkins, Elaine V.** (State U New York, Albany) **Conflict and communication within the university.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Describes models of organizational conflict applicable to university settings

and presents a review of the types of conflict that can occur within the university. Data from a recent study of a northeastern state university bearing on attitudes toward conflict and conflict aftermath are presented, and the relationships between conflict and communication are examined.

### Group Dynamics & Interpersonal Communication

2991. **Benjamin, Lorna S.** (U Wisconsin) **Structural analysis of social behavior.** *Psychological Review*, 1974(Sep), Vol 81(5), 392-425.—Presents a brief review of the literature on structural analysis of interpersonal behavior followed by a proposal which draws heavily from prior models, especially those of E. S. Schaefer (1965) and T. Leary (1957). The proposed model goes beyond previous ones in that it has a highly explicit structure which defines behavioral opposites, complements, and antidotes. Built on 2 axes named affiliation and interdependence, the model describes dyadic social interactions in terms of complementary proportions of those underlying dimensions. Opposite behaviors appear at 180° angles whereas complementary behaviors appear at topologically similar positions on 2 separate planes. Antidotes are defined as opposites of complements. The proposed structure was tested using the questionnaire responses of normal as well as psychiatric Ss. Analysis of these data by the techniques of autocorrelation, circumplex analysis, and factor analysis supports the model. (39 ref)—*Journal abstract.*

2992. **Bishop, George D. & Myers, David G.** (Yale U) **Informational influence in group discussion.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 92-104.—Examined an informational influence explanation of group-induced shift on choice dilemma items by experimental manipulation and by a mathematical model based on information weighing assumptions. Ss were 116 undergraduates. Although the exchange of arguments in an interactive discussion context produced significant response change, passive reading of arguments did not. Examination of the model revealed that at a molar level the mean model prediction for an item corresponded closely with the mean shift observed on that item following discussion. At a more molecular level, the informational model failed to predict the magnitude of specific group shifts on particular items. A suggestion as to how the informational influence explanation could be refined to accommodate these findings is taken from theory and research on the role of cognitive learning and cognitive rehearsal in attitude change. (30 ref)—*Journal abstract.*

2993. **Brownell, Winifred & Smith, Dennis R.** (U Rhode Island) **Communication patterns, sex, and length of verbalization in speech of four-year-old children.** *Speech Monographs*, 1973(Nov), Vol 40(4), 310-316.—Studied the quantity of speech produced by preschool children as a function of group size. The mean length of verbalization of 56 4-yr-old Head Start children was measured in 4 communication patterns—dyad, triad, small group, and role-playing triad. The children produced more speech in the small group than in the dyad. Differences between other patterns were not significant. Similar results were obtained when repetitions of words and phrases were eliminated. Females

produced more speech than males in all communication patterns.—*Journal abstract.*

2994. Godwin, William F. & Restle, Frank. (Educational Testing Service, Princeton, NJ) **The road to agreement: Subgroup pressures in small group consensus processes.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 500-509.—Tested 4 models of the process of a small group coming to consensus with groups of 3, 4, 5, and 6 undergraduates. 10 groups of each size were tested on 20 4-choice problems. Model 1 said that consensus was reached by random changes of opinion; it failed by far to account for the attractiveness of large subgroups who shared a single position. Model 2 said that each individual had attractiveness  $\alpha$  and that the probability of shift to a position depended upon the sum of attractiveness of people at that position. When such a model predicted equal probability of change toward or away from consensus, movement toward occurred with a probability of about .90, away with a probability of only .05. Model 3 said that large subgroups might have an attractiveness disproportionate to their number of members. However, it was shown that the attractiveness of a subgroup was not constant but depended upon the size of the whole group. Model 4 said that the attractiveness of a subgroup depended upon its relative size, particularly if it was 1 member short of consensus, or if it constituted a majority. This last model was not disproved by the present data. (16 ref)—*Journal abstract.*

2995. Greenberg, S. & Formanek, R. (Hofstra U) **Social class differences in spontaneous verbal interactions.** *Child Study Journal*, 1974, Vol 4(3), 145-153.—Observed spontaneous language behavior of 50 middle- and 50 lower-class mother-child pairs in 2 pediatricians' waiting rooms to determine the relationship between mode of language and social class. Additionally, the views of B. A. Bernstein (1959) and W. Labov (1969) were contrasted for their saliency to educational intervention. Results of the observations support several of Bernstein's notions in that data for mothers resembled data for children within the same class except for the motherly function of socialization. Main class differences were higher overall verbal productiveness, more questions asked, and fewer commands given by middle-class members. (15 ref)—*Journal abstract.*

2996. Hamlyn, D. W. (U London, Birkbeck Coll, England) **Person-perception and our understanding of others.** In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Considers that any understanding of other people presupposes an understanding of what people are in general and that complete understanding of a person is impossible without standing in a personal relationship to him. 4 conceptual principles concerning what is necessary to something's being properly considered as an object of knowledge are discussed in detail.

2997. Hamner, W. Clay. (Michigan State U, Graduate School of Business) **Effects of bargaining strategy and pressure to reach agreement in a stalemated negotiation.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 458-467.—Determined the effectiveness of various bargaining strategies under stalemate conditions. Ss were 96 male undergraduates. 4 bargaining

styles were replicated in a stalemated bilateral monopoly paradigm under both high and low pressure to reach agreement conditions: "tough," conciliatory or "soft," "intermediate" or moderately tough, and "fair." When Ss were faced with high pressures to reach agreement, they took fewer trials to reach agreement, had a higher concession rate, and reached agreement more often than Ss who faced low pressure to reach agreement. The tougher the opponent faced by the Ss, the higher was the number of cases where no agreement was reached, and the higher was the number of cases where the "last clear chance" offer was refused. Contrary to the anticipated results, a soft strategy resulted in significantly higher payoffs in both pressure conditions. (26 ref)—*Journal abstract.*

2998. Kitano, Eimasa. [Effect of group competition and cooperation on recall.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Dec), Vol 20(4), 226-235.—Studied the effect of group characteristics on memory. 6 groups of 24 high school students, characterized as introverted and extraverted, were equally assigned to competitive and cooperative groups. For all groups the task was to memorize a fictional story. It is concluded that the higher rate of recall is positively associated with the cooperative condition in all groups except the heterogeneous group. (English summary) (33 ref)—S. Choe.

2999. Marks, Michael W. & Vestre, Norris D. (Washington State U) **Self-perception and interpersonal behavior changes in marathon and time-extended encounter groups.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 729-733.—Assigned 27 undergraduates to a time-extended, a marathon group, or a control condition to evaluate the effects of encounter experiences on self-perception and interpersonal behavior. The Personal Orientation Inventory and the Interpersonal Check List were administered before the group experience, the day after, and again 8 wks later. Both experimental groups showed significantly greater changes in self-perceptions from pretest to posttest than the control group. No between-group differences were found on follow-up. Ratings made by each S's "significant other" indicated no between-group differences. (26 ref)—*Journal abstract.*

3000. Morris, Kenneth T. & Cinnamon, Kenneth M. (Central Michigan U, Counseling Ctr) **A handbook of verbal group exercises.** Springfield, IL: Charles C Thomas, 1974. xx, 347 p.—Uses an encyclopedic system to list, alphabetically, the goals and purposes of exercises aimed at expanding growth and communication possibilities within the group. Among the exercises included are those in coping, empathy, awareness, listening, perception, rejection, problem solving, self-concept, and self-disclosure.

3001. Organ, Dennis W. (Indiana U) **Social exchange and psychological reactance in a simulated superior-subordinate relationship.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 132-142.—Social exchange theory predicts that if a superior confers a social gift on a subordinate, the latter will feel obligated to reciprocate. A salient mode of reciprocation is the compliance with superior's task norms. However, the theory of psychological reactance argues that imposing



an obligation to reciprocate will generate countercompliance if accompanied by other situational variables (e.g., a high degree of surveillance) which threaten the subordinate's range of freedom. In a laboratory experiment using a business simulation task with 52 male undergraduate business majors it was found that under low surveillance, superior's conferral of a social gift (a compliment) led to greater compliance than in a control group (no social gift). However, under high surveillance (operationally defined in terms of the requirement of frequent reporting of task decisions to the superior), subordinates receiving the social gift complied to a lesser extent than the control group.—*Journal abstract.*

3002. Peters, Richard S. (U London, Inst of Education, England) **Personal understanding and personal relationships.** In T. Mischel (Ed), *Understanding other persons.* Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Examines the extent to which entering into personal relationships with others is constitutive of, rather than just providing conditions for, knowing and understanding them. The concept of "personal relationships" is explored, and it is suggested that there are levels of personal relationships which are connected with levels of personal understanding and personal attraction. (19 ref)

3003. Soble, Sharon L. & Strickland, Lloyd H. (Carleton U, Ottawa, Ontario, Canada) **Physical stigma, interaction, and compliance.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-B), 130-132.—A female student attempted to arrange interviews with 116 middle-class housewives. For half the requests, she appeared physically normal; for the rest she appeared to have a deformed back. Half of the requests were for subsequent interviews with herself; for the other half, she requested subsequent interviews with a different interviewer. As expected, compliance was low when the stigmatized stimulus person attempted to arrange a future interview with herself; but contrary to expectation, compliance was not appreciably higher than in control conditions when the stigmatized person attempted to arrange the interview with a physically normal interviewer. Results are discussed in terms of the "potency" of different types of physical stigma.—*Journal abstract.*

3004. Taylor, Milton H. (Limestone Coll) **Encounter-tapes for personal growth groups.** *Western Carolina University Journal of Education*, 1974(Spr), Vol 6(1), 16-19.—Reviews *Encounter-tapes*, a program of interpersonal exercises for 8-10 people for 10 sessions of 1½ hrs each on a set of audiotape recordings. The trainer's major role is the development of ground rules to focus on individual strengths. Coordinator's manual recommends that individuals in therapy or having emotional difficulties should not participate. The greatest liability is considered to be the lack of separation of effects of tape content from effects of personal interaction. Professionals using *Encounter-tapes* should not expect global growth, since the effectiveness of the tapes as a supplementary or substitute resource has not been established.—*J. Joesting.*

3005. Tedeschi, James T.; Smith, R. Bob & Brown, Robert C. (State U New York, Albany) **A reinterpretation of research on aggression.** *Psychological Bulletin*, 1974(Sep), Vol 81(9), 540-562.—The concept of aggression

is examined and found to be an inadequate way to describe or classify human behaviors. An alternative way of classifying harm-doing behaviors is presented in terms of coercive power. A reinterpretation of the distinctions made by various theories of aggression is offered and applied to research findings. The social-psychological perspective offered suggests specific research questions and generates a series of new hypotheses for investigation. The conditions that lead observers to label actors as aggressive are proposed, and the implications of this label on the subsequent behaviors of observers and actors are explored. (98 ref)—*Journal abstract.*

3006. Weitzenhoffer, André M. (VA Hosp, Oklahoma City, OK) **When is an "instruction" an "instruction"?** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 258-269.—In the course of validating with 100 undergraduate Ss the concept of a "classical suggestion-effect" (i.e., the existence of a class of nonvoluntary behaviors elicited by communications intended to serve as traditional "suggestions"), evidence was incidentally obtained showing that many "instructions" given to presumably hypnotized Ss also function like "suggestions." In these circumstances it is not possible to state *a priori* that a verbal communication will function as an "instruction" rather than as a "suggestion." Such a statement can be made with certainty only *a posteriori*, on the basis of the nature of the resulting behavior. The implications of this finding for research and for the clinical uses of hypnotic suggestion are discussed. (German, French & Spanish summaries)—*Journal abstract.*

### Social Perception & Motivation & Attitudes

3007. Baron, Robert S.; Roper, Gard & Baron, Penny H. (U Iowa) **Group discussion and the stingy shift.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 538-545.—The cultural value explanation of the risky shift predicts that group decisions should generally advocate more socially desirable action than previous individual decisions even when the decisions in question do not involve the risk-caution dimension. In addition, this theory holds that this "social desirability" shift should be maintained on individual decisions that follow the group decision. These predictions were tested by comparing group and individual decisions by 99 female undergraduates concerning donations to the Iowa Bengali Relief Committee. Contrary to these predictions, group decisions were significantly less generous than individual decisions despite the fact that Ss indicated that they felt generosity to be socially desirable. Moreover, this effect obtained regardless of whether the individual decision preceded or followed the group decision. Explanations for this outcome involving responsibility diffusion and reluctance to coerce others to emit costly responses were considered. (24 ref)—*Journal abstract.*

3008. Berger, Charles R. (Northwestern U) **Task performance and attributional communication as determinants of interpersonal attraction.** *Speech Monographs*, 1973(Nov), Vol 40(4), 280-286.—Investigated the relationship between task performance, attribution of success or failure to ability or luck, and interpersonal attraction to an external attributor. 141 high school

students were divided randomly into 2 groups, solving possible and impossible anagrams respectively. Ss evaluated their own performance, and were invited to attribute success or failure to either ability or luck. Their performance was also evaluated by a fictitious partner, who attributed it randomly to either ability or luck. Ss indicated agreement or disagreement with the partner, and also completed a measure of interpersonal attraction to the partner. Results show that Ss attributed their own success to ability, and their own failure to bad luck, although the latter attribution was less strong than the former. Attraction to the partner was greatest when there was agreement in attribution, particularly when the attribution concerned ability.—C. A. Sherrard.

3009. **Bickman, Leonard.** (Smith Coll) **The social power of a uniform.** *Journal of Applied Social Psychology*, 1974(Jan-Mar), Vol 4(1), 47-61.—Investigated the degree and basis of social power of uniformed figures in 2 field experiments. In Exp I, 153 adult Ss were stopped in the street by an E dressed in one of 3 ways: as a civilian, a milkman, or a guard. Ss were asked to pick up a paper bag, or to give a dime to a stranger, or to move away from a bus stop. Results indicate that the Ss complied more with the guard than with the civilian or milkman. 48 Ss in Exp II, which was designed to examine the basis of the guard's power, were asked to give a dime to a stranger under conditions of either surveillance or nonsurveillance. Results show that the guard's power was not affected by the surveillance manipulation. A logical analysis of social power indicated that the guard's power was most likely based on legitimacy. 2 questionnaire studies indicated, however, that college students did not perceive the guard as having either more power or more legitimacy than the milkman or civilian. The nature and importance of understanding legitimacy is discussed. (24 ref)—*Journal abstract*.

3010. **Burnstein, Eugene; Vinokur, Amiram & Pichevin, Marie-France.** (U Michigan) **What do differences between own, admired, and attributed choices have to do with group induced shifts in choice.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 428-443.—Conducted 2 experiments with a total of 122 female undergraduates to study 2 discrepancies considered to be important evidence in support of interpersonal comparison (value-adherence) explanations of group induced shifts in choice: (a) the differences between a person's own choice and the choice he predicts others would make and (b) the difference between the former and the choice he admires. Items from the Choice Dilemma Questionnaire were used in both experiments. Results of Exp I indicate that own choices are more extreme than those a person predicts others would make because he is more certain and confident about the former than the latter. Exp II strongly suggests that the extreme choices are admired because they imply that the person's solution to a problem involving choice is well-founded and that he has persuasive reasons for the choice. On the whole, evidence supports explanations of choice-shift effects based on persuasive argumentation rather than on interpersonal comparison processes. (35 ref)—*Journal abstract*.

3011. **Calder, Bobby J.; Insko, Chester A. & Yandell, Ben.** (U Illinois) **The relation of cognitive and memorial**

**processes to persuasion in a simulated jury trial.** *Journal of Applied Social Psychology*, 1974(Jan-Mar), Vol 4(1), 62-93.—Investigated in 4 experiments the dependence of persuasion on cognitive factors. All experiments employed a court case for which 795 Ss acted as jury members, reading summaries of both the prosecution's and defense's testimony. The amount of objective information on both sides of the case was varied. Persuasion was a position function of the number of prosecution arguments and the number of defense arguments. This finding was extended by obtaining measures of the Ss' cognitive reactions to the case as well as their opinions, and by following both of these measures over time. Both analysis of variance and multiple regression techniques showed that Ss could have derived their opinions from their cognitions about the case. This relationship also held up over time. Results suggest the general form of an information-processing theory of persuasion. One prediction of this theory is for an asymptotic function relating objective information to persuasion. This prediction received empirical support. (40 ref)—*Journal abstract*.

3012. **Carli, Renzo & Guerra, Giovanni.** (U Cattolica del Sacro Cuore, Facoltà di Medicina e Chirurgia, Milan, Italy) **[Cognitive style and interpersonal perception.]** (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 7-25.—Small groups of Ss played the Prisoner's Dilemma game. Field-dependent Ss showed a significantly higher interpersonal distance than field-independent Ss. The role of cognitive differentiation in field dependence-independence is discussed.

3013. **Chapko, Michael K. & Solomon, Henry.** (Bowdoin Coll) **The cross-situational validity of risk as a value.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 497-500.—Notes that demand characteristics and risk are confounded on the choice dilemma items. Thus, it is difficult using that instrument to determine if individuals view themselves as more risky than others because of a cultural value of risk or instructional demand characteristics. The present study asked 226 college students to make judgments for themselves and for others on either the choice dilemmas (with risk-oriented or risk-neutral instructions) or on 1 of 3 other measures of risk taking (behavior prediction scale, risk of aversive consequences, or zero expected value bets) which have exhibited the risky shift but do not have the instructional problems of the choice dilemmas. Only on the choice dilemmas did Ss view themselves as being more risky. On all other measures Ss viewed themselves as either equal to or more conservative than others. Results cast on the validity of value-type theories as general explanations for the risky shift. (20 ref)—*Journal abstract*.

3014. **Diggins, Dean.** (Brooklyn Coll, City U New York) **The role of social and nonsocial traits in interpersonal attraction.** *Journal of Personality*, 1974(Sep), Vol 42(3), 345-359.—60 male and 60 female undergraduates completed a questionnaire including a free description of 2 people known to the Ss—one liked and one disliked; a trait questionnaire involving 2 hypothetical persons—one liked and one disliked; and a value survey in which Ss rank ordered 6 social and 6 nonsocial values according to importance in their lives. Ss indicated which traits were most important as



determinants of likability and dislikability and their responses were coded into social and nonsocial traits. Results indicate that social traits were (a) in the free descriptions, more important than nonsocial traits in determining both likability and dislikability of a stimulus person; (b) in the trait questionnaire, more important than nonsocial traits in determining dislikability, but more important for females only as determinants of likability; (c) in both measures, more important as determinants of both likability and dislikability for females than for males; (d) affected by the value systems of the subjects; and (e) influenced by the situation, with a social situation yielding greater preference for social traits as determinants of likability and dislikability than a task condition. (23 ref)—*Journal summary*.

3015. Dion, Karen K. (U Toronto, Ontario, Canada) **Children's physical attractiveness and sex as determinants of adult punitiveness.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 772-778.—Investigated a child's physical attractiveness and sex as potential elicitors of differential adult punitiveness. Ss in Exps I and II were 52 white females and 44 white males, respectively. Ss in both groups viewed a videotaped interaction between the E and a child who was made to appear either physically attractive or unattractive. Subsequently, Ss monitored what was presumably the child's performance on a picture-matching task and administered penalties to the child for incorrect responses. The specific penalty involved taking 1-5 pennies away from the child for each error. Results show that women behaved more leniently towards an attractive boy than towards either an attractive girl or an unattractive boy; these results were interpreted in the context of a cross-sex leniency effect mediated by a child's physical attractiveness. Men were not influenced in administering penalties by either a child's attractiveness or sex. It is suggested that the data reflect differences in men's and women's orientations toward children's task behavior. (23 ref)—*Journal abstract*.

3016. Dutton, Donald G. & Aron, Arthur P. (U British Columbia, Vancouver, Canada) **Some evidence for heightened sexual attraction under conditions of high anxiety.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 510-517.—85 male passersby were contacted either on a fear-arousing suspension bridge or a non-fear-arousing bridge by an attractive female interviewer who asked them to fill out questionnaires containing Thematic Apperception Test (TAT) pictures. Sexual content of stories written by Ss on the fear-arousing bridge and tendency of these Ss to attempt postexperimental contact with the interviewer were both significantly greater. No significant differences between bridges were obtained on either measure for Ss contacted by a male interviewer. A 2nd study using 34 males involved a similar field setting and attempted to clarify findings of Study 1. A 3rd study in a laboratory setting manipulated anticipated shock to 80 male undergraduates and an attractive female confederate independently. Anticipation of own shock but not anticipation of shock to confederate increased sexual imagery scores on the TAT and attraction to the confederate. (26 ref)—*Journal abstract*.

3017. Farrell, Ronald A. & Morriene, Thomas J. (State U New York, Albany) **Social interaction and stereotypic responses to homosexuals.** *Archives of Sexual Behavior*, 1974(Sep), Vol 3(5), 425-442.—Studied variations in societal responses perceived by male homosexuals in different group interactions and the relationship of these responses to social status and related behavioral characteristics. Data from 148 male homosexuals in a large midwestern city indicate that (a) stereotypic responses are more likely to occur under the interactional prescriptions characteristic of secondary groups due to the impersonal and almost "one-way" interaction which characterizes them, and (b) lower-class homosexuals are more likely to perceive stereotypic responses because of their closer approximation to the stereotypic image of the homosexual. Behavior which closely approximates the stereotype may be a manifestation of the lower-class homosexual's desire to be clearly identified with the homosexual community and to conform to the sex-role stereotypic expectations of the lower classes. (33 ref)—*Journal abstract*.

3018. Friend, Ronald M. & Vinson, Michael. (State U New York, Stony Brook) **Leaning over backwards: Jurors' responses to defendants' attractiveness.** *Journal of Communication*, 1974(Sum), Vol 24(3), 124-129.—Studied the effects of appearance and personality of a defendant on the sentence given by jurors. It was hypothesized that judges or jurors, in their attempt to be impartial, overcompensate for their biases thereby being partial in the opposite direction. 102 male undergraduates completed the Authoritarian Aggression, Authoritarian Submission, and Power and Toughness subscales of the California F Scale. 3 groups of Ss were then formed to judge an attractive defendant, neutral defendant, and an unattractive defendant. Ss high on the combined Aggression scales sentenced the defendant to twice as many years. Results support the hypothesis—the mean sentence for the attractive condition was 8.40 yrs while it was 5.48 for the unattractive condition.—P. Federman.

3019. Glesne, Martin & Hendrick, Clyde. (Kent State U) **Effects of false positive and negative arousal feedback on persuasion.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 449-457.—Conducted 2 experiments to test the hypothesis that false feedback of high arousal, whether labeled as affectively positive or negative, enhances persuasion. In Exp I with 100 female undergraduates, the affective label attributed to the arousal state was manipulated by instructions describing the arousal Ss experienced as either "pleasant" or "unpleasant." Arousal intensity was manipulated by presenting either "high" or "low" false physiological feedback to Ss while they listened to a communication. Feedback of high arousal enhanced persuasion, and this relationship was not influenced by the affective label attributed to the arousal state. In Exp II with 149 female undergraduates, 1 group was given low-fear feedback, and 2 groups were given high-fear feedback during a warm-up period. During the communication, feedback remained low for the low-fear warm-up group, remained high for 1 high-fear warm-up group, and was reduced to low for the 2nd high-fear warm-up group. Results show that Ss were more persuaded when they received high-

than low-arousal feedback during the communication, and this was true even though they differentially attributed the cause of their arousal. (17 ref)—*Journal abstract.*

3020. Gormly, Anne V. (Trenton State Coll) **Recall of attitudinal and value belief statements in interpersonal judgment tasks.** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 102-104.—Investigated theoretical distinctions between attitude and value statements in 216 undergraduates, using 2 interpersonal-judgment situations. Recall of attitude and value beliefs and the effect of similarity of views on attraction were of interest. Predictions from M. Rokeach's 1968 belief centrality theory suggested the saliency of value beliefs over attitude beliefs in judgment settings. In Study 1, Ss were given booklets, attributed to a bogus stranger, which contained either attitude or value statements. The responses to the statements were manipulated to agree or disagree with the Ss' opinion, using 1 of 3 levels of similarity (25, 50, or 75% agreement). Ss tended to have better recall of value topics. Attitude statements, however, were rated as being more useful in making judgments about the bogus stranger. There was a significant effect for level of similarity on the attraction measures ( $p < .005$ ). In Study 2 Ss met an accomplice face to face and exchanged either attitude or value statements. This similarity of the accomplice and S was 1 of 4 levels (0, 33, 67, or 100% agreement). Attitude statements were more useful than value beliefs, and recall data favored value statements ( $p < .05$ ). There was a significant similarity effect for attraction measures.—*Journal abstract.*

3021. Greever, Kathryn B.; Tseng, M. S. & Friedland, B. Udelle. (West Virginia U) **Measuring change in social interest in community college freshmen.** *Individual Psychologist*, 1974(May), Vol 11(1), 4-6.—Administered the Social Interest Index (SII) and the California Psychological Inventory to 344 community college students and 26 4-yr college students to measure the change in social interest after 1 semester. Results show that women scored higher than men on social interest, and social interest changed significantly for men over the semester.

3022. Hamilton, David L. & Fallot, Roger D. (Yale U) **Information salience as a weighting factor in impression formation.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 444-448.—Used the concept of information salience to represent the extent to which the content of a stimulus attribute has implications for the judgment being made. In an experiment with 36 male undergraduates, information salience was manipulated by varying the content of person descriptions in terms of the social and intellectual desirability dimensions reported by S. Rosenberg et al (see PA, Vol 42:17150), which were hypothesized to have differential relevance to judgments of liking and respect. Results substantiate the importance of this concept in that social dimension information had greater influence on liking judgments, while intellectual dimension attributes had more influence on judgments of respect. Implications of these findings for a weighted averaging model of information integration are discussed. (16 ref)—*Journal abstract.*

3023. Harvey, John H. & Jellison, Jerald M. (Vanderbilt U) **Determinants of perceived choice, number of**

**options, and perceived time in making a selection.** *Memory & Cognition*, 1974(Jul), Vol 2(3), 539-544.—Asked 84 college students to make a selection from a set of options which varied in numerosity. After making their selection, Ss were given information which varied their perception of time in making the selection. As predicted, perceived choice was greater (a) the greater the number of options when S perceived that he had taken a relatively short time; (b) if the selection involved a moderately large number of options than if it involved either a small or a very large number when S perceived that he had taken a relatively long time; and (c) the longer the time S thought he had taken, except when the selection involved a very large number of options—in which case, perceived choice was greater the shorter the perceived time. Results provide evidence about the relationship between perceived choice and perceived competence.—*Journal abstract.*

3024. Hayakawa, Tsuguyo. [The effect of inequity upon distributing behavior of children.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 162-169.—Exposed 39 5-yr-old children to different 2-person game-playing situations where E controlled the equity or inequity of reward distribution in the 1st game. In the 2nd game Ss were allowed to distribute rewards by themselves. Results partially support inequity theory. Ss who received less reward from the E than their partners compensated by rewarding themselves generously in Game 2, and partners who received equal reward maintained this equity. However, Ss who were given more reward than their partners tended to maintain this inequity in Game 2 rather than compensating by giving their partner more reward. (English summary)—S. Choe

3025. House, William C. (Case Western Reserve U) **Actual and perceived differences in male and female expectancies and minimal goal levels as a function of competition.** *Journal of Personality*, 1974(Sep), Vol 42(3), 493-509.—Investigated the effect of competition on the performance expectancies, confidence, and minimal goal levels (MGL) of 86 female undergraduates as compared to 93 males. In addition, Ss' perceptions of the expectancies, confidence, and MGLs of males and females were investigated. Both males and females performed the experimental task either individually or under competitive conditions. Prior to task performance, all Ss reported performance expectancies, confidence, and MGLs. They also indicated perceptions of the expectancies, confidence, and MGLs of other male and female Ss in the experiment. Results indicate that females in a competitive situation reported lower performance expectancies, confidence, and MGLs than either females working alone or males in a competitive situation. Results also indicate that both males and females perceived males as reporting higher performance expectancies, confidence, and MGLs than females. Results reflect the traditional perception of the feminine role as noncompetitive, with the resultant avoidance of the appearance of competition on the part of females. (17 ref)—*Journal summary.*

3026. Jellison, Jerald M. & Ickes, William J. (U Southern California) **The power of the glance: Desire to see and be seen in cooperative and competitive situations.** *Journal of Experimental Social Psychology*.



1974(Sep). Vol 10(5), 444-450.—Tested F. Heider's 1958 suggestion that perception increases control and power over that which is perceived. 48 male undergraduates were given the expectation that they would be either cooperating or competing with another person in a game. 24 Ss were led to believe they would be interviewing their partner or opponent before the game, and 24 expected to be interviewed. Ss who expected to interview the other could choose whether to see the other person through a one-way mirror. Ss who expected to be interviewed could choose whether they wanted to be seen by the other. As predicted, the tendency to choose to allow perception was strong in all conditions except the condition in which Ss expected to compete with the other and might be seen by him.—*Journal abstract*.

3027. Kanekar, Suresh. (U Bombay, India) **Contiguity with versus instrumentality of reinforcement as a condition for liking: A theoretical note.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 25-27.—Discusses the relative potency of contiguity with reinforcement as opposed to instrumentality of reinforcement. Contiguity should be more potent than instrumentality for younger children who have a limited symbolic mediational apparatus. It is suggested that even when instrumentality is effective by itself, this is because it involves symbolic contiguity.

3028. Kaplan, Martin F. & Kemmerick, Gwen D. (Northern Illinois U) **Juror judgment as information integration: Combining evidential and nonevidential information.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 493-499.—96 undergraduates who simulated jurors gave guiltiness and punishment ratings for 8 traffic felony cases that varied in level of incrimination depicted by the evidence (high or low) and defendant characterization (positive, neutral, negative, or none). Judgment was an additive function of both types of information. Relative importance of characterizations for ratings was unaffected by instructions that varied their utility as guilt indicators. It is suggested that forming a juror judgment requires the integration of information. Results suggest that the conceptual approach and integration rules commonly applied to the impression formation task are equally applicable to juror judgment. Information components, whether legally relevant or not, have both scale value and weight for the judgment, and the juror then integrates these values into a unitary evaluation. (22 ref)—*Journal abstract*.

3029. Kawagishi, Hiroe. [A study of self-acceptance and acceptance of others with accent on measures of acceptance.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 170-178.—60 male and 81 female college students were given descriptions of personality characteristics and were asked to rate themselves on each characteristic in terms of self-satisfaction, private acceptance, and social acceptance. Correlational analysis of the 3 variables on the basis of responses to the 141 personality adjectives revealed that social acceptance was the purest measure of acceptance, and each adjective was given a scale value of social acceptance. Ss were then asked to rate a male and female stranger on each adjective to determine acceptance of others. Results indicate that self-acceptance and acceptance of others were significantly correlated ( $p < .01$ )

when both sexes were combined and when one sex viewed the same sex. Adjustment scores and self-acceptance were also positively correlated. (English summary) (19 ref)—S. Choe.

3030. Keesey, Charles B. (U Nebraska, Lincoln) **The influence of opinion agreement and quality of supportive reasoning in the evaluation of moral judgments.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 477-482.—Conducted 2 experiments in which a total of 48 6th-grade girls and 48 female undergraduates rated responses to Kohlberg-type moral dilemmas. These responses (moral judgments) consisted of (a) an opinion as to how the dilemma should be resolved and (b) moral reasoning at various Kohlberg stages that supported the opinion. Ratings were influenced not only by whether the opinion advocated in the moral judgment agreed or disagreed with the S's own opinion but also by the stage of supportive reasoning. The greater relative influence of opinion agreement over stage of supportive reasoning was more pronounced among preadolescent Ss. This age difference and the overall process of evaluating moral judgments are explained in terms of the mental operations composing Piaget's cognitive-developmental stage of formal operations. (18 ref)—*Journal abstract*.

3031. Lashbrook, William B. & Sullivan, Jean. (West Virginia U) **Apathetic and neutral audiences: More on simulation and validation.** *Speech Monographs*, 1973(Nov), Vol 40(4), 317-321.—Replicated and extended a computer-simulation study by C. Hylton and W. B. Lashbrook (1972) on producing attitude change in neutral and apathetic audiences by means of computer-generated messages. 89 high school students were divided into neutral and apathetic groups, according to their responses on the Fischbein and Raven AB Scales to an issue "Student Evaluation of Teachers for the Purpose of Tenure." Subgroups of neutrals and apathetics received either neutrally-oriented, apathetically-oriented, or control (nil) messages. The messages were determined by the computer program ARISTOTLE, using simulated audiences, prepared issues, and estimated degrees of required evidence as parameters. The program prediction that apathetically-oriented and neutrally-oriented messages would produce significant attitude change in the appropriated groups was upheld. In addition, the apathetic group was persuaded by both apathetically-oriented and neutrally-oriented messages.—C. A. Sherrard.

3032. Lindskold, Sverre et al. (Ohio U) **The perception of individual and group stability.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 211-218.—104 male and female undergraduates predicted the likelihood that groups or individuals would act in a manner consistent with their past actions. Predictions were made for 20 hypothetical situations. With both within-S and between-S analyses, the hypothesis that more stability would be attributed to groups than to individuals was confirmed. Social-learning, attributional, and balance-theory explanations are proposed. Unexpectedly, females perceived less stability in either groups or individuals than did males in 3 separate analyses. (18 ref)—*Journal abstract*.

3033. McGinnies, Elliott & Ward, Charles D. (American U) **Persuasibility as a function of source credibility and locus of control: Five cross cultural experiments.**

*Journal of Personality*, 1974(Sep), Vol 42(3), 360-371.—A total of 702 Australian, Japanese, Swedish, US, and New Zealand university students read an argument advocating the extension of international maritime boundaries. For some Ss the message was attributed to a highly credible communicator and for others to a much less credible communicator. The belief of the Ss in internal vs external locus of control was measured with Rotter's Internal-External Control Scale and used to predict attitude change under the 2 source conditions. A significant interaction was found between Source Credibility I-E Score, and Nationality. Previous findings of a Credibility  $\times$  I-E Score interaction among American Ss were replicated; however, no such relationship obtained in the Japanese, Swedish, and New Zealand Ss, and a significant reversal of the American effect appeared in the Australians.—*Journal summary*.

3034. Munson, Paul & Kiesler, Charles A. (U Kansas) **The role of attributions by others in the acceptance of persuasive communications.** *Journal of Personality*, 1974(Sep), Vol 42(3), 453-466.—Explored the question of Os communicating their attribution to actors. A total of 259 university students served as Ss. A confederate attributed an attitude to the S which was congruent with the S's true opinion, mildly discrepant, or quite discrepant. A control group with no attribution was also included. Independently of the attribution dimension, half of the Ss subsequently read a counter-communication on the issue. Attribution and attack each produced significant effects, but without statistical interaction. It is concluded that attributions by others have an independent persuasive effect on their own.—*Journal summary*.

3035. Newton, Darren. (U Virginia) **Dispositional inference from effects of actions: Effects chosen and effects forgone.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 489-496.—146 undergraduates made comparative judgments as to which of 2 hypothetical actors they were most confident possessed a choice-related trait, and which was most extreme on that trait dimension. Each actor was portrayed as making a choice from a set of actions; the choice sets varied independently in the number of effects eliminated by the choice and in the number of effects remaining after choice. Results confirm the 1965 hypothesis of E. E. Jones and K. E. Davis that correspondence would be inversely related to the number of effects remaining after choice. In addition, correspondence was directly related to number of effects eliminated by the choice when effects remaining did not differ. When given both sources of information, Ss preferred to use information from effects remaining.—*Journal abstract*.

3036. Nickel, Ted W. (U Tulsa) **The attribution of intention as a critical factor in the relation between frustration and aggression.** *Journal of Personality*, 1974(Sep), Vol 42(3), 482-492.—The perception of the intentionality of aggression (electric shock), together with either a low or high amount of that shock, was manipulated in an experiment with 56 paid male college students. Ss worked in pairs such that each S believed that his partner was administering the shock received. The amount of shock Ss believed their partner intended them to receive produced a greater difference in the Ss' behavior when they were given the chance to retaliate,

than did the shock which they actually received. Ss who received low shocks, but were led to believe that high shocks had been intended, retaliated with high shocks. Measures of affect as well as a simulation of the experiment confirmed the behavioral measures. Ss who had received high shocks, who were subsequently told that low shocks had been intended, were given the opportunity to react hostilely to a person other than their partner. There was no indication that they displaced their hostility on this person. Results support the utility of employing cognitive constructs when studying aggressive behavior.—*Journal summary*.

3037. O'Connell, Walter E. (VA Hosp, Houston, TX) **Receptivity toward dreikurisms.** *Individual Psychologist*, 1974(May), Vol 11(1), 22-23.—Presents the results of the agreements and disagreements of 46 college students unfamiliar with Adlerian premises when given a true-false test of 159 aphorisms by R. Dreikurs. Results indicate that (a) Ss agreed with items which did not seem to contradict cultural slogans and disagreed with those that pointed out subtle parent-child maneuverings and (b) females appeared to be more attuned to the here-and-now purposes of misbehavior and the interactional quality of life.

3038. Page, Monte M. (U Nebraska, Lincoln) **Demand characteristics and the classical conditioning of attitudes experiment.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 468-476.—Tested implications of a demand characteristics interpretation of the attitude conditioning effect in 2 experiments with a total of 150 undergraduates. In the 1st study, half the Ss were told just prior to their dependent variable performance that if they knew how certain syllables were "supposed" to be rated, they were to reverse those ratings to "completely opposite." This resulted in a "mirror image" reversal of the data for this group as compared to the regular group. This reversal was accounted for by aware Ss only. Unaware Ss could not follow the reversal instructions, and they did not show a conditioning-without-awareness effect. In the 2nd study, Ss were instructed to learn the associations between the conditioned stimulus-unconditioned stimulus lists. This resulted in a large increase in the magnitude of the attitude conditioning effect. Both studies are interpreted as making an unconscious conditioning interpretation of this experiment less and less plausible.—*Journal abstract*.

3039. Price, Richard H. & Bouffard, Dennis L. (Indiana U) **Behavioral appropriateness and situational constraint as dimensions of social behavior.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 579-586.—In the 1st of 2 studies, 52 undergraduates were required to judge the appropriateness of 15 behaviors in each of 15 situations in a behavior-situation matrix. Differences among behaviors, situations, and Behavior  $\times$  Situation interactions contributed substantial proportions of the total variance in judgments. The concepts of behavioral appropriateness and situational constraint were offered to account for the differences obtained among behaviors and situations, respectively. A 2nd study, using a new sample of 42 Ss and different methods of measurement, provided initial construct validity evidence for the concepts. Implications of these results for the construction of situational response



hierarchies, the development of behavior and situation taxonomies, and causal attribution are discussed. (35 ref)  
—*Journal abstract.*

3040. **Rosenhan, D. L.; Underwood, Bill & Moore, Bert.** (Stanford U) **Affect moderates self-gratification and altruism.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 546-552.—24 2nd and 3rd graders reminisced on matters that made them happy or sad. Subsequently, they were permitted to indulge themselves noncontingently with candies and to contribute money to other children, both in the absence of the E. Both happy and sad children self-gratified more than the 12 controls, but happy children contributed more than either the controls or unhappy ones. Among happy children, a strong positive correlation was obtained between self-gratification and altruism. Among unhappy children, that correlation was negative. Affect, therefore, moderates the relationship between self-gratification and altruism. (20 ref)—*Journal abstract.*

3041. **Ross, Michael & Thibaut, John.** (U Waterloo, Ontario, Canada) **Determinants of standards of judgment.** *Journal of Personality*, 1974(Sep), Vol 42(3), 383-398.—Conducted 3 experiments in which a total of 140 male undergraduates were presented with stimuli in either ascending order (providing increasing evidence that an artist was good) or descending order. For all 3 experiments, the mean intraseries judgment was more positive in the ascending than in the descending series, an indication of a lower adaptation level (AL) in the ascending series. Following the presentation of the ordered sequence a stimulus of objectively intermediate value (Exps I and II) or reproductions of 2 paintings (Exp III) were shown to the Ss. In Exps I and III the ratings of the postsequence stimulus were lower when it followed the ascending series. In Exp II when the postseries stimulus was made ambiguous by a very brief exposure time it was rated higher following an ascending series than following a descending or random series. Data suggest that a low AL in the early portions of an ascending series produces high judgments which form the basis for high expectations and a high standard of evaluation. (17 ref)—*Journal summary.*

3042. **Rule, Brendan G. & Nesdale, Andrew R.** (U Alberta, Edmonton, Canada) **Differing functions of aggression.** *Journal of Personality*, 1974(Sep), Vol 42(3), 467-481.—Examined the antecedent conditions which affect aggressive responses serving different purposes. 64 male undergraduates taught a peer a list of syllables by punishing errors with immediate shock feedback after each of 3 learning trials. Shock presumably provided such feedback, but increasing its intensity was described as either a help or hindrance to learning. The learner either succeeded or failed and either insulted or did not insult the teacher. Data reveal that the learner's success or failure affected the number of shocks administered depending on whether the aggression was described as a help or a hindrance to learning. When the learner was improving, more shocks were given when they could help him continue to reach his goal but fewer when they served only to inflict pain. Contrary to specific predictions, when the learner was failing, more shocks were given when the shock inflicted pain and fewer when they could help him. When insulted Ss were compared with

noninsulted Ss, the former gave more shock to hurt the victim and less shock to help him learn. (24 ref)—*Journal summary.*

3043. **Salancik, J. R.** (U Illinois) **Inference of one's attitude from behavior recalled under linguistically manipulated cognitive sets.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 415-427.—Tested D. J. Bem's 1972 hypothesis that individuals infer their attitudes from information about their behavior in a given context. 45 undergraduates were asked their attitudes about a course after reporting their behaviors for the course and receiving a linguistic manipulation to produce an intrinsic or extrinsic cognitive context (set). The intrinsic form resulted in a class perceived as more interesting than useful while the extrinsic form resulted in a class perceived as more useful than interesting. Results suggest that Ss' attitudes are derived from information about different behaviors under the 2 cognitive sets. The attitudes of extrinsic set Ss were correlated with behaviors relevant to obtaining course outcomes (contingent behaviors) and uncorrelated with behaviors relevant to personal interest (noncontingent behaviors); the opposite was found for intrinsic set Ss. (18 ref)—*Journal abstract.*

3044. **Sherrod, Drury R. & Downs, Robin.** (Kirkland Coll) **Environmental determinants of altruism: The effects of stimulus overload and perceived control on helping.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 468-479.—Measured the effects of stimulus overload on altruism. 60 female undergraduates were randomly assigned to 3 stimulus conditions of 20 Ss each: overload, overload with perceived control, and no overload. Ss performed simultaneous proofreading and number attention tasks while at the same time listening to distracting or nondistracting background sound, and 1 group believed they could have the sound turned off if they desired. Following task performance, all Ss received a request for a favor from an ostensibly unrelated confederate. Although all Ss performed the tasks about equally well regardless of stimulus condition, altruism increased significantly across the 3 conditions. Results are discussed in terms of stimulus overload associated with the urban environment. (23 ref)—*Journal abstract.*

3045. **Simons, Herbert W.** (Temple U) **The carrot and stick as handmaidens of persuasion in conflict situations.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Attempts to determine types of social influence, the means by which influence is exerted in conflict situations, and whether characteristic influence patterns are exhibited by different types of individuals. The idea that in conflict situations, persuasion is not so much an alternative to the power of constraints and inducements as it is an instrument, accompaniment, or a consequence of that power is examined, and implications for the Watergate affair are discussed. (3 p ref)

3046. **Smith, Raymond G.** (Indiana U) **Source credibility context effects.** *Speech Monographs*, 1973(Nov), Vol 40(4), 303-309.—Investigated the influence that speaker characteristics other than source credibility dimensions may have in the formation of listeners' impressions of speaker credibility. Responses

followed a simple information-averaging model in about 80% of listeners. For the remaining 20%, however, there was a significant interaction between traits. This mixed effect suggests caution in interpreting results of credibility studies. It was found further that all positive and negative source credibility dimensions could be treated safely as equal in weight, except for the negative pole of the Trustworthiness dimension; an untrustworthy speaker, regardless of his other qualities, was viewed as a questionable message source.—*Journal abstract.*

3047. Snyder, Mark. (U Minnesota) **Self-monitoring of expressive behavior.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 526-537.—Proposes a social psychological construct of self-monitoring (self-observation and self-control guided by situational cues to social appropriateness) of expressive behavior and self-presentation. An internally consistent, temporally stable self-report measure of individual differences in self-monitoring was constructed. 4 converging laboratory and field studies of peer perception ratings, criterion group membership, self-control of facial and vocal emotional expressive behavior, and attention to normative social comparison information were conducted with undergraduates to demonstrate the convergent and discriminant validity of the Self-Monitoring Scale (SM). The use of SM to investigate hypotheses concerning consistency in expression across situations and between channels of expressive behavior is discussed. (28 ref) —*Journal abstract.*

3048. Snyder, Mark; Grether, John & Keller, Kristine. (U Minnesota) **Staring and compliance: A field experiment on hitchhiking.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 165-170.—Conducted a field experiment in which a single male, a single female, or a male-female couple attempted to hitch rides at 4 different traffic locations, under conditions in which the hitchhikers either stared at or looked away from oncoming drivers. It was found that staring increased the probability of a driver stopping from .03 to .067. The female was a more successful hitchhiker than either the male or the couple.—*Journal abstract.*

3049. Sorrentino, Richard M. & Hardy, Jack E. (U Western Ontario, London, Canada) **Religiousness and derogation of an innocent victim.** *Journal of Personality*, 1974(Sep), Vol 42(3), 372-382.—Forty-two high-religious and 38 low-religious paid university students observed a peer (learner) receive either painful electric shocks (experimental condition) or no shock (control condition) for making errors in a serial learning task. A significant Religiousness  $\times$  Conditions interaction occurred ( $p < .01$ ) such that while the high-religious group gave the learner lower evaluations than the low-religious group in the control condition, the reverse was true in the experimental condition. In interpreting these results, considerable importance is attributed to the fact that the significant interaction was due primarily to the behavior of the low-religious group, as the high-religious group did not differ in their evaluation of the learner across conditions. Data are inconsistent with the general hypothesis that religious persons are less compassionate

than less religious persons. Results suggest, instead, that religious persons may be less sensitive to situational determinants than less religious persons. (21 ref) —*Journal summary.*

3050. Steiner, Ivan D.; Rotermund, Manfred & Talaber, Rudolph. (U Massachusetts, Amherst) **Attribution of choice to a decision maker.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 553-562.—Conducted 3 experiments with 210 undergraduates to test hypotheses generated by a theoretical model that predicts the amount of "real choice" attributed to a decision maker. The model maintains that greatest choice is attributed when available options seem equally attractive. The attractiveness of an option is indexed by the discrepancy between its expected value and the costs that must be incurred in pursuing it. All 3 experiments supported the model, but 2 of them also yielded findings that had not been predicted. Thus, although the discrepancy between expected values and costs emerged as the major determinant of attributed choice, each of these factors had effects that were not completely subsumed by the model. It is concluded that the model tells the truth, but not the whole truth, about the attribution of choice.—*Journal abstract.*

3051. Weaver, Robert A. (Indiana U Pennsylvania) **Peaks and valleys of student experiences.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 168-169.—Describes the results of a pilot survey of 35 male junior college students who were asked to write in detail about the 2 most negative experiences and the 2 most positive experiences of their lives. More than  $\frac{1}{2}$  of the negative experiences and more than  $\frac{1}{4}$  of the positive experiences reported were associated with their school situation.

3052. Wilke, H. (Inst of Social & Industrial Psychology, Groningen, Netherlands) **[Polarization.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jun), Vol 29(4), 259-280.—Reviews 4 theories of polarization of attitudes basic to the judgment of social stimuli: G. A. Kelly's construct theory, N. H. Anderson's information-integration theory, H. Tajfel's social categorization approach, and M. Sherif and G. W. Sherif's social judgment-involvement theory. According to the Kelly and Sherif theories, the more extreme the judgment about an important issue, the greater the polarization. According to Anderson and Tajfel, polarization is augmented when the information about an issue is increased to extreme limits. With respect to polarization within a group, many studies question the convergence effect—i.e., the tendency for attitudes within a group to shift to the middle position with additional information. Similarly, an individual's attitudes will become more extreme with greater risk-taking and greater personal involvement in a meaningful issue. The polarization between groups increases with an increasing value set on membership in the ingroup and a corresponding disparagement of the outgroup. (English summary) (91 ref)—A. J. Ter Keurst.

3053. Worchel, Stephen; Insko, Chester A.; Andreoli, Virginia A. & Drachman, David. (U North Carolina) **Attribution of attitude as a function of behavioral direction and freedom: Reactance in the eye of the observer.** *Journal of Experimental Social Psychology*.



1974(Sep). Vol 10(5). 399-414.—Conducted 2 experiments with a total of 140 undergraduates in which an actor-stooge was given free-choice, forced-compliance choice, or no-choice as to whether he should tell the "waiting S" that a task was dull or enjoyable. The actor-stooge also either chose or agreed to inform the "waiting S" that the task was dull or that the task was enjoyable as a manipulation of behavioral direction. Ss made positively correspondent inferences in the free-choice condition (i.e., the actor-stooge was attributed with a more unfavorable attitude toward the task when he chose to advocate the dullness of the task than when he chose to advocate its enjoyableness). However, within the no-choice condition, previously unobtained negative correspondent inference occurred. The actor-stooge was attributed with a more unfavorable attitude toward the task when he advocated the enjoyableness of the task than when he advocated the dullness of the task. Results indicate that Ss attributed reactance to the actor-stooge in the condition in which the most social pressure was exerted. Exp II demonstrated that the negative correspondence effect was not due to assumptions regarding other Ss' preference. The dependence of the effect on the absence of a rationale for the no-choice assignment of behavioral direction was also indicated.—*Journal abstract*.

3054. Ylon, Yoel & Bizman, Aharon. (Bar Ilan U, Ramat-Gan, Israel) **The nature of effective bonds and the degree of personal responsibility as determinants of risk taking for "self and others."** *Bulletin of the Psychonomic Society*, 1974(Aug), Vol 4(2-A), 80-82.—Tested the hypotheses that (a) the nature of affective bonds among group members and (b) the degree of personal responsibility for decisions made for "self and others" are determinants of the level of risk taken in making these decisions. In a field experiment, 90 16-18 yr old males who were residents of a dormitory made decisions in a card game which affected both themselves and 2 others. These triads consisted of Ss who mutually liked each other, were indifferent to each other, and disliked each other. It was found that Ss in the cohesive triads took fewer risks than members of the indifferent or hostile triads. Ss under a personal responsibility condition tended to take fewer risks than did Ss under a group responsibility condition. Contrary to expectation, no interaction was found between the 2 variables. Results are explained in terms of the living circumstances of the Ss.—*Journal abstract*.

3055. Yoshino, Noriko. [Social reinforcement and affiliation: The interpersonal behavior of children: II.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Dec), Vol 20(4), 236-243.—Studied the effect of experimentally controlled social deprivation and satiation on children's receptivity to social reinforcement. In 2 experiments, E's personal attention to 62 children's activities was differentially manipulated. In Exp I, the reinforcement effect was significant ( $p < .05$ ) for the group which received positive attention, as measured by the amount of the experimental task accomplished. In Exp II, the same effect was significant ( $p < .06$ ), as measured by the frequency of the cooperative behavior. (English summary)—*S. Choe*.

## COMMUNICATION AND LANGUAGE

3056. Arnold, William E.; Liddell, Charles & Findling, Janet. (Arizona State U) **Diffusion of information about crisis intervention services.** *Crisis Intervention*, 1974, Vol 5(3), 2-11.—Studied questionnaire responses of crisis-intervention clients to determine effects of mass media and interpersonal communication upon (a) visibility of services, (b) help-seeking motivation, and (c) the extent to which clients tell others about services.

3057. Aronson, Howard I. (U Chicago) **The role of attitudes about languages in the learning of foreign languages.** *Modern Language Journal*, 1973(Nov), Vol 57(7), 323-329.—Describes a set of powerful cultural factors which strongly inhibits the acquisition of an acceptable pronunciation pattern by the learner of a foreign language. The student deliberately avoids the correct intonation, labialization, or other phonological features in the target language because in English, the required pronunciation carries bad connotations (e.g., the hisping needed in Spanish).

3058. Bhat, D. N. (Stanford U, Language Universals Project) **Retroflexion and retraction.** *Journal of Phonetics*, 1974(Jul), Vol 2(3), 233-237.—Demonstrates that retroflexion and retraction are distinct and contrastive and that consonants produced with retroflexion show a number of phonological characteristics that differentiate them from sounds that are produced without it. It is argued that a system of phonetics that does not characterize the retroflexed consonants by their specific articulation would fail to take care of some of their phonological properties.

3059. Bond, Z. S. (U Alberta, Edmonton, Canada) **The perception of sub-phonemic phonetic differences.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 351-355.—Tested 10 assumedly homophonous word pairs (e.g., *lax* vs *lacks*) for the ability of 17 untrained undergraduates and 12 graduate phonetics students to identify them. When total scores for each word pair were considered, Ss were unable to identify any of the word pairs correctly at a statistically significant level. However, in the case of some individual productions of the homophone pairs, Ss were extremely consistent in how they labeled the words. The productions which were most consistently labeled were analyzed to determine what acoustic cues the Ss were employing. Apparently, Ss were able to make use of certain acoustic cues that are sometimes considered subphonemic. That these cues are not linguistically significant is indicated by the fact that besides correct identifications, the Ss also produced equally consistent mislabelings.—*Journal abstract*.

3060. Bowers, John W. (U Iowa) **Communication strategies in conflicts between institutions and their clients.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Discusses the nature of asymmetrical conflicts (e.g., those involving large, profit-making organizations and relatively powerless clients), the kinds of social control mechanisms available to both the clients and the company, and how these strategies of influence are likely to function in institution-client interactions. A 2-dimensional matrix of communication strategies which can be used to predict

the process of asymmetrical transactions based on 3 variables (perceived probability, reward, and cost) is applied to 2 actual conflicts.

3061. Buchli, Virginia & Pearce, W. Barnett. (Valley City State Coll) **Listening behavior in coorientational states.** *Journal of Communication*, 1974(Sum), Vol 24(3), 62-70.—Studied the factors accounting for differential listening performance using the coorientation model which combines interpersonal and intrapersonal factors of communication behavior. 117 students in a public speaking course served as Ss. Coorientational states were induced between Ss and the judges of 4 legal cases. Ss read the arguments in each case, and recorded their verdict and whether they expected the judge to agree or disagree with their verdict. Ss then listened to a recording of the judge's decision and his reasoning, wrote summaries of the judge's rationale, and were questioned on his statement. Ss were considered to have listened if they correctly identified whether a statement was contained in the judge's rationale. The hypothesis that Ss in different coorientational states would listen differently was confirmed. Those in the predicted-agreement-confirmed state listened less well than those in the other 3 states (predicted-agreement-disconfirmed, predicted-agreement-confirmed, and predicted-disagreement-disconfirmed). It is concluded that the poorest listening is done by those who are told beforehand that the speaker is endorsing a position they believe in. (25 ref)—P. Federman.

3062. Buck, Ross; Miller, Robert E. & Caul, William F. (U Connecticut) **Sex, personality, and physiological variables in the communication of affect via facial expression.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 587-596.—"Senders" viewed 25 emotionally loaded color slides. Their facial expressions were observed via a hidden television camera by "observers" who made judgments about the nature of each slide and the sender's reaction to it. A total of 64 undergraduates were arranged in 8 pairings each of females sending to male observers, females sending to females, males sending to males, and males sending to females. Statistically significant communication was demonstrated, with females being more accurate senders than males. More accurate senders tended to show a smaller skin conductance and heart rate response to the slides and a more "personal" verbal report of their emotional reaction to the slides. Several personality measures were related to communication accuracy and physiological responding (Byrne's Repression-Sensitization scale, Eysenck Personality Inventory Extraversion-Introversion scale, and the Janis and Field self-esteem scale). (18 ref)—*Journal abstract*.

3063. Caplan, David. (McGill U, Medical School, Montreal, Quebec, Canada) **A note on the abstract readings of verbs of perception.** *Cognition*, 1973, Vol 2(3), 269-277.—Describes the linguistic contexts in which certain verbs of perception assume an abstract rather than a concrete meaning. The class of verbs which permit such a reading is defined. This class can be related to neuroanatomical facts, which are themselves related to the human capacity for language. (French summary)

3064. Clynes, Manfred. **The biological basis for sharing emotion: The pure pulse of musical genius.** *Psychology Today*, 1974(Jul), Vol 8(2), 51-55.—Describes the use of "sentic," the scientific study of the communication of emotions, as a means of understanding emotions in music. Emotions are expressed precisely and can be measured. The patterns of the various emotions are identical among musicians, are constant across considerable time periods, and are universal. Sentic provides insights into the process of empathy, since performers must empathize with the emotions of the composer if they are to reproduce music.—E. J. Posavac.

3065. de Gerenday, Lynn. **Play, ritualization, and ambivalence in Julius Caesar.** *Literature & Psychology*, 1974, Vol 24(1), 24-33.—Discusses *Julius Caesar* as it demonstrates the nature of ambivalence. It is suggested, using Freud's interpretation of the play as a springboard, that rhetoric and ceremony, reinforced by an emphasis on play-acting, bind and distance intense love and hostility from conscious expression.

3066. Emanuel, Floyd W. & Smith, Wendell F. (U Oklahoma, Health Services Ctr, Oklahoma City) **Pitch effects on vowel roughness and spectral noise.** *Journal of Phonetics*, 1974(Jul), Vol 2(3), 247-253.—Results of tests with young adult Ss show that mean spectral noise level (SNL) and perceived roughness of the test phonations diminished significantly when vocal pitch was raised by an octave. Roughness ratings and SNL means were more closely related to the relative pitch at which the test phonations were produced than to the absolute fundamental frequency of phonation.

3067. Frentz, Thomas S. (U Southern California) **Toward a resolution of the generative semantics/classical theory controversy: A psycholinguistic analysis of metaphor.** *Quarterly Journal of Speech*, 1974(Apr), Vol 60(2), 125-133.—Tested 2 linguistic theories, the classical theory and generative semantics. 3 psycholinguistic models of metaphor were constructed. 160 undergraduates enrolled in speech courses judged 26 concepts derived from 2 metaphors, rating the concepts on semantic differential scales. 6 multiple regression analyses on the response data were performed, producing multiple correlation coefficients for each of the 3 models. For one of the metaphors, Model 1 predicted significantly better than either of the other models ( $p < .05$ ). Results provide preliminary behavioral support for generative semantics.—H. Ruja.

3068. Giles, Howard. (University Coll, Cardiff, Wales) **Communicative effectiveness as a function of accented speech.** *Speech Monographs*, 1973(Nov), Vol 40(4), 330-331.—Studied the effectiveness of regional accented speech in inducing attitude change. 250 high school students from 2 dialect areas were divided into 10 groups, matched for sex and initial attitude to capital punishment. Each group received 1 of 5 forms of an argument against capital punishment. The argument forms consisted of a taped speech in standard (prestigious) dialect, and 3 speeches in regional dialects of lesser degrees of prestige, all recorded by the same speaker, who kept rate and paralinguistic features constant. A 5th form was written. After stimulus presentation, Ss rated their attitude towards capital punishment, and also the quality of the argument they



had received. The perception of argument quality varied directly with accent prestige, but only the regional accents were effective in inducing attitude change. There were no interactions between Ss and message dialects.

—C. A. Sherrard.

3069. Gold, Bertram & Salkind, William. What do "top box" scores measure? *Journal of Advertising Research*, 1974(Apr), Vol 14(2), 19-23.—Analyses of results of 4 surveys show that ratings of discriminators in the top box (most favorable) indicate that the stimulus was rated more favorably than other stimuli and, by contrast, ratings of nondiscriminators in the top box reflect identical favorable ratings for all stimuli. Varying but significant proportions of nondiscriminator yeasayers contaminate validity of measurement, especially in monadic designs. It is suggested that control of nondiscriminator bias should result in more sensitive research.

—J. C. Franklin.

3070. Goldstein, Louis M. & Lackner, James R. (Brandeis U) Alterations of the phonetic coding of speech sounds during repetition. *Cognition*, 1973, Vol 2(3), 279-297.—Undergraduates who listened to a meaningless syllable that was continually repeated heard the syllable undergo a variety of changes over time. These changes were very systematic and represented alterations in the phonetic coding assigned to an unchanging sound stimulus. The changes appear to involve a reorganization of the phones constituting the syllables. (French summary) (17 ref)

3071. Grieve, Robert. (U St Andrews, Psychological Lab, Scotland) Definiteness in discourse. *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 365-372.—Attempted to relate definiteness to topicalization in 2 experiments with a total of 122 native English-speaking undergraduates. In an utterance with 2 nominals, there is a tendency to distinguish the nominals in the topic from the nominal in the comment by marking the former with *the* and the latter with *a*, for in discourse the speaker must presuppose of his listener knowledge of topic (the + noun) and ignorance of comment (a + noun). However, since this clearly assumes that use of *the* is related to knowledge, and *a* to lack of knowledge, the present study tested these assumptions. Results support the hypotheses.

—Journal abstract.

3072. Grinstein, Alexander. King Lear's impending death. *American Imago*, 1973(Sum), Vol 30(2), 121-141.

—Discusses Shakespeare's *King Lear* as a play that presents not only a man's own reaction to his impending death but also the reactions of his children. It is suggested that the psychological greatness of the play lies in the universality of this subject. (26 ref)—R. S. Albin.

3073. Hagenauer, Fedor & Hamilton, James W. (U Cincinnati, Medical School) "Straw Dogs": Aggression and violence in modern film. *American Imago*, 1973(Fal), Vol 30(3), 221-249.—Discusses some aspects of aggression and violence as presented in Sam Peckinpah's film "Straw Dogs." The adaptation of this film from a novel was made in such a way as to emphasize intrapsychic core conflicts of dependence, oral rage, separation-individuation, and passivity. A psychoanalytic approach to the material reveals definite patterns of highly overdetermined behavior with clearly identifiable genetic components. It offers a more complete understanding of

the story and a more thorough account of the impact of the film. Biographical data on the director is included. The role of violence in human evolution is discussed. (44 ref)—R. S. Albin.

3074. Hoffman, Nancy Y. (St John Fisher Coll) Franz Kafka: His father's son: A study in literary sexuality. *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(12), 1623-1626.—Analyzes Kafka's relationship with his father and the expressions of sexual impotence and anxiety that appear in his work. A 65-page letter written by Kafka to his father in 1919 is discussed in terms of problems in marriage, writing, and inferiority. The themes of father as killer, the crime of uninvolvedness, and victimization of the "little man" are examined in several of his works.

3075. Horvath, Frank S. (Michigan State U, School of Criminal Justice) Verbal and nonverbal clues to truth and deception during polygraph examinations. *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 138-152.—Conducted structured interviews with 50 verified truthful and 50 verified lying Ss who subsequently took polygraph tests. 14 questions in the pretest interview provided 3 types of behavioral information about each S: elicited verbal clues, spontaneous verbal clues, and nonverbal clues. Responses from the 2 types of Ss are compared in detail for each of the 3 types of behavior. Results show clearly that the verbal and nonverbal behavior of truthful polygraph Ss differs in significant observable respects from that of lying Ss. It is concluded that behavioral data can provide useful information to supplement polygraph findings in the ultimate diagnosis of truth or deception, but must be checked for agreement with other data.—R. S. Albin.

3076. Houston, Franklin S. & Weiss, Doyle L. (U Missouri, St Louis) An analysis of competitive market behavior. *Journal of Marketing Research*, 1974(May), Vol 11(2), 151-155.—Conducted an empirical study of the movement of competitive market shares. K. S. Palda's 1964 cumulative advertising model was modified to include a price variable and the analysis extended to a multibrand market. The statistical methodology, which recognizes the competitive interdependence of brands studied and uses this interdependence in its estimation procedures, is detailed, and results of its application to a low-cost food item are presented. Data confirm previous evidence that the influences of advertising effects on sales are cumulative over time.—L. Gorsey.

3077. Jacobson, Irving. (State U New York, Upstate Medical Ctr, Syracuse) The child as guilty witness. *Literature & Psychology*, 1974, Vol 24(1), 12-23.—Relates A. Miller's treatment of the child in "I Don't Need You Anymore" to psychologists' belief that a child frequently loses his sense of being at home in the world when he observes an event he feels he should not have seen. Such an action is followed by conflicts, evasions, and guilt. Specific support for the argument is derived from E. Erikson (1963) and E. Neumann (1964).

3078. Jeng, Chung-In; Lai, Mei-Wei & Liu, In-Mao. (National Taiwan U, Taipei, Republic of China) Category norms in Chinese and English from bilingual subjects. *Acta Psychologica Taiwanica*, 1973, Vol 15, 81-153.—Presents complete normative data (in Chinese with English translation) for responses to 54 verbal

categories by Chinese college students. All but 2 categories from US studies by B. H. Cohen et al (1957) and by W. F. Battig and W. E. Montague (1969) were included. Data include all responses given by each S to each category name within 60 sec, and English-word responses within 30 sec to each of 56 categories of norms presented in English.

3079. Kanungo, Rabindra N. & Pang, Sam. (McGill U, Montreal, Quebec, Canada) **Effects of human models on perceived product quality.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 172-178.—Studied the effects of human models in advertisements on the individual's perception of and attitude toward the product. 32 male and 32 female undergraduates were tested under 3 experimental and 1 control conditions for each of 4 different products (car, sofa, TV, and stereo). In the 3 experimental conditions a male, a female, and a male-female pair were used as models. In the control condition the product was presented without any model. Results reveal that the "fittingness" of the models for the product was an important variable in product advertisements. The implications of congruity theories for product advertisements are discussed.—*Journal abstract.*

3080. Kramer, Cheris. (U Illinois) **Women's speech: Separate but unequal?** *Quarterly Journal of Speech*, 1974(Feb), Vol 60(1), 14-24.—Describes a number of research studies of sex differences in speech, most of them inconclusive, and cites various beliefs regarding such differences, most of them folklore and stereotype. Hypotheses underlying these popular beliefs and requiring experimental investigation include: that men do not like women who talk "too much"; that women are more verbose than men, use different adjectives from men, and more frequently use the "tag-question" formation and leave sentences unfinished; that women's declarative sentences contain more qualifiers; that volume and pitch of their speech vary with the situation and the ratio of men and women present; that serious news is not expected from women and hence they are not acceptable as television and radio announcers; that women's speech has syntactic looseness; that their vocabulary is more limited and central; and that they have an "instinctive" shrinking from coarse expressions.—*H. Ruja.*

3081. Lefcowitz, Allan. (US Naval Academy) **Apology: a pro Roger Pryne: A psychological study.** *Literature & Psychology*, 1974, Vol 24(1), 34-44.—Asserts that in Hawthorne's *The Scarlet Letter*, (a) Chillingworth's apparent allegorical function in the novel masks his complex character and motivation, and his "plot" within the work; and (b) Chillingworth's actions reveal his role as an Oedipal child.

3082. Lehiste, Ilse & Meltzer, David. (Ohio State U) **Vowel and speaker identification in natural and synthetic speech.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 356-364.—Required 60 listeners with training in the phonetics to identify both the vowel and the sex of the speaker of 10 monophthongal American English vowels. These vowels were produced by a male speaker, a female speaker, and a child. Formant values were read from spectrograms made of these vowels and used for synthesizing the same 30 vowels on a Glace-Holmes synthesizer. A 3rd set of vowels was generated synthetically using formant and fundamental frequency values

reported by G. E. Peterson and H. L. Barney (see PA, Vol 26:6793). Overall speaker identification scores were higher than overall vowel identification scores for both normal speakers and vowels synthesized from measurements; for the Peterson-Barney set, the scores were approximately the same. The highest overall correct score was 88.3%, obtained for the normal male speaker; the lowest correct score was 31.0%, obtained for children's vowels synthesized from measurements.—*Journal abstract.*

3083. Leonard, Laurence B. (Memphis State U) **The roll of intonation in the recall of various linguistic stimuli.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 327-335.—Examined the effects of intonation on the recall of normal sentences, anomalous (grammatical but unmeaningful) sentences, anagram (ungrammatical but meaningful) strings, and word lists presented to 96 university speech students. Results indicate that intonation facilitated recall only in the anomalous sentence condition, suggesting that, in such learning situations, intonation may function as an additional component of grammar, rather than as an independent linguistic variable.—*Journal abstract.*

3084. Leroy, David J. & Smith, F. Leslie. (Florida State U) **Perceived ethicality of some TV news production techniques by a sample of Florida legislators.** *Speech Monographs*, 1973(Nov), Vol 40(4), 326-329.—Conducted a pilot study of ethical attitudes of politicians towards TV production techniques in news coverage. An 11-item questionnaire was constructed from class essays on ethicality in journalism by seniors majoring in humanities and mass communication. The questionnaire was sent to 153 members of the Florida legislature, with a response rate of 32% ( $N = 53$ ). Factor analysis of the responses revealed 2 principal factors in the evaluation of TV production techniques. Factor 1, Ethicality, was related particularly to the transposition of film footage in order to create pseudo-events. Factor 2, Judgmental Editing Decisions, mainly concerned film splicing which does not alter the internal statements of the respondent, and simplified narration substituted for complex original speeches. These procedures were not considered unethical. The principal influencing variable in judging ethicality seemed to be the editorial intention; where this appeared to be deceitful, unethicality was perceived.—*C. A. Sherrard.*

3085. MacKay, Donald G. (U California, Los Angeles) **Complexity in output systems: Evidence from behavioral hybrids.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 785-806.—The speech errors known as synonymic intrusions (e.g., "sotally," an inadvertent combination of initial word "solely" and sequel word "totally" in "He was sotally responsible for that") suggest that 2 or more words can be simultaneously activated, competing for the same position in a sentence. Statistical analysis of 257 such intrusions showed that the intruding word (or phrase) was simpler than the initial one at segment, syllabic, lexical, and 2 syntactic levels. A hierarchic model for the serial production of speech, and more generally for the study of other motor systems, is proposed. (16 ref)—*Journal abstract.*

3086. Marton, Katherin & Rohloff, Albert C. (Baruch Coll, City U New York) **Use one-interview studies with**



care. *Journal of Advertising Research*, 1974(Apr), Vol 14(2), 35-38. States that on-air studies of ad effectiveness with different levels of exposure require a pre-exposure interview and the recognition that the exposure groups are self-selecting. As a result these groups may differ substantially in predisposition to individual brands. It is also observed that single exposure on-air tests of commercials, using only a post interview, can yield different results when testing is done on different programs, or if the predisposition of the test audience increases over time.—J. C. Franklin.

3087. McEwen, William J. (U Connecticut, Communications Div) **Evaluating media campaigns: Using drug images to assess anti-drug abuse information.** *Drug Forum*, 1974(Spr), Vol 3(3), 283-293.—Reports results of a series of investigations aimed at identifying and assessing the major components of audience response to drug-relevant communications. Analysis of student reactions to antiabuse messages suggested a set of measures which provide sensitive indices of receiver perceptions of the message, the drug(s) discussed, and the type of drug user image depicted.

3088. Mortensen, C. David. (U Wisconsin, Madison) **A transactional paradigm of verbalized social conflict.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Describes the methodological substantive assumptions and propositions of a transactional paradigm of social conflict behavior. Behavioral requirements of such a paradigm are discussed (e.g., intensity, affect, and orientation), and an application of the paradigm to high and low conflict issues (the case of Lt. William Calley and the legalization of marijuana) is presented. (54 ref)

3089. Mulac, Anthony & Sherman, A. Robert. (U California, Lab for Quantitative Research in Speech, Santa Barbara) **Behavioral assessment of speech anxiety.** *Quarterly Journal of Speech*, 1974(Apr), Vol 60(2), 134-143.—Reports the development and evaluation of an instrument for the behavioral assessment of speech anxiety. From a preliminary list of 32 behavioral variables, a rating scale of 18 items was constructed. 12 graduate and undergraduate students majoring in speech or psychology received 3 hrs of training in assessing speech anxiety, after which they rated 4 1-min videotaped segments from 5 speeches delivered by 40 males at the beginning and end of a 10-wk introductory speech course. The raters assigned weights to the variables. Reliability of these weightings was measured by correlating them with weightings by expert judges ( $r = .89$ ). Reliability of the ratings of the speech segments was determined by the Ebel intra-class method ( $r = .95$ ). Validity was measured by correlating the total weighted scores assigned by the 12 judges with the overall anxiety scores assigned to the same speeches by 18 expert judges ( $r = .88$ ), by predicting progress in reducing anxiety and verifying the predictions ( $p < .03$ ), and by utilizing varimax rotation to produce an orthogonal factor structure. Factor analysis of the scores on the 18 variables generated 4 independent factors which accounted for 50.3% of the total variance: Rigidity, Inhibition, Disfluency, and Agitation.—H. Ruja.

3090. Neumarkt, Paul. Hartmann von Aue: The psychologism of a medieval poet. *American Imago*, 1973(Sum), Vol 30(2), 157-176.—Presents an analysis of Hartmann von Aue's work *Der arme Heinrich*. This is seen as a rite of passage steeped in the mind-consciousness of medieval surroundings. It is suggested that the hero's initial meeting with the peasant girl constitutes a sexual involvement. The hero's inner struggle is followed through the vicissitudes of psychic manifestations and is interpreted psychoanalytically.—R. S. Albin.

3091. Nichols, Harold & Smith, Raymond G. (Kansas State U) **Perception of intensional and extensional meaning domains in a semantic differential application.** *Speech Monographs*, 1973(Nov), Vol 40(4), 322-325.—Studied concept-scale and S-scale interaction in the semantic differential. 82 junior speech students rated 5 intensional and 5 extensional concepts on a battery of 15 intensional and 15 extensional semantic differential scales. An extra measurement was added to the usual semantic differential instrument so that Ss could indicate whether they were using each scale in an intensional or an extensional manner. Results support previous findings that Ss have more difficulty rating scale-concept pairs with mixed than with matched meaning domains, and indicate considerable S-scale interaction in the measuring instrument.—*Journal abstract*.

3092. Norris, Margot C. (U Tulsa) **The language of dream in *Finnegans Wake*.** *Literature & Psychology*, 1974, Vol 24(1), 4-11.—Uses Freudian dream theory to support the argument that the complicated language in J. Joyce's *Finnegans Wake* is a deliberate attempt to replicate the intricate processes of translating an unconscious phenomenon to a conscious one. Further support is drawn from linguistic theory, which suggests that conscious language is frequently inadequate for relating some human experiences.

3093. O'Neil, Harold F.; Walker, Mary E. & Judd, Wilson A. (U Texas, Computer-Assisted Instruction Lab, Austin) **Feasibility and utility of an on-line information communication system in a research and developmental management and planning environment.** *US AFHRL Technical Report*, 1974(Jul), No 74-51, 64 p.—Presents an interim report which (a) documents a thorough review of the literature on the implementation and evaluation of on-line data management systems, (b) analyzes methods currently used by the Air Force Human Resources Laboratory (AFHRL) for processing management and planning information, (c) analyzes the information needs of a designated subgroup of AFHRL, and (d) develops implementation and evaluation strategies and demonstrates their feasibility.—*Journal abstract*.

3094. Page, William D. (U Chicago) **Are we beginning to understand oral reading?** *Reading World*, 1974(Mar), Vol 13(3), 161-170.—Describes 2 types of oral reading responses that can be identified by a speaker of English—pseudo-reading, the direct internalization of information into oral responses without determining what the information means, and meaningful oral reading, the transformation of the internal sentence into deep structures. Deep structure includes whatever is required for the semantic interpretation of a sentence. The oral reading error, or miscue, is discussed.—R. S. Albin.

3095. **Parker, Frank.** (Purdue U) **The coarticulation of vowels and stop consonants.** *Journal of Phonetics*, 1974(Jul), Vol 2(3), 211-221.—In a discussion of the properties of English stop consonants, it is noted that the length of the preceding vowel has been posited as the most significant perceptual cue. It is proposed, however, that the perceptual cue correlating with the phonological feature for determining the voice value of stops in postvocalic position is directly linked to the manner of termination of the preceding vowel. (15 ref)

3096. **Pease, Kenneth & Arnold, Paul.** (U Manchester, England) **Approximations to dialogue.** *American Journal of Psychology*, 1973(Dec), Vol 86(4), 769-776.—In an attempt to assess the role of contextual constraints in dialog, a method similar to that of G. Miller and J. A. Selfridge (1950) was used to produce "approximations to dialog." Ss were a total of 69 college students and staff. Ss who had been given a description of the social situation of a conversation and 2-3 utterances as context produced approximations to dialog that were judged by other Ss as more plausible than approximations produced with less context, but not as less plausible than approximations with more context supplied.—*Journal abstract.*

3097. **Pohlman, Alan & Mudd, Samuel.** (Gettysburg Coll, Smoke Psychological Lab) **Market image as a function of consumer group and product type: A quantitative approach.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 167-171.—67 undergraduates and 24 adult men rated approximately 30 brands of each of 3 product types (automobiles, beers, and magazines) for "classiness" on a 9-point graphic scale. Medians and semi-interquartile range values of the rating distributions were calculated for each brand item. These statistics varied systematically as a function of product type and consumer group. Familiarity was correlated significantly with some dimensions of the class-rating distributions.—*Journal abstract.*

3098. **Reed, Michael D.** (U Oregon) **Morris' "Rapunzel" as an Oedipal fantasy.** *American Imago*, 1973(Fal), Vol 30(3), 313-322.—Presents an interpretation of the poem "Rapunzel" by William Morris that views the work as a rite of passage. Themes of love and incest are discussed in relationship to the Victorian times during which the poem was produced.

3099. **Rosnow, Ralph L.** (Temple U) **On rumor.** *Journal of Communication*, 1974(Sum), Vol 24(3), 26-38.—Attempts to define and classify rumor. Rumor is a communication process that is easily started but difficult to stop and constructed around inauthentic information. Several schemes have been used to categorize rumor, including the idea of rumor as pipe dreams (i.e., expressing one's hopes by wishful thinking), logic (i.e., deriving from fears and anxieties), and wedge-driving (i.e., dividing groups and destroying loyalties, with the motivation being aggression and hatred). Rumor-mongering is theorized and conceptualized from sociological, psychoanalytic, and social-psychological views. (84 ref) —*P. Federman.*

3100. **Savitsky, Jeffrey C. & Sim, Marguerite E.** (Purdue U) **Trading emotions: Equity theory of reward and punishment.** *Journal of Communication*, 1974(Sum), Vol 24(3), 140-147.—Examined the nonverbal communi-

cation of a defendant's emotional state (vocal tones, body gestures, and facial expressions). 8 videotapes were used in 2 experiments; each was of a Caucasian male relating to details of a crime while portraying one of the following emotional states: angry, happy, sad and distressed, and neutral. 86 male and 106 female undergraduates rated the severity of a crime on a 7-point bipolar scale of severity. Results indicate that anger elicited more negative evaluations than did the other emotional states; evaluations given to the happy state were more negative than those directed at the sad or emotionally neutral actors. Ss also rated the videotaped person for likeability on a 7-point scale—angry actors were rated least likeable and happy actors were less likeable than neutral actors.—*P. Federman.*

3101. **Sawusch, James R. & Pisoni, David B.** (Indiana U) **On the identification of place and voicing features in synthetic stop consonants.** *Journal of Phonetics*, 1974(Jul), Vol 2(3), 181-194.—Used 2 models of the interaction of phonetic features in speech perception to predict 24 undergraduates' (native speakers of American English) identification functions for a bidimensional series of synthetic consonant-vowel syllables. The stimuli varied systematically in terms of the acoustic cues underlying the features of place of articulation and voicing. Model I assumed the additivity of phonetic features and their independent processing in perception. Model II assumed that the phonetic features interact and are not processed independently. The fit of Model II to the bidimensional series data was better than the fit of Model I, suggesting that the phonetic features of place and voicing in stop consonants are not processed independently but rather show a mutual dependency on each other. (18 ref)—*Journal abstract.*

3102. **Schwartz, Murray M.** (State U New York, Buffalo) **Leontes' jealousy in *The Winter's Tale*.** *American Imago*, 1973(Fal), Vol 30(3), 250-273.—Discusses the motives underlying Leontes' jealousy in Shakespeare's play *The Winter's Tale*. In the play, no external explanation of this jealousy is provided, and it is suggested that this is an attempt to dramatize jealousy whose motivation is embodied in the structure of linguistic and personal relationships acted out on the stage and in our minds. The literature analyzing this play from this viewpoint is discussed. The play itself, the characters, and their motivations are discussed in detail. It is concluded that Leontes' jealousy is not at all motiveless but is the manifestation of processes such as paranoia and suspicion.—*R. S. Albin.*

3103. **Settle, Robert B. & Golden, Linda L.** (California State U) **Attribution theory and advertiser credibility.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 181-185.—Measured consumer confidence in advertising claims and their expectations of product value under 2 conditions. 120 undergraduates completed a 3-part questionnaire on which they rated the importance of product characteristics depicted in 5 advertisements for each of 5 products (ballpoint pen, wrist watch, blender, camera, and clock radio). Some of the ads for each product claimed superiority for the advertised brand on all 5 product features mentioned, and some claimed superiority for only 3 of the 5 (superiority was disclaimed for 2 features thought to be of least importance to the



consumer). As predicted by attribution theory, when superiority was disclaimed for some product characteristics, confidence increased and value expectations equaled that obtained when all were claimed superior.—*L. Gorsey.*

3104. Sigurd, Bengt. (U Stockholm, Inst of Linguistics, Sweden) **Maximum rate and minimal duration of repeated syllables.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 373-395.—A simple pilot experiment with strings of open syllables such as /tatata . . . /, /stastasta . . . /, and /strastrastra . . . / was carried out with 4 American, 2 British, 1 German, 1 Swedish, and 1 Korean linguist to determine how fast the syllables could be repeated. Differences in the results were interpreted as being due to individual differences in motor skills and to differences in the phonetic material of the syllables. 2 simple mathematical models were derived to predict the data. One model predicted repetition rate from assumed inherent durational values of the consonants involved. A correction factor was established to compensate for the difference between observed and predicted values. This factor seems to depend on difficulties in coordinating articulatory movements. Some hypotheses and speculations concerning the connection between the results and the phonological structure of languages are advanced. (18 ref)—*Journal abstract.*

3105. Sloane, Eugene H. Coleridge's *Kubla Khan: The living catacombs of the mind.* *American Imago*, 1972(Sum), Vol 29(2), 97-122.—Presents the hypothesis that Coleridge's *Kubla Khan* is an elaborate development of a birth dream. Theories about birth dreams are described with particular reference to the meaning of the poem.

3106. Solomon, Maynard. **Freud's father on the Acropolis.** *American Imago*, 1973(Sum), Vol 30(2), 142-156.—Presents an analysis of Freud's 1936 letter to Romain Rolland, "A disturbance of memory on the Acropolis." The letter is seen as having given access to the entire range of Freud's fantasy life. The oedipal and pre-oedipal ideas are interpreted, along with the feminine-homosexual aspects of the letter. It is suggested that Freud's emotional estrangement on the Acropolis arose from the revival of an early fantasy of pederastic sexual satisfaction by the father. (41 ref)—*R. S. Albin.*

3107. Spiegel, John & Machotka, Pavel. (Brandeis U) **Messages of the body.** New York, NY: Free Press, 1974. xxiv, 440 p. \$17.95.—Presents a scientific study of body language and draws on behavioral science and the visual arts to outline a new theory of nonverbal communication. Experimental data is included to support the theory. (12 p ref)

3108. Steinfatt, Thomas M. & Miller, Gerald R. (Queens Coll, City U New York) **Communication in game theoretic models of conflict.** In G. R. Miller & H. W. Simons (Eds), *Perspectives on communication in social conflict.* Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.—Discusses the concept of conflict and describes the rationale, methodology, terminology, and recent studies of game theory in conflict situations. Strategies of players in game-theoretic conflict situations, the role of communication in game models of conflict, high and low payoffs as real and imaginary rewards, and 2 recent

studies on the effects of communication on game-playing behavior are examined. (4 p ref)

3109. Sternglanz, Sarah H. & Serbin, Lisa A. (U New York, Stony Brook) **Sex role stereotyping in children's television programs.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 710-715.—Conducted an observational analysis of the male and female role models presented on 10 popular commercially produced children's TV programs. Striking sex differences ( $p < .001$ ) were found both in the number of male and female roles portrayed (more than twice as many male roles) and in the behaviors which were emitted by male and female characters. For example, males were more often portrayed as aggressive and constructive (e.g. building and planning) than females, while females were more likely to be shown as deferent. In addition, the consequences that males and females received for emitting behavior were different, with males more often being rewarded and females more often receiving no consequence. An exception to this was that females were more often punished for high levels of activity than were males. Implications of these models for stereotyped sex role development are discussed.—*Journal abstract.*

3110. Studdert-Kennedy, Michael & Hadding, Kerstin. (Haskins Lab, New Haven, CT) **Auditory and linguistic processes in the perception of intonation contours.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 293-313.—Systematically varied the fundamental-frequency contour of a 700-msec vocoded utterance, "November," to produce 72 contours, different in fundamental frequency at the stress and over the terminal glide. 22 Swedish and 16 American graduate and undergraduate students classified (a) speech and sine-wave contours as either terminally rising or terminally falling (psychophysical judgments) and (b) speech contours as questions or statements (linguistic judgments). For both groups, 2 factors acted in complementary relation to govern linguistic judgments: perceived terminal glide and fundamental frequency at the stress. Ss tended to classify contours with an apparent terminal rise and/or high stress as questions and contours with an apparent terminal fall and/or low stress as statements. For both speech and sine waves, psychophysical judgments of terminal glide were influenced by earlier sections of the contour, but the effects were reduced for sine-wave contours, and there were several instances in which speech psychophysical judgments followed the linguistic more closely than the sine-wave judgments. It is suggested that these instances may reflect the control exerted by linguistic decision over perceived auditory shape. (35 ref)—*Journal abstract.*

3111. Tholey, Paul. [Zur Einzel- und Gruppenleistung unter eingeschränkten Kommunikationsbedingungen. (Individual and group performance under limited conditions of communication.)] (Germ) Frankfurt-on-Main, W Germany: Waldemar Kramer, 1973. 226 p.

3112. Tomasi, Barbara R. (State U New York, Buffalo) **The fraternal theme in Joyce's *Ulysses*.** *American Imago*, 1973(Sum), Vol 30(2), 177-191.—Delineates the atmosphere of rivalry that permeates *Ulysses*. This atmosphere is seen as the inevitable outcome of the fatherless situation, whether it is the fatherless household or the fatherless society. Freud's interpretation of *Ulysses*

is discussed and criticized. The large number of children in the Irish family could account for a shift of oedipal hostility from the father to the brothers who require so much of the mother's attention.—*R. S. Albin.*

3113. Wind, Yoram & Denny, Joseph. (U Pennsylvania, Wharton School) **Multivariate analysis of variance in research on the effectiveness of TV commercials.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 136-142.—Proposes that multivariate analysis of variance and covariance is a potentially useful approach to marketing experimentation, including on-air TV commercial testing involving a number of response variables. An illustration of the use of these statistical techniques in consumer evaluation of a commercial is presented, and advertising and marketing applications are examined.

3114. Wright, Patricia & Reid, Fraser. (Medical Research Council, Applied Psychology Unit, Cambridge, England) **Written information: Some alternatives to prose for expressing the outcomes of complex contingencies.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 160-166.—68 adults solved problems using information written either as (a) bureaucratic-style prose, (b) a flow chart or algorithm, (c) a list of short sentences, or (d) a 2-dimensional table. Prose was always slower to use and more error-prone than other versions, but error on nonprose formats was affected by problem difficulty. Easier problems resulted in no differential error-rates, although the table was used most rapidly; for harder problems, the algorithm gave fewest errors. Differences in retention strategies appeared when Ss worked from memory—performance with prose and short sentences continued to improve over trials, whereas performance with the algorithm and table deteriorated. It is concluded that the optimal format for written information depends on conditions of use. (15 ref)—*Journal abstract.*

3115. Zeligs, Dorothy F. **Moses and pharaoh: A psychoanalytic study of their encounter.** *American Imago*, 1973(Sum), Vol 30(2), 192-220.—Presents a psychoanalytic interpretation of Moses's contradictory image: that of a man beyond the realm of the mortal yet of human origins and with human failings. A conflict between these 2 forces within the psyche of Moses is exposed. On the one hand, there was the wish for omnipotence while on the other hand, there were deep and painful feelings of inadequacy. This struggle is expressed repeatedly in the Bible. Early indications of conflict, the trauma of failure, the 10 plagues, the flight, and the psychodynamics of these situations are all discussed. (41 ref)—*R. S. Albin.*

3116. Zillman, Dolf & Bryant, Jennings. (Indiana U) **Retaliatory equity as a factor in humor appreciation.** *Journal of Experimental Social Psychology*, 1974(Sep), Vol 10(5), 480-488.—Manipulated squelches (i.e., cleverly stated retorts), depicting a protagonist who is provoked and who then retaliates against his provoker, to effect a variation in the degree of retaliation achieved: extreme underretaliation, underretaliation, fair retaliation, overretaliation, and extreme overretaliation. It was hypothesized that retaliatory equity (i.e., a situation in which the negative consequences inflicted upon the provoker by the retaliator are of a similar magnitude to the negative consequences initially inflicted upon the retaliator) constitutes an optimal condition for mirth, and that both

types of retaliatory inequity, under- and overretaliation, impair humor appreciation in proportion to the magnitude of the resultant inequity. Data from 215 undergraduates who rated the humor of unmanipulated jokes and cartoons and 6 manipulated squelches confirm the hypotheses.—*Journal abstract.*

## PERSONALITY

3117. Allen, Jon G. & Hamsher, J. Herbert. (Northern Illinois U) **The development and validation of a test of emotional styles.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 663-668.—Developed the Test of Emotional Styles based on 3 dimensions of emotionality: responsiveness (intensity of affect), expressiveness (interpersonal communication of affect), and orientation (attitudes toward emotion). 3 measures of these dimensions (incomplete sentences, true-false, and forced choice) were analyzed in a multitrait-multimethod matrix. Construct validity was established by correlations with peer ratings of emotionality, experimentally induced affect, the Marlowe-Crowne Social Desirability scale, the Rotter Incomplete Sentences Blank, and the Mosher Forced-Choice Guilt Inventory. There was substantial support for convergent and discriminant validity, and the measures were unconfounded with adjustment or social desirability. Females scored significantly higher than males on all dimensions in a sample of 120 undergraduates. (23 ref)—*Journal abstract.*

3118. Block, Jack; Block, Jeanne H. & Harrington, David M. (U California, Berkeley) **Some misgivings about the Matching Familiar Figures Test as a measure of reflection-impulsivity.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 611-632.—Argues that a discrepancy exists between J. Kagan's conceptualization of reflection-impulsivity and his operationalization of reflection-impulsivity using the Matching Familiar Figures Test (MFF). A review of the literature reveals little clear evidence for the reflection-impulsivity interpretation of MFF performance. A study with 100 children is reported in which the separate contributions of latency and accuracy were evaluated. Results indicate that accuracy had important personality concomitants; latency was inconsequential. Fast-Inaccurate children were anxious, hypersensitive, vulnerable, and structure-seeking; they were not impulsive, minimally concerned, and unanxious as conjectured by Kagan. Some implications of the study are drawn. (55 ref)—*Journal abstract.*

3119. Cacciaguerra, Francesco. **[Sensibilità e autoscienza nella pubertà. (Sensitivity and self-awareness in puberty.)]** (Ital) Milano, Italia: U Cattolica del Sacro Cuore, 1972. viii, 210 p.

3120. Calhoun, Lawrence G.; Cheney, Thomas & Dawes, A. Stephen. (U North Carolina, Charlotte) **Locus of control, self-reported depression, and perceived causes of depression.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 736.—Administered Rotter's Internal-External Control Scale, the Zung Self-Rating Depression Scale, the Depressive Adjective Checklist, and a questionnaire on the internal vs external causes of depression to 81 undergraduates. Although no significant correlations between the measures of depres-



sion and the checklist of perceived causes were found, data indicate a trend for females to hold themselves more responsible for unhappy moods than males.

3121. Carmer, James C. & Rouzer, David L. (Georgia State U) **Healthy functioning from the Gestalt perspective.** *Counseling Psychologist*, 1974, Vol 4(4), 20-23. —Proposes that mental health does not come from outer security but emanates from inner faith. The personality can be understood only in terms of the whole. Needs must be met in order to maintain evenness and balance. The job of the therapist is to promote awareness so that the client is conscious of his needs. The healthy individual knows himself realistically and is able to identify and reject destructive identifications and alienations. Aggression, in this view, can be beneficial and supportive.—H. Silverman.

3122. Diamond, Michael J. et al. (U Hawaii) **An alternative approach to personality correlates of hypnotizability: Hypnosis-specific mediational attitudes.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 346-353.—In an attempt to overcome the limitations of employing general personality traits to predict hypnotic performance, the present study compared the predictive validity of 2 hypnosis-specific mediational attitudes with a general personality trait (internal-external locus of control). 2 new hypnosis-specific constructs were developed and termed "desirability of hypnosis" and "locus of control in hypnosis." Desirability of hypnosis attitudes significantly predicted hypnotic susceptibility ( $p < .001$ ) of 110 male undergraduate psychology students. There was no relationship between susceptibility and either of the 2 locus-of-control variables. Results are discussed in relation to the social-learning approaches to personality and, in particular, with respect to hypnosis. Attitudes concerning the desirability of hypnosis are considered for modifying hypnotizability. (German, French, & Spanish summaries) (16 ref)—*Journal abstract*.

3123. Ellseo, Thomas S. (Swedish-American Hosp, Rockford, IL) **The hypnotic induction profile and hypnotic susceptibility.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 320-326.—The Hypnotic Induction Profile and the Harvard Group Scale of Hypnotic Susceptibility, Form A were compared using 47 18-22 yr old female nursing students. A significant positive relationship between these 2 scales was found. The eye-roll, which is the ability to roll one's eyes upward and slowly close the lids, was also compared to the Harvard Group Scale of Hypnotic Susceptibility and was not related to it. Results suggest the possibility of using the Hypnotic Induction Profile, which takes only 5-10 min to perform, for rapid screening of experimental Ss and possibly of patients. (German, French, & Spanish summaries)—*Journal abstract*.

3124. Fagan, Joen. (Georgia State U) **Personality theory and psychotherapy.** *Counseling Psychologist*, 1974, Vol 4(4), 4-7.—Discusses theories of personality, on which governments and social systems are based. In psychology, the many branches of personality theory are integrated, but the difficulty of subjecting personality theory to laboratory control puts it outside the realm of scientific measurement. Freud is considered an example of biologically oriented personality theory. Adler's is

socially oriented; O. Rank's is based on self-emphasis. G. Allport represents the eclectics, and H. J. Eysenck the experimentalists. It is not possible to develop an adequate theory of personality, for in order to do so, the theorist would have to transcend his own inner and environmental limitations.—H. Silverman.

3125. Faschingbauer, Thomas R. (Duke U, Medical Ctr, Highland Hosp Div, Asheville) **A 166-item written short form of the group MMPI: The FAM.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 645-655.—Describes the 166-item Faschingbauer Abbreviated Minnesota Multiphasic Personality Inventory (FAM) which was developed using cluster analysis and compared to the MMPI and other short forms. Median reliabilities of .88 for 146 Ss (1 day apart) and .77 for 50 Ss (1 wk apart) as well as median validities of .91 for 399 Ss (in context) and .76 for 119 Ss (1 day apart) were found. All Ss were either normal undergraduates or psychiatric inpatients. On code-type correspondence, configural classifications, profile validities, and scale elevations, the FAM compared favorably to a retest MMPI. Differences in context, obvious, and true items were minimal. The FAM retains the usual 13 scales and 47% of the critical items and showed itself superior to the other short forms in most respects. (37 ref)—*Journal abstract*.

3126. Ghabrial, Talaat M. (Ain Shams U, Cairo, Egypt) **Some characteristics of level of aspiration at university students.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 16-19.—Examined the concept of "level of aspiration," which has enjoyed a revival as a basic element in cognitive theory. The Zeigarnik effect was studied for the purpose of creating ego-involvement situations. Ss were 100 Egyptian students, of whom 41% showed "adequate" reactions to success or failure, 32% showed an "impulsive" level of aspiration, and 27% showed a "cautious" level of aspiration. (45 ref)—R. D. Nance.

3127. Glass, David C.; Snyder, Melvin L. & Hollis, Jack F. (U Texas, Austin) **Time urgency and the Type A coronary-prone behavior pattern.** *Journal of Applied Social Psychology*, 1974(Apr-Jun), Vol 4(2), 125-140.—Conducted 2 experiments with a total of 71 male undergraduates to examine behavioral consequences of a sense of time urgency, which presumably characterizes individuals classified as manifesting a "Type A" coronary-prone behavior pattern. Exp I indicated that time-urgent Type A Ss were reliably less successful than noncoronary-prone "Type Bs" in performing a task requiring a low rate of response for reinforcement (DRL). Type As were not only unable to delay their responses, but also showed greater evidence of tension and hyperactivity than Type Bs during DRL performance. Exp II extended these results to the interpersonal domain. Time-urgent Ss became more impatient and irritated than less urgent Ss when both types were systematically slowed down in their efforts to reach a solution on a joint decision-making task. Results are discussed in terms of a conceptualization of the A-B dimension as reflecting differential expectations of and needs for environmental control. (24 ref)—*Journal abstract*.

3128. Goldin, George J.; Perry, Sally L.; Margolin, Reuben J. & Stotsky, Bernard A. (Northeastern U) **Dependency and its implications for rehabilitation.** (Rev ed). Lexington, MA: D. C. Heath, 1972. xi, 139 p.—Discusses the sociological and psychological aspects of dependency and its implications for rehabilitation theory and practice. Topics include psychoanalytic, sociocultural, and developmental theories of dependency; behavioral manifestations of dependency (e.g., social, financial, psychomedical, and institutional); dependency in the nonhandicapped; the differentiation concept in field dependence; and rehabilitation of the dependent client. (18 p ref)

3129. Halpin, W. Gerald; Payne, David A. & Ellett, Chad D. (U Montana) **In search of the creative personality among gifted groups.** *Gifted Child Quarterly*, 1974(Spr), Vol 18(1), 31-33.—Administered the What Kind of Person Are You? Test (E. P. Torrance and J. Khatena, 1970) to 360 gifted high school students in 8 academic and artistic areas. Creative personality scores were highest for the social science, art, and science groups, lowest for music and foreign language groups.

3130. Hamburg, David A. (Stanford U, Medical School) **Coping behavior in life-threatening circumstances.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 13-25.—Summarizes information on human coping behavior under stress and suggests the potential use of such information in the practice of medicine. Studies are discussed which deal with situations of life-threatening illness and injury (severe burns, severe poliomyelitis, and childhood leukemia). Study of parents of leukemic patients elucidated reactions similar to those observed in studies of burn and polio patients. Coping strategies useful to persons of various ages, both sexes, and different socioeconomic backgrounds in facing a variety of tasks in several stressful situations of life-threatening significance are described. (26 ref)—*Journal abstract*.

3131. Handel, Amos. (U Haifa, Israel) **Cognitive styles among adolescents in Israel.** *International Journal of Psychology*, 1973, Vol 8(4), 255-267.—Administered tests of cognitive skill and personality, and variations of the rod-and-frame series (RFS) and the Hidden Figures Test (HFT) to 557 male students in Grades 7-11. All groups had about the same mean WISC score (approximately 114) and the same variances. Scores on personality scales of neuroticism, extraversion, and internal control were not related to measures of field dependence. Correlation between the RFS and HFT in the total sample indicates that the 2 tests shared only 13% of their variance. While a developmental trend, showing progressive increase in field independence, occurred with advancing age, a parallel trend also applied to personality dimensions reflected in the Q-adjustment score and in the Life scale, tests conceptually independent of the field-dependence construct. 17 of 60 Q-sort items correlated significantly with 1 or both measures of field dependence; field-independent adolescents presented a self-image of self-confidence, self-assertiveness, self-reliance, and self-centeredness, while field-dependent adolescents showed higher needs for succorance and nurturance. Findings call into question the empirical equivalence of the rod-and-frame test and the HFT and

the usual explanation of the source of common variance between these measures and tests of ability. (French summary) (68 ref)—*E. A. Gavin*.

3132. Harris, Darrel E. & Brown, Timothy R. (Resthaven Psychiatric Hosp & Community Mental Health Ctr, Los Angeles, CA) **Relationship of the community adaptation schedule and the personal orientation inventory: Two measures of positive mental health.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 111-118.—Studied the relationship between Community Adaptation Schedule (CAS) and the Personal Orientation Inventory (POI), 2 conceptually different measures of positive mental health. Both the CAS and POI were administered to 40 female applicants to a paraprofessional training program for mental health workers. Results suggest a positive relationship between the CAS and POI and support their interdependence as measures of positive mental health. The relationships of the CAS and POI to the Marlowe-Crowne Social Desirability scale are discussed.—*Journal abstract*.

3133. Harvey, John H.; Barnes, Richard D.; Sperry, Dwight L. & Harris, Ben. (Vanderbilt U) **Perceived choice as a function of internal-external locus of control.** *Journal of Personality*, 1974(Sep), Vol 42(3), 437-452.—Selected a total of 50 internal and 50 external undergraduates on the basis of Rotter's Internal-External Control Scale scores. In Exp I Ss chose between options which were either positive or negative in valence. Internals perceived much greater choice when the options were positive in valence than when they were negative, but externals exhibited this tendency to a much lesser degree. Although it was predicted that internals would perceive more choice than externals irrespective of valence, this effect was found only when the options were positive in valence. In Exp II Ss chose between options which were either similar, dissimilar, or identical in attractiveness. As predicted, internals perceived much greater choice when the options were similar in attractiveness, but externals exhibited this tendency to a lesser degree. Results are discussed in terms of (a) a differential sensitivity of internals and externals in their perception of choice as a function of characteristics of the choice options and (b) the possibility of a general tendency for internals to perceive more choice than externals.—*Journal summary*.

3134. Hayashi, Tamotsu; Yamauchi, Hirotsugu & Sudo, Wataru. [The effect of experimental arousal of achievement motivation on imaginative stories.] (Jpn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 179-183.—After viewing 5 Thematic Apperception Test pictures, 232 elementary school children were asked to write imaginary stories under a neutral situation. 2 mo later Ss were divided into aroused and neutral groups. The aroused group was asked to write stories under an aroused situation; the neutral group wrote them under a neutral situation. The difference between the 2 groups was not significant; however, the direction of change was as expected.—*S. Choe*.

3135. Hedberg, Allan G. (St Vincent's Hosp, Los Angeles, CA) **The effect of certain examiner and subject characteristics on responsiveness to suggestion.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 354-364.—Assessed (a) those



behavioral characteristics which determine an individual's ability to induce suggestion in others and (b) the relationship between susceptibility to suggestions and the traits of neuroticism and extroversion. Ss were 160 female university students classified as neurotic-extrovert, neurotic-introvert, stable-extrovert, or stable-introvert by Eysenck Personality Inventory scores. A role-playing technique was employed to facilitate the study of the effect of E-behavior on suggestivity. Findings demonstrate that susceptibility to suggestion is a function of E-behavior and S's personality traits. Results further support the position that primary and secondary suggestibility may not be unitary factors as generally thought. It is concluded that role playing is a valuable method by which to study the influence of E-behavior. (German, French, & Spanish summaries) (24 ref) —*Journal abstract*.

3136. Heilbrun, Alfred B.; Kleemeier, Carol & Piccola, Gary. (Emory U) **Developmental and situational correlates of achievement behavior in college females.** *Journal of Personality*, 1974(Sep), Vol 42(3), 420-436. —Tested the hypothesis that females with a male sex-gender identification, as defined by perceived similarity to their fathers, will experience motivation problems in direct competition with males. Possible patterns of relationship between sex-gender identification, several role variables, achievement motivation variables, and achievement behavior were explored with 51 female and 35 male undergraduates. Males and females were separately administered a battery of measures—including a rank ordering of 20 self-descriptive adjectives, the Masculinity-Femininity and Achievement scales of the Adjective Check List, verbal-lead stories to be completed by the S, and 2 parallel forms of a digit-symbol task modeled after a WAIS subtest—with different instructions to males and females designed to create competition. From analysis of the data, 2 major conclusions are drawn: (a) a greater number of and more complex relationships emerged for females than for males in examining developmental, social role, and achievement variables; and (b) distinct achievement patterns for the females were found more among those who perceived themselves similar to their fathers than among those who did not. (21 ref)—*B. McLean*.

3137. Hobi, Viktor & Klär, Albrecht. (U Basel, Psychiatric Clinic, Switzerland) **[A combined factor analysis of the MMPI, FPI and 16-PF.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 1(2), 27-48. —Examined the test results of 100 normal juveniles, 50 juvenile and 80 adult toxic psychosis patients who were administered the Saarbrücken MMPI, the Cattell 16 Personality Factors (16 PF), and the Freiburg Personal Inventory (FPI). Factor analysis and varimax rotation of the raw scores on scale level identified 7 factors: (1) clinical-neurotic complaints; (2) extra- vs introversion; (3) openness and assertion vs dissimulation tendencies; (4) emotional integration vs neurotic tensions; (5) moody-suggestible vs suspicious-dogmatic attitude; (6) emotional vs rational behavior control; and (7) dependent vs independent opinion forming. The 16 PF loaded on all factors except 5 but produced few clinical results. The FPI loaded on Factors 1-5 and provided useful clinical differentiation. The MMPI loaded on Factors 1, 2, 3, 5,

and 6 with the main emphasis on clinical factors, but did not attain a separation into symptom-oriented complexes. Results of the study are analyzed in detail and the possibilities of reducing the 3 inventories to the relevant scales are discussed. (English summary) (31 ref)—*T. Fisher*.

3138. Holland, Norman N. (State U New York, Ctr for the Psychological Study of the Arts, Buffalo) **Defence, displacement and the ego's algebra.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 247-257. —Describes an algebra that formalizes the terms of clinical experience. Projection, repression, denial, regression, reaction formation, reversal, incorporation, introjection, identification, sublimation, and splitting are all discussed. The algebra is explained with particular reference to the phenomenon of displacement. 4 kinds of displacement are cited: one based on verbal representations, another on likeness and attitudinal differences, another through physical similarity built on perceptions, and another on motility. A topographic model of these categories is presented. (21 ref)—*R. S. Albin*.

3139. Kazdin, Alan E. (Pennsylvania State U) **Reactive self-monitoring: The effects of response desirability, goal setting, and feedback.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 704-716. —Examined the reactive effect of self-monitoring in 3 experiments with a total of 250 undergraduates. In each experiment, performance on a sentence-construction task, the dependent measure, was determined immediately before and after the experimental manipulations were presented. Exp I evaluated the effect of valence or social desirability of the behavior and self-monitoring and being observed by another person; and Exp III replicated the effect of performance standard and also evaluated the role of response feedback. Results indicate that (a) self-monitoring was reactive, (b) the valence given to the target response determined the direction of behavior change, (c) self-monitoring and response valence were necessary but not sufficient conditions for behavior change, (d) monitoring one's own behavior or being monitored by someone else were equally reactive, (e) providing a performance goal or feedback augmented the reactive effects of self-monitoring, and (f) the act of self-recording led to behavior change. (33 ref)—*Journal abstract*.

3140. King, Donald L. & Lummis, Guy. (Howard U) **Effects of visual sensory-restriction and recent experience with the imagined stimulus on a suggestibility measure.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 239-248. —Of 80 female undergraduate Ss, those who were requested to imagine that an extended arm was heavy and falling while exposed to visual sensory-restriction exhibited a greater arm-drop than Ss given the same request and permitted normal vision. Since visual sensory-restriction should increase imagery, this result supports extant correlational research suggesting that vividness of imagery and condition employed to promote imagery, recent exposure to the stimulus to be imagined, did not increase arm-drop. (French summary) (23 ref)—*Journal abstract*.

3141. Ko, Yung-Ho. (National Taiwan U, Taipei, Republic of China) **Birth order and psychological needs.**

*Acta Psychologica Taiwanica*, 1973, Vol 15, 68-80.—Compared the Edwards Personal Preference Schedule scores of 4 groups of 32 university students who were only sons, eldest sons, 2nd-born sons, and youngest sons. Each group was similar on age, family socioeconomic status, father's education, and the degree of urbanization. Results provide partial support for the findings of a previous study by Y. H. Ko and L. H. Lin (see PA, Vol 49:11168). Findings concerning the need for achievement and dominance contradict US findings about the eldest son and support US findings about the only son. (19 ref)—*Journal abstract*.

3142. Kroger, Rolf O. (U Toronto, Ontario, Canada) **Faking in interest measurement: A social-psychological perspective.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 130-134.—Proposes a social-psychological hypothesis of test faking which postulates that faking involves the enacting of a social role appropriate to the given testing situation. Successful faking depends on favorable motivation, accurate conception of the role involved, adequate role-taking skills, and the presence of role-relevant cues in the test. A series of interrelated experiments, using primarily the Strong Vocational Interest Blank and the Minnesota Multiphasic Personality Inventory (MMPI) as dependent measures, are reviewed. Subtle manipulations of the test-taking environment, designed to induce Ss to adopt given social roles, produced substantial role-specific changes in test scores, or, successful faking. Such faking was not detected by the validity scales of the MMPI. It is concluded that test faking in terms of role enactment represents the test-taker's general approach to testing situations, with success depending especially on the presence of role-relevant cues in the test and on the test-taker's accurate conception of the role to be enacted.—*Journal abstract*.

3143. Kuncze, Joseph T. & Reeder, Charles W. (U Missouri, Columbia) **SVIB scores and accident proneness.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 118-121.—Reviews 5 interrelated studies, showing that certain preselected Strong Vocational Interest Blank occupational scales were indicative of life-styles related to accident incurrence. The hypothetical formulation underlying these studies was that vocational interest scores reflect enduring personal characteristics, or life-styles, as well as occupational interests. Rates of accident incurrence (using different criteria and different populations) were consistently highest for those having Aviator scale scores substantially higher than Banker scale scores. Findings support a position that accident incurrence may be more a function of life-style than an expression of psychopathology. Findings also support the position that occupational interest scores may be used as indicators of enduring personality characteristics or traits.—*Journal abstract*.

3144. Lessner, Milton & Knapp, Robert R. **Self-actualization and entrepreneurial orientation among small business owners: A validation study of the POI.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 455-460.—Tested the hypothesis that merchandising-oriented entrepreneurs are more self-actualizing than craft-oriented entrepreneurs. The Personal Orientation Inventory (POI), a measure of self-actualiza-

tion, was administered to samples of small business owners who were identified as merchant- or craft-oriented. Since significant differences were obtained on the major Inner Directed (I) Scale, the hypothesis was supported. Results are interpreted in terms of the significant differences noted between entrepreneurial orientation on 4 out of the 9 POI scales considered.—*Journal abstract*.

3145. Mermin, Dan. (Georgia State U) **Gestalt theory of emotion.** *Counseling Psychologist*, 1974, Vol 4(4), 15-20.—Discusses F. Perls's analysis of emotions, which is based on his personal experience rather than on laboratory studies. To the Gestalt psychologist, emotions are of primary, not tangential importance. The concepts of "body" and "soul" are not different; they represent aspects of the same unity. The body is the reservoir of all cells, the soul the reservoir of all emotions, and the person is the sum of all. Emotions are not bodily changes alone; they are meaningful only in terms of an environment. Technically, emotions cannot be antisocial.—*H. Silverman*.

3146. Midgley, Nina & Abrams, Marsha S. (U Vermont) **Fear of success and locus of control in young women.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 737.—Administered Rotter's Internal-External Control Scale and M. Horner's incomplete story lead designed to evoke achievement anxieties to 108 female undergraduates. The motive to avoid success was significantly positively associated with external control scores.

3147. Moore, Joseph A. & Sermat, Vello. (Memorial U Newfoundland, St John's, Canada) **Relationship between self-actualization and self-reported loneliness.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 194-196.—125 undergraduates who wished to enter sensitivity groups completed the Personal Orientational Inventory (POI) and also indicated their degree of loneliness. Ss low in loneliness obtained higher scores on the POI, with 8 of the 12 subscales significantly different from Ss high in loneliness. A discussion is presented of the supported general hypothesis that individuals who identify themselves as being more lonely are also likely to be less self-actualized.—*Journal abstract*.

3148. Morgan, Arlene H.; Johnson, David L. & Hilgard, Ernest R. (Stanford U) **The stability of hypnotic susceptibility: A longitudinal study.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 249-257.—Retested 85 former Stanford University students on the Stanford Hypnotic Susceptibility Scale, Form A, after an 8-12 yr retest interval. There was no overall change in level of susceptibility, and the correlation between the total scores on the 2 testings was .60. Hypnotic susceptibility thus appears to be a relatively stable characteristic when measured under standard conditions, and when no intervening special training has been given. (German, French & Spanish summaries) (18 ref)—*Journal abstract*.

3149. Nevill, Dorothy & Damico, Sandra. (U Florida, Office of Academic Affairs) **Development of a role conflict questionnaire for women: Some preliminary findings.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 743.—Describes a 252-item questionnaire which assesses 8 potential role-conflict areas:



Time Management, Relations with Husband, Household Management, Financial, Child Care, Expectations for Self, Expectations of Others, and Guilt. Preliminary data from 242 female respondents suggest that the greatest role conflict for women today involves their self-image and that those areas which deal directly with self-concept are more stressful.

3150. Patterson, C. H. (U Illinois) **Beyond competence: Self-actualization as an integrative concept.** *Counseling Psychologist*, 1974, Vol 4(4), 82-86.—Lists the major aspects of A. Maslow's work. The advantages of his concept of self-actualization are that it is a positive goal, not a negative concept; it avoids the difficulties of the adjustment model; it combines intrapersonal and interpersonal goals; it regards the goal as a process; it allows for individualization; it can be applied to life; it relates to all individuals; and it is a core around which other needs are built and clustered. (21 ref)—H. Silverman.

3151. Peters, Joseph E.; Dhanens, Thomas P.; Lundy, Richard M. & Landy, Frank J. (Lebanon Valley Coll) **A factor analytic investigation of the Harvard Group Scale of Hypnotic Susceptibility, Form A.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 377-387.—Conducted a factor-analytic study of the self-report items of the Harvard Group Scale of Hypnotic Susceptibility, Form A. This scale was administered to an original sample of 368 undergraduates and a replication sample of 246 Ss. 3 rotated factors were found to represent the basic structure of this scale. The 1st 2 factors clearly seem to represent challenge-item performance and responses to passive motor suggestions, while the 3rd factor could be loosely considered to represent cognitive performance. Further analyses showed the factors to be consistent across the 2 samples, to possess adequate reliability, and to be relatively independent. Implications for hypnotic research are discussed. (German, French, & Spanish summaries) (19 ref)—*Journal abstract*.

3152. Ruch, John C.; Morgan, Arlene H. & Hilgard, Ernest R. (Stanford U) **Measuring hypnotic responsiveness: A comparison of the Barber Suggestibility Scale and the Stanford Hypnotic Susceptibility Scale, Form A.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 365-376.—The Barber Suggestibility Scale (BSS) and the Stanford Hypnotic Susceptibility Scale, Form A (SHSS:A) were administered, under both imagination and hypnotic-induction instructions, to 2 samples of 40 paid high school students. The 2 scales were sufficiently correlated to indicate that, in general, they measure responses in the same broad domain. There was, however, a greater discrepancy between objective and subjective scores on the BSS than on the SHSS:A. The subjective scores were not independent of the objective scores but corrected the objective scores for pressure toward social compliance. It is concluded that both scales are satisfactory for preliminary S-selection but limited as criteria for the range of hypnotic responsiveness. (German, French, & Spanish summaries)—*Journal abstract*.

3153. Schwartz, Albert. (Empire State Coll, State U New York, Saratoga Springs) **The Trauma of Birth and Rank's departure from Freud.** *Review of Existential*

*Psychology & Psychiatry*, 1973, Vol 12(1), 75-92.—Examines O. Rank's (1923) theory of the trauma of birth, which purported to answer most of the therapeutic questions confronting psychoanalysts. The basis on which the theory signaled the break between Rank and Freud and Rank's role in the history of psychoanalysis are discussed.

3154. Scott, William A. (James Cook U, Townsville, Qld, Australia) **Varieties of cognitive integration.** *Journal of Personality & Social Psychology*, 1974(Oct), Vol 30(4), 563-578.—Studied 4 styles of cognitive integration (affective balance, affective-evaluative consistency, centralization, and image comparability) within 4 domains of cognition (acquaintances, family, nations, and self) among 554 university students in 3 countries (United States, Japan, and New Zealand). In all 3 countries, the tendency to use one or another integrative style depended both on the cognitive domain and on other structural properties of the Ss' cognitive systems. Affective balance tended to be a preferred style within the domain of family relations and among Ss with simple, highly evaluative, and univalent conceptions of objects. Image comparability tended to be a preferred integrative style within the domains of nations and acquaintances and among Ss with many independent precisely discriminating attributes for appraising objects. (35 ref)—*Journal abstract*.

3155. Sharpe, Deborah T. **The psychology of color and design.** Chicago, IL: Nelson-Hall, 1974. xiii, 170 p. \$9.95.—Investigates the influence of color on personality (and vice versa) and the effects of color on children and on different world cultures. Color theory is analyzed, and a discipline of color and design which can be used in personal living and in business is established.

3156. Spiegel, Herbert. (Columbia U, Coll of Physicians & Surgeons) **The grade 5 syndrome: The highly hypnotizable person.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 303-319.—On a 0-5 hypnotizability range, as measured by the Hypnotic Induction Profile, the Grades 4-5 are identified as highly hypnotizable persons. This group tends to exhibit a clinically identifiable configuration of personality traits: the high eye-roll sign, the high intact Hypnotic Induction Profile score, readiness to trust, a relative suspension of critical judgment, an ease of affiliation with new experiences, a telescoped time sense, an easy acceptance of logical incongruities, an excellent memory, a capacity for intense concentration, an overall tractability, and a rigid core of private beliefs. Role-confusion and a subtle sense of inferiority are often evident. For these persons, treatment strategy requires clarification of central vs peripheral beliefs, increasing sensitivity to positive and negative field-forces, awareness of secondary gain-loss issues, and aid in establishing guidelines to implement with action the integrity of their own beliefs, especially their perception of alternatives and their right to use them. If secondary gain is not formidable under appropriate therapy, these patients have a very good health potential. (German, French, & Spanish summaries)—*Journal abstract*.

3157. Stricker, Lawrence J. (Educational Testing Service, Princeton, NJ) **Response styles and 16 PF higher order factors.** *Educational & Psychological Meas-*

urement, 1974(Sum), Vol 34(2), 295-313.—Explored the relationship of acquiescence, social desirability (SD), and defensiveness response styles with 1st, 2nd, and higher-order factors on the 16 Personality Factors Questionnaire (16 PF). All the various kinds of response bias indexes were appreciably correlated with the 1st-order factor scales. Each kind of response style measure predominantly loaded a different 2nd-order factor, and 4 such factors were extracted, 3 of them corresponding to well-established 16 PF 2nd-order factors. SD scales defined a novel factor somewhat resembling an anxiety factor, and acquiescence and defensiveness measures loaded but did not define independence and anxiety factors, respectively. None of the various kinds of response style indexes consistently loaded an extroversion factor, and none loaded the single 3rd-order factor obtained. This factor was not similar to previously reported 16 PF 3rd-order factors and its nature was unclear. (39 ref)—*Journal abstract*.

3158. Sztulman, H. (U Toulouse-le Mirail, France) **[Narcissism and libido in the light of "On narcissism: An introduction."]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 23-31.—Considers the historical and theoretical significance of Freud's 1914 essay. The evolution of the concept of narcissism up to 1914 is described, and 2 pairs of concepts are analyzed: (a) primary and secondary narcissism and (b) libido of the ego and libido of the object. These distinctions, introduced in the 1914 essay, ran counter to an older pair of opposites, sexual instincts and instincts of the ego. The historical effects of the new perspective consisted of making the recent break with Jung irrevocable and in stimulating a revisionary effort in the whole psychoanalytic camp. On the theoretical level, the road was then open to the radical libidinization of the ego and to creation of the tripartite structure of id, ego, and superego.—*A. Blasi*.

3159. Weiss, Howard & Sherman, John. (New York U) **Internal-external control as a predictor of task effort and satisfaction subsequent to failure.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 132-136.—Used Rotter's Internal-External Control Scale to predict effort expended on a task subsequent to failure on a similar task. Given that a person has an initial need for success and that he expects that working hard will result in success, it was hypothesized that, after failing the task, internals would maintain their initial expectancy and expend more effort on subsequent tasks than externals who would decrease their prefailure expectancies for success. Ss were 41 male undergraduates who completed a series of maze tasks. The Job Descriptive Index was also administered as a measure of task satisfaction. Results confirm this hypothesis, but fail to support secondary predictions regarding task satisfaction. (18 ref)—*Journal abstract*.

3160. Wheeler, Ladd et al. (U Rochester) **Eye-roll and hypnotic susceptibility.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 327-334.—Investigated whether the ability to roll one's eyes upward and then close the eyelids without looking down is a predictor of hypnotic susceptibility. Nonsignificant negative correlations between the eye-roll test and both the Harvard Group Scale of Hypnotic Susceptibility,

Form A, and the Stanford Hypnotic Susceptibility Scale, Form C. Test conditions included separate and blind administration of the eye-roll and susceptibility scales, good reliability and range on all measures, and an adequate sample of 52 psychology students for testing the hypothesized relationship. Population and scale differences, E-bias, and selective elimination of Ss are discussed as possibly producing the relationship between eye-roll and hypnotic susceptibility reported in H. Spiegel's (1970) system. (German, French, & Spanish summaries)—*Journal abstract*.

3161. Willemaers, Rik. **[The human movement in the Rorschach test: A validation study: II. Results.]** (Duth) *Psychologica Belgica*, 1973, Vol 13(3), 313-340.—Presents findings of a study whose purpose and methodology were described previously (see PA, Vol 51:7187). Results indicate (a) a significant positive relationship between human movement and the human content, the Rorschach Index of Repressive Style (RIRS), the pripro TC%, the anxiety score, and the I-aspirations; and (b) a significant negative relationship between human movement and clerical interest. There was no clear relationship between the human movement and R, FM, m, time estimation, time metaphors, Guilford-Zimmerman personality traits, and intelligence. The relationship between human content and other variables was noted to be similar to the relationship between human movement and the same variables, though no significant relationship between human content and RIRS, pripro TC%, and I-aspirations was apparent. (English abstract) (36 ref)—*S. Slak*.

3162. Witkowski, Tadeusz. **[Dimensions of personality and permanent contact with the group.]** (Poln) *Roczniki Filozoficzne: Annales de Philosophie*, 1972, Vol 20(4), 17-31.—Administered the Eysenck Personality Inventory to 2 groups of Ss to compare their scores on the Neuroticism (N) and Extraversion (E) scales. Group 1 consisted of 150 19-27 yr old Ss who had permanent contact with religious-liturgical groups. Group 2 consisted of 100 18-26 yr old Ss whose contact with such groups was not permanent. Permanent-contact Ss were less neurotic and had higher E scores than nonpermanent-contact Ss. Permanent contact with religious-liturgical groups thus appears to be a characteristic of extraverts in spite of the fact that stability and endurance have been correlated with introversion. (17 ref)—*English summary*.

3163. Worthing, Parker M.; Venkatesam, M. & Smith, Steve. (U Massachusetts, Amherst) **Personality and product use revisited: An exploration with the Personality Research Form.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 179-183.—Administered the Affiliation, Aggression, Dominance, Exhibition, and Social Recognition scales of the Personality Research Form (PRF) to 166 male and 66 female undergraduates. A replication study was conducted with 133 male undergraduates. Ss also completed a product use questionnaire which contained 18 product categories. Results (presented for males only since there were too few female nonusers of certain products) demonstrate that product use was related to a complex of personality trait interactions. Canonical analysis revealed 2 significant roots, one which was associated with Affiliation and Aggression and was related to the use of cigarettes, beer,



headache remedies, mouthwash, and men's dress shirts; the other root was associated with all 5 traits and related to the infrequent use of cigarettes, soft drinks, and mouthwash, and to the use of men's cologne, aftershave, and dress shirts. Data also confirm the independence and reproducibility of the PRF scales. (18 ref)—*Journal abstract*.

3164. Yang, Kuo-Shu & Liang, Wang-Huel. (National Taiwan U, Taipei, Republic of China) **Some correlates of achievement motivation among Chinese high-school boys.** (Chin) *Acta Psychologica Taiwanica*, 1973, Vol 15, 59-67.—Studied the relationship of several psychological and sociological variables to achievement motivation, as measured by the Thematic Apperception Test, among 96 Chinese high school boys. The need for achievement was found to be positively correlated with individual modernity and was an inverted-U function of father's socioeconomic status. Firstborns scored significantly higher in need achievement than the youngest, with the mean scores of middle children in between. (32 ref)—*Journal abstract*.

3165. Yang, Pen-Hua L. (National Taiwan U, Taipei, Republic of China) **[Some personality correlates of individual modernity in Chinese college students.]** (Chin) *Acta Psychologica Taiwanica*, 1973, Vol 15, 46-53.—Studied the relationship between 45 personality variables and individual modernity in 374 male and 673 female Chinese college students. Personality variables were assessed by the Chinese versions of the 16 Personality Factor Questionnaire (16 PF), Guilford-Zimmerman Temperament Survey (GZTS), California Personality Inventory (CPI), and Taylor's Manifest Anxiety scale. Modernity was measured by the Individual Traditionality-Modernity Scale, a test specifically constructed for use with Chinese Ss. It was found that individual modernity was positively correlated with CPI scales measuring spontaneity and flexibility and, for females only, with CPI scales reflecting well-being, tolerance, and achievement via conformance. Modernity was negatively correlated with the GZTS scale assessing personal relations for both sexes, and with constraint and friendliness for females. Modernity was positively correlated for females with GZTS ascendance and masculinity scales. Positive correlations were obtained with 5 factors of the 16 PF and modernity was negatively correlated with 2 16 PF scales.—*English summary*.

## PROFESSIONAL PERSONNEL

3166. Argyris, Chris & Schön, Donald A. (Harvard U) **Theory in practice: Increasing professional effectiveness.** San Francisco, CA: Jossey-Bass, 1974. xiv, 224 p. \$10.95.—Discusses the concern that the professions are neither effective nor democratic in practice. Professional competence and its acquisition and the redesigning of professional education according to the necessities of competent practice are explored, and it is proposed that competence is based on the ability to develop theories of what to do in new situations and the ability to behave effectively in the practitioner-client relationship. (3 p ref)

3167. Ash, Leslie C. (Lakehead Psychiatric Hosp, Regional Children's Ctr, Thunder Bay, Ontario, Canada)

**Training in mental retardation for psychiatric residents.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 55-58.—Surveyed the 16 universities in Canada that offer postgraduate training in psychiatry about their training in mental retardation. Few universities offered courses or even lectures on mental retardation. A majority of universities had no full-time teacher whose field was mental retardation. The prospect of increasing the number of psychiatrists specializing in mental retardation is concluded to be bleak. (French summary) —F. Auld.

3168. Bergman, S. (Tel Aviv U, Israel) **Nursing attitudes to psychiatry and geriatrics as preferred work areas with deviant groups.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 156-160.—Studied the attitudes of 214 nurses in regard to their preferred clinical area, most preferred patient age group, and the types of expressive and instrumental attributes assigned to the clinical areas. Psychiatry was preferred to geriatrics, and attributes assigned to work in psychiatry were generally professional (instrumental) in nature, while attributes assigned to work in geriatrics were predominantly emotional (expressive). The rejection of the aged as a patient group was strongly pronounced. Possible reasons for the negative attitudes toward the field of geriatrics and the aged are discussed, including the stronger psychiatric component in nursing curricula, the heterogeneity of age groups among psychiatric patients, and the reversibility of some psychiatric conditions.—*Journal abstract*.

3169. Bjerstedt, Ake. Malmö educational reports 1973: Mini-notes from Malmö School of Education. *Didaktometry & Sociometry*, 1974, Vol 6(2), 68 p.—Presents 71 English abstracts or annotations of German-, Swedish-, and English-language reports and reprints issued during 1973 by the Department of Educational and Psychological Research.

3170. Block, William E. (Rockland County Community Mental Health Ctr, Pomona, NY) **The study of attitudes about mental health in the community mental health center.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 216-220.—Tested the assumption that a common ideology is shared by the staff of a community mental health center, using Baker and Schulberg's Community Mental Health Ideology Scale. The scores of 3 groups were analyzed: service directors, line staff, and student aides. Marked discrepancies and lack of consensus in beliefs existed among professional disciplines, between service units, and within each category. Implications for inservice training programs and center functioning are discussed.—*Journal abstract*.

3171. Bradley, Fred O. (Kansas State U) **A modified interpersonal process recall technique as a training model.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 34-39.—Studied the use of a modified form of the N. Kagan et al Interpersonal Process Recall (IPR) technique as an influence on the counseling dimensions of level of regard, empathic understanding, unconditionality of regard, and congruence as measured by the Barrett-Lennard Relationship Inventory. Ss were 24 advanced graduate students in a counseling practicum course. The hypothesis was that those groups which underwent the IPR treatment would demonstrate greater

growth on the measured conditions of counseling. Analysis of covariance revealed no significant differences between groups on each of the 4 variables. (15 ref) —*Journal abstract.*

3172. **Brook, Peter.** (Warley Hosp, Brentwood, England) **Psychiatrists: Background, career and career alternatives of a group of recently appointed consultants.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 1-9.—Reports findings from 1 of a series of mail surveys on the training history and current status of 125 consultant psychiatrists appointed during 1969-1972. Data reveal that (a) differences in background and career existed, depending on the type of hospital in which the consultants had received their psychiatric training; and (b) switching from general psychiatry to one of the psychiatric specialties to achieve consultant status was far less popular an alternative than that of emigrating permanently.

3173. **Brown, Tom.** (U Alberta, Edmonton, Canada) **Present and preferred functions of CGCA members.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 175-184.—Sent a 53-item counselor role questionnaire (CRQ) to a random sample of 150 Canadian Guidance and Counselling Association (CGCA) members, their administrators, and their clients. Counselors were asked to respond to the CRQ both in terms of what they were doing and in terms of what they judged they should be doing. Returns were received from 49 CGCA members, 24 clients, and 27 administrators representing all provinces and most categories of membership in the Association. The bulk of the respondents were employed in educational institutions and were professionally well prepared. The most frequently reported counselor activities were in the traditionally accepted areas of educational-vocational counseling. Most counselors expressed a desire for a greater level of involvement in group counseling, research, and public relations activities. Counselors were satisfied with their level of involvement on only approximately 25% of the CRQ items. Comparison of counselor, administrator, and client responses indicate conflict or lack of consensus regarding counselor role. Counselors and administrators had the least number of interposition differences, whereas administrators and clients had the most differences. (French summary)—*Journal abstract.*

3174. **Butler, Kevin W.** (Fort Lewis Coll, Miller Student Ctr) **Videotaped self-confrontation.** *Language, Speech & Hearing Services in Schools*, 1974(Jul), Vol 5(3), 162-170.—Describes videotaping as used by the speech pathologist to analyze speech therapy sessions. The Quick Analysis Scoring Form by D. R. Boone and T. E. Prescott was used. The positive and negative reinforcement ratios and the reinforcement efficiency ratios can be analyzed to determine the rate of subsequent reinforcement. The correct response ratio, optimal at 65-80%, is an indicator of the client's performance. If the inappropriate response ratio exceeds 10%, it reveals a problem in the client-clinician relationship. Self-confrontation and self-analysis enable the clinician to improve his therapeutic performance by providing him with an objective view of his own behavior.—*S. S. Liu.*

3175. **Butler, Richard L.** (State U New York Hosp, Upstate Medical Ctr, Syracuse) **Teaching principles of**

**medical ethic curricula.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 379-380.—Describes the goal, philosophy, and structure of a core curriculum in "medical relevancy" which includes courses on the role of the physician in society and concepts of medical ethics. The curriculum is aimed at developing a professional identity in students and developing their capacity to make correct decisions under changing and often stressful situations.

3176. **Chasis, Herbert & Campbell, Charles I.** (New York U, Medical School) **An experimental clinical science fellowship in cardiovascular-renal diseases.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 374-378.—Describes an experimental program aimed at evaluating a method of developing physicians who are disciplined by research and competent both as teachers and in the care of patients (clinical scientists). It is considered that contemporary medical education and financing of research tend to drive potential clinical scientists into research inadequately grounded in patient care or into clinical medicine undisciplined by the intellectual challenge of research. It is difficult to obtain support for a recent graduate to further develop his competence at the bedside, teach, and undertake a research project concurrently. 10 preceptors who met the standards of a clinical scientist selected 10 fellows; after 2-4 yrs of training, 3 fellows achieved the goals set for the program and a 4th partially succeeded. 2 failed and 4 resigned before completing the fellowship. It is concluded that the method permits development of physicians competent at the bedside, as teachers, and as investigators.—*Journal abstract.*

3177. **Cleghorn, John M.** (McMaster U, Medical Ctr, Section of Psychiatry, Hamilton, Ontario, Canada) **Organization of psychosocial care in a teaching hospital.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 55-65.—Argues that, in order to be globally effective, psychiatrists must take major steps to overcome their marginal position in the medical profession. It is urged that the education of medical students to comprehend and manage psychosocial problems must begin at the outset of their medical educational experience and continue throughout their professional lives. (22 ref)

3178. **Cohen, Earl.** (U California, Medical School, San Francisco) **Suicide and self-assault: An introductory course for medical students.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 383-385.—Describes a course for 1st- and 2nd-yr medical students which included (a) traditional lectures emphasizing the medical model of disease and its relation to suicidal behavior, (b) interviews with a patient manifesting self-assaultive symptoms, and (c) special seminars on specific social aspects of the problem.

3179. **Davis, Robert M. & O'Connor, James B.** (Pennsylvania State U, Johnstown) **Changes in counseling response preference among rehabilitation counseling interns.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 40-46.—Assessed counseling response preferences of 67 graduate students completing internship requirements using Patterson's Rehabilitation Counseling Response Exercise during the first and final weeks of their internships at a comprehensive, multidisciplinary vocational rehabilitation center. It was hypothesized



ized that at the end of the internship the students would show a significant increase in preference for active counseling responses and a correspondingly significant decrease in preferences for passive techniques. 5 counseling responses (evaluative, interpretive, supportive, probing, and understanding) were evaluated and change did occur as hypothesized.—*Journal abstract*.

3180. Dell Orto, Arthur E. & Jordan, John E. (Sargent Coll, Boston, MA) **A multivariate analysis of racial attitudes: Structure, content, and determinants.** *Rehabilitation Psychology*, 1973(Fal), Vol 20(3), 126-135.—Examined the relationships between attitude behaviors of white and black rehabilitation counselor trainees and selected predictor variables in 47 graduate training programs. Black and white trainees differed markedly on perceived racial differences. Geographic location and sex were predictive of positive racial attitudes, females and those born in the North being more positive. Political and religious preferences were not related to positive racial attitudes. The Guttman facet theory approach to attitude measurement was used, indicating the multidimensional nature of attitude behaviors and supporting Guttman's definition of attitude as "a delimited totality of behavior." In general, attitudes at the action levels were related to an effective-value-contact dimension rather than to a cognitive-knowledge one. (33 ref)—*Journal abstract*.

3181. DiMattia, Dominic J. & Arndt, Gerald M. (U Bridgeport) **A comparison of microcounseling and reflective listening techniques.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 61-64.—Assigned 15 graduate students in counseling to either microcounseling or reflective listening training groups. Microcounseling procedures included videotaping attending behaviors between various group members and discussing the videotapes; reflective listening procedures involved videotaping structured person-to-person responses and evaluating facilitative and expressive responses. Counseling skills were rated by 4 trained judges in terms of eye contact, verbal following, posture, and overall effectiveness. There were no significant differences between the groups for any criteria; however, significant differences on 3 of the 4 criteria from pre- to posttest evaluations were observed in both groups. It is suggested that the failure to effect any significant change in trainees' posture may be due to Ss' high level of functioning on this variable before training.—*L. Gorsev*.

3182. Dubey, Joseph. (North Shore Hosp, Manhasset, NY) **Confidentiality as a requirement of the therapist: Technical necessities for absolute privilege in psychotherapy.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1093-1096.—Considers that privilege for the psychotherapist is a technical necessity for certain forms of psychotherapy. Psychiatrists are not legally protected from being compelled, in certain situations, to divulge information; therefore, their patients are in danger of either being embarrassed or of having their therapy subverted for secondary gain. There is an inherent conflict between the goals of the therapist and of the advocate and an incompatibility between the functions of treatment and evaluation. It is suggested that the communications and information of psychotherapy be excluded from public policy and that the therapist

should not perform evaluative functions during litigation; if psychiatric information is necessary, it should be obtained from an independent court-appointed psychiatrist. (18 ref)—*Journal abstract*.

3183. Dubin, Samuel S. (Pennsylvania State U) **The psychology of lifelong learning: New developments in the professions.** *International Review of Applied Psychology*, 1974(Apr), Vol 23(1), 17-31.—Studied the significance of professional obsolescence, its causes, symptoms, and definitions. The concept of "half-life"—the point after completion of training when a professional has become roughly half as competent as he was upon graduation—was used to measure the obsolescence of a profession. Major areas needing study are (a) motivation for professional updating; (b) adult learning; (c) measuring professional competence; (d) surveys of self-perceived educational needs; (e) educational technology; (f) counseling adults and midcareer change; (g) periodic readmission of professional persons to postgraduate training; and (h) research and evaluation. Data concerning updating within professions is provided for medicine, the science and management of natural resources, education, psychology, law, dentistry, management, and engineering. (60 ref)—*L. A. Ostlund*.

3184. Elgie, Nancy A. **Public relations in a private practice.** *Ontario Psychologist*, 1974(Aug), Vol 6(3), 49-52.—Discusses how a psychologist in private practice is affected by public relations in initiating his practice and in dealing with referral sources, patients, the community, and other professionals.

3185. Felton, Gary S.; Wallach, Howard F. & Gallo, Charla L. (Children's Hosp of Los Angeles, Allied Health, CA) **New roles for new-professional mental health workers: Training the patient advocate, the integrator, and the therapist.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 52-65.—Describes the conceptualization, development, and implementation of a Veterans Administration neuropsychiatric hospital-based human services worker (new-professional) training program. The program involves an experientially heterogeneous group of 16 trainees whose practical and academic training will be centered around the veteran psychiatric patient and the community with which he is in contact. 4 principal roles of this new professional are emphasized: (a) patient advocate, (b) longitudinal contact person for patients from hospital admission to posthospitalization community adjustment, (c) integrator of the patient's ongoing treatment process and experiences, and (d) cross-disciplinary worker who under supervision relieves existing professionals of the less specialized portions of their workload. (18 ref)—*Journal abstract*.

3186. Flax, Jim & Garrard, Judith. (U Minnesota, Medical School) **Students teaching students: A model for medical education.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 380-383.—Describes the development of a pilot course in interviewing and taking a medical history designed for 1st-yr students and taught by 5 2nd-yr students. Results of the pilot course were compared with those of a standard course; findings indicate the value of peer teaching.

3187. Foster, Sue; McClanahan, L. D. & Overley, Teresa. (Athens Mental Health Ctr, OH) **Mental hospital**

staff attitudes as a function of experience, discipline, and hospital atmosphere. *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 569-577.—Asked 234 mental hospital employees in 5 disciplines to complete a staff attitude scale. 6 attitude factor scores were compared using a Discipline  $\times$  Experience multivariate analysis of variance with education as covariate. Attitudes toward patient care were significantly different among 4 disciplines and across 6 different experience levels. A separate analysis yielded no sex differences. Using previously published means from 6 hospitals, plus data from the present sample, a multivariate Hospital  $\times$  Discipline analysis was completed on 2,178 Ss. The 6 traditional hospitals differed significantly from a transitional hospital. Because of possible violations of assumptions, the last analysis requires further support. (30 ref)—*Journal abstract*.

3188. Friedrichs, Robert W. (Williams Coll) **The impact of social factors upon scientific judgment: The "Jensen thesis" as appraised by members of the American Psychological Association.** *Journal of Negro Education*, 1973(Fal), Vol 42(4), 429-438.—Sent a 1-item Likert questionnaire to 526 representative members of the American Psychological Association (APA), 225 additional APA residents of Alabama and Mississippi, and 242 additional members who are "ethnically Jewish" (as determined by name). The questionnaire concerned their attitude toward Jensen's thesis of a genetic, as opposed to environmental, basis for Negro-Caucasian intelligence difference. 60% of the total sample disagreed with Jensen's genetic thesis and 28% agreed. The Jewish sample was significantly less in agreement with Jensen (22% agreed, 60% disagreed) than the representative sample less the Jews ( $p < .03$ ). The Alabama-Mississippi sample was more in agreement with Jensen (31% agreed, 49% disagreed) than the total sample less Alabama-Mississippi residents ( $p < .05$ ). Physiological and comparative psychologists were significantly more in agreement with Jensen (36% agreed, 51% disagreed) than other psychologists ( $p < .05$ ).—*W. E. Sedlacek*.

3189. Friesen, John W. (U Calgary, Alberta, Canada) **Evaluating supervised pastoral education: A pilot study.** *Journal of Pastoral Care*, 1973(Dec), Vol 27(4), 229-235.—Conducted a pilot study to evaluate supervised pastoral education with 11 students, representing a variety of denominations, involved over 2 summers at a general hospital in Canada. The program emphasized academic presentations, ward visitation and practical experience, and interpersonal relations sessions. Evaluation instruments included The Adjective Check List, The Daily Reaction Report, Supervisor's Assessment, and Individual Student Assessment. The Daily Reaction Report was a page written each day by the student to express his feelings about the daily experiences. These reactions were rated positive or negative on a 5-point scale by 2 readers. During 1 summer session, a semantic differential technique was also used with a control group of 10 clergymen. These measures were used for individual candidate assessment as well as for the program evaluation.—*B. Smith*.

3190. Fujinaka, Larry H. & Stone, Shelley C. (DePauw U) **Counselor commitment and career development.** *Counselor Education & Supervision*, 1974(Sep),

Vol 14(1), 47-53.—Examined the relationship between preparation and career commitment by studying the degree to which counseling personnel actively involve themselves as school counselors after training. If counselor education programs are truly concerned with preparing professionals for a career, then long-term involvement is an important criterion reflecting the success of counselors and their prior preparation. Results from a study tracing 406 graduates from 20 National Defense Education Act (NDEA) institutes 6 yrs after training show that only 45% immediately entered and remained in counseling for 6 yrs. The existence of a teacher-counselor-administrator promotion ladder is presented as being a major source of loss from the ranks of school counseling. A related finding showed non-entry to counseling to be caused by a return to classroom teaching after counseling preparation.—*Journal abstract*.

3191. Gabridge, Michael G. (U Illinois, School of Life Sciences) **Medical microbiology: Deficits and remedies.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 389-391.—Recent surveys of medical school graduates indicate a serious deficit in their retention of microbiological principles. A medical school curriculum is described which emphasizes core disciplines and which utilizes a behavioral objective teaching format and independent self-study. Preliminary results indicate that students in this program performed better on final examinations than students in a traditional program.

3192. Gamble, Thomas E. (U Illinois, Medical School, School of Basic Medical Sciences) **The practicing physician's involvement in the training of medical students.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 331-337.—Surveyed 20 practicing physicians (mean age = 44.95 yrs) who also acted as nonsalaried clinical faculty at a university to determine their attitudes concerning (a) continuing education benefits to the physician through his involvement in teaching medical students; (b) whether the practicing physician has sufficient time to be involved in a teaching program; (c) pedagogical implications of a semi-independent study medical curriculum; (d) the impact of teaching involvement on the practicing physician's work; and (e) the role, status, and professional responsibilities of teaching. Results indicate that the physicians supported the program in all 5 areas surveyed.—*Journal abstract*.

3193. Gartrell, Nanette; Kraemer, Helena & Brodie, H. Keith. (Stanford U, Medical School) **Psychiatrists' attitudes toward female homosexuality.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 141-144.—Reports answers to a questionnaire distributed to 908 psychiatrists, 42% of whom responded. Almost all (98%) favored legalization of homosexual behavior between consenting adults; 66% opposed the use of psychiatric labels in categorizing female homosexual behavior. 87% stated that their concept of mental health included the possibility of a well-adjusted homosexual woman, and 66% challenged the traditional belief that Lesbianism represents sickness or inadequacy. (15 ref)—*Journal abstract*.

3194. Gimmetad, Michael J. & Greenwood, Janet D. (Florida State U) **A new twist on IPR: Concurrent recall by supervisory group.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 71-73.—Discusses theoretical and



empirical evidence for the use of the N. Kagan et al Interpersonal Process Recall (IPR) technique in group settings. This modification would include a small group of peers and 1 or 2 supervisors all serving as recallers simultaneously, instead of only 1 recaller. Preliminary data from the use of group IPR with 12 counseling students are presented which suggest that group IPR provides initial interviewing training appropriate for supervision of practicum and internship work and for ongoing supervision and inservice training of skilled practitioners.—*L. Gorsey.*

3195. Gregory, Robert J. (Duke U, Medical Ctr) **A community education drug abuse project.** *Drug Forum*, 1974(Spr), Vol 3(3), 259-266.—Describes a comprehensive small group educational and training experience focused on the issues and problems of drug abuse. 25 responsible adults were trained to lead small group sessions. Pre- and posttesting were done to test the knowledge, attitudes, and feelings of the participants about the drug scene, human relationships, and the course.

3196. Gutheil, Thomas G. (Massachusetts Mental Health Ctr, Boston) **Rapid retrieval of literature for the practicing psychiatrist: A practical approach.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1145-1147.—Describes a method of information storage and retrieval for psychiatric literature, based on dividing journals into component articles and filing by subject matter. It is suggested that use of this system will result in significant savings of time and effort. A list of suggested subject categories to facilitate initiation of the system is included.

3197. Halmos, Paul. (University Coll, Cardiff, Wales) **The personal and the political.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 130-148.—Notes that the term "counseling" is used liberally to convey pedagogical, casework, and clinical meanings. The indiscriminate use of the term by institutions of health, welfare, and education often conceals the intention to appear more solicitous to clients than the institution can afford to be. The central factor in counseling is the use of the counselor's total and global personality in effecting changes in the personality of the client. This factor is shown to be potentially present even in behavior therapy where it would be explicitly disclaimed. Counseling, therefore, is a personalistic process. Political accusers charge counselors, social caseworkers, psychotherapists, and others with a desertion of their moral duty to change evil systems and with distracting attention from the really important public miseries inflicted on man by these systems. The present article stresses the incompatibilities of the personal and political roles and advocates a continued protection of the integrity of these meliorist roles. (30 ref)—*Journal abstract.*

3198. Hiemstra, Roger & Long, Roger. (U Nebraska, Lincoln) **A survey of "felt" versus "real" needs of physical therapists.** *Adult Education*, 1974, Vol 24(4), 270-279.—Stresses that constantly emerging knowledge has made continual learning a necessity for health-related professionals. A questionnaire was administered to 77 physical therapists to compare their felt needs (personal perceptions symptomatic of problems) with

their real needs (actual knowledge or skill weaknesses). A literature review prompted the null hypothesis of no correlation between perceived felt needs and demonstrated real needs. Statistical testing (Pearson correlation) suggested a failure to reject the null hypothesis (.05 level). The differences between felt and real needs indicate the complexity of the needs assessment process and the limited usefulness, in planning continuing education programs, of a questionnaire that solicits only personal perceptions of need.—*Journal abstract.*

3199. Housley, Warren F. & Magnus, Robert E. (Mississippi State U) **Increasing empathy for employment service counselors: A practicum.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 28-31.—Outservice practicum training of employment service counselors presents a particular challenge to counselor educators. An overview of a 2-wk practicum-laboratory training program with a total of 30 employment counselors is presented and discussed. The efficacy of the training is examined from the standpoint of helpful levels of empathy presented by the counselors trained. The difference between pre- and posttraining levels of empathy indicates that statistically significant gains were realized.—*Journal abstract.*

3200. Hurst, Michael W. & Shatkin, Stephen D. (Boston U, Medical School) **Relationship between standardized admissions variables and certain interpersonal skills.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 22-33.—Investigated the predictive value of data readily available on college admission forms. An admissions model was developed that includes standardized intellectual and nonintellectual variables. The admissions "scores" of 3 groups of 33 counseling students (age range, 22-35 yrs) were tested against levels of performance on a tape-test of 3 counseling skills. Linear combinations of grade point average, quality of undergraduate college, major area of study, and recommendations and work experience were generally unrelated to pre- or posttraining ratings of empathy, respect, and genuineness. New variables based on Carkhuff's Counseling Simulation Inventory were added to the admissions equation and significantly raised the predictive power of the admissions score. (50 ref)—*Journal abstract.*

3201. Jarzebowska-Baziak, Barbara & Morawski, Jacek. (Ctr for Research in Criminality, Warsaw, Poland) **[Professional opinions concerning resocialization of recidivists.]** (Polh) *Przegląd Penitencjarny i Kryminologiczny*, 1972, Vol 10(1), 40-55.—Discusses questionnaire responses by 49 county and other judges and 464 staff members of penal institutions for recidivists, both heads of departments and rank and file personnel. Most respondents believed that hard physical labor and discipline are more valuable than education in handling recidivists. Vocational training should be concerned with the needs of the economy, rather than with the individual's ability. Several differences between the views of the judges and those of penal personnel are mentioned. (French summary)—*A. Z. Arthur.*

3202. Jones, Lawrence K. (North Carolina State U, Raleigh) **Toward more adequate selection criteria: Correlates of empathy, genuineness, and respect.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1),

13-21.—Reports correlations obtained between scores or ratings on 17 variables derived from a review of the literature on the problem of selection and rated levels of empathic understanding, genuineness, and respect provided by 19 graduate students to clients during the counseling practicum experience. Ss completed a battery of psychological tests including 3 scales of the MMPI, 8 scales of the Edwards Personal Preference Schedule, and the Complexity scale of the Omnibus Personality Inventory. Empathic understanding and respect were significantly related to 2 similar personality variables: tolerance of ambiguity and need for order. Ratings from Carkhuff's index of communication were significantly related to empathic understanding. None of the variables was significantly related to genuineness. Suggestions are made for further research and the improvement of existing selection instruments. (27 ref)—*Journal abstract.*

3203. Krell, Robert; Miles, James E. & Maurice, William L. (U British Columbia, Div of Child Psychiatry, Vancouver, Canada) **Training in child psychiatry: A model for medical undergraduates.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 368-373.—Describes the child psychiatry component of a teaching program in general psychiatry for 4th-yr medical students. The students staff a psychiatric ward for 8 wks, and 1 day/wk is spent in a structured program of child and family psychiatry. The total experience can be viewed as consisting of 2 parts: the 1st 4 days are devoted to interviews and basic diagnostic and descriptive skills, while the 2nd 4 days consist of a series of didactic seminars. The common thread is the continued patient and family evaluation by the student for the full 8 days. All teaching of basic skills and academic content is related to, or stimulated by, the patients who are being evaluated. 6 students supervised by 2 instructors are scheduled for each 8-wk rotation. This model can be used for other professionals seeking experience in psychiatry.—*Journal abstract.*

3204. Lambert, Michael J. (Brigham Young U) **Supervisory and counseling process: A comparative study.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 54-60.—Compared the process of supervision with that of counseling by examining the behavior of 5 professional therapists in both situations. Counselors recorded their counseling sessions with 10 clients and their supervisory sessions with 10 trainees. The level of facilitative conditions (empathy, respect, genuineness, and specificity) was assessed in 180 3-min tape excerpts. The Hill Interaction Matrix was also used to compare the verbal interactions in both counseling and supervising situations. Results indicate that the level of respect and genuineness were equal in the 2 situations. Contrary to previous assumptions, the levels of empathy and specificity were significantly lower in supervision than in counseling. When interactions were rated with the matrix, supervision was significantly less therapeutic than was counseling. Implications for the teaching and learning of psychotherapy are discussed.—*Journal abstract.*

3205. Lapointe, Roger E. (U Montreal, Quebec, Canada) **The use of psychological tests by Ontario psychologists.** *Ontario Psychologist*, 1974(Jun), Vol 6(2), 75-82.—Reports answers by 260 Ontario psychologists

to a questionnaire asking which 5 tests or test batteries they used most frequently. Those names most often were the WISC, WAIS, Bender-Gestalt, Rorschach, Thematic Apperception Test, and the MMPI. 16% used no tests at all.

3206. Law, Bill. (U Reading, School of Education, England) **Anne's story: A counsellor's dilemmas.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 212-220.—A school counselor describes a series of interviews with a high school girl to illustrate dilemmas faced by the counselor in synthesizing role expectations of himself, the client, and society. It is suggested that, before seeing the client, the counselor should determine how much client exploitation and conflict with society he can tolerate.

3207. MacKenzie, Fredericka; Davis, Howard V. & George, Rickey L. (Southern Illinois U, Edwardsville) **A question of accountability: Student representation.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 75-77.—Discusses the issues involved in student representation in academic decision-making processes. The role and function of the student representative within a counselor education department, relevant faculty concerns, and implications for student-teacher and general academic relationships are discussed.

3208. Malouf, Roberta E. & Alexander, James F. (Granite Community Mental Health Ctr, Salt Lake City, UT) **Family crisis intervention: A model and technique of training.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Describes a family-centered approach to short-term crisis intervention counseling, which emphasizes the role of interpersonal processes and characteristics of family system membership in the genesis of conflict. Treatment stresses the joint involvement of all family members in formulating behavior goals and strategies, and therapist training incorporates many of the same experiences that families receive—modeling, reinforcement, and role playing.

3209. Mandell, Arnold J. (U California, Medical School, San Diego) **The changing face of chairmen of psychiatry departments in America: An opinion.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1137-1139.—Suggests that 2 decades ago psychiatrists were trained by a few charismatic, humanistic clinicians who did not have much to do with laboratories or fund raising. After World War II academic psychiatry was transformed, largely by federal money, into a multidimensional scientific enterprise, the leaders of which needed to be scientific entrepreneurs as well as persuasive humanists. But since the fantastic promise of a technology for universal well-being could not be fulfilled before the sources of financial support began to dry up, department chairmen are evolving from humanistic scientists into corporate executives who haven't the time or energy to pursue clinical elegance or rigorous laboratory research firsthand.—*Journal abstract.*

3210. Martin, Roger D. & Shepel, Lawrence F. (U Saskatchewan, Saskatoon, Canada) **Locus of control and discrimination ability with lay counselors.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 741.—Hypothesized that structured training would



increase the ability to discriminate helpful counseling conditions and cause a shift toward the internal dimension of locus of control with an associated increase in trust, insight, and self-confidence. Data from 21 senior female nursing staff support the hypothesis and suggest that locus of control measures may be useful as selection devices to optimize training effectiveness with lay counselors.

3211. **McConnell, Lawrence G.** (McGill U, Montreal, Quebec, Canada) **The counsellor and his asexual client.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 207-210. —Contends that in terms of human sexuality, counselors are trained to function as if living in a Victorian society. This is achieved by simply pretending that sex does not exist. It is considered that the counselor has a role to perform in assisting his clients to come to grips with their own sexuality. The counselor's competence in this area is questioned, and his training in the area of human sexuality is urged. (French summary)—*Journal abstract*.

3212. **McCreary, Bruce D.** (Kingston Psychiatric Hosp, Mental Retardation Services, Ontario, Canada) **Full-time medical practitioners in Canadian mental retardation facilities.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 51-53.—Surveyed full-time physicians working in mental retardation institutions in Canada. Data from 78 physicians, perhaps half of all those employed, show that 50% were primary-care physicians and 30% were psychiatrists. Few of the respondents had had training in child psychiatry, genetics, or mental retardation. It is concluded that physicians who work in institutions for retardates should be specifically trained for this work.

3213. **McNally, Harry A. & Drummond, Robert.** (Maine School Administrative District 24, Van Buren) **Ratings of Carkhuff's facilitative conditions: A second look.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 73-75.—Examined the factor structure of ratings made with R. R. Carkhuff's 1969 revision of scales for assessing facilitative counseling conditions (empathic understanding, facilitative genuineness, and communication of respect). Results indicate the existence of 2 (Empathy-Genuineness and Respect) rather than 3 main factors, and suggest the need for evaluating counselor helpfulness on these more general dimensions rather than by 3 discrete variables.

3214. **Meadows, Chris M.; Kemp, Charles F.; Hiltner, Seward & Hopewell, James F.** (Vanderbilt U, Divinity School) **A symposium on research for the professional doctorate.** *Journal of Pastoral Care*, 1973(Dec), Vol 27(4), 267-282.—Reports how 4 individuals involved in professional doctorate programs in ministry responded to the following questions concerning appropriate professional research: How do you understand the nature and purpose of research for the professional doctorate? How is this research same or different from research for the PhD or ThD degree? How specialized or focused in a particular area of ministry or academic discipline is it appropriate for professional doctoral projects to be? Is there any experience you can share concerning professional doctoral projects in the area of pastoral care and counseling?

3215. **Muslin, Hyman L.** (U Illinois, Abraham Lincoln School of Medicine) **Clinical exercises in empathy.**

*Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 384-387.—Presents a demonstration of the psychological work necessary for using empathy as an observational mode. The method requires that individuals be able to make a distinction between subjective reactions to others and empathy.

3216. **Muslin, Hyman L.; Thurnblad, Robert J.; Templeton, Bryce & McGuire, Christine H.** (Eds.). (U Illinois, Abraham Lincoln School of Medicine) **Evaluative methods in psychiatric education.** Washington, DC: American Psychiatric Association, 1974. xiii, 220 p. —Presents a monograph containing 14 papers on the history, current status, and future of various methods of assessment and evaluation in psychiatric education. Topics include applications of patient-management problem tests to psychiatry; the use of multiple-choice testing, videotape and film, computer simulations of clinical encounters, and problem-oriented records in psychiatric training; and the theory and methods of evaluating the quality of care.

3217. **Nadolsky, Julian M.** (Auburn U) **Guidelines for the classification and utilization of vocational evaluation personnel.** *Rehabilitation Literature*, 1974(Jun), Vol 35(6), 162-173.—Presents guidelines for recruiting and utilizing vocational evaluation personnel by public and private rehabilitation agencies, in the form of job descriptions and a classification scheme using a 7-tiered hierarchy ranging from aide to fully competent professional practitioner. Specific staffing patterns for small, medium, and large vocational evaluation programs are suggested.

3218. **Nelson-Jones, Richard & Patterson, C. H.** (U Aston, Birmingham, England) **Some effects of counselor training.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 191-199.—The 1st 2 classes of a British university graduate counseling program, consisting of 5 students in 1971-1972 and 11 students in 1972-1973, were measured on their ability to respond empathically and to discriminate the quality of other counselors' responses at the beginning and the end of the academic year. Additionally, the 1972-1973 group was administered a counselor attitude scale. Significant differences were found between pre- and posttest means on all 3 measures for the 1972-1973 group and on the communication of empathy for the 1971-1972 group. Findings for the 2 groups are discussed in relation to each other and to comparable American data. (18 ref)—*Journal abstract*.

3219. **Nelson-Jones, Richard.** (U Aston, Birmingham, England) **Some thoughts in counsellor training.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 182-190.—Suggests that the main object of counselor training—helping trainees offer an effective counseling relationship—requires 3 main training elements: personal, practical, and academic. Ways in which the personal development of trainees may be fostered include individual support counseling and a weekly encounter group session. While constructive feedback is necessary, a minimum of evaluation is suggested so that the trainee can feel safe and free to explore himself. Preplacement training focused on empathic understanding is considered essential before the trainee is allowed to begin supervised placement, and a program of practical work

training is outlined. Reasons for including academic work are also discussed, and appropriate academic content is suggested. The problem of obtaining suitably qualified trainers is considered, along with the desirability of trainers continuing to counsel and the need for adequate administrative support for training programs. (15 ref)—*Journal abstract*.

3220. Nisbet, John & Mackay, Ken. (U Aberdeen, Scotland) **The training of educational psychologists in Scotland.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 17-20.—Compares the training of educational psychologists in Scotland and in England. Scottish educational psychologists are required to have an honors degree in psychology or its equivalent, a recognized teaching qualification, and postgraduate professional training, either through a formal course or through on-the-job apprenticeship. Among the strengths of the Scottish program are its strong educational flavor, especially in the training, which includes the Master's degree in Education, and the fact that it allows mature, experienced people the opportunity to enter the profession. Students have more time to consider their careers than they do in the English system. The Scottish tendency to see psychological services as an extension of the teaching profession can be both a strength and a weakness. The latter refers to the lower initial salaries, a problem which is overcome at the senior level.—*I. L. Zimmerman*.

3221. Nishizono, Masahisa. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[New psychiatry and nursing: VIII. History of psychiatric treatment focused on schizophrenics.]** (Japn) *Kyushu Neuro-psychiatry*, 1971(Oct), Vol 17(2), 98-104.—Suggests that for effective treatment psychiatrists and nurses must understand not only the use of drugs but also the importance of humanitarian treatment of patients. The patients must understand the importance of establishing better interpersonal relationships.

3222. Padilla, Elena & Goldston, Stephen E. (New York U, Graduate School of Public Administration) **Role of schools of public health in the development of mental health manpower.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 16-23.—Presents research findings on the perceptions of graduates of accredited schools of public health concerning the mental health training they received and the place of mental health in public health work. Questionnaires were mailed in 1968 to 4,459 American citizens who received MA degrees during 1961-1967. Data obtained from the 2,605 respondents reveal the extent of exposure to mental health in public health training and the limited impact of this training in schools of public health on the production of mental health manpower and public health workers capable of performing mental health functions. Policy considerations for strengthening mental health in public health training are suggested.—*Journal abstract*.

3223. Paiva, Rosalia E.; Juan, Isabel R. & Haley, Harold B. (Southern Illinois U, Medical School) **Factors in internship choice.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 343-350.—Tested the assumption that in postgraduate medical education internships offered by different types of hospitals attract different types of individuals. An extensive questionnaire and 3

standardized psychometric instruments (the Gordon Survey of Interpersonal Values, the Study of Values test, and the Rokeach Dogmatism Scale) were administered to 535 senior medical students, divided into 3 groups by their choice of either a university, a municipal, or a private hospital for internship. It was found that this choice was mainly related to: (a) the medical school attended; (b) the relative importance the S placed on teaching, available residency programs, individual responsibility, and association with other physicians; (c) financial factors; (d) expressed choice of career and type of practice; (e) influence received from various individuals; (f) research experience while in medical school; and (g) some motivational patterns affecting relationships with others.—*Journal abstract*.

3224. Parlow, J. & Rothman, A. (U Toronto, Ontario, Canada) **Attitudes towards social issues in medicine of five health science faculties.** *Social Science & Medicine*, 1974(Jun), Vol 8(6), 351-358.—Developed the Attitudes Toward Social Issues in Medicine (ATSIM) scale, a Likert-type instrument, to assess attitudes toward social issues in health care. The 7 scales were named Social Factors, Doctor-Patient Relations, Paramedical Cooperation, Preventive Medicine, Government Role, General Liberalism, and Social Desirability. The ATSIM was administered to a total of 750 students in dentistry, medicine, nursing (undergraduate and postgraduate), pharmacy, and social work. Univariate analyses comparing medicine to each of the other groups showed significantly higher scores for nursing and social work than for medicine on almost all the ATSIM scales; medicine differed from dentistry on only 1 scale, and from pharmacy on 3 scales. Multivariate analyses showed that nursing and social work groups had similar attitudes, while dentistry, medicine, and pharmacy formed a separate cluster, scoring lower on all scales except Social Factors and Social Desirability. All 3 student groups for whom data were collected in each year of their program (social work, nursing undergraduates, and nursing postgraduates) showed a pattern of increasing ATSIM scores over their stay at university; this contrasts with other studies of medical and dental students, which have shown a deterioration in such attitudes. The ATSIM scales appeared to be sensitive differences among different health science faculties, as well as to intrafaculty differences among course years. (41 ref)—*Journal abstract*.

3225. Parlow, Jack & Rothman, Arthur I. (U Toronto, Faculty of Medicine, Ontario, Canada) **ATSIM: A scale to measure attitudes toward psychosocial factors in health care.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 385-387.—Describes the Attitudes Toward Social Issues in Medicine (ATSIM) scale, a 63-item Likert-type instrument intended for medical and health science students. The 7 scales of the ATSIM and their reliabilities are presented, and possible uses of the instrument are discussed.

3226. Patterson, Lewis E.; Hayes, Robert W. & McIntire, Paul R. (Cleveland State U, Coll of Education) **Careers in operation: Industry as a laboratory for counselor development.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 64-70.—Describes a guidance fellowship program in school counseling which is



conducted with workers of General Electric. Emphasis is placed on counselor contributions to career development, the characteristics of life within an industrial complex, sensitivity to the feelings of others, and the effects that counselors can have on these feelings, counseling theory and skills, and the psychology of vocational development. Selection and training processes and specific techniques used by the trainees for experiencing self and others are described.—*L. Gorsey.*

3227. **Plaut, Eric A.** (Indiana State Dept of Mental Health, Indianapolis) **A perspective on confidentiality.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1021-1024.—Notes that the confidentiality of communications from psychiatric patients is threatened from many directions. The traditional stance of psychiatrists has been to proclaim total confidentiality as the principle and then to make exceptions. It is argued that, as third-party payers, peer-review structures, and governmental agencies erode the exclusively dyadic doctor-patient relationship, the traditional stance no longer suffices. What is needed is a thorough understanding of the forces involved and a set of principles to help assess the real needs for confidentiality in a variety of psychiatrist-patient interactions.—*Journal abstract.*

3228. **Richards, James M.** (Johns Hopkins U, Ctr for Social Organization of Schools, Careers Program) **Environmental psychology: A case study of scientific specialization.** *Center for Social Organization of Schools Report, Johns Hopkins University*, 1974(Sep), No 179, 11 p.—As a step toward understanding specializing in environmental problems, 73 environmental psychology researchers were compared with 109 interpersonal attraction researchers and with 179 psychologists in general on measures of current career and educational background. Both groups of researchers are more oriented than other psychologists to scientific aspects of psychology and less oriented to people-related aspects. Fewer differences were obtained between the 2 research groups, although the environmental psychologists seem somewhat more biologically and quantitatively oriented, perhaps a reflection of an ecological perspective. The clearest trend appears to be that a more heterogeneous area like environmental psychology will attract a more diverse group of researchers. (25 ref)—*Journal abstract.*

3229. **Schneider, Seymour.** **The autonomous functioning of Adlerian nonprofessionals.** *Individual Psychologist*, 1974(May), Vol 11(1), 1-3.—Explored the effectiveness of Adlerian nonprofessionals in 2 community-based family education centers. Results indicate that the Ss could discriminate the goals of a child's misbehavior significantly better than recently-graduated masters-level students and a matched group of untrained laymen. Implications of the study are discussed.

3230. **Shenkin, Budd N.** (US Dept of Health, Education, & Welfare, Office of the Assistant Secretary for Washington, DC) **Medical education, medical care, and society in Sweden.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 357-367.—Reports that Swedish medical education is nationally financed and organized; selection of students is centralized, objective, based on scientific aptitude, and keenly competitive. Enrollment, determined by legislation, has more than tripled since 1950. The curriculum is rigidly post-Flexnerian, but

social medicine is stressed. The national government adjusts medical training to serve both societal needs and professional interests. A 1969 reform resulted in a more tightly structured postgraduate education program. Medical students are state supported, well organized, and active in radical political movements. As in Swedish society at large, efforts to promote equality, integration, and democracy in the medical education process have met with limited success, as traditional values of objectivity and expertise impede some changes. Education produces experts rather than liberally educated citizens. Idealism remains strong, however, and its influence is an important force. (17 ref)—*Journal abstract.*

3231. **Signell, Karen A.** (San Mateo County Mental Health Services Div, North County Mental Health Ctr, Daly City, CA) **An interaction method of teaching consultation: Role-playing.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 205-215.—Presents guidelines and suggestions for exercises for instructors using role-playing techniques in classroom settings, specifically courses in consultation procedures. First, instructors show standard techniques and how to handle awkward situations. The students first experience role-playing in the familiar role of therapist to differentiate therapy and consultation responses. Then they practice being consultants, anticipating certain pitfalls in consultation. Later, they role-play consultees and discover which consultation interventions work best. Class members generally set up their own role-playing, challenge the limits of each others' styles, and draw upon their role-life experiences in class as a model.—*Journal abstract.*

3232. **Singh, S. B. & Nigam, Asha.** (GSVM Medical Coll, Kanpur, India) **A comparative study of the personality profile of the male and female medical students.** *Indian Journal of Psychometry & Education*, 1973, Vol 4(1), 30-33.—Compared 30 male and 25 female medical students, using Kapoor's Hindi version of the 16 Personality Factor test. Results indicate that males were significantly warmer (Factor A), more sensitive (Factor I), more suspicious and jealous (Factor L), and more anxious (2nd order Anxiety) than females. Results are attributed to the greater responsibilities male professionals are called upon to bear in Indian society.—*J. B. Francis.*

3233. **Spence, Donald P.; Lugo, Marta & Youdin, Robert.** (New York U, Research Ctr for Mental Health) **Cardiac correlates of cognitive processing.** *Psychosomatic Medicine*, 1974(Sep-Oct), Vol 36(5), 420-437.—A 17-min passage taken from a simulated psychoanalytic interview was played to a group of 14 trained therapists, 10 therapists in training, and 16 inexperienced undergraduates who were alerted to the organizing theme (of termination of treatment) and asked to attend to direct and indirect references to this theme. Tonic heart rate (HR) averaged over 30-sec periods, was lower when clues were present than during control periods when clues were not present. Phasic HR (11-sec profiles) in the vicinity of each clue was significantly lower than profiles surrounding control passages. Profiles surrounding recalled clues were significantly lower than profiles surrounding control clues. Profiles surrounding more relevant clues were significantly lower than profiles

surrounding control clues whether or not the clue was recalled later. Findings suggest that decrease in mean HR can be used to mark the appearance of a significant stimulus even in cases where it does not appear in later recall; thus an on-line HR decrease may be a more sensitive index of stimulus processing than a later verbal report. Correlations were also found between HR change and clinical experience and between awareness of termination clues and clinical orientation.—*Journal abstract.*

3234. Tauber, Lewis E. **Specialties in professional practice.** *Ontario Psychologist*, 1974(Aug), Vol 6(3), 16-30.—Considers the identification of specialties and specialty functioning, the establishment of standards and specialty boards, and some of the issues involved.

3235. Turner, Edward V.; Helper, Malcolm M. & Kriska, S. David. (Ohio State U, Medical School) **Predictors of clinical performance.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 338-342.—50 3rd-yr medical students studying pediatrics were videotaped during their interview and physical examination of outpatients. Ratings based upon observed actions of the students in 3 areas thought to be components of clinical competence—communication skill, interpersonal skill, and physical examination skill—were summed to yield a composite variable which was correlated with 60 psychological traits and scores on 6 ability tests (e.g., the 16PF and the Medical College Admission Test). 11 of the 66 measures had significant correlations ( $p < .10$ ). Consideration should be given to the possible value of psychological tests as predictors of clinical competence. (16 ref)—*Journal abstract.*

3236. Ulman, Elinor & Levy, Bernard I. (George Washington U) **Art therapists as diagnosticians.** *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 35-38.—Discusses the theoretical role of the art therapist as a diagnostician. The philosophical and psychological background of such a role is presented, and the implications for education in art therapy are considered.

3237. Van Cott, Harold P. (American Psychological Association, Washington, DC) **Innovations in the transfer of psychological information: The communications programme of the American Psychological Association.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 193-196.—Describes the origin, development, current status, and plans of the American Psychological Association's communications program, including both informal communications (conferences, etc) and publications and bibliographic information (through journals). The program appears to have been responsive to the needs of both basic and applied psychologists.

3238. Weinstein, Philip & Gipple, Cindy. (U Washington, Office of Research in Medical Education) **The relationship of study skills to achievement in the first 2 years of medical school.** *Journal of Medical Education*, 1974(Sep), Vol 49(9), 902-904.—Administered the Study Habits Inventory to 108 freshmen and 78 sophomore medical students. Study skills were more highly related to achievement (grade point averages) than to aptitude (Medical College Admission Test) scores; this relationship was stronger for freshmen than for sophomores. Results of a factor analysis of predictors of academic failure are also presented.

3239. Wiener, Stanley L. (State U New York, Medical School, Stony Brook) **Ward rounds revisited: The validity of the data base.** *Journal of Medical Education*, 1974(Apr), Vol 49(4), 351-356.—Describes a new format for ward rounds on a large medical service designed to correct deficiencies in history-taking, interviewing, and physical diagnosis techniques. Since the new format was instituted, a marked improvement has occurred in house staff performance in those areas. In addition, the new method has allowed for more vivid patient-based rounds and has minimized discussions which keep physicians away from the bedside. It is designed to emphasize basic clinical skills, observation, and reasoning, and may be used exclusively or intermittently with rounds based on case presentation.—*Journal abstract.*

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

3240. Auger, Terrance J. & Auger, Sue E. (Illinois Dept of Mental Health, Herman) **Differences in perceptions of the seriousness of various behavior descriptors among mental health staff and others.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 93-101.—Administered the Peterson-Quay Behavior Problem Checklist to a total of 147 professional staff members, teachers, and parents of emotionally disturbed and/or mentally retarded children in an inpatient treatment center. Ss ranked each of the 55 checklist items in terms of its judged importance in the mental health of children. Results show that 6 of the 17 behaviors associated with conduct problems appeared among the 10 most important items ranked by the parent sample; only 2 of these behaviors appeared among the 10 most important items ranked by the center's staff and the public school teachers. These findings suggest the validity of parents' perceptions of the seriousness of behavior disorders manifested by their own institutionalized children.—*Journal abstract.*

3241. Benton, Arthur L. (U Iowa) **Clinical neuropsychology of childhood: An overview.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Briefly surveys neuropsychological studies of children and assesses their achievements, limitations, and prospects for elucidating the relations between behavior and the structure and functions of the nervous system.

3242. Boucebc, M. [About psychiatry in Algeria.] (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 427-433.—Presents a review of 13 doctoral dissertations dealing with various aspects of mental health in Algeria.

3243. Davison, Leslie A. (U California, San Francisco) **Current status of clinical neuropsychology.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Discusses developments and practical problems in child and in adult clinical neuropsychology, considers the use of neuropsychological assessment as a study technique, and evaluates clinical-individual vs general knowledge in research studies as well as in patient categorization.



3244. Dement, William C. & Villablanca, Jaime. (Stanford U, Medical School) **Clinical disorders in man and animal model experiments.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Reviews data on primary, secondary, and interactive sleep disturbances and the indicated treatments for each. Primary disorders include the dyssomnias, the syndromes of drug dependency, and the syndromes of inadequate sleep. In secondary disorders the sleep disturbance is a direct consequence of a pathological condition, while in interactive disorders the disease manifestations, although of independent origin, are related to sleep stages or to prolongation of the recumbent position.

3245. Garcia, Eugene E. & DeHaven, Everett D. (U Utah) **Use of operant techniques in the establishment and generalization of language: A review and analysis.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 169-178.—Operant training techniques have been used successfully to establish and remediate speech and language behavior. Review of experimental reports suggests that an operant technology presently exists for establishing verbal imitation and can be used as a basis for training different forms of receptive and expressive speech. It is urged that research, especially in the newer areas of generative speech training and generalized speech usage, should continue to maintain the present momentum in the analysis of language development. (50 ref)—*Journal abstract*.

3246. Noel, B. & Revil, D. (Centre Hosp, Lab de Cytogénétique, Chambéry, France) **Some personality perspectives of XYY individuals taken from the general population.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 219-225.—Compared the psychological characteristics of 16 Ss having a 47,XYY chromosome, with those of a group of normal Ss who were matched for education, age, height, and socioeconomic status. XYY Ss had a certain degree of psychomotor difficulty, a lower level for emotional control, lower tolerance for inappropriate responses, and a less mature self-concept.—E. B. Jaffa.

3247. Parker, Elizabeth. (Special Hosp Research Unit, London, England) **The victims of mentally disordered female offenders.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 51-59.—Studied case records of 55 victims of 47 female offenders who committed murder, manslaughter, attempted murder, or wounding and who were found to be insane or admitted to a mental hospital. Of the 47 offenders, 39 attacked 1 person and 8 attacked 2 persons. 70% of the murder victims and 75% of the manslaughter victims were related to their assailants. 59% of the victims were male and 41% were female; males and females were equally represented in the murder and manslaughter groups, but the victims of attempted murder and wounding were predominantly male. Persons under 16 yrs of age constituted 2/5 of the victims and were more often victims of the fatal offenses, whereas the majority of the attempted murder and wounding victims were adults. Data on the place, time and method of attack are also discussed, and all findings are compared to previous studies of the characteristics of crimes by mentally disturbed persons.—L. Gorsej.

3248. Pillard, Richard C.; Rose, Robert M. & Sherwood, Michael. (Boston U, Medical School) **Plasma testosterone levels in homosexual men.** *Archives of Sexual Behavior*, 1974(Sep), Vol 3(5), 453-458.—Administered the Profile of Mood States to, and measured plasma testosterone levels in, 28 19-34 yr old male homosexuals. The Psychiatric Status Schedule was also completed for each S and background information was obtained in individual interviews. The overall mean testosterone levels for the homosexuals were somewhat lower than for a control group of heterosexual men, but the range of values for the 2 groups showed considerable overlap. Among the homosexuals, the 13 with some heterosexual experience had higher testosterone levels than the 15 without heterosexual experience. Testosterone levels were not related to relative masculinity or femininity or to any other psychological variables measured. (16 ref)—*Journal abstract*.

3249. Reitan, Ralph M. & Davison, Leslie A. (Eds.). (U Washington) **Clinical neuropsychology: Current status and applications.** Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.

3250. Reitan, Ralph M. (U Washington) **Methodological problems in clinical neuropsychology.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Uses empirical research data to outline methodological steps toward advancing knowledge of human brain-behavior relationships and, specifically, ways to predict neurological bases of behavioral deficits for individual patients.

3251. Tennent, Gavin; Loucas, Kypros; Fenton, George & Fenwick, Peter. (St Brendan's Hosp, Bermuda) **Male admissions to Broadmoor Hospital.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 44-50.—Examined demographic, diagnostic, and criminal records of 178 male consecutive admissions to Broadmoor Hospital, an English maximum security mental hospital for dangerous or violent patients. Findings were compared with those from 350 other offender and nonoffender psychiatric patients from an area mental hospital. There were more similarities than differences between the 2 offender groups, although fewer Broadmoor patients had had previous hospital admissions, and there was a longer interval between the present admission and previous hospitalizations for the Broadmoor Ss. Data on the relationship between diagnosis and type of offense are also presented.—*Journal summary*.

3252. Weijel, J. A. (U Amsterdam, Inst of Social Medicine, Netherlands) **The influence of social security in an affluent society on illness behaviour.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 272-281.—Argues that those who are somatically ill, psychosomatically disturbed, or psychosocially deficient are expelled from the labor market through the channel of the social security system and so cushioned against impoverishment. It is not wealth which decides illness behavior but the social security system which makes health care available for a whole population and prevents the pauperization of the lower classes. (17 ref)—*Journal abstract*.

3253. Zolt, Nathan. (U Illinois, Abraham Lincoln School of Medicine, Chicago) **Equivalence hypothesis of**

**mental and somatic processes: Clinical considerations.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 309-315.—Based on N. Zolt's (see PA, Vol 50:1387) initial article on the equivalence hypothesis of mental and physical processes, a discussion of clinical manifestations of disease, general treatment considerations, treatment procedures, and limitations of treatment is presented. The equivalence hypothesis argues that the brain is essentially an emotional organ, that every part of the brain is involved in emotional process formation, and that complex thought processes can be explained in terms of physiological functions. 5 characteristics of pain are outlined and related to characteristics of both disease and emotional states. Proper diagnosis and treatment depend on finding the proper balance of "afferent" and "efferent" systems in the body; methods of activating these systems in turn depend on assessing the proportions of direct, retrograde, and parallel activation and facilitating their balance.—L. Gorsey.

### Mental Disorders

3254. Aleksandrowicz, Jerzy W. (Cracow Medical Academy, Psychiatric Clinic, Poland) [An attempt to analyze the factors contributing to a change of diagnosis in neurotic patients.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Feb), Vol 26(2), 111-112.—Discusses 3 types of clinical diagnosis of neurotic syndromes: (a) the primary, presenting diagnosis; (b) subdivision of the primary diagnosis into components which recognize the personality structure and etiological origins of the disturbance; and (c) diagnosis in an unofficial clinical jargon.

3255. Astrachan, Boris M.; Brauer, Lee; Harrow, Martin & Schwartz, Carol. (Yale U, Medical School) **Symptomatic outcome in schizophrenia.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 155-160.—Interviewed a total of 132 schizophrenic patients, treated on 6 inpatient units and discharged to the community, 2-3 yrs after discharge. Virtually no patients were symptom free. Only 5 were healthy on 3 neurotic and psychotic indexes (Gurin Mental Status Index, New Haven Schizophrenia Index, and the Psychiatric Evaluation Form). Approximately 1/4 of the entire sample had considerable symptoms of psychosis. Social class was most strongly related to symptomatic outcome. High social class was associated with better symptomatic outcome (particularly psychotic symptoms). Neurotic symptomatology was influenced by race. Psychotic symptomatology was also influenced by length of time in treatment and in drug therapy. Overall symptomatology and psychotic and neurotic factors were independent of marital status and other described predictive items, including age at onset, precipitating factors, family members ever in treatment, and depression and confusers during the index episode. (37 ref)—*Journal abstract*.

3256. Bach-y-Rita, George & Veno, Arthur. (Langley Porter Neuropsychiatric Inst, U California, San Francisco) **Habitual violence: A profile of 62 men.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1015-1017.—Used questionnaire and psychiatric examination data to study 62 habitually violent patient-inmates from a prison population for life history and clinical variables. An extraordinarily high incidence of self-destructive

behavior and self-mutilation was found as well as a high incidence of childhood pathology suggestive of deprivation and neurological impairment in these patients. The population was also found to be heterogeneous, differing on several significant variables.—*Journal abstract*.

3257. Bach-y-Rita, George. (Langley Porter Neuropsychiatric Inst, U California, San Francisco) **Habitual violence and self-mutilation.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1018-1020.—37% of a group of 22 habitually violent male patient-inmates were observed on admission to a special prison facility to have scars resulting from self-inflicted wounds. It was found that these men revealed considerable psychopathology beginning at an early age. The importance of identifying such patients and of treating them separately from other violent individuals is discussed. (19 ref)—*Journal abstract*.

3258. Battle, Allan O. (U Tennessee) **The psychological appraisal of a patient who had performed self-castration.** *British Journal of Projective Psychology & Personality Study*, 1973(Dec), Vol 18(2), 5-17.—Discusses the case history and test results of a 19-yr-old man who cut off his own penis. His responses to the Rorschach, Projective Wishes, and Draw-A-Person tests are presented in full and interpreted in the perspective of his family background, early history, medical record, and current interpersonal relations. This analysis suggests (a) severe conflicts concerning sexual impulses and masturbation guilt due to a rigid superego, (b) the breakdown of ego control in the presence of emotional stimuli, and (c) loss of reality contact in both the intellectual and emotional spheres.—J. Adams-Webber.

3259. Beck, Aaron. (U Pennsylvania) **Cognition, affect, and psychopathology.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Presents a classification of neurotic conditions based on the typical cognitive content of each of the disorders. Perseverative conceptualizations relevant to danger, loss, unjustified attack, and self-enhancement are typical of anxiety neuroses, depression, paranoid states, and hypomanic states, respectively. (15 ref)

3260. Behar, Lenore & Siringfield, Samuel. (U North Carolina, Chapel Hill) **A behavior rating scale for the preschool child.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 601-610.—Attempted to provide a tool that could be used by preschool teachers and child-care workers to identify children who show symptoms that may suggest emotional disturbance. A modification of Rutter's Children's Behaviour Questionnaire was standardized on a sample of 496 normal and 102 emotionally disturbed preschool children. The modified questionnaire (renamed the Preschool Behavior Questionnaire) was found to possess criterion validity and high interrater and test-retest reliabilities. 3 factors were extracted and were labeled Hostile-Aggressive, Anxious-Fearful, and Hyperactive-Distractible. Data indicate that the Preschool Behavior Questionnaire may be valuable in either clinical or research settings for the first step in early detection of emotional problems. (22 ref)—*Journal abstract*.

3261. Bengtsson, G.; Fällström, K.; Jansson, B. & Nachemson, A. (U Göteborg, Sweden) **A psychological**



and psychiatric investigation of the adjustment of female scoliosis patients. *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 50-59.—Studied the adjustment of 26 23-63 yr old women with an idiopathic scoliosis of a high degree (average curvature was 105°) by means of (a) a psychiatric interview, (b) a sociopsychological evaluation based on the patient's writings about her life and an unstructured interview, and (c) a personality evaluation based on scores on the Bender Gestalt Test and the Rorschach test. A synthesis was made of the different evaluations characterizing the patients' experience of disability according to a 4-grade scale. This variable was then related to important somatic variables. The patients' superficial psychosocial adjustment was very good; only 1 woman had an invalid pension and the psychiatric contact of the material only moderately exceeded the figure for other women with the same age distribution. However, results of the personality examination indicate that adjustment was not always so good. 2 case histories illustrate the discrepancy between a good superficial adjustment and a high-grade psychological handicap. The patients' lives were marked to a high degree by their deformity. The group was characterized by hypersensitivity and insecurity, with a tendency to dysphoric mood; the level of energy was high. Psychological adjustment deteriorated with an increasing degree of deformity. Poor vital capacity also impaired adjustment.—*Journal abstract*.

3262. Billig, Otto & Burton-Bradley, B. G. (Vanderbilt U, Medical School) **Psychotic "art" in New Guinea.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 40-62.—Compared spontaneous graphics by psychotic indigenous patients of various areas in New Guinea with those by psychotics from other cultures. The role of geometric designs, "inarticulated" structures, and the representation of space in the graphics is discussed, and possible psychodynamic and psychobiological factors in an individual's organization of reality are analyzed. (45 ref)

3263. Blackburn, Ivy M. (MRC Brain Metabolism Unit, U Edinburgh, Scotland) **The pattern of hostility in affective illness.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 141-145.—Tested 6 groups of patients ( $N = 106$ ) suffering from a bipolar or unipolar affective illness on a measure of hostility to differentiate between unipolar and bipolar depression and to study the pattern of hostility in mania. The groups were bipolar actively manic, bipolar recovered manic, bipolar actively depressive, bipolar recovered depressive, unipolar actively depressive, and unipolar recovered depressive. Results show that unipolar and bipolar depressives differed on extrapunitive while manics differed from both types of depressives in extra- and intropunitive. The changes occurring with recovery were also studied in each group, and the role of hostility in affective illness is discussed.—*Journal summary*.

3264. Blankenburg, W. (Heidelberg U, Psychiatric Clinic, W Germany) **[Fundamentals of the concept of an "anthropological proportion."]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 322-333.—Presents a theoretical philosophical discussion of the ideas of L. Binswanger and others on the concept of an anthropological proportion and the

importance of these ideas for psychopathology. (English summary) (33 ref)

3265. Bottenberg, E. H. & Finster, H. (Niedersachsen Pedagogical Coll, Brunswick, W Germany) **[Child-rearing conditions and anxiety in children.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Apr), Vol 23(3), 88-98.—Investigated the relationship between anxiety in children, measured by the Children's Anxiety Test (F. Thurner and U. Tewes), and various attitudes of mothers and teachers. Ss were 175 3rd and 4th graders of both sexes. Maternal attitudes were measured by the German form of the Parental Attitude Research Instrument (E. S. Schaefer and R. Q. Bell). Low but significant correlations were found between maternal child-rearing attitudes and child anxiety. Authoritarian personality in the mother also correlated with child anxiety to a low but significant degree; authoritarian personality in the teacher correlated to a low but very significant degree. Maternal punitiveness (as reported by the Ss) showed low correlation with anxiety, significant for girls only. In boys, anxiety was associated primarily with authoritarian attitudes; in girls, with attitudes of hostility and rejection. Basic dimensions of maternal child-rearing attitudes are discussed. (61 ref)—H. A. Euler.

3266. Burgess, Ann W. & Holmstrom, Lynda L. **Rape trauma syndrome.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 981-986.—Interviewed and followed 146 patients admitted during a 1-yr period to the emergency ward of a city hospital with a presenting complaint of having been raped. Based upon an analysis of the 92 adult women rape victims in the sample, existence of a rape trauma syndrome is documented, and its symptomatology as well as that of 2 variations, compounded reaction and silent reaction, is delineated. Specific therapeutic techniques are required for each of these 3 reactions. Crisis intervention counseling is effective with typical rape trauma syndrome; additional professional help is needed in the case of compounded reaction; and the silent rape reaction means that the clinician must be alert to indications of the possibility of rape having occurred even when the patient never mentions such an attack. (17 ref)—*Journal abstract*.

3267. Burke, Aggrey W. (U Birmingham, England) **Clinical aspects of attempted suicide among women in Trinidad and Tobago.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 175-176.—Reports that 90 of 350 psychiatric inpatients were admitted because of suicide attempts and 260 for other psychiatric reasons. Though the admission rate was high for 25-44 yr old nonsuicide patients, more of those attempting suicide were younger than those admitted for other reasons. Reasons for and methods of the suicide attempts are listed.

3268. Burlo, Jorge M. (French Hosp, Neurological Ctr, Buenos Aires, Argentina) **[Digital agnosia without acalculia in schizophrenia: Preliminary communication.]** (Span) *Acta Psiquiátrica y Psicología de América Latina*, 1974(Feb), Vol 20(1), 58-59.—Presents a preliminary report on 8 schizophrenic patients exhibiting digital agnosia without acalculia.

3269. Burstein, Alvin G.; Adams, Russell L. & Chapman, Loren J. (U Texas, Health Science Ctr, San Antonio) **Prognosis in schizophrenia: A 5-year follow-up.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol

159(2), 137-140.—Studied the prognostic power of the Elgin Prognostic Scale (EPS) using 3 criteria: hospital status (in or out) 9 mo after admission, hospital status after 5 yrs, and number of days in the hospital during 5 yrs. The EPS predicted 9-mo hospital status and days in the hospital over 5 yrs about equally well ( $r = .29$  and  $.30$ ). Heterosexual achievement, as indicated by either marital history or by item I of the EPS, predicted days in the hospital somewhat better ( $r = .41$  in each case). The EPS predicts somewhat more effectively when applied only to extreme groups.—*Journal abstract.*

3270. Burton-Bradley, B. G. (Div of Mental Health, Boroko, Papua New Guinea) **Social change and psychosomatic response in Papua New Guinea.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 229-238.—Posits that the rapidity of sociocultural changes in Papua New Guinea exceeds the tolerance thresholds of many individuals. By the cosmic and sociopolitical views of the people, they precipitate the clinical entities of the spirit-possession syndrome and of those associated with cargo cult activities. Cultural themes color and embellish the disease picture. Delusional states are predominantly grandiose, the result of technological disparity between the local and alien cultures.

3271. Byrne, Louis; O'Connor, Teresa & Faby, T. J. (St Loman's Hosp, Dublin, Ireland) **The home behaviour of schizophrenic patients living in community and attending a day centre.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 20-24.—Assessed 20 chronic schizophrenic patients attending a day centre and living at home on measures of illness behavior, work performance, productivity, and mental state. Concurrent illness behavior was measured in the home setting. The mean level of illness behavior reported by day center staff was not significantly different from that recorded at home interviews with patients' families. Correlations between home and day center behavior for individual patients were not significant, and the pattern of illness behavior at home was sometimes quite different from that at the day center. A high level of satisfaction among relatives was maintained at 2-yr follow-up. Although all patients improved somewhat in social performance, the poorest results were obtained with aggressive patients.—*Journal summary.*

3272. Cassano, G. B.; Castrogiovanni, P.; Conti, L. & Salis, G. (U Pisa, Inst di Clinica Psichiatrica, Italy) **[Automatic diagnostic procedures in psychiatry.]** (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 61-76.—Describes psychiatric diagnoses obtained from a computer on the basis of a cross-sectional examination of the patient's symptomatology as rated by the Inpatient Multidimensional Psychiatric Scale. A psychopathological profile supplements the conclusions reached independently by discriminant analysis. A high degree of agreement between automatic and clinical diagnoses is noted.

3273. Cazzullo, C. L.; Smeraldi, E. & Penati, G. (Milan Medical School, Inst of Clinical Psychiatry, Italy) **The leucocyte antigenic system HL-A as a possible genetic marker of schizophrenia.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 25-27.—Investigated the human lymphocyte-antigen (HL-A) distribution in 53 unrelated Italian schizophrenics and 386 normal volun-

teers matched for geographic area and racial type. Results indicate more marked differences in HL-A distribution between schizophrenic groups than between overall schizophrenic Ss and controls. Hebeephrenic Ss showed a significantly higher frequency of HL-A<sub>1</sub> than paranoid Ss ( $p < .05$ ). Differences between control and schizophrenic Ss were not significant.

3274. Chailman, Alan. (U Minnesota, Medical School) **The empirical nature of worry.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1140-1141.—Presents an 11-point operational definition which suggests that worry is a good example of self-inflicted suffering; it is so commonly experienced that it provides, for anyone who cares to introspect, a convenient opportunity for further self-understanding and thereby a reduction in personal suffering.

3275. Chipman, Abram & Paykel, Eugene S. (Boston State Hosp, MA) **How ill is the patient at this time? Cues determining clinician's global judgments.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 669-674.—Studied the relationship between an unstructured global rating of severity of illness and structured ratings of individual symptoms (e.g., Brief Psychiatric Rating Scale) in 278 25-60 yr old depressed women. Correlational analyses revealed that patients rated as more severely ill were those showing psychomotor retardation, depressive delusions, agitation, guilt, initial insomnia, hopelessness, suicidal tendencies, verbal complaint of depressed feelings and observed appearance of depression, and less short-term reactivity of mood. Findings suggest that patients showing greater severity on the core symptoms of depression and more characteristics of psychotic or endogenous depression are perceived as more ill. A multiple regression equation derived from 30 symptoms accounted for 56% of variance in the global scale.—*Journal abstract.*

3276. Chodoff, Paul. (George Washington U, Medical School) **The diagnosis of hysteria: An overview.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1073-1078.—Outlines the 3 predominant conceptualizations of hysteria: that described by P. Briquet in 1859 and revived by current researchers, hysteria as a conversion symptom, and the idea of the hysterical personality. Psychoanalytic conceptualizations of hysteria—especially the idea of hysteria as the result of repressed sexuality—and explanatory models alternative to them are also reviewed. Although there is great confusion about the diagnosis of hysteria, it is concluded that the term itself is valuable for psychiatry. Suggestions for clarifying the concept include separating Briquet's hysteria and what has been termed the "hysterical personality" from their identification with hysteria and using the term in the diagnosis of hysterical conversion symptoms. (46 ref)—*Journal abstract.*

3277. Cocozza, Joseph J. & Steadman, Henry J. (New York State Dept of Mental Hygiene, Research Unit, Albany) **Some refinements in the measurement and prediction of dangerous behavior.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1012-1014. Recent analyses of data on the Baxstrom patients (see PA, Vol 49:7655 and 7654 and Vol 59:5567) resulted in some refinements in the authors' measurement of dangerous behavior and in the finding that 2 factors, particularly in



combination, were highly related to subsequent arrest and dangerous behavior: (age—under 50 yrs—and score on the Legal Dangerousness Scale—a score of 5 or more). The implications of this finding for the prediction of dangerous behavior and the need for additional research are discussed. (17 ref)—*Journal abstract*.

3278. Cohen, David B. (U Texas, Austin) **On the etiology of neurosis.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 473-479.—Evaluated the concept of predisposition to neurosis within the context of 2 broad classes of interaction: (a) between organismic and socialization variables which produce relevant dispositions and (b) between these dispositions and current environmental conditions. It is suggested that treating abnormal behavior as a dependent rather than as an independent variable may be a useful approach in studying its etiology. Implications of this analysis for theoretical and methodological approaches to etiology of neurotic phenomena are discussed. (52 ref)—*Journal abstract*.

3279. Cohler, Bertram J. et al. **Social role performance and psychopathology among recently hospitalized and nonhospitalized mothers: II. Correlates with life stress and self-reported psychopathology.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 81-90.—Postulated that greater impairment in the performance of the roles of housewife, wife, mother, friend and neighbor, and daughter in one's own parental family, as measured by the Social Role Performance Instrument, would be associated with greater life stress and greater expressions of psychological distress, as measured by MMPI content scales. Within a group of 47 mothers recently discharged from a psychiatric hospital, the predicted relationship between life stress and impaired role performance did not appear, although this relationship was found within a sample of 18 nonhospitalized mothers in the community. A somewhat different relationship between psychological symptoms and impaired role performance was found within each of the 2 groups. Social withdrawal and psychotic symptoms, in particular, were more often associated with impaired role performance among former patients than among controls. (20 ref)—*Journal abstract*.

3280. Cormane, R. H. (U Amsterdam, Netherlands) **A molecular explanation of stress dermatitis.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 188-194.—Posits that, in contact dermatitis, delayed type allergy usually occurs in conjunction with immediate type. The latter response depends upon precipitation of antigen-antibody complexes within the vessel walls with subsequent fixation of complement and attraction of ancillary cells. All deposition mechanisms of immune complexes except the one involving hydrodynamic forces are mediated by vasoactive amines. The process may be hastened by release of vasoactive amines and hormones due to psychological reasons, stress, or trauma. As a consequence, it is understandable that release of sympathomimetic amines and hormones along with the presence of antigen may perpetuate cell-mediated immunity. (30 ref)

3281. Daut, Randall L. & Chapman, Loren J. (U Wisconsin, Madison) **Object sorting and the heterogeneity of schizophrenia.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 581-584.—Gave 126 schizo-

phrenics who were off drugs, 23 schizophrenics on drugs, and 52 nonpsychotic Ss a 30-item object-sorting test using D. Rapaport et al's passive sorting procedure. Inadequate responses were scored as Restrictive or Expansive. Some schizophrenics made predominantly Restrictive errors, and others made predominantly Expansive errors. Both chronic and newly admitted drug-free schizophrenics exceeded nonpsychotic Ss on the variance of the score of the difference between the 2 kinds of errors. Several potential statistical phenomena that often produce such heightened schizophrenic variance were ruled out. The test identifies patients with diverse error propensities and thus seems promising as a tool for seeking subdisorders within schizophrenia. —*Journal abstract*.

3282. Davis, William E. & Jones, Mark H. (VA Hosp, St Cloud, MN) **Negro vs Caucasian psychological test performance revisited.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 675-679.—Reports that in a group of 2,750 1st and 2nd admissions to the psychiatric unit of a Veteran's Administration hospital differences in proportion of Negroes vs Caucasians receiving schizophrenic, alcoholic, and depressive psychiatric diagnoses were found. Race, education (12 yrs or more vs 11 yrs or less), and diagnosis (schizophrenic vs nonschizophrenic) were varied. Contrary to past research, data from 160 Negro and Caucasian, schizophrenic and nonschizophrenic, and high- and low-educated patients under age 50 reveal no significant race-related main effects on the 9 MMPI clinical scales. Schizophrenics scored higher on the Paranoia (Pa) and Schizophrenia (Sc) scales, and poorly educated patients scored higher on Sc. Higher Pa and Sc scale scores were obtained from poorly educated Negroes but not from higher educated Negroes or Caucasians at both educational levels. Results are discussed in terms of education having an inculturating effect on minority groups and a selective process whereby poorly motivated minority group members drop out of school.—*Journal abstract*.

3283. de M'Uzan, M. **Psychodynamic mechanisms in psychosomatic symptom formation.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 103-110.—Considers that the genesis of the psychosomatic symptom is linked to an original psychic structure totally opposed to that of the neuroses. This structure is characterized by a deficiency, more or less marked, of the phantasmic activities which no longer, or very imperfectly, fulfil their functions of elaboration and integration.

3284. Dekker, Daniel J. & Webb, James T. (Ohio U) **Relationships of the Social Readjustment Rating Scale to psychiatric patient status, anxiety and social desirability.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 125-130.—Compared scores on the Social Readjustment Rating Scale (SRRS) made by 3 groups of Ss: 40 psychiatric inpatients, 40 psychiatric outpatients, and 40 normals. The relationship of the SRRS to 2 MMPI scales, Manifest Anxiety (At) and Social Desirability (So-R), was also evaluated. Results indicate significant differences in SRRS scores between the 2 patient groups and the normal group, but no significant differences between inpatients and outpatients. SRRS scores were significantly correlated with age, At, and So-R. It is concluded that self-reports of stressful life events are

related to the obtaining of psychiatric care. (18 ref)—*W. G. Shipman.*

3285. Depue, Richard A. & Dubicki, Margaret D. (Southern Illinois U, Carbondale) **Hospitalization and premorbid characteristics in withdrawn and active schizophrenics.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 629-632.—Obtained hospitalization and premorbid data on 20 withdrawn and 20 active schizophrenics (mean ages = 38.5 and 40.1 yrs, respectively) using the General Information Questionnaire to explore basic differences between these types of patients. Results show that withdrawns were first hospitalized at an earlier age, stayed in the hospital longer each time they were admitted, spent more of their lives in psychiatric facilities, and had a higher incidence of delusions and hallucinations than actives. Data reflect basic differences beyond the schizophrenic episode since withdrawns were also found to have a poorer overall premorbid adjustment, were less likely to be married, had fewer estimated friends between the ages of 6 and 18, and had fewer estimated high school activities than actives. (16 ref)—*Journal abstract.*

3286. Depue, Richard A. (Southern Illinois U, Carbondale) **The specificity of response interference to schizophrenia.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 529-532.—Recent research has emphasized that the greater-than-normal response interference in schizophrenics is a specific characteristic of schizophrenia. Since arousal is an important variable in response interference and since schizophrenics show patterns of overarousal, it is suggested that arousal would be important to control if behavioral differences between schizophrenics and controls are to be attributed specifically to schizophrenics' special problems of response interference. These ideas were tested by replicating a study by W. E. Broen and L. H. Storms (see PA, Vol 38:7261) using an overaroused control group of 15 nonpsychotic psychiatric inpatients, 15 nonparanoid schizophrenics, and 15 normals in a visual discrimination task. Data show that both the overaroused controls and schizophrenics, while not differing from each other, showed greater decrement of correct responding with increased arousal than the normal controls.—*Journal abstract.*

3287. Dirks, Stanley J. & Kuldau, John M. (Stanford U) **Validity of self-report by psychiatric patients of employment earnings and hospitalization.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 738.—Data from 50 control and 44 experimental male psychiatric ward patients show significant differences between the actual and self-reported number of previous hospitalizations for the experimental Ss and between the actual and self-reported length of hospitalization for the control Ss. Differences between self-reports and Social Security data on employment earnings were significant for experimental Ss.

3288. Dongier, M. (Allan Memorial Inst, Montreal, Quebec, Canada) **Psychosomatic aspects in myocardial infarction in comparison with angina pectoris.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 123-131.—Cites evidence from the literature that some psychodynamic features are more frequent than others in subjects prone to coronary heart disease. As personality changes

often take place following myocardial infarction, retrospective studies are less convincing than prospective ones. However, the latter point in the direction of predominance of obsessive-compulsive character defenses, more in myocardial infarction than in angina pectoris without myocardial infarction. Poverty of fantasy life, operational mode of mental functioning, repression, and control of emotional reactions appear predominantly in the former. (44 ref)—*Journal abstract.*

3289. Dorfman, Wilfred. **Depression and psychosomatic illness.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 87-92.—Current concepts of depression recognize that it may have genetic, constitutional, biochemical, neurophysiological, sociocultural, and psychodynamic factors. Depression can be overt and quite evident; in many instances it can be hidden by more noticeable somatic symptoms and even somatic disease. Concepts of psychosomatic illness have undergone considerable change in that the "specificity" theories which prevailed 30 yrs ago have been superseded by the current belief that all illness is psychosomatic and not limited to a few chosen ones. Depression is often interwoven with psychosomatic illness since it can be the trigger that precipitates a somatic illness as well as its result. (16 ref)—*Journal abstract.*

3290. Epstein, Leonard H. & Stein, David B. (Auburn U) **Feedback-influenced heart rate discrimination.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 585-588.—Used a discrimination paradigm to evaluate detection of heart-rate levels. 7 nonpsychotic psychiatric patients and 3 hospital employees were instructed to press a button when they detected a change in heart rate during a no-feedback, feedback, and 2nd no-feedback phase. Feedback was presented as points on a counter. Operant responding in the presence of both increased and decreased heart rate levels was monitored for each S. Results indicate that Ss did not reliably respond in the presence of the heart-rate levels prior to stimulus control feedback training. Accuracy of responding improved during feedback but decreased slightly at postfeedback. No differences were observed between operant responding to heart-rate increases or decreases. (17 ref)—*Journal abstract.*

3291. Fabrega, Horacio. **Problems implicit in the cultural and social study of depression.** *Psychosomatic Medicine*, 1974(Sep-Oct), Vol 36(5), 377-398.—Discusses Western disease depression to illustrate the relationship between psychiatric disease and social systems. 2 areas are covered: Part 1 is an analytical discussion of problems inherent in the field of cultural psychiatry. Part 2 addresses problems involved in the study of depression in Western nations. Epidemiological questions and factors involving the influence of social factors in the onset, duration, and manifestations of depression are discussed. (46 ref)—*Journal abstract.*

3292. Friessem, Dieter H. (Bürgerhospitals, Psychiatric Clinic, Stuttgart, W Germany) **[Psychiatric and psychosomatic diseases of foreign workers in the Federal Republic of Germany: A contribution to psychiatry of migration.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Feb), Vol 26(2), 78-90.—Presents demographic data on the more than 2 million foreign industrial workers in Germany in 1973. Incidence



of psychiatric illness is reported for the 5 nationalities with the largest number of immigrants. Turks, Greeks, Spaniards, Yugoslavs, and Italians had the highest percentage of illness, in that order. Turks were significantly higher in several diagnostic categories including neuroses, psychosomatic disorders, abnormal reactions, and attempted suicide. Spaniards were more often schizophrenic. Yugoslavs were more often alcoholics. (67 ref)—*K. J. Hartman*.

3293. **Fulker, D. W.** (U Birmingham, England) **A biometrical genetic approach to intelligence and schizophrenia.** *Social Biology*, 1973(Sep), Vol 20(3), 266-275.—Describes a method that permitted a reanalysis of existing data on schizophrenia and suggests that biometrical genetics could easily be applied to the analysis of human behavior. A brief account of this approach and its underlying assumptions is presented to illustrate the genetics of intelligence and schizophrenia. (29 ref)

3294. **Greden, John F.** (U Michigan, Medical Ctr) **Anxiety or caffeinism: A diagnostic dilemma.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1089-1092.—Reports that high intake of caffeine ("caffeinism") can produce symptoms that are indistinguishable from those of anxiety neurosis, including nervousness, irritability, tremulousness, occasional muscle twitchings, insomnia, sensory disturbances, tachypnea, palpitations, flushing, arrhythmias, diuresis, and gastrointestinal disturbances. The caffeine withdrawal syndrome and the headache associated with it may also mimic anxiety. Patients with caffeinism will generally be identified only by routine inquiry into their caffeine intake. The psychiatrist should especially suspect caffeinism in patients who do not respond to psychopharmacological agents or who have psychophysiological complaints and recurrent headaches, chronic coffee-drinking patients on inpatient psychiatric services, and "hyperkinetic" children. 3 case reports illustrate the syndrome. (29 ref)—*Journal abstract*.

3295. **Hall, Charles P.** (Temple U, School of Business Administration) **Financing mental health services through insurance.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1079-1088.—Outlines the historical development of health insurance in the US, noting how the social, technological, and financial constraints on the treatment of mental illness during the early years of private health insurance led to gaps in coverage for treatment of mental illness. Recent legislative proposals for national health insurance and major issues requiring research and resolution are reviewed.

3296. **Hartog, J.** (U California, San Francisco) **A transcultural view of sibling rank and mental disorder.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 33-49.—Assumes that a transcultural view of the relationship between sibling rank and mental disorder might clarify discrepant East-West observations and point the way towards universal hypotheses. The range of psychological, social psychological, and physiological theories is discussed in terms of the author's observations in Malaysia. The author's biphasic hypothesis, which proposes elevated vulnerability to mental disorder for oldest and youngest siblings, is presented. It is argued that this hypothesis reconciles universal family psychodynamics with cultural variables, opens a valuable new

epidemiological approach to the problem, and refutes the view that sibling-rank differences are merely birthrate artifacts. Areas of research that might bridge the psychological-physiological gap are suggested, and the social and educational implications of sibling rank differences are noted. (41 ref)—*Journal abstract*.

3297. **Haynes, Stephen N.; Follingstad, Diane R. & McGowan, William T.** (U South Carolina) **Insomnia: Sleep patterns and anxiety level.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 69-74.—Conducted 2 studies to assess the sleep patterns, anxiety levels, and muscle tension levels of insomniacs and noninsomniacs. Study 1 involved the administration to 284 Ss of a Sleep Behavior Questionnaire (SBQ) and the Taylor Manifest Anxiety scale (MA scale). In Study 2 the SBQ and MA scale were given to 101 college students. Frontalis muscle activity was measured by electromyogram. Data from the 2 studies support the hypothesis that physiological arousal or anxiety is an etiological factor in insomnia, and suggest that anxiety-reducing procedures may be helpful in treating the problem.—*W. G. Shipman*.

3298. **Holzman, Phillip S. et al.** (U Chicago) **Eye-tracking dysfunctions in schizophrenic patients and their relatives.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 143-151.—Data from 103 psychiatric patients, 53 of their relatives, and 72 nonpatient controls who performed a simple test of smooth-pursuit eye tracking movements show a striking association between deviant eye tracking and clinically diagnosed schizophrenia. A high proportion of the schizophrenic patients' first-degree relatives who were not themselves clinically schizophrenic also showed deviant eye-tracking behavior. The relationship of poor eye tracking and schizophrenia is even stronger when specific psychological test evidence of thought disorder (WAIS and Rorschach Test) is used operationally to classify patients. The eye-tracking dysfunction may thus represent a genetic marker that can prove highly useful for studying the transmission of a vulnerability to schizophrenia. Findings suggest proprioceptive and interoceptive involvement in schizophrenic pathology. (23 ref)—*Journal abstract*.

3299. **Humphrey, John A.** (U North Carolina, Greensboro) **A study of the etiology of sociopathic behavior.** *Diseases of the Nervous System*, 1974(Sep), Vol 35(9), 432-435.—Tested the hypothesis that the incidence of early institutionalization (before age 16) among sociopaths will be significantly higher than for mental patients diagnosed as other than sociopathic. Ss consisted of 50 sociopaths and 59 non-sociopaths (32 paranoid schizophrenics and 27 psychoneurotics) drawn from the resident Caucasian male population of a state psychiatric hospital; most Ss were between 20 and 34 yrs of age. Findings from chart reviews confirm the hypothesis ( $p < .001$ ) and support the suggestion that childhood socialization which takes place under conditions of secondary relations between the child and socializing agents will be ineffective for the development of a self with an adequate role-taking ability. (22 ref)—*Journal abstract*.

3300. **Ikemi, Yujiro, et al.** (Kyushu U, Faculty of Medicine, Fukuoka City, Japan) **Psychosomatic mecha-**

nism under social changes in Japan. *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 240-250.—Notes that, after World War II, the sudden overthrow of the old social establishment and traditional value system in Japan, combined with the direct ill effects of modern industry, has exerted a serious influence upon the health of the Japanese people. Psychosomatic problems, including asthma and allergic disorders, are described in children and students, in females, in workers, and in the aged.

3301. Ineichen, Bernard & Hooper, Douglas. (U Bristol, England) **Wives' mental health and children's behaviour problems in contrasting residential areas.** *Social Science & Medicine*, 1974(Jun), Vol 8(6), 369-374.—A health survey conducted in 5 residential areas revealed comparatively good health among wives in a suburban commuter area. In contrast, a redeveloped central urban area produced a high level of neurosis among wives living in houses and behavior problems among children in high-rise apartments. Social factors which the families themselves associated with these results are discussed.

3302. Isaev, D. N. & Kagan, V. E. (Pediatric Medical Inst, Leningrad, USSR) **Autistic syndromes in children and adolescents.** *Acta Paedopsychiatrica*, 1974, Vol 40(5), 182-189.—Discusses several variants of autism (excluding childhood schizophrenia and Kanner's early infantile autism), stressing the specificity of the organization of cognitive processes, the inconsistency of behavior, and the strange nature of interests and communications characteristic of autistic psychopaths. Peculiarities of autistic manifestations within the framework of organic autism depend on insufficient psychic tension, underdeveloped space-time notions, insufficiency of intelligence as a whole, and the presence of epileptic seizures. Autism may also occur in the form of somatogenic or psychogenic reactions and pathological personality development. It seems to be a nonspecific syndrome of childhood. Peculiar clinical manifestations are associated with peculiarities of the basic disorder. Correlations of clinical, psychological, EEG, and pneumoencephalography data are suggestive of defects and distortions in the system of motivation and behavior planning.—G. Rubin-Rabson.

3303. Johnson, D. A. & Heather, B. B. (Crumpsall Hosp, Manchester, England) **The sensitivity of the Beck Depression Inventory to changes of symptomatology.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 184-185.—Interviewed 73 patients on 3 occasions from 7 days to 18 wks after exhibiting a new episode of depressive illness to test whether the Beck Depression Inventory can measure change in a depressive mood. Results suggest that the Inventory is sensitive to improvements of symptomatology which do not warrant a change of clinical rating.

3304. Jones, Fredric H. (U Rochester, Medical Ctr) **A 4-yr follow-up of vulnerable adolescents.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 20-39.—Attempted to develop predictors of severe psychopathology in early adulthood from behavioral descriptions provided in middle adolescence and early adulthood by parents. Ss were 24 males who were first seen in a psychology department clinic for behavioral problems in

middle adolescence. Assessment of adaptive adequacy at intake and follow-up was in terms of (a) a 4-fold grouping of Ss defined in terms of contrasting styles of coping, (b) the degree of social competence in a broad range of stimulus situations obtained from the cluster analysis of a structured joint parental interview, and (c) overall level of psychopathology obtained from the scaling of a brief description of the target child's behavioral assets and liabilities, which served as the outcome criterion. Prediction to the outcome criterion from the global rating of level of psychopathology at intake which separated those manifesting extreme or bizarre symptoms from the rest of the sample was .58. Two-thirds of the most inadequate category at follow-up were in the same category at intake. The strongest single predictors were 2 clusters assessing the child's cooperativeness, responsibility and maturity in relating to his parents. Prediction to the outcome criterion was increased to .87 by adding to the multiple correlation as predictor variables the global rating of degree of pathology at intake and the 2 dimensions of activity and locus inherent in the 4-fold grouping of Ss. (16 ref) —*Journal abstract.*

3305. Kaffman, Mordecai. **Toilet-training by multiple caretakers: Enuresis among kibbutz children.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 340-365.—In the Israeli kibbutz system of upbringing, several caretakers as well as the parents are responsible for the toilet training of children. It was assumed that (a) the transfer of the training functions to several theoretically neutral care-taking agents would reduce the pathogenic effects in toilet training of a contingent parent-child emotional conflict and (b) good achievements in sphincter control could be expected with the introduction into kibbutz child-rearing practices of progressive educational principles and psychologically oriented approaches to toilet training. An analysis of a representative sample of 1,376 4-18 yr old kibbutz children shows that Ss had a much higher reported incidence of enuresis up to age 6-7 yrs, and a lower incidence over age 10 yrs, in comparison to nonkibbutz children studied by previous authors. "Regressive" enuresis in response to stress-provoking situations in the parent-child relationship was relatively uncommon among kibbutz children. (22 ref)—*Journal abstract.*

3306. Kandabashi, Nobuharu. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[Statistics on new neuropsychiatric patients at the Kyushu University Hospital: 1970.]** (Jpn) *Kyushu Neuro-psychiatry*, 1971(Oct), Vol 17(2), 107-112.—Presents diagnostic classifications of the patients at the neuropsychiatric division of a Japanese medical college. The trends suggest that social behavior problems are becoming the major reason for hospitalization in the neuropsychiatric division.

3307. Kaplan, Donald M. **On shyness.** *International Journal of Psycho-Analysis*, 1972, Vol 53(4), 439-453.—Describes the processes that may account for the various phenomena called shyness. Neurotic shyness is seen as a species of phobia, specifically social, having phenomenological and dynamic resemblances to depersonalization. The symptom is a continuity of a vivid fantasy activity retained at other moments in the patient's life. In neurotic shyness, a primal family



romance fantasy is specifically pathogenic. The regression in shyness from oedipal conflict is to an oral phase of primal anxiety which undoes consolidations of 8-mo "stranger anxiety." Though neurotic shyness resembles the bashfulness of schizophrenics phenomenologically, the dynamics differ. As a common factor in the etiology of shyness, it is concluded that there was an overt infantilizing contentiousness between parent and child. (58 ref)—R. S. Albin.

3308. Kay, Stanley R. & Singh, Man M. (Bronx State Hosp, NY) **A temporal measure of attention in schizophrenia and its clinical significance.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 146-151. —Developed the Span of Attention Test as a temporal measure of concentration and distractibility for studies with schizophrenics. The evaluation is determined by the average length of time the patient sustains attention at a routine motor task. The clinical value of the test was investigated by administering it to 66 schizophrenic inpatients and 23 nonpsychotic adults. Cross-sectional analyses found the test to distinguish between schizophrenics and nonschizophrenics and between paranoid and nonparanoid schizophrenics, and revealed significant correlations with indices of distractibility, arousal, and withdrawal. Longitudinal study showed the test to be a reliable instrument that monitors the differential course of chronic vs subacute and acute schizophrenics and may have prognostic significance for schizophrenic thought disorder.—*Journal summary*.

3309. Kety, Seymour S. (Harvard U, Medical School, Boston) **From rationalization to reason.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 957-963. —Stresses that psychiatry is a branch of medicine, that psychiatrists are physicians especially equipped to treat mental illness, and that the medical model of mental illness is valid, heuristic, and humanitarian. New data are presented bearing on the reliability of the diagnosis of schizophrenic illness and the importance of genetic factors in the transmission of that syndrome. It is argued that the medical model is as appropriate for the major psychoses as it is for diabetes. (18 ref)—*Journal abstract*.

3310. Kidd, K. K. & Cavalli-Sforza, L. L. (Yale U, Medical School) **An analysis of the genetics of schizophrenia.** *Social Biology*, 1973(Sep), Vol 20(3), 254-265. —Summarizes observers on the inheritance of schizophrenia presented that both genetics and environment contribute in an important way to the disease. Since the heterogeneity of the data makes an accurate analysis difficult, a resolution of the issues is unlikely to come from statistical techniques alone. Future advances in physiological, toxicological, and biochemical research are more likely to supply a firmer basis for understanding the genetic component of this disorder. A crude analysis of a threshold model, using a polygenic or a single-gene hypothesis, shows that both are in approximate agreement with the data. The single-gene hypothesis is thought to be more attractive at this stage of our knowledge. (27 ref)—R. S. Albin.

3311. Knobel, Mauricio. (U Buenos Aires, Medical School, Argentina) **Abnormality in normal development: A concern of symptom formation in childhood.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 35-42. —Utilizes the classic Freudian approach to symptom

formation in discussing basic conflicts with their corresponding anxieties. Normality and pathology become relative terms in child development and may or may not acquire the significance of a structured pathological system. The basic core of symptom formation relies in the interplay of conflictive ego-object relationships. Parental objects being primary structuring figures, the earlier conflicts stem from hampered maturational processes due to this pathological situation. 3 schematic types of somatization are described—hysterical, hypochondriacal, and psychotic—and several clinical cases are briefly presented. (16 ref)—*Journal abstract*.

3312. Kunz, Hans. [Experience, hallucinatory experience, and the certainty of death.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 334-347. —Employs phenomenological analysis in a comparison of real experiences with delusory ones. An analogy is drawn between "primary delusion" and becoming aware of one's own death, and common characteristics of the 2 phenomena are specified. (English summary)

3313. Lader, M. H. & Marks, I. M. (U London, Inst of Psychiatry, England) **The rating of clinical anxiety.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 112-137. —Divides the many scales and inventories that have been introduced for the rating of anxiety into those aimed at assessing "trait anxiety" (habitual anxiousness) and those designed to rate "state anxiety" (anxiety at that moment). The former are essentially personality inventories and include the MMPI, the Taylor Manifest Anxiety scale, the 16 Personality Factor Questionnaire, and the Eysenck Personality Inventory. Clinical rating scales are primarily mood assessment instruments and include simple linear scales, the Hamilton Anxiety Scale, the Lipman Scale, the Psychiatric Outpatient Mood Scales, the Cornell Medical Index, and the Morbid Anxiety Inventory. These scales together with many others are reviewed, their advantages and disadvantages are listed, and recommendations are made for the rating of trait and state anxiety. The importance of distinguishing between scales which establish diagnostic profiles and those which measure changes in the severity of symptoms is emphasized. (5 p ref)—*Journal abstract*.

3314. Lawrence, John E. (North Carolina State U) **Science and sentiment: Overview of research on crowding and human behavior.** *Psychological Bulletin*, 1974(Oct), Vol 81(10), 712-720. —Posits that, despite the increased salience of overcrowding as a social issue, it has generated little behavioral research among human Ss. Experimental evidence from the laboratory is slight and partly inconsistent; problems of definition and measurement obscure analysis in the field. A prevailing view, however, associates high population density with indexes of social and psychological malaise. This article reviews this position in light of seminal comparative and social experimentation. While it is considered difficult to draw firm conclusions from the existing meager body of data, the balance of evidence appears not to support any simple causal relationship between density and socio- or psychopathology. Prognoses of the horrors of overcrowding are judged to be imprecise and premature. Recent research has tended to distinguish between density and crowding, referring to the former in terms of

sociospatial factors and to the latter in terms of individual perception. It is suggested that any theory of crowding should encompass the intrapsychic case and that research should attempt to uncover evidence, if any, of neurophysiological responses to sociospatial variations in density. (58 ref)—*Journal abstract*.

3315. Leslie, Shirley A. (Booth Ball Hosp, Blackley, England) **Psychiatric disorder in the young adolescents of an industrial town.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 113-124.—Describes an epidemiological study of the prevalence of psychiatric disorder among 13-14 yr old children. Ss were a weighted sample of 150 children who were given a psychiatric examination and diagnosed; recommendations for treatment were made for each child on the assumption of unlimited facilities. The assessments were compared with previously administered parental questionnaire scores, and the prevalence rates were calculated. Because only 67.4% of the parental questionnaires were returned, a subsidiary study on a 1:5 sample of nonreturner was completed. Results of this procedure indicate that, particularly among the boys, the prevalence rate was much higher than that of the original sample. After adjustment for the nonreturners, the rates of severe disorder were 6.2 and 2.6% for boys and girls, respectively; for moderate disorder, the rates were 14.6% for boys and 11% for girls. A comparison between the current study and a previous one conducted among 10-11 yr olds in the Isle of Wight suggests that the higher rate in the current study is a feature of the area rather than of the age of the children and not due to different criteria for diagnosis. (15 ref)—*Journal summary*.

3316. Lesse, Stanley. **Psychiatric symptoms in relationship to the intensity of anxiety.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 94-101.—Notes that anxiety is a highly organized psychophysiologic process that follows definitive patterns that are predictable in a vast majority of patients. In a study of 624 patients over a period of 18 yrs it was found that the vast majority of patients, no matter what the nature of the original stress, demonstrate definite evidence of mounting anxiety before there is any evidence of other clinical psychiatric symptoms and signs. 4 components of anxiety—motor (tension), affective, autonomic, and verbal—are described quantitatively. Secondary psychiatric symptoms and signs in almost all instances begin to manifest themselves only after there is a definite appearance of the affective component. A symptom or sign does not disappear until the affective component of anxiety is decreased below a certain threshold. The last symptom or sign to appear is usually the first symptom or sign to disappear as the level of anxiety is reduced.—*Journal abstract*.

3317. Lifshitz, Michaela & Chovers, Atalya. **Encopresis among Israeli kibbutz children.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 326-340.—Analyzed the case records of 50 2-13 yr old children raised on an Israeli kibbutz who were referred to a child guidance clinic because of encopresis (fecal soiling) or fecal withholding. Results correspond to those previously published on soiling children raised in the city within the family framework. Findings tend to support the psychodynamic character of the symptom as a means

of gratification of needs in a child whose environmental contacts (parents and peers) are unsatisfactory. The symptom may also be caused by neuromuscular coordination that has not reached the level expected for the child's age and sex group. The prognosis is usually good even without direct therapeutic intervention. (16 ref)—*Journal abstract*.

3318. Lipsitt, Don R. (Mount Auburn Hosp, Cambridge, MA) **Psychodynamic considerations of hypochondriasis.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 132-139.—Argues that the term hypochondriasis must be considered, in its historical, medical, and sociological context, as a label misused extensively. Attempts at refinement of definition of terms such as hysteria, conversion reaction, somatization, psychophysiological, and psychosomatic diseases are cited; yet the theoretical issues involved are often defiant of clarification, and the problems in clinical differentiation remain complex. A case example of "hypochondriacal patient" illustrates the common clinical dilemmas experienced by patient, house staff, and physicians, the iatrogenic components of dysfunctional doctor-patient relationships, and some of the psychodynamic mechanisms related to the patient's mode of presentation, illness behavior, and ultimate disclosure of intrapsychic as well as psychosocial problems. (38 ref)—*Journal abstract*.

3319. London, Nathaniel J. **An essay on psychoanalytic theory: Two theories of schizophrenia: I. Review and critical assessment of the development of the two theories.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 169-178.—Describes 2 main psychoanalytic theories of schizophrenia, the unitary theory and the specific theory. They appear incompatible with one another, yet both derive from Freud's classical theory of schizophrenia. The unitary theory ascribes primary roles to instinctual drives, anxiety, and defense, thus failing to encompass present knowledge of schizophrenic behaviors. The specific theory, on the other hand, cites the decathexis of the mental representation of objects. Suggestions for ways to confirm this theory are presented. (37 ref)—*Journal summary*.

3320. London, Nathaniel J. **An essay on psychoanalytic theory: Two theories of schizophrenia: II. Discussion and restatement of the specific theory of schizophrenia.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 179-193.—Critiques the tendency within psychoanalysis to overextend crucial psychoanalytic concepts in the service of maintaining a cohesive unified theory. Psychoanalytic metapsychology is viewed as a group of interrelated but separable theories, derived from a common intrapsychic focus and from a common method. The unitary and specific theories of schizophrenia are discussed. Definitions of instinctual drives, object representations, and representations of time and space are provided, and brief histories of the 2 theories are included. (53 ref)—R. S. Albin.

3321. Maher, Brendan. (Harvard U) **Delusional thinking and cognitive disorder.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Presents a hypothesis about the origins of paranoid delusions which suggests that there is a group of patients who suffer from primary perceptual disorders, funda-



mentally biological but influenced by stress, and that these disorders involve vivid and intense sensory input. These experiences demand explanations which the patient develops through the same cognitive processes as found in normal theory-building. (24 ref)

3322. McNeil, T. F.; Persson-Blennow, I. & Kaji, L. (Malmö General Hosp, Sweden) **Reproduction in female psychiatric patients: Severity of mental disturbance near reproduction and rates of obstetric complications.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 23-32. —Studied the relationship between degree of active maternal mental disturbance near reproduction and the total number of obstetric complications during 169 reproductions for 99 female psychiatric patients. The primary source of information on active mental disturbance was the psychiatric records of the patients. Degree of disturbance was rated on a 7-point general psychopathology scale, both for the 10 mo prior to delivery and for the 1st 10 mo postpartum. Degree of active maternal mental disturbance during pregnancy was unrelated to total number of obstetric complications. Degree of active maternal mental disturbance postpartum was slightly negatively related to total number of obstetric complications. Data do not support (a) the psychosomatic hypothesis of a relationship between maternal mental disturbance and somatic complications or (b) the hypothesis that obstetric complications are the intermediate link between severity of psychiatric disturbance in mothers and increased risk for disturbance in their offspring. (21 ref)—*Journal abstract*.

3323. McPherson, F. M.; Presly, A. S.; Armstrong, Jennifer & Curtis, R. H. (Royal Dundee Liff Hosp, Scotland) **"Psychoticism" and psychotic illness.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 152-160. —Administered a 29-item Psychoticism scale to 77 psychotic inpatients to test hypotheses relating Psychoticism and Extraversion to differences within the group of Ss. Results show that scores were largely unaffected by age, vocabulary, and sex; Psychoticism scale scores were independent of Neuroticism, although not of Extraversion and Lie scale, and were stable over time. Psychoticism scale scores did not discriminate between the psychotics and 35 neurotics and 112 normals. However, within the psychotic group, those patients who had delusions of "disintegration," thought disorder, and affective flattening had significantly higher scores than those psychotics without these signs. (22 ref)—*Journal summary*.

3324. Møllerup, E. T. & Rafaelsen, O. J. (Rigshospitalet, Psychochemistry Inst, Copenhagen, Denmark) **Heterogeneity and biochemical findings in manic-melancholic disorders.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 104-111. —Attempts to find biochemical changes related to mental events are well known from the literature concerning manic-depressive psychosis. The most studied areas are probably carbohydrate, electrolyte, and neurotransmitter metabolism. The present article reviews the normal physiological connections which exist between different metabolic reactions belonging to these 3 areas. It is concluded that many different metabolic disturbances possibly might lead to the same mental disorders. It is also emphasized that lithium influences several of the reactions which might

be involved in these metabolic disturbances. (56 ref)—*Journal abstract*.

3325. Mezzich, Juan E.; Demarin, Fred L. & Erickson, James R. (Stanford U, Medical Ctr) **Comparative validity of strategies and indices for differential diagnosis of depressive states from other psychiatric conditions using the MMPI.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 691-698. —Used as source of data the MMPI protocols of 223 18-60 yr old psychiatric inpatients randomly divided into 2 groups for a double cross-validation design, clinical diagnosis of depressive vs nondepressive states as criterion, and multiple regression as the main analytic technique. The individual validity of MMPI scales constructed through empirical (external criterion), purely intuitive, and intuitive plus internal consistency techniques was lower than the validity of regression models. The validity and cross-validity of regression equations obtained from several different sets of scales including "linear models" composed of single scales and "configural models" that included their binary cross-products was very similar across models and across construction techniques of the component scales. A simplified regression formula is provided for diagnostic purposes. (18 ref)—*Journal abstract*.

3326. Mischel, Theodore. (State U New York, Binghamton) **Understanding neurotic behavior: From "mechanism" to "intentionality."** In T. Mischel (Ed), *Understanding other persons*. Totowa, NJ: Rowman and Littlefield, 1974. xv, 266 p.—Notes that there is much in Freud's clinical writings, particularly in the metapsychology, which suggests an attempt to conceptualize neurosis in terms of models drawn from the physical sciences. Freud's interpretation of neuroses as being traceable "back to an excessive repression of libidinal trends" is examined, and the concept of neurotic defenses as techniques of self-deception is explored. (4 p ref)

3327. Morrison, James R. (U California, San Diego) **Bipolar affective disorder and alcoholism.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1130-1133. —Reports that the percentage of manic-depressive patients ( $N = 297$ ) admitted to an acute care psychiatric service who were also diagnosed as alcoholic (36%) was not significantly different from the rate of alcoholism for the entire psychiatry service ( $p < .02$ ). Demographic factors, symptoms, and course of the affective illness did not distinguish alcoholic from nonalcoholic patients. Data do not support a causal relationship between the 2 illnesses, both of which might be considered "primary" in an individual patient.—*Journal abstract*.

3328. Munoz, Rodrigo A. **One hundred private psychiatric patients.** *Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 358-361.—Explored the demographic and clinical characteristics of 100 clients treated by private psychiatrists. Interviews and observations indicate that most Ss had discrete psychiatric disorders and affective disorders, and sought attention because of emergency situations.

3329. Murphy, George E.; Woodruff, Robert A. & Herjanik, Marijan. (Washington U, Medical School) **Primary affective disorder: Selection efficiency of two sets of diagnostic criteria.** *Archives of General Psychia-*

try, 1974(Aug), Vol 31(2), 181-184.—115 patients whose conditions were diagnosed as primary affective disorder were followed up prospectively after a 5-yr interval. The patients were reinterviewed blindly, and 86% were given the same diagnosis at follow-up, evidence of the diagnostic validity of the criteria used for primary affective disorder. The efficiency of criteria recently developed by J. P. Feighner et al (1973) were compared with criteria used in initial evaluation of the patients' conditions by W. Cassidy et al (1957). Within the limits of this study, there is evidence that the Feighner criteria are more inclusive in selecting patients with primary affective disorder with no loss of diagnostic validity.—*Journal abstract.*

3330. Nagaraja, Jaya. **Somnambulism in children: Clinical communication.** *Child Psychiatry Quarterly*, 1974(Jan), Vol 7(1), 18-19.—Discusses somnambulism and its etiology in children. The etiology includes the take-over of activities and direction by the subconscious. 2 case histories are presented. An 8-yr-old boy had several such episodes each night. 3 wks of in-patient treatment on a tranquilizer, followed by 6 wks of the drug on an outpatient basis resulted in a symptomatic recovery for 2 yrs. A 9-yr-old girl who had been sleep walking for 6 mo also responded to tranquilizer treatment.—*R. S. Albin.*

3331. Nolan, J. Dennis. (Ohio State U) **A within-subjects analysis of discrimination shift behavior in schizophrenics.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 497-511.—In 3 experiments, 24 20-68 yr old chronic schizophrenics, 12 20-66 yr old new admissions, 12 18-46 yr old predischARGE patients, and 4 49-56 yr old lobotomized patients were trained on 1 of 4 discrimination-learning tasks, followed by either a reversal-intradimensional-extradimensional shift sequence or an extradimensional-extradimensional-reversal shift sequence. Shift means and subproblem-learning curves indicated that some attentional responding did occur, but that some Ss found it difficult to respond to familiar stimuli in a new way. No differences between patient subgroups were obtained, but individual differences in attention suggest meaningful subvarieties of patients. It is concluded that a within-Ss discrimination shift paradigm can provide useful information about attentional responding, perseverative responding, and ability to deal with familiar stimuli in a new way. (28 ref)—*Journal abstract.*

3332. Offord, D. R. (U Ottawa, Ontario, Canada) **School performance of adult schizophrenics, their siblings and age mates.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 12-19.—Analyzed school records of 51 male and 65 female adult schizophrenics, their 247 male and female siblings, and 116 age-matched controls. 3 types of data were assessed: frequency of repeating, IQ scores, and last regular grade completed. Male schizophrenics' school performance was inferior to that of female schizophrenics on all 3 measures. Male schizophrenics, but not females, did significantly more poorly in school than their age-matched controls, and there was a sizable group of low-IQ males but not of females. Within-family data show that the preschizophrenic differed consistently on school performance from his siblings and age mates only when he was a male

belonging to a low-IQ sibship. (22 ref)—*Journal summary.*

3333. Ornitz, Edward M. et al. (U California, Medical School, Los Angeles) **The recovery cycle of the averaged auditory evoked response during sleep in autistic children.** *Electroencephalography & Clinical Neurophysiology*, 1974(Aug), Vol 37(2), 173-174.—Studied the recovery cycle of the averaged auditory evoked response (AER) during sleep in 28 autistic and 23 normal 22-68 mo old children by measuring the amplitudes and latencies of wave N<sub>1</sub> of the 1st response (R<sub>1</sub>) and the 2nd response (R<sub>2</sub>) to paired clicks. No significant differences in the recovery ratios (R<sub>2</sub>: R<sub>1</sub>) were found between autistic and normal children in either Stage 2 or REM sleep at within-pair stimulus separations of 250, 160, 80, and 40 msec. (French summary)—*Journal summary.*

3334. Overall, John E. (U Texas, Medical Branch, Galveston) **Validity of the Psychological Screening Inventory for psychiatric screening.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 717-719.—Administered the Psychological Screening Inventory to 126 adult psychiatric outpatients. Responses were scored using R. I. Lanyon's clinical scales and J. E. Overall's recently derived factor scoring keys. Responses of 800 normal adults were similarly scored by the 2 methods. Discriminant function analysis revealed 18% misclassification for clinical scale scoring and 22% misclassification for factor scoring. The hit rates are considered appropriately high in view of criterion uncertainty. As in similar studies with other instruments, factor analysis did not provide a superior basis for discriminant validity.—*Journal abstract.*

3335. Pethö, Bertalan. ("Semmelweis" Medical U, Psychiatric Clinic, Budapest, Hungary) **[Nosological aspects of schizophrenia: I. Toward the solution of the problem of a stabilized nosological category.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 136-143.—Reviews the historical process of a more flexible concept of schizophrenia. E. Kraepelin's dichotomy of endogenous psychoses and E. Bleuler's psychogenetically oriented explanation are considered. The current crisis in symptomatology and the formal revival of nosological characteristics are summarized.

3336. Pinard, G. & Tetreault, L. (Inst National de la Recherche Scientifique, Hôpital Saint-Jean de Dieu, Montréal, Ontario, Canada) **[Evaluation of syntactic complexity in psychotic depression.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(2), 103-117.—Reports further developments in earlier research (see PA, Vol 50:7472) in measuring depression from aspects of patient's speech. Syntactic structural complexity of the speech of 10 depressed psychotics revealed statistically significant differences between the frequency of incomplete sentences spoken and other related measures during depression and after recovery. Over a 4-wk period, sentences tended to become more complete and more complex in structure.—*K. J. Hartman.*

3337. Pinkerton, Philip. (U Liverpool, Inst of Child Health, England) **Symptom formation reconsidered in psychosomatic terms.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 44-53.—Presents a system for classify-



ing physical symptoms in childhood disorder under 3 main headings: (a) the somatopsychic sequence in which the basic substrate is an organic lesion giving rise to intellectual and emotional repercussions; (b) the pseudosomatic sequence in which the symptom presentation, though physical, has a basis of purely emotional pathology; and (c) the psychosomatic sequence which should be retained for those specific disorders like asthma, eczema, migraine, and spastic colon which have a pathophysiological substrate activated by emotional factors. The principle common to all 3 syndromes is that symptom formation is dependent upon the lesion itself and upon the child's and parent's attitudes toward it. (22 ref)—*Journal abstract*.

3338. Post, Robert M. & Goodwin, Frederick K. (National Inst of Mental Health, Adult Psychiatry Branch, Bethesda, MD) **Estimation of brain amine metabolism in affective illness: Cerebrospinal fluid studies utilizing probenecid.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 142-156.—To assess central serotonin and dopamine metabolism in 26 patients with affective illness and 8 heroin addicts on methadone, cerebrospinal fluid amine metabolites 5-hydroxyindoleacetic acid (5HIAA) and homovanillic acid (HVA) were measured under baseline conditions and after probenecid administration. 5HIAA and HVA accumulations were increased by the respective amine precursors, tryptophan and levodopa and were decreased by inhibitors of synthesis, parachlorophenylalanine, and  $\alpha$  methylparatyrosine. In depressed and manic patients, 5HIAA levels were similar to those in 7 normal controls, while probenecid-induced accumulations of 5HIAA tended to be lower than those in controls. HVA accumulation in depressed patients was low compared to that in controls. Amitriptyline and imipramine treatment significantly lowered 5HIAA accumulation, suggesting that the tricyclic antidepressants decrease central serotonin turnover. (88 ref)—*Journal abstract*.

3339. Quinlan, Donald M. & Harrow, Martin. (Yale U) **Boundary disturbances in schizophrenia.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 533-541.—Studied 4 types of index associated with the concept of "boundary" with 171 psychiatric inpatients who were tested with the Rorschach and independently assessed on other aspects of psychopathology (e.g., measures of depersonalization, stimulus overinclusion, and derealization). Contaminations and fabulized combinations were correlated with indices of pathology from Rorschach and with other psychopathology measures. Penetration scores were unrelated to pathology. Contaminations were more frequent in schizophrenics than in any more frequent among schizophrenics and latent schizophrenics than in depressives. Penetration responses were less frequent in depressives than in any other group. Support was found for the hypothesis that schizophrenics give certain types of responses considered indicative of boundary disturbance such as contamination responses. (35 ref)—*Journal abstract*.

3340. Raskin, David E. & Sullivan, Kathleen E. (U Washington) **Erotomania.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1033-1035.—The unusual

syndrome of erotomania consists of a delusional belief, usually in a woman, that an older man of higher social status is in love with her. The few cases of erotomania described in the literature are reviewed, 2 new cases are presented, and new dimensions in understanding this condition are discussed.

3341. Rees, W. Linford. (St Bartholomew's Hosp, London, England) **Personality and psychodynamic mechanisms in migraine.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 111-121.—Discusses the complex etiology of migraine and the psychological factors which are either predisposing or precipitating causes of migraine—personality attributes, neurosis and other psychiatric disorders, emotional reactions, changes in life situation, various psychosocial stresses, and periods of overactivity. Mood changes which may accompany an attack of migraine are associated with alterations in energy, concentration, and ability to work. There may also be a somatopsychic sequence of events in which the sufferer may react in various ways to an attack of migraine just as he may react to any other illness or disability. (20 ref)—*Journal abstract*.

3342. Ritzler, Barry & Rosenbaum, Gerald. (U Rochester) **Bilateral transfer of inhibition in the motor learning of schizophrenics and normals.** *Journal of Motor Behavior*, 1974(Sep), Vol 6(3), 205-215.—Evaluated bilateral transfer of the effects of massed practice in motor learning for an adjusted sample of 36 male chronic undifferentiated schizophrenics and 36 normal hospital staff and psychology student matched controls. Ss were trained and tested on a rotary pursuit task under 2 bilateral transfer conditions—rest and no-rest—and 1 nontransfer control condition. Normal Ss demonstrated positive reminiscence scores in the rest condition and significant transfer of inhibitory effects in the no-rest condition. Schizophrenics on the other hand, showed no significant transfer of inhibition. Results are discussed as supporting the hypothesis of a proprioceptive deficit in schizophrenia involving central integrating mechanisms. Such findings also suggest that a proprioceptive deficit might be a significant underlying factor in the cognitive dysfunction and body image disturbances of schizophrenia, processes which also can be explained by impairment in central integrating mechanisms. (18 ref)—*Journal abstract*.

3343. Roback, Howard B.; Webb, Warren W. & Strassberg, Donald. (Vanderbilt U, Medical School) **Personality differences between fee-paying and non-fee paying patients seen for psychological testing.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 734.—Administered the MMPI to 17 21-62 yr old male patients who did not pay their clinic bills and 17 patients who did pay their bills. MMPI and clinical data suggest greater reality disturbance and distortion for the non-fee paying group than for the fee-paying group, and that fee-payment behavior is situationally determined and not a generalized characteristic.

3344. Saccuzzo, Dennis P.; Hirt, Michael & Spencer, Terry J. (Middle Tennessee State U) **Backward masking as a measure of attention in schizophrenia.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 512-522.—Compared backward-masking functions for 2 groups of 16 schizophrenics with the masking functions for 2

control groups (8 undergraduates and 8 nonschizophrenic psychiatric patients). Masking functions were obtained for both single-letter and 8-letter visual displays. The procedure involved a forced-choice letter recognition method analogous to signal detection methodology. Both schizophrenic groups produced longer masking functions, under all conditions, than the 2 control groups whose functions were highly similar. Consistent with "attention" theories of schizophrenia, results indicate that some deficit occurs in schizophrenia at a very early stage of information-processing in the visual system. (22 ref)—*Journal abstract*.

3345. Schless, A. P.; Mendels, J.; Kipperman, A. & Cochrane, C. (U Pennsylvania) **Depression and hostility.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 91-100.—Studied 37 depressed patients to explore the association between depression, hostility, and the direction in which hostility is expressed. A spectrum of hostile behaviors was found, defined by 4 factors, with an approximately equal number of patients turning hostility inward and outward. In patients who tended to turn hostility in, there was a relationship between the degree of turning hostility inward and higher scores on several measures of the severity of depression. Several indicators of outward hostility were related to presence of hysterical features and resentment. These tentative findings are in keeping with a theory which considers depression to be primarily an emotional signal and hostility to serve as a defense. There is evidence that the defense may fail as depression becomes more severe. (38 ref)—*Journal abstract*.

3346. Schlossberg, Arie & Rattok, Yaacov. (Tel Aviv U, Israel) **The autokinetic phenomenon in schizophrenics.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 138-144.—Exposed 26 acute and 46 chronic schizophrenic patients to the autokinetic phenomenon; acute and chronic Ss were further divided into 14 acute and 18 chronic paranoids and 12 acute and 28 chronic nonparanoids. All Ss were 18-40 yrs old, and were receiving phenothiazines. Significant differences were found between all subgroups, except in the cases of chronic nonparanoids vs chronic paranoids and acute paranoids vs a previously reported normal control group ( $p < .05$ ). Results are discussed in terms of ego autonomy and an ego closeness-distance continuum. The autokinetic phenomenon appears useful in differentiating acute paranoids from nonparanoid schizophrenics, thus supporting research which defines paranoids as a distinct diagnostic subgroup.—*Journal abstract*.

3347. Schott, Gerhard & Dietze, Rosemarie A. (Charité Nerve Clinic, Berlin, E Germany) [**The de la Tourette syndrome.**] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 176-182.—Reports 2 cases of the rare Gilles de la Tourette syndrome. Problems related to localization of subcortical atrophy and problems of nosology are discussed.

3348. Shapiro, M. B. & Post, F. (U London, Inst of Psychiatry, England) **Comparison of self-ratings of psychiatric patients with ratings made by a psychiatrist.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 36-41.—Conducted 4 single-case experiments to assess the psychiatrist's ability to predict the degree of symptom intensity reported by 4 psychiatric patients, each with a

long-term nonpsychotic affective disorder. The psychiatrist's predictions were based on interviews with each S, conducted either immediately before or after the patient had reported the intensity of his own symptoms on the Personal Questionnaire (PQ). The psychiatrist also completed the PQ and results were compared with the patient's own responses. 6-17 separate testing sessions were completed and each S was rated on 20-29 different symptoms in each session. The psychiatrist's predictions were exactly correct approximately 60% of the time, and were within 1 scale point at least another 25% of the time. Discrepancies between the psychiatrist and the patients were not related to content but rather to the degree of symptom severity, with accuracy being greater at extreme intensities than in the middle range.—*Journal summary*.

3349. Shean, Glenn; Faia, Christine & Schmaltz, Eileen. (Coll of William & Mary) **Cognitive appraisal of stress and schizophrenic subtype.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 523-528.—Studied differences in patterns of cognitive appraisal and response to stress in a total of 19 male nonparanoid process schizophrenics and paranoid reactive schizophrenics. Paranoids evidenced greater heart-rate response to stress stimuli while rating the stress categories as less disturbing than did nonparanoid Ss. Comparison of autonomic measures and verbal ratings of the slides indicated that paranoids underrated their autonomic response to stress stimuli while nonparanoid Ss overrated it. Results support the clinical literature on defensive styles of the 2 groups. (15 ref)—*Journal abstract*.

3350. Solyom, L.; Beck, P.; Solyom, C. & Hugel, R. (Allan Memorial Inst, Montreal, Quebec, Canada) **Some etiological factors in phobic neurosis.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 69-78.—Studied 47 phobic psychiatric outpatients who were matched for age, sex, marital status, and education with 47 normal persons. 43 of the 47 patients had agoraphobia; the others had specific phobias. 45% of the normals had fears of snakes, heights, spiders, or bees, but these fears caused them no problems; 1 normal S had a mild agoraphobia. Mothers of phobics were more often neurotic and fearful than mothers of normals, and phobic patients had been more fearful as children. On the average, patients developed the phobic symptom at age 20; fearful normals developed their fears at age 11. Phobias of patients typically began following a trauma in adulthood (e.g., separation or death of a loved-one). The train and tunnel phobias of 2 male patients had not been extinguished despite their daily commuting by train through a tunnel. Findings contradict the view that phobias are produced and maintained by conditioning. It is suggested that agoraphobia derives from the reactivation of separation anxiety, whereas specific phobias derive from conditioned responses. (French summary) (24 ref)—*F. Auld*.

3351. Standage, K. F.; Moore, J. A. & Cole, M. G. (Memorial U Newfoundland, St John's, Canada) **Self-mutilation of the genitalia by a female schizophrenic.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 17-20.—Describes the case of a 20-yr-old single woman in whom self-mutilation of the genitalia was associated with the development of schizophrenia. The



psychopathology was dominated by sexual themes and resembled reports of patients with erotomania in the setting of a paranoid or schizophrenic psychosis. The literature on genital mutilation by both male and female patients is briefly reviewed. It is suggested that such behavior in women indicates severely disturbed psychosexual development but lacks diagnostic significance. (French summary)—*Journal summary*.

3352. Stådeli, H. [Causes of the unfavorable development of severely disabled children.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 68-75.—Compares 2 groups of children: (a) 25 who were admitted to a Swiss child clinic in 1954-1969, and were later referred to a psychiatric clinic, and (b) 25 control children referred to an assessment ward during a 5-mo period. The following variables showed different frequencies in the 2 groups and are considered causes of problem development in the target children: (a) psychiatric problems in the parents; (b) the 1st yr of life spent with parents in severely disturbed circumstances, or involving changes in foster parents and/or home; (c) average intelligence, neither high nor low; and (d) diagnosis of character disorders. The implications of these findings for mental health programs are discussed.—*H. A. Euler*.

3353. Stein, Robert. *Incest and human love: The betrayal of the soul in psychotherapy*. Baltimore, MD: Penguin, 1974. xxi, 200 p. \$2.95.—Challenges Freud's central assumption that human development depends on the repression of the incestuous drives. A different attitude toward the incest taboo is proposed, the cultural significance of man's disturbed relationship with his instinctual roots, the effect of this relationship on aspects of masculine and feminine psychology, and the therapeutic role of transference are explored.

3354. Stephens, F. G. & Valentine, M. (Glenside Hosp, Bristol, England) **MMPI and clinical scales compared**. *British Journal of Psychiatry*, 1974(Jul), Vol 125, 42-43.—Administered the MMPI and M. Valentine's standardized psychiatric interview, the CAPRICE system (see PA, Vol 52:1087), to 70 psychiatric patients. Significant associations were found between (a) MMPI scales for Depression, Schizophrenia, and Manifest Anxiety (At) and (b) nearly the equivalent CAPRICE scales for Depression, Psychosis, and Anxiety. These relationships held regardless of whether or not the data included 10 MMPI records with doubtful validity (high F) scores. In these records, there were positive but nonsignificant associations for the same 3 scales. The MMPI scale for Psychasthenia (Pt) did not associate significantly with the CAPRICE scale of obsessional-compulsive disorder in any group.—*Journal summary*.

3355. Sue, Stanley & Sue, Derald W. (U Washington) **MMPI comparisons between Asian-American and non-Asian students utilizing a student health psychiatric clinic**. *Journal of Counseling Psychology*, 1974, Vol 21(5), 423-427.—The MMPI records of a total of 46 Chinese and Japanese students were compared with those of 120 non-Asian students from a university psychiatric clinic. Results indicate that compared to non-Asians, Chinese and Japanese students (a) underutilized the clinic services; (b) possessed more pronounced MMPI scale elevations; and (c) exhibited problems involving somatic

complaints, family discord, and social introversion. Findings are discussed within the context of Asian cultural values. It is suggested that rates of psychopathology have been underestimated for Asian-Americans.—*Journal abstract*.

3356. Sund, A. (U Oslo, Psychiatric Clinic, Norway) **Prognostic factors in the neurotic illness**. *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 90-103.—103 young men in compulsory military service, diagnosed and treated for neurotic illness, were studied by using medical and social background data, follow-up, and personal reexamination to investigate prognostic factors in neurotic illness. Functional capacity was used as a criterion of neurotic disability, and 55% of the patients had no "functional failure" during the average observation period of 10.7 yrs. Factors having a positive prognostic significance included the absence of psychiatric disorders in the immediate family, a good emotional environment in childhood, neither very strict nor unstructured upbringing, ability for social adjustment during adolescence, a harmonious marriage during the observation period, and fitness for military service at follow-up. Mental capacity, high level of education, and high social class did not affect long-term prognosis. Explanations for these findings are offered.—*Journal abstract*.

3357. Teshima, Hideki; Inoue, Sadahisa; Ago, Yukihiko & Ikemi, Yujiro. (Kyushu U, Faculty of Medicine, Fukuoka City, Japan) **Plasminic activity and emotional stress**. *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 218-228.—From analysis of experimental and clinical data it is concluded that emotional stress accelerates plasminic activity through the autonomic nervous system and acts as the trigger in hereditary angioneurotic edema. Increased plasminic activity interferes with hormonal feedback. Plasmin, which acts on many substances, is activated easily by emotional stress, especially in allergic diseases.

3358. Udabe, Ronaldo U. **Biochemistry and psychiatry with special reference to psychopharmacology**. *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 179-187.—Suggests that the position of biochemistry with respect to the causes of mental illness may change drastically in the near future because of 3 discoveries, possibly of prime importance: the role of prostaglandins in controlling release and uptake of neurotransmitters, the role of cyclic adenosine-monophosphate (and its synthesizing enzyme, adenylyl cyclase) in neural transmission, and the role of certain neurohormones within the central nervous system.

3359. Vale, Salvador, et al. **Creatine phosphokinase**. *Archives of Neurology*, 1974(Jan), Vol 30(1), 103-104.—Obtained spinal fluid samples from 20 male and 20 female Ss 16-60 yrs old (mean age 27.6 yrs), 29 diagnosed as schizophrenics and the others as having affective or paranoid psychoses, with total duration of illness ranging from 1 mo to 26 yrs. Examination of the samples for creatine phosphokinase (CPK) revealed increased enzyme activity in 12 of the 40 Ss. CPK values ranged from 1 to 11 international units (IU)/100 ml, with a mean of 4 IU  $\pm$  3.5 standard deviations. Ss who showed increased spinal fluid activity were those in whom the psychotic state was in the acute phase.

Findings support the postulate that nonspecific brain damage frequently occurs in psychotic patients.—E. A. Gavin.

3360. van Keep, Pieter A. & Kellerhals, Jean M. (International Health Foundation, Geneva, Switzerland) **The impact of socio-cultural factors on symptom formation: Some results of a study on ageing women in Switzerland.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 251-263.—Demonstrates that biology and culture are not completely independent spheres, using data from a study involving interviews with 448 41-60 yr old Swiss women. It is shown that the impact of aging and of menopause as measured from 2 indices—climacteric complaints and subjective adaptation to daily life—was more severe in women of the lower social classes than in women of the higher social classes.

3361. Vartanian, M. Ye. & Gindilis, V. M. (USSR Academy of Medical Sciences, Inst of Psychiatry, Moscow) **Some notes on the genetics of behavior traits in man, especially of abnormal mental traits like schizophrenia.** *Social Biology*, 1973(Sep), Vol 20(3), 246-253.—Suggests that traditional explanations used in interpreting the results of twin studies be modified. In particular, the inheritance of schizophrenia is discussed in the light of proposed changes in analysis methodology.

3362. Vella, Gaspare & Bollea, Ernesto. (U Rome, Inst of Psychiatry, Italy) **[Early observations of depressed patients during interphasic periods.]** (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 481-497.—Studied 20 patients suffering from monopolar endogenous depression, using a list of 147 psychopathological or behavioral factors to verify whether they recovered from the "phase," whether these depressive symptoms lasted, and whether other nondepressive symptoms existed. A group of abnormal Ss remained who showed symptoms of both depression and mania. It is considered impossible to obtain an exact diagnosis of their psychopathology from these interphasic periods.—*Journal summary.*

3363. Wallace, Charles J. & Davis, John R. (Camarillo—Neuropsychiatric Inst, CA) **Effects of information and reinforcement on the conversational behavior of chronic psychiatric patient dyads.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 656-662.—Conducted 2 experiments to determine if the conversational behavior of 3 male and 1 female chronic psychiatric patients could be increased through either reinforcement or the provision of information about potential topics of conversation. Each experiment utilized 1 dyad in a withdrawal design or a combined changing criterion and withdrawal design. For 3 of the 4 Ss a positive reinforcement contingency was used, while for the 4th an avoidance contingency was used. Conversation was defined as talk between the members about a specified topic of general interest with eye contact at least once every 15 sec. Only reinforcement increased conversational behavior. Information about the specified topics was ineffective in spite of the fact that the information was comprehended and was relevant to the topics. Additional results demonstrate the ineffectiveness of instructions and the potential usefulness of the infrequently used changing criterion design. The avoidance of extended conversation effectively reinforced a

specified duration of initial conversation. (18 ref) —*Journal abstract.*

3364. Ward, Patricia & Rouzer, David L. (Georgia State U) **The nature of pathological functioning from a Gestalt perspective.** *Counseling Psychologist*, 1974, Vol 4(4), 24-27.—Discusses the Gestalt view of healthy and unhealthy personalities. A healthy person accepts the necessity and inevitability of change. For the pathological person, there is discrepancy between how he sees himself and what he feels he should be. The neurotic is not at peace with his inner self-concept. He cannot love and blames this on the world around him. Unconsciously he surrounds himself with people who reinforce his view of reality; this is less painful than relating to a loving person. The narcissist gives himself the love which he feels he cannot get from others.—H. Silverman.

3365. Waring, E. M. (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **Emotional illness in psychiatric trainees.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 10-11.—Administered the General Health Questionnaire to 83 psychiatric postgraduate trainees. 22% of the trainees had scores in the range of a probable case of nonpsychotic emotional illness as compared with 3% of a control group of 46 nonpsychiatric medical postgraduate trainees. No differences were found between 1st-yr trainees, foreign medical graduates, or British-born and trained Ss.

3366. Weissman, Myrna M. & Paykel, Eugene S. (Yale U) **The depressed woman: A study of social relationships.** Chicago, IL: U Chicago Press, 1974. xix, 289 p. \$10.—Reports a 20-mo study of the social functioning, adjustment, and behavior patterns of 40 depressed women and a matched control group of 40 normal women. Results include methodological issues in studying social adjustment, whether social impairments in depressed women are the result of a depressive episode or whether they reflect personality characteristics which precipitate depression, and the relative effectiveness of 3 treatment philosophies (pharmacotherapy, psychotherapy, or both). (14 p ref)

3367. Wing, J. K.; Cooper, J. E. & Sartorius, N. (MRC Social Psychiatry Unit, Inst of Psychiatry, London, England) **Measurement and classification of psychiatric symptoms: An instruction manual for the PSE and Catego program.** Cambridge, England: Cambridge U Press, 1974. x, 233 p. \$14.50.—Presents a guide to a method of partially standardizing the assessment of a subject's mental state in order to achieve greater comparability between different examiners. The Present State Examination interview technique, which allows symptoms to be elicited and accurately recorded, is detailed. (3 p ref)

3368. Winokur, George; Morrison, James; Clancy, John & Crowe, Raymond. (U Iowa, Medical School) **Iowa 500: The clinical and genetic distinction of hebephrenic and paranoid schizophrenia.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 12-19.—Studied 115 consecutively admitted hebephrenics and 62 paranoid schizophrenics, using hospital records, interview transcripts, and clinical observation and assessment. Clinically the 2 groups differed in that the hebephrenics had more changes in affect, more tangential thinking, blocked more, and were more delusional. Hallucinations



were equal between both groups. Paranoids were admitted at an older age, were older at the age of onset, and showed less disruption of family life. A blind family history assessment revealed that hebephrenic probands had over 3 times as many schizophrenic relatives as the paranoid probands. These familial data indicate a high probability that process schizophrenia is not a unitary (homogeneous) illness. It is suggested that there are 2 types of schizophrenia, one of which may manifest itself mostly as hebephrenia but occasionally as paranoid schizophrenia. The 2nd type would be paranoid schizophrenia in which there is a paucity of schizophrenic relatives. In paranoid schizophrenia, an affected relative, should he exist, would have only paranoid schizophrenia. Thus, there may be only 1 type of hebephrenic schizophrenia but 2 types of paranoid schizophrenia, one related genetically or familiarly to hebephrenic schizophrenia.—*Journal abstract.*

3369. Wittkower, E. D. & Warnes, H. (McGill U, Montreal, Quebec, Canada) **Transcultural psychosomatics.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 1-12.—Surveys the current body of knowledge regarding the cultural etiological parameter of psychosomatic disease, citing investigative difficulties, objectives, and methodologies. Data are discussed concerning the prevalence of cardiovascular and gastrointestinal disorders and the influence of race, life expectancy, eating habits and diet, psychosocial stress, and basic personality on psychosomatic diseases. (37 ref)

3370. Wolkind, S. N. (London Hosp Medical Coll, England) **Sex differences in the aetiology of antisocial disorders in children in long term residential care.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 125-130.—Studied 53 male and 39 female 5-12 yr old institution residents to determine whether same or different factors are related to the development of antisocial disorders in males and females, and whether factors related to antisocial traits are the same for children living outside institutions as for inmates. Results show that 40% of the males and 26% of the females had an antisocial or antisocial-neurotic disorder. Different factors were associated with this disorder in each sex: for the males, lack of father-contact and large numbers of siblings; for the females, prolonged early experience of residential care. Implications of the findings for child psychiatric care are discussed. (20 ref)—*Journal summary.*

3371. World Health Organization. (Geneva, Switzerland) **The international pilot study of schizophrenia.** Geneva, Switzerland: World Health Organization, 1974. xi, 427 p.—Presents the results of the initial evaluation phase of the World Health Organization's international study of schizophrenia. Among the topics included are the distribution, diagnosis, management, and operation of schizophrenia; description of field research centers; characteristics and psychopathological description of the study population; and applicability and reliability of methods and classification by cluster analysis. (14 p ref)

3372. Wortis, Joseph; Sersen, Eugene A.; Floistad, Iver & Astrup, Christian. (State U New York, Stony Brook) **Childhood and adult schizophrenia: Some clinical and experimental comparisons.** *Pavlovian Journal of Biological Science*, 1974(Jul-Sep), Vol 9(3),

149-159.—Studied 31 childhood schizophrenics, using a battery of motor conditional reflex tests, an autonomic conditioning test, and a word association test. Presenting symptoms were not comparable to those seen in a group of adult schizophrenics tested with similar procedures. It is noted that the literature fails to provide convincing evidence that childhood schizophrenia starting before age 11 represents the same clinical symptomatology, genetic background, and course of illness, as adult schizophrenia. Childhood schizophrenia seldom appears to involve long-term schizophrenic deterioration. (23 ref)—*Journal abstract.*

### Behavior Disorders

3373. Bollea, Ernesto & Gaston, Alberto. (U Rome, Inst of Psychiatry, Italy) [The concept of "alcoholic epilepsy": Considerations based on a clinical case.] (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 583-597.—Discusses the case of a 41-yr-old male in the light of the most recent biochemical and EEG research. A distinction is made between "regular convulsive crises," characterized by actual organic damage, and "accidental convulsive crises," where the alteration is essentially functional. It is concluded that the regular convulsive crises of chronic alcoholics are bound to several etiopathogenic factors: toxic effect of alcohol on the nerve cells, electrolytic imbalance, lack of polyvitamins B, and status of cerebral hypoxia. All of these factors can potentially bring about convulsive phenomena, but the convulsive seizure is usually caused by a combined action of some of them only. (58 ref)—*Journal summary.*

3374. Buglass, Dorothy & Horton, John. (MRC Unit for Epidemiological Studies in Psychiatry, Edinburgh, Scotland) **The repetition of parasuicide: A comparison of three cohorts.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 168-174.—Surveyed 3 successive annual cohorts ( $N = 2,809$ ) to determine the factors which are consistently related to the repetition of suicidal behavior. Findings identified the following items that consistently discriminated repeaters: sociopathy, problems in the use of alcohol, previous inpatient or outpatient psychiatric treatment, previous parasuicide, low social class, dependence on drugs, unemployment, and a history of criminal behavior. There was a considerable degree of similarity between male and female repeaters, the proportion of repeaters under 25 yrs increased between 1968 and 1970, and there was no evidence that inpatient care prevented subsequent repetition. (16 ref)—*Journal summary.*

3375. Chappell, Duncan; Geis, Gilbert & Fogarty, Faith. (Battelle Memorial Inst, Law & Justice Study Ctr, Seattle, WA) **Forcible rape: Bibliography.** *Journal of Criminal Law & Criminology*, 1974(Jun), Vol 65(2), 248-263.—Demonstrates a large change of emphasis between pre-1969 and post-1969 materials. Earlier cases deal mainly with aspects of protecting an accused rapist from vindictive charges, while the more recent literature stresses the protection of the rape victim. The earliest citation found was published in 1940; the latest in 1973. References are organized into the following main categories (followed by subheadings): Sociology, The Victim, The Offender, The Law, Medical and Medico-

Legal, Police Investigation, and Rape in Non-Common Law Jurisdictions. No summaries are included.

3376. Chesney-Lind, Meda. (U Hawaii) **Juvenile delinquency: The sexualization of female crime.** *Psychology Today*, 1974(Jul), Vol 8(2), 43-46.—Contends that juvenile courts treat girls more harshly than boys. A far larger proportion of girls are arrested and institutionalized for juvenile (as opposed to penal) offenses than boys. Girls are often suspected of sexual promiscuity regardless of the actual charge. Thus, in the name of protection, the civil rights of girls are systematically violated.

3377. D'Orbán, P. T. (H. M. Prison, Medical Officer, London, England) **A follow-up study of female narcotic addicts: Variables related to outcome.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 28-33.—66 female narcotic addicts first examined in 1967-1968 were followed up 4 yrs later by reference to drug, criminal, and death record data. 36% had become abstinent, 32% had remained addicted, and 15% had died. Comparisons were made on 8 variables between those with good and those with poor outcomes. Outcome was assessed in terms of continued addiction, delinquency, and addiction status. The number of previous convictions showed a significant inverse relationship to abstinence; this association may be worth validating in prospective studies of both sexes. (20 ref)—*Journal summary*.

3378. De Sousa, Alan. (Grant Medical Coll, Bombay, India) **Causes of behaviour problems in children.** *Child Psychiatry Quarterly*, 1974(Jan), Vol 7(1), 3-8.—Reviews the environmental factors in child development beginning with conception. During the prenatal period, the fetus reacts to the mother's anxiety state, nutritional status, and physical health. The process of birth is described as a trauma in which abnormal birth takes an even greater toll on the infant. During early upbringing the attitudes and behavior of the mother or mother surrogate form the basis of the infant's concept of the outside world. All faulty parental attitudes can be considered to lie along the cross-axes of overprotection and rejection. The effects of the joint family, cultural factors, the neighborhood, and the media (e.g., television) on the child are cited.—*R. S. Albin*.

3379. Dorpat, Theodore L. (Blakely Psychiatric Group, Seattle, WA) **Drug automatism, barbiturate poisoning, and suicide behavior.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 216-220.—Discusses the differential diagnosis of accidental vs intentional barbiturate poisoning. Studies of a nonfatal and a fatal case of barbiturate poisoning show that, although cases of accidental barbiturate poisoning do occur, they are not caused by drug automatism. The apparent lack of self-destructive intentionality and the amnesia for the overdose in nonfatal cases, erroneously diagnosed as drug automatism, are explained by the patients' needs to deny their self-destructiveness and to repress their memory of the overdose. The literature contains no well-authenticated cases of fatal barbiturate poisoning caused by drug automatism. The persistence of the drug automatism hypothesis is partially explained by the tendency of many patients, their relatives, and physicians to deny the self-destructive motives and actions of the patient. (23 ref)—*Journal abstract*.

3380. Earles, James A.; Mullins, Cecil J. & Vitola, Bart M. **Variables related to amphetamine use.** *US AFHRL Technical Report*, 1974(Mar), No 74-22, 22 p.—Compared a sample of 985 self-admitted amphetamine users with a sample of 9,378 airmen who had no known record of drug abuse. Results indicate a strong likelihood that amphetamine users also abuse other drugs. There were relationships between amphetamine use and geographic area of enlistment, religious preference, aptitude scores, educational level, and age at enlistment. Amphetamine use was also related to the likelihood of getting an undesirable discharge and to lower Airman Proficiency Report ratings.—*Journal abstract*.

3381. File, Karen N.; McCahill, Thomas W. & Savitz, Leonard D. (Treatment Alternatives to Street Crime, Philadelphia, PA) **Narcotics involvement and female criminality.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 177-188.—Studied the relationship between drug abuse and criminal records in 7,883 arrests made in a 90-day period in Philadelphia, 1,087 (13.8%) of which involved females and 227 (20.9%) of which were classified as narcotics related. Specific data from these 227 arrests on the relationship between drug abuse and prostitution and comparisons between nonprostitute and prostitute arrestees are presented. Data suggest that criminal patterns among female addicts can be classified in 4 groups: prostitute/criminals (i.e., prostitutes with histories of serious crimes), prostitutes (i.e., prostitutes with no histories of serious crimes), criminals (i.e., females who have never been arrested for prostitution but have been arrested for other serious offenses), and "bag-followers" (i.e., female addicts who carry drugs for pushers but have no records of prostitution or other serious crimes). It is suggested that these groups present identifiable alternative hustling patterns rather than stages in a general socialization pattern involving narcotics addiction and crime.—*L. Gorsey*.

3382. Gibbons, Robert J. et al (Ed.). (Addiction Research Foundation, Toronto, Ontario, Canada) **Research advances in alcohol and drug problems: I.** New York, NY: John Wiley & Sons, 1974. xvii, 428 p.

3383. Goodwin, Donald W. et al. (Washington U, Medical School) **Drinking problems in adopted and nonadopted sons of alcoholics.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 164-169.—Compared 20 sons of alcoholic parentage, adopted in infancy, with their 30 brothers who were raised by the alcoholic parent. Both the adopted and nonadopted sons had high rates of alcoholism (25% and 17%, respectively), but the difference was not statistically significant. The 2 groups also had comparable frequency of alcohol problems. The nonadopted sons differed from the adopted sons in age (older) and belonged to a lower socioeconomic class. Length of exposure to the alcoholic parent was not associated with the development of alcoholism. However, severity of the parent's alcoholism, as inferred by number of hospitalizations, was positively related to alcoholism in the offspring. Results suggest that environmental factors contributed little, if anything, to the development of alcoholism in sons of severe alcoholics, in this sample. (16 ref)—*Journal abstract*.

3384. Griffiths, Roland; Bigelow, George & Liebson, Ira. (Johns Hopkins U, Medical School) **Assessment of**



effects of ethanol self-administration on social interactions in alcoholics. *Psychopharmacologia*, 1974, Vol 38(2), 105-110.—5 39-49 yr old male chronic alcoholic volunteers participated in an experiment in which the availability or nonavailability of a daily ration of 12 oz (360 ml) of 95-proof ethanol (133.68 g) was randomly determined. For all Ss, rates of social interaction were significantly higher on ethanol days than nonethanol days. The study demonstrates the feasibility of using complex molar units of human behavior as dependent variables in behavioral pharmacology research. (16 ref)—*Journal abstract*.

3385. Hafner, James L. & Linkenhoker, Dan. (Indiana State U) **Quantifying the reinforcement value of verbal items on drug addicts that were inmates of a prison.** *Journal of the Association for the Study of Perception*, 1974(Spr), Vol 9(1), 17-25.—Scaled 20 words according to their reinforcing value. 47 undergraduates and 53 prisoners in a drug treatment program rated the words according to whether or not they would like to have a respected person say the word after S performed a task. A frequency table was compiled that indicated the number of times each word was chosen. Items in the frequency table with a high numerical value were denoted as liked and positive; items with a low numerical value were denoted as disliked and negative. One of each positive, negative, and neutral reinforcers was used in a verbal conditioning experiment with 84 additional male prisoners. After "I-we" sentences, Ss were given orally 1 of the 3 reinforcing words. The positive reinforcer produced a progressive increase in the rate of responding; the negative reinforcer produced a nonsignificant, but apparently decreasing reinforcing characteristic; the neutral reinforcer produced no significant change in the rate of responding. (15 ref)—*Journal summary*.

3386. Hardy, Richard E. & Cull, John G. (Virginia Commonwealth U) **Vocational satisfaction among alcoholics.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Studied 72 nonalcoholic and 93 alcoholic vocational rehabilitation clients to determine the differences between the expressed vocational interest of alcoholics and their actual occupations prior to admission to a treatment center. Results indicate that both groups showed the greatest preference for social service occupations and that alcoholic Ss held significantly fewer such jobs.

3387. Holzer, Dietrich. **[Correct and incorrect diagnoses in psychological and psychiatric reports about maladapted juveniles.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 50-56.—Examines psychological and/or psychiatric reports concerning 108 poorly socialized adolescents. 14 of the cases illustrate the overestimation of sociogenic and psychogenic factors and the neglect of inborn characterological traits.

3388. Jabara, Raymond F. & Curran, Stephen F. (VA Drug Treatment Unit, Baltimore, MD) **Comparison of the Minnesota Multiphasic Personality Inventory and Mini-Mult with drug users.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 739-740.—Data from 60 male drug addicts and users support

previous findings that when correlations between corresponding MMPI and Mini-Mult scales are used, there is good correspondence; however, there is low accuracy with respect to clinical evaluation and high-point correspondence.

3389. Kiev, Ari. (New York Hosp—Cornell Medical Ctr, NY) **Prognostic factors in attempted suicide.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 987-990.—Analyzes clinical and social data collected from 300 patients at the time of a suicide attempt and again 1 year after the attempt for 299 of the patients. Results of the follow-up showed prognostic significance for 3 factors: interpersonal conflict, symptom distress, and the social setting of the suicide attempt. The significance of these factors in predicting further suicide attempts calls attention to the need for psychiatrists to take cognizance of the social world of the patient following a suicide attempt.—*Journal abstract*.

3390. Klatch, Dolores. **Woman plus woman: Attitudes toward lesbianism.** New York, NY: Simon & Schuster, 1974. 287 p. \$8.95.—Explores the hypocrisy, misinformation, and contradictory theories surrounding the subject of lesbianism, and discusses the lives and times of some of the more articulate and historical lesbian figures. Data from frank interviews and anonymous questionnaires are included. (8 p ref)

3391. Kuhn, Roland. (Psychiatric Clinic, Münster, W Germany) **[The current importance of the work of Ludwig Binswanger.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 311-321.—Presents a discussion of L. Binswanger and his theories. The case of a young drug abuser suffering from periodic endogenous depression and psychosomatic stomach disorders is presented as an illustration of Binswanger's approach to the biological and psychological aspects of psychoses induced by drug addiction and their treatment. (English summary)

3392. Leibach, Werner K. (U Clinics of Bonn, W Germany) **Organic pathology related to volume and pattern of alcohol use.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Reviews data on physiological and pathological factors in alcoholism, including comparative studies of consumption and drinking patterns in various countries, capacity of ethanol elimination, the quantitative effects of alcohol intake, the effects of abstinence, genetic predisposition and susceptibility, and the effects of various types of alcoholic beverages. (540 ref)

3393. Levine, David G.; Preston, Phyllis A. & Lipscomb, Sally G. (San Francisco Methadone Treatment Program, CA) **A historical approach to understanding drug abuse among nurses.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1036-1037.—Investigation of the histories of 12 nurses who abused drugs disclosed an early and extensive involvement in medical treatment. A "medical dependence" became evident, manifested by somatic orientation, chronic medical difficulties, dependence on alcohol, and, finally, dependence on other drugs. It is considered that irrational attitudes toward addicting substances underlie this progression. This developmental theme is significant in

the genesis of addiction among nurses and should be dealt with during rehabilitation.—*Journal abstract.*

3394. Mayfield, Demmie; McLeod, Gail & Hall, Patricia. (VA Hosp, Providence, RI) **The CAGE questionnaire: Validation of a new alcoholism screening instrument.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1121-1123.—Administered the CAGE questionnaire, a new brief alcoholism screening test, to all patients ( $N = 366$ ; 39% alcoholic) admitted to a psychiatric service over a 1-yr period. Results indicate that the CAGE questionnaire is not a sensitive alcoholism detector if a 4-item positive response is the criterion; however, if a 2- or 3-item criterion is used, it becomes a viable rapid alcoholism screening technique for large groups.—*Journal abstract.*

3395. Mercer, G. W. & Smart, R. G. (York U, Toronto, Ontario, Canada) **The epidemiology of psychoactive and hallucinogenic drug use.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Reviews data on psychoactive and hallucinogenic drug use patterns in the US, Canada, Asia, Africa, South America, Australia, and Europe. General methodological difficulties in epidemiological drug studies are discussed, and an overview of morbidity and mortality associated with drug use is presented. (294 ref)

3396. Mier y Terán, Carmen; Schnass, Lourdes; Vargas, Guaria & Belsasso, Guido. (Ctr Mexicano de Estudios en Farmacodependencia, Mexico City) **Drug abuse among the inmates of a women's prison in Mexico City.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 153-175.—Interviewed 24 Mexican female narcotics addicts about their family backgrounds, drug abuse histories, and socioeconomic status. 2 control groups were also interviewed, one consisting of nonaddict prison inmates and the other of nonprison women with similar socioeconomic backgrounds. Specific data are presented for age at first use of various drugs, educational backgrounds, social and geographic mobility of the addicts and their families, and occupational status. Results suggest that (a) a relationship existed among drug abuse, tobacco use, and alcoholism, with addicts using these substances at earlier ages than the 2 control groups; (b) drug abuse usually began in adolescence; and (c) inadequate socialization and family instability were major characteristics of the addict group. It is concluded that deviant behavior (e.g., drug abuse) emerges from varied socioeconomic contexts which make adequate socialization difficult, and that if certain factors do exist (e.g., those which contribute to the stability of heterosexual relationships), the appearance of symptomatology related to family conflict and inadequate socialization will be retarded. (21 ref)—*L. Gorsey.*

3397. Mormont, C. (U Liège, Psychiatric Clinic, Belgium) **[Study of the Rorschach test in the case of a girl who tried to commit suicide.]** (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 387-392.—Describes the case of 10-yr-old girl whose suicidal ideation was reflected in her Rorschach record.

3398. Murphy, John; Bennett, Robert; Hagen, James M. & Martin, Chris. (VA Hosp, Salem, VA) **The relationship of physical fitness to mental adjustment: III. The effects of reconditioning upon the vital capacity**

**of known alcoholics.** *American Corrective Therapy Journal*, 1972(Sep), Vol 26(5), 142-144.—Reviews the literature on the relationship between vital capacity, physical activity, and coronary heart disease among alcoholics. A study is described to test the hypothesis that a 3-mo course in physical reconditioning would make a significant difference in the predicted vital capacity for a group of 76 alcoholics. Results show no gains in vital capacity among participants. Vital capacity is considered to be a significant indicator of physical fitness despite the lack of statistical substantiation.—*R. S. Albin.*

3399. Nelles-Bächler, Maria. (Rheinland Pedagogical Coll, Cologne, W Germany) **[The disadvantages of aggressive children at school.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Apr), Vol 23(3), 99-102.—Presents the case of an aggressive 15-yr-old boy with poor scholastic achievement despite good intellectual capacities. This underachievement is explained by social-psychological factors. Proposals are offered for training programs for such disadvantaged children.

3400. Newman, Robert C. & Pollack, Donald. (San Bernardino County, Mental Health Services, CA) **Newman and Pollack reply.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 749-750.—Replies to B. Wolfe's (see PA, Vol 53:Issue 2) criticisms of the author's statistical design and methods of analysis. Further clarifications of the procedures are presented, and some post hoc suggestions for clearer interpretations of the results are offered.

3401. Nisbett, Richard E. & Storms, Michael D. (U Michigan) **Cognitive and social determinants of food intake.** In H. London & R. E. Nisbett (Eds), *Thought and feeling: Cognitive alteration of feeling states*. Chicago, IL: Aldine, 1974. 239 p. \$8.95.—Reports 3 experiments to test the hypothesis that food intake of overweight individuals is more affected by external cues of a cognitive or social nature than the intake of normal-weight persons. Data indicate that food intake of people in general was affected by cognitive and social cues, but overweight persons were not more responsive to these cues than other persons. (17 ref)

3402. Nowicki, Stephen & Hopper, Allen E. (Emory U, Psychological Ctr) **Locus of control correlates in an alcoholic population.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 735.—Data from male and female alcoholic in- and outpatients who completed a locus of control measure by Nowicki and Strickland, a figure-copying test, and a short form of the WAIS show that (a) female inpatients had significantly more external scores and (b) external orientation was related to a greater evidence of psychomotor impairment in females and to generally lower verbal IQ scores for both sexes.

3403. Nyström, Sune A. (U Göteborg, Sweden) **An overview of research in alcohol abuse.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Reviews research in alcohol abuse relating to background factors of the disease, natural development of symptoms, and aspects of prevention. (52 ref)



3404. **Payne, Clive; McCabe, Sarah & Walker, Nigel.** (Nuffield Coll, Research Services Unit, Oxford, England) **Predicting offender-patients' reconvictions.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 60-64. —Describes a simple additive prediction model based on a logistic analysis of N. D. Walker and S. F. McCabe's 1973 study of 334 psychiatric offender patients who were allowed to leave within a year of admission. As with ordinary criminal samples, the number of previous convictions and type of current offense were powerful predictors of reconviction, although sex and age had negligible predictive powers, contrasting sharply with ordinary penal groups. Diagnosis was a useful predictor only if those patients who were readmitted without being reconvicted are included. Data confirm the importance of after-care programs, especially for high-risk groups. —*Journal summary.*

3405. **Phillipson, Richard.** (National Inst of Drug Abuse, Washington, DC) **Adolescent alcohol abuse.** *Drug Abuse and Alcoholism Newsletter*, 1973(Nov), Vol 2(8), 4 p. —Discusses data that suggest an increase in the prevalence of adolescent alcohol abuse, implications of lowering the drinking age, and measures and alternatives that might be developed to prevent further abuse. The importance of the peer group in adolescent drinking is noted, and a question-and-answer section on the problem is included.

3406. **Raymaker, Henry.** (VA Ctr, Dublin, GA) **Prediction of delinquent behavior.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p. —Describes several signs of potential delinquency and discusses the need for psychological evaluation of young people to prevent or treat problem behaviors. The use of projective techniques with delinquents and recurrent themes in adolescent stories are examined and related to the need to evaluate the patient's self-concept. Community responsibility for the problem of juvenile delinquency is also assessed.

3407. **Robinson, Malcolm G. et al.** (Walter Reed Army Inst of Research, Washington, DC) **Assessment of pupil size during acute heroin withdrawal in Viet Nam.** *Neurology*, 1974(Aug), Vol 24(8), 729-732. —Cites the use of large amounts of pure heroin by many soldiers during the Viet Nam conflict. Photographic pupillometry was used to evaluate 10 such heroin users and 5 controls 3 times/day for 6 days after the patients' last heroin dose. Initially, heroin users had constricted pupils that dilated as withdrawal progressed and remained mydriatic thereafter. Stimulation with intense light further constricted the miotic pupils of heroin-intoxicated patients. Pupil diameter exhibited a definite circadian pattern, with increasing size throughout each day both in patients and controls. Results confirm pupil diameter as an excellent differential indicator of heroin intoxication and withdrawal. (16 ref) —*Journal abstract.*

3408. **Roebuck, Julian B.** (Mississippi State U) **The psychological approach to the understanding of alcoholism.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75. —Discusses psychological theories of the etiology of alcoholism which emphasize alcohol effects, reinforcement, transactional analysis

concepts, psychoanalytic concepts, field dependence, and the alcoholic personality. A review of evidence supporting each theory indicates that the alcoholic is a passive-dependent person who uses alcohol as an escape. (11 p ref)

3409. **Saunders, Jacquelyn R.; Vitola, Bart M. & Mullins, Cecil J.** **Correlates of barbiturate use.** *US AFHRL Technical Report*, 1974(Mar), No 74-21, 22 p. —Compared a sample of 448 self-admitted preservice barbiturate users with a control sample of 9,378 airmen with no known record of drug abuse. The barbiturate sample differed significantly from the control sample in that barbiturate users (a) were disproportionately represented in the North-Northeast and Far West-Pacific Coast enlistment areas, (b) more often indicated no religious preference, and (c) enlisted at a younger age. Degree of barbiturate use was negatively associated with aptitude, educational level, and measures of success in the US Air Force, and was positively associated with the use of other drugs. —*Journal abstract.*

3410. **Schneck, Jerome M.** (St Vincent's Hosp & Medical Ctr of New York, NY) **Zooerasty and incest fantasy.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Oct), Vol 22(4), 299-302. —Reports specific clinical data on zooerasty revealed in psychotherapy with an intelligent 45-yr-old man. Incorporation of zooerasty into an incest theme is of additional interest. The manner in which the patient dealt with this material in treatment is described. (German, French, & Spanish summaries) —*Journal abstract.*

3411. **Schuster, Charles R. & Johanson, Chris E.** (U Chicago) **The use of animal models for the study of drug abuse.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p. —Outlines a conceptual conditioning/reinforcement framework for an animal model of drug abuse based on 4 distinct problems: physical dependence, behavioral or psychological dependence, physiological and behavioral consequences of drug use, and self-administration of a drug for nonmedical purposes. Methodologies for studies of these problems with animals and pharmacological and environmental variables affecting drug self-administration are discussed. (75 ref)

3412. **Steffen, John J.; Nathan, Peter E. & Taylor, H. Augustus.** (U Cincinnati) **Tension-reducing effects of alcohol: Further evidence and some methodological considerations.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 542-547. —Studied the relations among alcohol consumption, self-reported distress, and muscular tension in 4 male 28-45 yr old male chronic alcoholics. Ss were permitted free access to beverage alcohol and were monitored for blood alcohol level, electromyographic response, and subjective distress every other hour of their waking day for 12 days. Pearson product-moment correlations revealed (a) significant negative correlations between blood alcohol level and electromyographic response, (b) a significant positive correlation between blood alcohol level and subjective distress, and (c) no relation between electromyographic response and subjective distress. Results, while supporting a tension-reduction model of the effects of alcohol, reveal a complex interaction between alcohol

consumption, subjective distress, and muscular tension.—*Journal abstract.*

3413. **Stoller, Robert J.** (U California, Medical School, Los Angeles) **The male transsexual as "experiment."** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 215-225.—Discusses the early factors in the development of male transsexualism, focusing on studies and theories of early stages of infantile development in both normal and perverse people. The adult male transsexual is seen as having been feminine since earliest childhood. By age 3 or 4 he is already saying he wants to be a girl. As an adolescent, this person has already successfully passed as a woman. The etiology of this pattern in the early mother-child relationship is noted. Core gender identity and its relation to perversion is discussed. The relationship of fetishism to transsexualism is also considered. (32 ref)—*R. S. Albin.*

3414. **Strassberg, Donald S. & Robinson, Janice S.** (Ohio State U) **Relationship between locus of control and other personality measures in drug users.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 744-745.—Data from 60 self-identified heroin users who completed a battery of personality tests show that previous findings relating locus of control to adjustment and self-concept among nondrug users are valid for narcotics users as well, and that locus of control in drug users is not a function of the length of drug use or age of the user.

3415. **Tyndel, Milo.** (Addiction Research Foundation, Toronto, Ontario, Canada) **Psychiatric study of one thousand alcoholic patients.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 21-24.—Describes a 2-yr study of 1,017 hospitalized alcoholics. All were diagnosed as either neurotic (58%), psychotic (6%), or personality disorder (36%). It is concluded therefore that there can be no such thing as "primary alcoholism" and that the development of alcoholism is inconceivable without underlying psychopathology.

3416. **Vista Hill Psychiatric Foundation.** (San Diego, CA) **The drug dependent paraplegic.** *Drug Abuse and Alcoholism Newsletter*, 1974(Jan), Vol 2(9), 4 p.—Discusses the problem of the drug dependent paraplegic, emphasizing that drug abuse among such patients may be caused both by iatrogenic and psychological factors. 8 major reasons why paraplegics, particularly young persons, may abuse psychoactive drugs are presented, and special considerations in the treatment and prevention of this problem are described. Treatment of the paraplegic addict does not differ significantly from the treatment of other addicts, although differences between street and paraplegic addicts do exist in terms of drug availability and reasons for use. The possibility that drug and/or alcohol dependency may predate the paraplegic condition is also noted.—*L. Gorsey.*

3417. **Wagner, Gerhard.** (Berlin-Lichtenberg Neurological & Psychiatric Hosp, E Germany) **[On the motivation of incendiarism.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 155-164.—Challenges the conventional assumption that sexual perversion is the motive for arson. Case histories reveal the basic motivation as a chronic social frustration, with or without a personal need for attention. Literature is cited which supports the conventional view,

and the opposing view that incendiarism is a spontaneous reaction to reduce anxiety. (56 ref)

3418. **Westermeyer, Joseph.** (U Minnesota Hosp, Minneapolis) **Opium dens: A social resource for addicts in Laos.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 237-240.—Studied the social functions of opium dens in Laos by 2 methods. Repeated visits were made to 3 opium dens. Data were collected on the physical structure of the den, the owner-proprietor, the customer-participants, the activities, and conversations in the dens. 35 addicts were selected to comprise a representative sample and were interviewed regarding their present locus of opium usage; demographic data were obtained from these addicts. Data on several psychosocial functions that dens serve for certain opium users are presented. The dens seem to serve urban society by providing a milieu within which certain people can meet needs that were served formerly in village society, but which are neglected in urban settings. (15 ref)—*Journal abstract.*

3419. **Williams, Allan F.** (Insurance Inst for Highway Safety, Washington, DC) **Causes of alcohol abuse.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Reviews the literature on the possible causes of alcohol abuse, including hereditary, physiological, sociological, and personality factors. Suggested methods are presented for applying information on the causes of alcohol abuse to the treatment of the disease. (20 ref)

3420. **Wilmotte, J. N.; Cosyns, P.; Mendlewicz, J. & Deschutter, B.** (Ctr of Suicide Prevention, Brussels, Belgium) **[A study of suicidal behaviors in a penitentiary.]** (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 411-426.—Conducted a study of 386 suicide attempts and 45 suicides which occurred in Belgian prisons during an 11-yr span. The sex distribution of the Ss corresponded roughly to that of the prison population in general. The age distribution of suicide attemptors was also similar to that of the prison population (with highest frequencies between 20 and 35 yrs), but successful suicides were relatively more frequent in later years (40-60 yrs). The most common methods for suicide attempts were wrist-slashing, jumping from heights, hanging, and drugs, but hanging accounted for 93% of the completed suicides. Conclusions are drawn from the data which can be helpful in improving suicide prevention in prisons. (French, Dutch, English, German, Italian, & Spanish summaries) (25 ref)—*E. Coché*

3421. **Wolfe, Bonnie.** (U Southern California) **A discussion of "Proxemics in deviant adolescents,"** by Robert C. Newman II & Donald Pollack. *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 749.—Discusses the statistical designs and methods of data analysis used by R. C. Newman and D. Pollack (see PA, Vol 50:968). The use of proxemic area as an independent variable is questioned, and the possibility that sequence and/or interaction effects may have accounted for the results is examined.

3422. **Zahn, Margaret A. & Ball, John C.** (Temple U) **Patterns and causes of drug addiction among Puerto Rican females.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 203-213.—Studied medical and



nonmedical drug addiction patterns in 12 addicted and formerly addicted Puerto Rican females living in Puerto Rico. Data on demographic variables, addiction among relapsed Ss, and drug use, prostitution, and other crimes are presented. A possible relationship between drug abuse and female role expectations is also examined.

### Learning Disorders & Mental Retardation

3423. Ball, Thomas S. (Neuropsychiatric Inst.—Pacific State Hosp Research Group, Pomona, CA) **Note on "Effect of motor development on body image scores for institutionalized mentally retarded children."** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 225-226.—Discusses the evaluation by W. C. Chasey et al (see PA, Vol 52:8002) of the use by M. P. Maloney et al (see PA, Vol 44:11088) of 2 measures of body image—the Eye, Hand, and Ear Test and the Personal Orientation Test—with mentally retarded children. Although Chasey et al stated that these measures did not meet their criteria of effectiveness, it is argued that both measures are appropriate to the assessment of the therapeutic effects of N. C. Kephart's (1971) sensorimotor training program as it has been adapted for retarded persons.

3424. Chalfant, James C. & Foster, Georgiana E. (U Arizona) **Identifying learning disabilities in the classroom.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 3-14.—Emphasizes the importance of classroom teachers, who observe children daily in any program for identifying children with learning disabilities. However, teachers must understand what a learning disability is, how it affects learning, and what classroom indicators are encountered.

3425. Corkin, Suzanne. (Massachusetts Inst of Technology) **Serial-ordering deficits in inferior readers.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 347-354.—Tested the hypothesis that reading disorders in children may in part grow out of a more general deficit in serial organization. The performance of 56 4-11 yr old boys classified as average, inferior, and prereaders was compared on 2 tasks that required them to remember the correct serial position of visual or auditory stimuli. The efficiency of all groups on this task increased markedly as a function of age. In conditions where greater demands were made upon immediate memory processes, the average readers surpassed the inferior readers at all ages studied. Crossed dominance of hand and eye was equally common within these 2 groups. (French & German summaries)—*Journal abstract*.

3426. Cornwell, Anne C. (Albert Einstein Coll of Medicine, Yeshiva U) **Development of language, abstraction, and numerical concept formation in Down's syndrome children.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 179-190.—Findings of A. C. Cornwell and H. G. Birch (see PA, Vol 44:5539) suggested the hypothesis that a marked discrepancy between verbal receptive and performance abilities exists in home-reared children with Down's syndrome. This was tested developmentally in 38 5-19 yr old Down's syndrome children. The data show differences between verbal items requiring extensive language expression (designation) and recognition of visually presented objects. Language expression was assessed in numerical

concepts and skills and concept formation. Developmentally, this population revealed a slow accretion of certain rote skills and progressive improvement in other abilities, but severe limitations in concept formation, abstraction, and higher level integrative abilities regardless of age. (27 ref)—*Journal abstract*.

3427. Denhoff, Eric. (Meeting Street School Children's Rehabilitation Ctr, Providence, RI) **The responsibility of the physician, parent, and child in learning disabilities.** *Rehabilitation Literature*, 1974(Aug), Vol 35(8), 226-230, 233.—Describes the physician's responsibilities in dealing with children who have learning disabilities: advocacy, early identification, quality health care, referral and interprofessional coordination, discrimination of program, and interpretation to the family.

3428. Drutu, Ioan. [Aspects of verbal memory in students of special auxiliary school.] (Romanian) *Studia Universitatis Babeş-Bolyai*, 1972, Vol 17, 31-39.—Carried out a study with 102 mentally retarded children. Each was asked to memorize a series of 15 words repeated 5 times. Characteristics of performance by these Ss are described. Results indicate that variations in verbal memory were directly related to degrees of mental retardation. (Russian & French summaries)—R. A. Meyer.

3429. Folkard, Simon. (MRC Applied Psychology Unit, U Sussex, Brighton, England) **Expectancy in educable subnormal children and their normal mental age controls.** *Quarterly Journal of Experimental Psychology*, 1974(Aug), Vol 26(3), 495-502.—The long reaction times of mentally subnormal children have commonly been attributed to an inability to build up an adequate preparatory set. The present experiment tested this suggestion by comparing the ability of normal and educable subnormal (ESN) children to anticipate a regularly occurring event. The performance of 12 13-yr-old ESN boys was found to be inferior to that of 12 9-yr-old boys matched on mental age (9 yrs) both in terms of the accuracy and the variability of their anticipations. This inferiority disappeared when visual input was restricted to the relevant events. It is concluded that ESN children suffer both in the accuracy and in the variability with which they estimate time intervals. It is suggested that these deficits may be mediated either by a relatively high level of distractibility or by a relatively low level of arousal. (19 ref)—*Journal abstract*.

3430. Freston, Cyrus W. & Drew, Clifford J. (U Utah) **Verbal performance of learning disabled children as a function of input organization.** *Journal of Learning Disabilities*, 1974(Aug-Sep), Vol 7(7), 424-428.—Investigated the recall performance of learning disabled children as a function of material organization and difficulty. 48 7-17 yr old children with organic brain syndrome and diagnosed as having learning disabilities were randomly subdivided into 2 groups receiving either organized or unorganized material. 3 levels of material difficulty were used. Results indicate no influence of material organization on Ss' recall performance. Ss did, however, perform differently as a function of material difficulty. Implications for future research and practice are discussed. (19 ref)—*Journal abstract*.

3431. Galkowski, Tadeusz. **Auditory reactions in mentally retarded children by means of psychogalvanic**

**reflexes.** *Audiology*, 1974, Vol 13(6), 501-505.—Examined 29 6-15 yr old male retardates and 32 normal children of matched mental age. Results obtained using psychogalvanic responses for acoustical (drum beat) stimuli show the usefulness of this method and its importance as a screening test or in standard audiometry. (French summary)

3432. **George, Colleen.** (North Texas State U) **Reliability estimates of grip strength assessments in the institutionalized mentally retarded.** *American Corrective Therapy Journal*, 1973(Nov), Vol 27(6), 173-175.—Describes a study done for the purpose of determining reliability coefficients for grip strength of the preferred and nonpreferred hands in each of 3 tonic neck postures. 48 students at the Denton State School in Texas with IQs between 50 and 90 were studied. It is concluded that the product moment correlation yields spuriously high reliability coefficients in this kind of situation and that the intraclass correlation coefficient is a better measure. Suggestions are made to study further these measurements. Simple and partial correlation coefficients were all greater than .95 while intraclass correlation coefficients were between .51 and .71.—R. S. Albin.

3433. **George, Colleen.** (North Texas State U) **Motor educability and chronological age as potential estimates of errors in perceptual-motor development of educable mentally retarded children.** *American Corrective Therapy Journal*, 1972(Jul), Vol 26(4), 105-111.—Describes a pilot study designed to estimate the degree of accuracy with which performances of educable mental retardates on tests of perceptual-motor skills could be predicted by chronological age. 12 male and 2 female educable mentally retarded students (IQ = 55-70) were studied. The Purdue Perceptual-Motor Survey was administered. Results show that chronological age in months significantly increased the accuracy of prediction. Also, when scores on the Johnson Test of Motor Educability were checked, they were highly correlated with those on the Purdue test. (16 ref)—R. S. Albin.

3434. **Gibson, David.** (U Calgary, Alberta, Canada) **Involuntary sterilization of the mentally retarded: A western Canadian phenomenon.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 59-63.—Describes the history of legislation governing involuntary sterilization of the mentally retarded in Canada. Some origins of the continuing eugenics debate are identified with a view to clarifying the issue and creating more rational solutions.

3435. **Gickling, Edward E. & Joiner, Lee M.** (U Tennessee) **Complex interactions of an auditory ability and aspiration in predicting specific reading deficits.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 162-168.—Demonstrated the curvilinear interaction—a personality variable—in the prediction of performance on 9 Spache Diagnostic Reading Scales. Of 49 11-26 yr old institutionalized mentally retarded Ss tested, those scoring high in auditory ability performed best on the reading criteria under the condition of "realistic" aspiration and performed poorest when aspiration scores indicated larger positive and negative discrepancy scores. Low auditory-ability Ss performed better under the conditions of positive discrepancy

(aspired performance exceeding attained performance). This form of interaction was observed repeatedly in 8 of the 9 reading diagnostic areas. An interpretation of the interaction effects and a discussion of the findings are included. (20 ref)—*Journal abstract.*

3436. **Gosling, Harrington & Jenness, David.** (Columbia U) **Temporal variables in simple reaction times of mentally retarded boys.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 214-224.—The effects of specific temporal factors in simple reaction time (RT) trials—foreperiod lengths of the target trial and of the trial preceding, and intertrial interval—were investigated in 12 nonretarded and 12 institutionalized retarded 14-20 yr old males. For both groups it was found that (a) RTs were shortest when the preliminary interval was equal to or greater than the prior preliminary interval, (b) RTs were impaired when the preliminary interval was less than the prior preliminary interval, and (c) the degree of impairment was directly referable to the differences between the 2 foreperiod values. All effects were significantly greater for the retarded than for the nonretarded Ss. Increasing the intertrial interval had little effect on the nonretarded Ss but tended to accentuate the obtained effects in the retarded Ss. Findings are interpreted as directly opposed to a stimulus-trace deficit theory but consistent with an expectancy model, with greater rigidity characterizing the retarded Ss. (29 ref)—*Journal abstract.*

3437. **Gottwald, Peter.** (Max Planck Inst for Psychiatry, Munich, W Germany) **[Several operant conditioning experiments with mentally retarded children.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 1(1), 21-47.—Conducted series of operant conditioning experiments with 8 4-7 yr old children with severely retarded speech development to study learning processes and therapeutic techniques. 3 Ss suffered from Kanner's syndrome, 1 from severe mental retardation with autistic traits, 3 from deaf-mutism, and 1 from congenital acoustic agnosia. In a sequence of fully automated, programed and recorded tests and pretests, Ss examined the acquisition and establishment of positive conditioned reinforcers, the learning of correct performance in matching-to-sample discrimination tasks with pictures of food and toys as stimuli, the generalization to newly introduced visual stimuli, extinction, recovery and transfer to audiovisual stimuli matching tasks. All Ss were able to learn and solve the original matching tasks correctly. Ss presented strongly differing reactions to the secondary reinforcers introduced and built up during the tests and some parameters had to be changed before all Ss managed to perform correctly. A quick generalization to new visual stimuli was evident in all Ss, but of the 3 Ss who had not previously comprehended the meaning of words, only one learned to execute audiovisual matching correctly after a process of visual fading-out in combination with the voiced naming of the object to be matched. (English summary) (27 ref)—T. Fisher.

3438. **Hamilton, James L. & Budoff, Milton.** (Lesley Coll, School of Education, Cambridge, MA) **Learning potential among the moderately and severely mentally retarded.** *Mental Retardation*, 1974(Aug), Vol 12(4), 33-36.—Investigated the feasibility of M. Budoff and M. Friedman's (see PA, Vol 39:5651) learning potential



paradigm as an assessment approach with moderately and severely mentally retarded persons. 40 12-22 yr old institutionalized retardates were tested 3 times: initially, after 1 wk, and after 1 mo with a match-to-sample block design test. 20 were randomly assigned to a 30-min training session which occurred on the day prior to the 1st retest. Pretrained scores were positively correlated with Peabody Picture Vocabulary Test IQ. Improvement following training was not related to IQ, but was significantly related to 2 validity measures. (17 ref) —*Journal abstract.*

3439. Hatfield, Frances M. & Zangwill, O. L. (Cambridge Psychological Lab, England) **Ideation in aphasia: The picture-story method.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 389-393.—Examined the ability of aphasics to communicate a sequence of events by drawing. Examples of this written communication obtained from a chronic male patient with expressive aphasia are presented. It appears that ideational processes in aphasia may be substantially intact in spite of severe defects in spoken and written expression. (French & German summaries)

3440. Holden, Edward A. (Edward R. Johnstone Training & Research Ctr, Bordentown, NJ) **Enumeration versus tracking during unimodal and multimodal sequential information processing in normals and retardates.** *Developmental Psychology*, 1974(Sep), Vol 10(5), 667-671.—Presented varying length pulse sequences to 24 16-yr-old educable retardates, 24 equal chronological age (CA) normals, and 24 9-yr-old equal mental age (MA) normals under 3 modality switching conditions and 2 response modes. Error magnitudes were greatest for retardates, less for equal-MA normals, and least for equal-CA normals. Error magnitudes also increased significantly from the no switching to maximum modality switching condition, from the enumeration to motor tracking response mode, and with increasing numerosities. Error increases from enumeration to tracking and from no switching to maximum modality switching rates were predominantly underestimations, confirming previous findings that attention shifting interferes with input or storage of stimulus number.—*Journal abstract.*

3441. Jones, Marshall B. (Pennsylvania State U, Milton S. Hershey Medical Ctr) **Nonassortative mating and small mean differences: A comment on the Reeds' family study.** *Social Biology*, 1973(Sep), Vol 20(3), 347-349.—Disputes the conclusion reached by E. W. Reed and S. C. Reed (1965) that there is no explanation for the "marrying down" by female retardates in nonassortative marriages. An explanation is offered based on reanalysis of statistical data.

3442. Marinoson, G. L. (Child Guidance Clinic, Middleton, England) **Performance profiles of matched normal, educationally subnormal and severely subnormal children on the revised ITPA.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Apr), Vol 15(2), 139-148.—Compared the performance of matched groups of 30 normal, 30 educationally subnormal (ESN), and 30 severely subnormal (SSN) children, all of whom had a mental age of 5 yrs, on the revised Illinois Test of Psycholinguistic Abilities (ITPA). Results show that normals scored highest on all subtests, with ESNs next and SSNs scoring lowest. The largest

intergroup differences were found on the Visual Sequential Memory subtest, but significant differences were also found between normals and ESNs on Auditory Sequential Memory and between normals and SSNs on both reception subtests, Auditory Association and Auditory Sequential Memory. Both normals and ESNs showed preference for tests in the auditory-vocal channel over those in the visual-motor channel. Results are discussed in the light of previous ITPA findings, the special circumstances of this study, and the characteristics of the test battery. (28 ref)—*Journal summary*

3443. Matthews, Charles G. (U Wisconsin, Ctr for Health Sciences, Madison) **Applications of neuropsychological test methods in mentally retarded subjects.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Presents mean scores and standard deviations for 3 WISC and 3 Wechsler-Bellevue Scale IQ groups obtained from 81 9-14 yr old institutionalized retardates and from another group of 286 Ss 15 yrs old and older. Methodological-clinical problems and potential contributions of neuropsychological investigations in mental retardation are discussed.

3444. McGavern, Maureen L. (Austin State School, TX) **Modeling behavior in echopraxic and non-echopraxic profoundly retarded subjects.** *American Corrective Therapy Journal*, 1972(Sep), Vol 26(5), 136-138.—Examined whether profoundly retarded Ss who are echopraxic perform differently on a motor imitation task subsequent to film viewing than do profound retardates in general. 11 echopraxic and 10 nonechopraxic males were studied. Measurements were made of chronological age and social quotient. Results show that the echopraxic group responded better to modeling than did nonechopraxic retardates. This is interpreted in terms of the echopraxic's special ability at motor imitation. (16 ref) —*R. S. Albin.*

3445. Preda, Vasile. [Qualities and limitations of the Kohs-Goldstein tests as a means of diagnosing mental retardation.] (Romanian) *Studia Universitatis Babes-Bolyai*, 1972, Vol 17, 41-53.—Administered the Kohs-Goldstein test to 200 mentally retarded children 9-14 yrs old and to 80 normal children 6-14 yrs old. Results were compared for diagnostic value with those of the Binet-Simon test (correlation .54) and the Bender Gestalt test (correlation .78). Since the Kohs-Goldstein test is directed toward the diagnosis of serious mental disorders, it should be used only as part of a larger diagnostic battery in the assessment of mildly retarded children. (Russian & English summaries)—*R. A. Meyer.*

3446. Rolf Jensen, Marchen. (Danish Coll for Educational Studies, Aarhus) **Some psychological patterns of functioning of children retarded in reading: Considerations of the relation between "brain-damage" and reading retardation.** (Danish) *Skolepsykologi*, 1974, Vol 11(4), 259-276.—Compared 11 5th-grade boys receiving remedial reading instructions with 11 others from the same socioeconomic level and having the same middle range of intelligence (as estimated by their teachers) with satisfactory reading performance. The purpose was to elucidate the relation between minimal cerebral dysfunction and emotional factors. Instruments used were (a) a

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settings for mentally retarded children.—*Journal abstract.*

3454. Stephens, Beth et al. (Temple U) **Symposium: Developmental gains in the reasoning, moral judgment, and moral conduct of retarded and nonretarded persons.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 113-161.—Presents results from a longitudinal study on the development of Piagetian reasoning, moral judgment, and moral conduct. Findings are analyzed and tabulated for 2 2-yr testings of 75 nonretarded (IQ = 90-100) and 75 retarded (IQ = 50-75) 6-20 yr old Ss. Attention is also given to interrelationships which exist among scores on measures of reasoning, moral judgment, and moral conduct. Discussions of and reactions to the findings on reasoning are provided by J. M. Hunt; on moral judgment, by L. Kohlberg; and on moral conduct, by J. Aronfreed.—*Journal abstract.*

3455. Swartz, Jon D. (U Texas, Austin) **Motor development and body image: A reply to Ball.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 227-228.—Clarifies the intentions of W. C. Chasey et al (see PA, Vol 52:8002) in their article using body-image scores with mentally retarded children and cites reliability data supporting the use of the measures employed. Criticisms by T. S. Ball (see PA, Vol 53:Issue 2) of Chasey et al are answered, supporting the latter's study.

3456. Tanaka, Toshihiko & Matsuda, Tadahisa. (Osaka U, Lab of Psychology, Japan) **[A study of figure cognition by mentally retarded children: II. In comparison with normal children.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Jun), Vol 21(2), 111-115.—Compared the perception of geometric form by mentally retarded children with perception by normal Ss in order to find perceptual characteristics of the mentally retarded. 93 children with mental ages 4, 5, and 6 yrs performed recognition tasks, identifying forms similar to 6 standard groups. The data were compared with those of previous studies. Results show that the mentally retarded performed better in identifying topology than in identifying shape, and that normal Ss performed better ( $p < .01$ ) than the mentally retarded when mental age was equated.—*S. Choe.*

3457. Tzortzis, C. & Albert, M. L. (INSERM, Paris, France) **Impairment of memory for sequences in conduction aphasia.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 355-366.—Administered matching, serial speech, word recognition and learning, and auditory perception tests, the Wechsler Memory Scale, and the Auditory Sequencing Test to 3 47-53 yr old patients with conduction aphasia, 3 23-41 yr old normal controls, and 2 patients (21 and 53 yrs old) with sensory aphasia and motor aphasia. Although the Ss with conduction aphasia could reproduce the items presented they could not recall the correct order of the items; this was true whether the material was verbal or nonverbal, auditory or visual, and whether the response was oral or by pointing. It is concluded that the disorder underlying the repetition defect in these 3 conduction aphasics is an impairment of their memory for sequences. Case reports of the patients with aphasia are appended. (French & German summaries)—*Journal abstract.*

3458. Vandever, Thomas R. & Neville, Donald D. (George Peabody Coll for Teachers) **Letter cues vs. configuration cues as aids to word recognition in retarded and nonretarded children.** *American Journal of Mental Deficiency*, 1974(Sep), Vol 79(2), 210-213.—63 mentally retarded and 54 nonretarded 6-7 yr old children were randomly assigned to 3 independent conditions (outline, contrast, and letter cue) in which they learned to read words written in a contrived orthography. In the outline condition, the words were outlined; in the contrast condition, they were surrounded by a black background; and in the letter-cue condition, the words were presented without configurational aids, and letter cues were stressed. Retarded Ss in the letter-cue group learned significantly more words than those in the other groups. The cues emphasized did not influence the numbers of words learned by the nonretarded Ss. It is suggested that teachers working with mildly mentally retarded beginning readers avoid stressing configuration cues.—*Journal abstract.*

3459. Woodruff, Michael L. (U Florida) **Subconvulsive epileptiform discharge and behavioral impairment.** *Behavioral Biology*, 1974(Aug), Vol 11(4), 431-458.—Reviews clinical and experimental reports regarding deficits in learning and memory as a result of subclinical epileptiform discharge. The effects of focal epileptic discharge upon behavior are compared to the effects produced by nonepileptic lesions of the same brain areas. It is suggested that whether or not epileptogenic discharge has behavioral consequences similar to ablation of the same brain region depends upon the intensity of the discharge and the extent to which the discharge spreads from the focus. Data which support the hypothesis that seizure discharge impairs retrieval of information more severely than storage are examined, and advantages and disadvantages of several methods for producing epileptiform discharge experimentally are discussed. It is suggested that relatively long-term changes in background EEG activity and cortical steady potential shifts may be the underlying physiological alterations responsible for the observed deficits, rather than simply the presence of epileptiform spike and wave discharges. (4½ p ref)—*Journal abstract.*

3460. Zimmermann Tansella, Christa. (U Padova, Inst of Clinical Psychiatry of Verona, Italy) **[Mental retardation: I. Problems of classification.]** (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 541-564.—Reviews the evolution of the concept of mental retardation in various countries as reflected in terminology, definitions, and classifications. Heber's classification is discussed in detail with special reference to the problems of the relationship between intelligence, social abilities, etiology, and prognosis. (77 ref)

3461. Zimmermann Tansella, Christa. (U Padova, Inst of Clinical Psychiatry of Verona, Italy) **[Mental retardation: II. Problems of diagnosis.]** (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 565-582.—Since low intelligence and inadequate social abilities are the most important criteria of mental retardation, those instruments commonly used to measure these factors are re-examined: the Stanford-Binet, the Wechsler Scales, the Vineland Social Maturity Scale, and the Progress Assessment Charts. It is concluded that the 1st 3 are

useful only for classification purposes and do not serve for intraindividual diagnosis, even though they are widely used for that purpose. The main reasons for their inadequacy are seen as the low reliability of the subtests and the lack of specific norms for mentally retarded reference groups. The Progress Assessment Charts are presented as an adequate approach to overcome such difficulties. (49 ref)—*Journal summary*.

3462. Zisfein, Laura & Rosen, Marvin. (Elwyn Inst, PA) **Self-concept and mental retardation: Theory, measurement, and clinical utility.** *Mental Retardation*, 1974(Aug), Vol 12(4), 15-19.—Examined the clinical use of 4 measures—a self-evaluation scale, a risk-taking task, a self-comparison scale, and level of aspiration—with 56 day and residential mentally retarded students. The 4 measures were significantly interrelated. Ss sorted as having extremely high or low self-concepts could also be identified by an independent evaluation based upon projective techniques, clinical impressions, and personal records. Results suggest the usefulness of these measures for professionals and nonprofessionals working with the mentally handicapped in assessing the varying self-concepts of their clients. (15 ref)—*Journal abstract*.

### Speech Disorders

3463. Andrews, Gavin & Cutler, Jeffrey. (U New South Wales, Sydney, Australia) **Stuttering therapy: The relation between changes in symptom level and attitudes.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 312-319.—Assessed the reliability and validity of R. I. Erickson's scale (1969) for measuring communication attitudes in stutterers and nonstutterers by administering it to a control group of 25 nonstutterers on 2 occasions and to a group of 25 stutterers on 3 occasions during a therapy program: before treatment, after the instatement of fluency, and after transfer to everyday conversation. An analysis of the items led to the deletion of those not suitable for repeated administration. The resultant 24-item scale was a more valid and reliable measure of change in the communication attitudes of stutterers. The rate of change was compared with the changes in the level of stuttering. After stuttering stopped, the stutterers' scores did not equal those of the nonstutterers until they experienced speaking outside therapy. A follow-up study confirmed these results. After the removal of symptoms by behavior therapy, attitude change was only partial, and it was not until the patients completed a program of supervised experience that their attitudes changed to normal. (19 ref)—*Journal abstract*.

3464. Chester, Sondra L. & Egolf, Donald B. (Harmarville Rehabilitation Ctr, Pittsburgh, PA) **Nonverbal communication and aphasia therapy.** *Rehabilitation Literature*, 1974(Aug), Vol 35(8), 231-233.—Suggests that because of the general importance of nonverbal communication and its overwhelming importance to those having a language disorder, a counseling program on nonverbal communication be incorporated into aphasia therapy involving professionals, paraprofessionals, and others in the aphasic's environment. The categories of nonverbal communication included are organemics, cosmetics, costuming, proxemics, chronemics, oculistics, haptics, kinesics, objectics, and vocalics.—S. L. Warren.

3465. Gardner, Julie O. (California State U, Northridge) **Identification of children for speech and language referral.** *Journal of School Health*, 1974(May), Vol 44(5), 255-256.—Presents guidelines for the school nurse in detecting the child with a language handicap. Normal and abnormal aspects of articulation, voice, rhythm, and language, and the use of health records as a prescreening device are discussed.

3466. Hofmann, Joanne & Panagos, John M. (Kent State U, Div of Speech Pathology and Audiology) **Mothers' and non-mothers' semantic adaptation to deviant speech.** *Language & Speech*, 1973(Oct-Dec), Vol 16(4), 396-404.—Examined whether a group of 10 mothers of children with deviant speech and a matched group of 10 nonmothers could adapt their comprehension strategies to decode command sentences spoken by a child known to generate patterned deviant utterances. While Ss made significant improvement in their comprehension performance (adaptation), a significant difference between groups was not observed. It is suggested that perceptual adaptation to variant linguistic codes may be so basic to decoding performance that maternal experience with child speech would not provide mothers with a decoding advantage over native speakers engaged in everyday adaptive communication.—*Journal abstract*.

3467. Holbrook, Anthony; Rolnick, Michael I. & Bailey, Clayton W. (Florida State U) **Treatment of vocal abuse disorders using a vocal intensity controller.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 298-303.—Used a portable voice intensity controller in a treatment program for patients with dysphonia related to vocal cord lesions and to laryngeal hypertension. The device, worn in daily speaking situations, provided auditory feedback contingent on excessive vocal intensity. Consequently, a soft vocal level was automatically maintained even in the presence of high-level environmental noise. The device proved to be an aid to vocal rehabilitation for the 32 patients studied, including complete resolution of disorders for 11 patients.

3468. MacDonald, James D. & Blott, Judith P. (Ohio State U) **Environmental language intervention: The rationale for a diagnostic and training strategy through rules, context, and generalization.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 244-256.—Proposes the Environmental Language Intervention Strategy as a singular approach to the diagnosis and training of individuals with severely delayed expressive language. The strategy places in a clinical framework the semantically based approach to grammar of L. Bloom, I. M. Schlesinger, and R. Brown by selecting as the content for diagnosis and for training those 8 rules governing the semantic functions of early 2-word utterances in a variety of languages. The rules are elicited with linguistic and nonlinguistic cues that represent the full environmental context of the utterance. The strategy also samples and trains the early language rules in imitation, conversation, and play in order to include, from the beginning of intervention, procedures for training generalization of new language classes to spontaneous use. The theoretical rationale for the strategy is discussed, and operational definitions of the rules are presented.



The procedures for using the strategy in diagnosis and training are introduced. (16 ref)—*Journal abstract*.

3469. **Quarrington, Bruce.** (York U. Downsview, Ontario, Canada) **The parents of stuttering children: The literature re-examined.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 103-110.—A review of the literature on personality, attitudes, and behavior of the parents of stuttering children suggests that parents are low in social dominance and that the mothers of beginning stutterers are particularly permissive or passive regarding the shaping and control of the developing child's behavior. Although instructional passivity appears to persist in the mothers of chronic stutterers, specific punitive attitudes also emerge. The roles of instructional passivity and punitive parental reactivity in the precipitation and maintenance of stuttering behaviors are briefly considered. (French summary) (16 ref)—*Journal summary*.

3470. **Suga, Tetsuo & Otake, Nobuko.** [On "commanding-to-write" behavior: A case study.] (Jpn) *Japanese Journal of Educational Psychology*, 1972(Dec), Vol 20(4), 216-225.—Devised a numerical coding system of Japanese letters and numbers for a 12-yr-old girl who was unable to speak because of serious impairment of general motor function caused by cerebral palsy. In 11 training sessions with a simple apparatus specially constructed for the S, she was able to use the coding system for verbal communication. Educational implications for persons having speech disorders are considered to be important. (English summary)—*S. Choe*.

3471. **Vicker, Beverly A. (Ed.).** (U Iowa, Hosp School) **Nonoral communication system project 1964/1973.** Iowa City, IA: Campus Stores, 1974. 261 p.—Presents a collection of 5 papers on the various means of communication available for persons who, although they lack the motor coordination to produce intelligible speech, do have intact abilities for language comprehension and formulation. The use of communication boards by a group of cerebral palsied children is described, along with the design of individualized nonoral vocabulary materials, suggestions for a habituation program, and evaluation procedures. Sample materials and blueprints for equipment are included.

### Physical & Toxic Disorders

3472. **Abse, D. Wilfred et al.** (U Virginia Hosp) **Personality and behavioral characteristics of lung cancer patients.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 101-113.—Conducted psychiatric interviews which focused upon some of the variables thought to be relevant to the distinction between cancer-prone personalities and other personalities. 59 patients, 31 later diagnosed as having lung cancer and 28 as having general cancer-free thoracic problems, were interviewed in terms of these variables. Results show that patient groups could be successfully discriminated from one another only when behavior patterns were included in the analysis and were interpreted relative to the patient's age. Findings support the age hypothesis; i.e., that young cancer patients more frequently demonstrate and more clearly portray the characteristics attributed to lung cancer patients in general. (45 ref)—*W. G. Shipman*.

3473. **Alpert, Jack N.** (Baylor Coll) **Failure of fixation suppression: A pathologic effect of vision on caloric nystagmus.** *Neurology*, 1974(Sep), Vol 24(9), 891-896.—Defines an ocular-fixation index as a measurement for determining the presence of failure of fixation suppression in 21 9-78 yr old patients as compared with 30 normal controls. The ocular-fixation index of slow-phase velocity best separated normal from abnormal caloric responses. Patients showing failure of fixation suppression by these criteria had a high incidence of posterior fossa lesions.

3474. **Assal, G.** (Service U de Neurochirurgie Hôpital Cantonal, Lausanne, Switzerland) [Problems in the auditory reception of language associated with lesions of the cerebral cortex.] (Fren) *Neuropsychologia*, 1974(Jul), Vol 12(3), 399-401.—Presents the results of a test of phonemic discrimination administered to Ss with unilateral cerebral left or right lesions. Poor performances among Ss with anterior left lesions are discussed. (German summary)

3475. **Beaumanoir, A.; Ballis, T.; Varfis, G. & Ansari, K.** (Out-patient Dept of the Pediatric Clinic, Geneva, Switzerland) **Benign epilepsy of childhood with Rolandic spikes: A clinical, electroencephalographic, and telencephalographic study.** *Epilepsia*, 1974(Sep), Vol 15(3), 301-315.—26 cases of "benign epilepsy of childhood" with Rolandic spikes, thoroughly studied clinically and electroencephalographically, were compared with 26 patients with petit mal or petit mal and grand mal seizures. Momentary alterations of consciousness (absences) could be detected in a fair number of children with "benign epilepsy." Rolandic spikes and Mu rhythms were found almost exclusively in patients having convulsions, whether focal or generalized. Rolandic spikes associated with Mu rhythms and bilaterally synchronous or asynchronous discharges of spikes of spike-and-slow-waves seem, therefore, to be the features of an epilepsy whose clinical manifestations (absences or convulsions) may depend on the psycho-biophysiological background.—*Journal summary*.

3476. **Becker, R. D.** **Minimal cerebral (brain) dysfunction—clinical fact or neurological fiction? The syndrome critically re-examined in the light of some hard neurological evidence.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 87-106.—Presents a systematic review of the current theoretical, empirical, and clinical controversies in the fields of developmental and psychological medicine, pediatrics, and child psychiatry and neurology, stressing the diagnostic value and potential usefulness of the designation of minimal brain dysfunction (MBD). An attempt is made to redefine the etiological, symptomatic, neuropsychological, and behavioral correlates of the MBD syndrome. The clinical diagnostic value of "soft" and "hard" neurological signs is reexamined and equivocal and/or nonspecific outcomes of neuropsychological examinations are described. The psychological reality of the MBD child and the secondary emotional consequences are considered. Cognitive, affective, behavioral, developmental, communicative, social, and learning correlates of the MBD syndrome are defined, and some guidelines for establishing an early recognition and diagnosis are presented. (49 ref)—*Journal abstract*.

3477. **Boll, Thomas J.** (U Washington) **Behavioral correlates of cerebral damage in children aged 9 through 14.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Reviews the literature, discusses the validity of the Halstead Neuropsychological Test Battery for Children, and presents results of administering extensive psychometric and ability tests to matched groups of brain-damaged and normal 9-14 yr old Ss. Empirical data on qualitative vs quantitative changes in adaptive abilities of brain-lesioned children are described, and the use of multiple inferential methods to assess the effect of cerebral impairment on motor and tactile-perceptual functioning is cited.
3478. **Cameron, Paul & Robertson, Donald.** (U Louisville) **Effect of home environment tobacco smoke on family health.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 142-147.—Replicated and extended earlier research by P. Cameron et al in 1969 that indicated a greater prevalence of respiratory illness among children subjected to tobacco smoke in the home environment. A random phone sample of 2,626 households in Detroit, Michigan and in Long Beach and Pasadena, California, yielded evidence suggesting that (a) children subjected to tobacco smoke in the home environment have a greater prevalence of acute illness when compared to children in smoke-free environments, (b) adult nonsmokers subjected to tobacco smoke in the home environment may have a greater prevalence of acute illness than adult nonsmokers who reside in a smoke-free environment, and (c) respiratory illness rates may be related to air pollution rates in metropolitan areas.—*Journal abstract*.
3479. **Carey, Raymond G.** (Lutheran General Hosp, Park Ridge, IL) **Emotional adjustment in terminal patients: A quantitative approach.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 433-439.—Used a quantitative approach to identify factors relating to emotional adjustment in 84 13-82 yr old dying patients. 11 hospital chaplains collected data by interviewing the patients. Results indicate that emotional adjustment to the awareness of a limited life expectancy was not related principally to religious orientation, although this was an important factor. Emotional adjustment was influenced more by the patient's physical condition (level of discomfort), by previous experiences with dying persons, and by interpersonal relationships. The most important aspect of the religious variable was the quality of religious orientation rather than mere religious affiliation or verbal acceptance of religious beliefs.—*Journal abstract*.
3480. **Cherington, Michael.** (U Colorado, Medical Ctr, Denver) **Visual neglect in a chess player.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 145-147.—Describes a chess game in which one player, the patient, had a right parietal lobe lesion. His performance tended to support the concept that many factors are involved in visual neglect. It is believed that this is the 1st case reported in which visual neglect is demonstrated on the chess board.
3481. **Comings, David E. & Amromin, George D.** (City of Hope National Medical Ctr, Durate, CA) **Autosomal dominant insensitivity to pain with hyperplastic myelinopathy and autosomal dominant indifference to pain.** *Neurology*, 1974(Sep), Vol 24(9), 838-848.—Describes 2 forms of aberrant sensation to pain: autosomal dominant insensitivity to pain and autosomal dominant indifference to pain. The case histories of 2 families are detailed, in one of which electron microscopy of the sural nerves demonstrated a unique abnormality of myelin that has been termed hyperplastic myelinopathy. The unmyelinated C fibers were normal, while the medium- or large-sized myelinated fibers were involved, indicating the importance of the latter in pain sensation. (48 ref)
3482. **Cramer, Kathryn D. & Eber, Norman P.** (Central Inst for the Deaf, St Louis, MO) **A spondee recognition test for young hearing-impaired children.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 304-311.—10 spondaic words recorded on Language Master cards were presented monaurally through insert receivers to 58 5-9 yr old hearing-impaired children to evaluate their ability to recognize familiar speech material. Ss were tested individually until their performance stabilized—which required from 4 to 10 sessions. They indicated their responses by pointing to labeled picture cards. Spondee recognition scores were bimodally distributed, with clusters of scores of 0-65% and 66-100%, respectively. In general, pure-tone averages better than 93 db HTL (hearing-threshold level) were associated with spondee scores from 66 to 100%, while pure-tone averages poorer than 103 db HTL corresponded to spondee scores from 0 to 65%. No close relation between pure-tone thresholds and spondee recognition scores was found for average hearing levels between 93 and 103 db. Recognition scores varied as a function of repeated testing in 3 general ways: stable performance, steadily improving performance, or inconsistent performance.—*Journal abstract*.
3483. **Dague, P.** [Applications of the Marianne Frostig Test of Maturation of Visual Perception in schools.] (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(2), 77-86.—Reports on the probable usefulness of the Frostig Test of Perceptual Maturation in diagnosis of visual handicaps, psychomotor disorders, and mental retardation. The test measures visual-motor coordination, discrimination of figure and ground, constancy of geometrical form, positioning in space, and spatial relations.
3484. **Davidson, Philip W.; Barnes, Judith K. & Mullen, Gina.** (Washington Coll) **Differential effects of task memory demand on haptic matching of shape by blind and sighted humans.** *Neuropsychologia*, 1974(Jul), Vol 12(3), 395-397.—Studied the role of prior perception experience in retention of haptic information by comparing 22 blind and 23 sighted adolescents (matched for IQ) in a matching task that systematically varied task memory demand. Results indicate that whereas greater memory demand reduced retention for both groups of Ss, the blind showed better retention under such memory demand than did the sighted. The outcome was interpreted in light of the effects of prior experience in gathering information by hand, on the way the stimulus is explored, and the way it is coded. (French & German summaries)—*Journal abstract*.



3485. Davison, Leslie A. (U California, San Francisco) **Introduction.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Discusses concepts frequently encountered in the study of clinical brain-behavior relations; the utility of clinical neuropsychology and its relationships to its primary referral sources—neurology, neurosurgery, and psychiatry; and differences between clinical psychological and clinical neuropsychological approaches to the assessment of brain damage.

3486. Falicki, Zdzislaw & Pilasiewiczowa, Barbara. (Bialystok-Choroszcz Medical Academy, Clinic for Mental Diseases, Poland) **[Histopathological studies of skin segments in schizophrenic patients: A preliminary report.]** (Poln) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 519-521.—Fine roundcelled infiltrations around capillaries were found in segments of macroscopically unchanged skin in 7 out of 10 cases of schizophrenia and in 8 out of 10 members of a control group of mentally retarded individuals. Because such changes occur frequently in psychiatric patients, these studies will be continued and expanded. (Russian summary)

3487. Fidel, Edward A. & Ray, Joseph B. (Texas Tech U) **The validity of the Revised Objective Perceptual Test in differentiating among nonorganic, minimally organic, and grossly organic children.** *Journal of Special Education*, 1972(Fal), Vol 6(3), 279-284.—Administered a revision of L. Hays's 1968 Objective Perceptual Test (OPT) to 40 nonorganic, 40 minimally organic, and 20 grossly organic children (age range, 5.5-9.5 yrs) to determine its diagnostic effectiveness. The OPT differentiated nonorganic from organic Ss and minimally organic from nonorganic Ss with a high degree of accuracy. It differentiated minimally organic from nonorganic Ss more effectively (84%) than did the Bender-Gestalt Test (B-G) scored according to the Koppitz procedure (63%). Consideration of both Revised OPT and B-G performance resulted in a more accurate diagnosis (94%) between minimally organic and organic Ss than when either test was considered alone. It is noted that the Revised OPT has several advantages when compared to the majority of psychological tests used to detect organicity in children: objective scoring, rapid administration and scoring, high degree of validity, empirical norms for perceptual development, and differentiation of expressive from receptive disorders.—*Journal abstract.*

3488. Friedman, Gary D.; Ury, Hans K.; Klatsky, Arthur L. & Siegelau, A. B. (Kaiser-Permanente Medical Care Program, Oakland, CA) **A psychological questionnaire predictive of myocardial infarction: Results from the Kaiser-Permanente epidemiologic study of myocardial infarction.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 327-343.—Administered a 155-item psychological questionnaire to 330 multiphasic examinees who subsequently developed a well-documented first myocardial infarction (MI). 2 control groups who were matched for age, race, and sex and who remained free of MI were selected from multiphasic examinees; 1 group was additionally matched to the cases for standard coronary risk factors. Responses to several questionnaire items were associated with subsequent MI to a statistical-

ly significant degree, and a further test indicated that the questionnaire as a whole contained more associated items than would be expected by chance. Outside experts selected items to represent certain psychological traits hypothesized as predicting MI. Items representing "emotional drain" and "somatization" proved to be associated with subsequent MI, but these relationships were no longer apparent when Ss with coronary symptoms and diagnoses at the time of testing were removed from the study group. Sets of items representing certain other traits were not significantly predictive, except for those representing "anxiety-neuroticism," in the symptom-free subgroup. It is concluded that in studying factors predicting MI, care should be taken that psychological traits are not confused with symptoms of coronary heart disease. (16 ref)—*Journal abstract.*

3489. Gajdusek, D. C.; Garruto, R. M. & Dedecker, R. (NIH, Inst of Neurological Diseases & Stroke, Bethesda, MD) **Congenital defects of the central nervous system associated with hyperendemic goiter in a neolithic highland society of Western New Guinea.** *Human Biology*, 1974(May), Vol 46(2), 339-344.—Obtained birth weights and infantile growth rates for 73 male and female newborns, representing a total of 438 longitudinal weight measurements, for the Mulia population of the Central Highlands of Western New Guinea at an early period of cultural contact. The newborns and infants represent offspring from a population severely affected with goiter and cretinism and associated mental and motor defects, but none of the infants were diagnosed as cases of severe congenital cretinism. The birth weights of Mulia infants are among the lowest reported for New Guineans, which may in part be the result of the severely protein-deficient diet of pregnant mothers in the Mulia valley. Longitudinal growth curves in Mulia infants are generally similar to those found in other protein-deficient New Guinea populations.—S. L. Warren.

3490. Garrie, Erica V.; Garrie, Stuart A. & Mote, Thomas. (St Mary's U) **Anxiety and atopic dermatitis.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 742.—Reports that 45 Ss with atopic dermatitis had significantly higher A-State and A-Trait anxiety (measured by the State-Trait Anxiety Inventory) than 45 Ss with pityriasis rosea (a nonitchy skin disease) or 45 normal control Ss.

3491. Goldberg, Richard T. (Massachusetts Rehabilitation Commission, Boston) **Adjustment of children with invisible and visible handicaps: Congenital heart disease and facial burns.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 428-432.—26 11-15 yr old children with congenital heart disease and 22 with facial burns were compared on 10 measures of adjustment to test the effects of invisible and visible disability upon social and psychological development. Interview data were coded and submitted to analysis of covariance, using sex, grade, and age as covariates. The invisible disability group (the heart group) was higher in adjustment in all 10 measures. Significant differences ( $p < .01$ ) were obtained on vocational aspirations, origin of interest in vocational aspiration, career plans after high school, self-image, and work values. It is concluded that an invisible disability with severe physical limitations has fewer deleterious effects upon social adjustment than does a visible

disability without physical limitations such as facial disfigurement. (20 ref)—*Journal abstract*.

3492. Gorsuch, Richard L. & Key, Martha K. (George Peabody Coll for Teachers, John F. Kennedy Ctr for Research on Education & Human Development) **Abnormalities of pregnancy as a function of anxiety and life stress.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 352-362.—Measured states of anxiety and magnitude of life change surrounding the pregnancies of 111 low-income clinic patients, using the State-Trait Anxiety Inventory and a life change inventory. Results indicate that anxiety around the 1st trimester was related to abnormalities of pregnancy, parturition, and infant status. Life stress during the 2nd and 3rd trimesters was similarly associated with the same measure of abnormalities. Anxiety and life stress independently contributed to abnormalities of pregnancy and were critical at different times. Evidence did not suggest that either anxiety or life stress before conception influences the course and outcome of pregnancy. (23 ref)—*Journal abstract*.

3493. Hackett, T. P. & Cassem, N. H. (Massachusetts General Hosp, Boston) **Development of quantitative rating scale to assess denial.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 93-100.—Devised a single rating scale item for each of the behavioral traits empirically noted among major deniers and for several specific questions about fear, making a 33-item scale. The scale was then applied to interviews with 63 male and 26 female coronary patients 29-80 yrs old (mean age, 58.2 yrs). Patients were divided into 3 groups according to amount of denial used and each person was interviewed from 3 to 10 times during his hospital stay. The desired range of scale scores (4-53 in this sample) was achieved. The ability of the scale scores to differentiate the 3 clinical groups was highly significant. Differences between pairs of mean scores for each of the 3 denial groups were also highly significant. (21 ref)—W. G. Shipman.

3494. Hegenscheidt, Marianne & Cohen, Rudolf. (Max Planck Inst for Psychiatry, Munich, W Germany) **[Determination of cognitive flexibility in brain-damaged persons.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 1(1), 1-20.—Tested 3 measures of cognitive rigidity and flexibility for their differential-diagnostic value in detecting organic brain damage. Ss were male patients 25-65 yrs old (250 brain damaged, 65 schizophrenic, 27 depressed) and 96 normal controls tested in groups matched in age, education, and intelligence. Ss were given the Trailmaking Test, Form B (for letter and number alteration, with part A—for numbers only—partialled out); the Stroop Color-Word Test (for reading and naming, with naming partialled out); and a dichotic hearing test (with numbers and letters and right vs left ear recall, with a dichotic digit-span score partialled out). These tests, designed to obtain cognitive flexibility measures, were preceded by control tests which were similar in all respects but did not require Ss to shift rapidly between different sets of instructions. The 2 test series were correlated to obtain "pure" flexibility measures. Brain-damaged Ss performed significantly less well than normal controls in the 1st 2 tests; no separation was achieved in the 3rd test. None of the tests could separate Ss with organic brain damage from the 2

psychotic groups. The 3 measures did not correlate with each other, or with tests that reliably discriminated the groups. It is concluded that the concept of cognitive flexibility cannot be defended. (English summary) (20 ref)—T. Fisher.

3495. Heyde, W. & Aban, P. [Marital conflict among patients under treatment for gynecological conditions and breast cancer.] (Germ) *Praxis der Psychotherapie*, 1973(Apr), Vol 18(2), 49-54.

3496. Keenan, Joseph S. & Brassell, Esther G. (VA Hosp, Atlanta, GA) **A study of factors related to prognosis for individual aphasic patients.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 257-269.—Reviewed the clinical records of 39 21-79 yr old aphasic patients in order to identify and correlate factors noted in the initial examination with the patients' progress in communicative performance. 3 nonlanguage variables (age, general health, and regularity of employment) and language variables (listening performance, talking performance, reading performance, writing performance, motor speech impairment, and speech stimulability) were studied. Results suggest that a high rate of prognostic accuracy may be attained through the application of some simple clinical observations concerning the patients' speech performance. (15 ref)—*Journal abstract*.

3497. Kenigsberg, Daniel et al. (Wesleyan U) **The coronary-prone behavior pattern in hospitalized patients with and without coronary heart disease.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 344-351.—Compared 42 22-64 yr old male and female hospitalized patients with coronary heart disease (CHD) and 42 with noncardiovascular diseases in terms of selected behavioral variables. Coronary patients were from the postcoronary unit and controls were patients hospitalized for surgery or traumatic injury. The major behavioral assessment was the Jenkins Activity Survey (JAS) designed to measure the coronary-prone behavior pattern (Type A), and used with female CHD patients for the first time in this study. CHD patients, both male and female, exhibited more Type A behavior and were more hard-driving than those with other health crises. These results replicate earlier findings from a large retrospective analysis of an industrial study. The differences observed were evaluated in terms of other demographic variables and found not to be influenced by them. —*Journal abstract*.

3498. Kinney, Jo A. & McKay, Christine L. (US Naval Submarine Medical Research Lab, Groton, CT) **Test of color-defective vision using the visual evoked response.** *Journal of the Optical Society of America*, 1974(Sep), Vol 64(9), 1244-1250.—Describes a new technique for detecting color-defective individuals, based upon the isolation of a pattern response from the visual evoked response. Specifically designed targets were produced from equal-luminance hues that lie on the confusion lines of deuteranopes, protanopes, and tritanopes. 16 color normals, 8 deuteranopes, 8 protanopes, and 1 tritanope were tested with these targets. Results show that color normals gave a pattern response to patterns formed of hue differences only; this response was similar to that produced by luminance differences. Color-defective individuals, however, gave no pattern response to



targets formed of hues that they could not discriminate, although they gave pattern responses for luminance differences. (23 ref)—*Journal abstract*.

3499. Klonoff, Harry & Low, Morton. (U British Columbia, Vancouver, Canada) **Disordered brain function in young children and early adolescents: Neuropsychological and electroencephalographic correlates.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Used discriminant analysis of variance to determine the relationships between neuropsychological status, neurological-minimal cerebral dysfunction (MCD) ratings, and EEG ratings. In a comparison of acute head-injured, chronic brain-damaged, MCD, and normal children, a high degree of success was achieved in predicting neurological, MCD, and EEG ratings from neuropsychological data, resulting in the emergence of differential age-etiology interaction patterns.

3500. Klonoff, Harry & Paris, Robert. (U British Columbia, Vancouver, Canada) **Immediate, short-term and residual effects of acute head injuries in children: Neuropsychological and neurological correlates.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Examined the neuropsychological status of children under 9 yrs of age and over 9 yrs of age ( $N = 231$ ) who had been hospitalized with head injuries. One and two years after trauma a higher incidence of developmental anomalies, positive premorbid factors, and sequelae were found in the younger boys, and a higher incidence of head injuries and assignment of blame to others was found for the younger girls. The older children had a higher occurrence of anterograde amnesia.

3501. Klove, Hallgrim & Matthews, Charles G. (U Bergen, Norway) **Neuropsychological studies of patients with epilepsy.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Results of 3 studies of selected classifications of epileptic patients show that (a) the known organic etiology of epilepsy is of more significance than the seizure manifestations for determining impairment level of neuropsychological functioning, (b) major motor seizures of known etiology impair psychological abilities more than seizures of unknown etiology, and (c) determination of impairment levels from major seizures of unknown as opposed to known etiology is dependent on inclusion of age-at-onset in the experimental design.

3502. Klove, Hallgrim. (U Bergen, Norway) **Validation studies in adult clinical neuropsychology.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Traces the background and development of the Halstead Neuropsychological Test Battery and of the Wechsler-Bellevue Scales and discusses studies from the literature which have used the tests to assess the organic integrity of the cerebral hemispheres and the laterality of brain damage in adults.

3503. Kristianson, Per. (U Uppsala, Sweden) **A comparison between the personality changes in certain forms of psychomotor and grand-mal epilepsy.** *British*

*Journal of Psychiatry*, 1974(Jul), Vol 125, 34-35.—Assessed the MMPI profile of a 34-yr-old male grand-mal epileptic patient. S's elevated scores on the Depression and Psychopathic Deviate scales suggest the existence of a syndrome of epileptic personality change and the utility of the MMPI in differentiating the psychopathology of certain forms of psychomotor and grand-mal epilepsy.

3504. Lazarus, Gary M. **The visual evoked potential, its clinical application in the investigation of cortical functioning and in the detection of neuro-ophthalmic pathology.** *Journal of the American Optometric Association*, 1974(Jul), Vol 45(7), 850-855.—Presents a brief history of the development of the EEG, and describes the electrophysiology of the cerebral cortex and its continuous activity, physiological basis, and evoked potential.

3505. Lenard, Hans-Gerd & Schulte, Franz-Josef. (U Göttingen, W Germany) **Sleep studies in hormonal and metabolic diseases of infancy and childhood.** In O. Petre-Quadens & J. D. Schlag (Eds), *Basic sleep mechanisms*. New York, NY: Academic Press, 1974. xix, 459 p. \$23.50.—Traces the development of research on sleep in infants and children and discusses EEG and polygraphic data from studies of sleep patterns in hypothyroidism and phenylketonuria.

3506. Leslie, Wendy J. & Greenberg, David A. (Massachusetts Coll of Optometry, Boston) **Headache: Discussion, classification and differential diagnosis for the optometrist: I.** *Journal of the American Optometric Association*, 1974(Jul), Vol 45(7), 827-832.—Presents the 1st of a 2-part series giving the practicing optometrist a working knowledge of headaches. The physiologic basis of head pain, classification and differential diagnosis of the more frequently occurring headaches, and a short glossary of neurological terms associated with headache descriptions are included.

3507. Lipowski, Z. J. (Dartmouth Coll, Medical School) **Sensory overloads, information overloads and behavior.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 264-270.—Reviews research results which support the thesis that a hallmark of technological societies is the ubiquity of conditions which result in sensory and information overloads for many persons. It appears that information overloads give rise to psychophysiological effects which may lead to behavioral and somatic pathology and are thus an important subject for psychosomatic investigators. (20 ref)—*Journal abstract*.

3508. Meier, Manfred J. (U Minnesota) **Some challenges for clinical neuropsychology.** In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Discusses the concept of localization of brain damage according to lateral, cephalocaudal, and vertical axes and considers related developments in modern behavioral neurology and human physiological psychology. Longitudinal applications and use of predictor and outcome-criteria batteries are described.

3509. Mormont, C. & Servais, J. (U Liège, Psychiatric Clinic, Belgium) **[The Rorschach of a young seizure-free epileptic patient.]** (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 379-386.—Reports the case study

of a 12-yr-old female epileptic who was not presenting seizures but who appeared to suffer from a behavior disorder. The study exemplifies the role the Rorschach test can play in the early detection of such disorders. The epileptic component had been overlooked but was later confirmed by EEG. Specific treatment produced improvement of the behavior disturbance. (French, Dutch, English, German, Italian, & Spanish summaries)—*E. Coché*

3510. Neumärker, Klaus J.; Neumärker, Marianne & Pose, Ursel. (Berlin-Lichtenberg Neurological & Psychiatric Hosp, E Germany) [On the psychopathology of psycho-motor seizures in childhood.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 165-175.—Reviews the literature on psychopathic incidents related to permanent and episodic disturbances associated with epilepsy. Personality characteristics are hypothesized based on study of 15 patients with a diagnosis of psychomotor epilepsy and damage to ascribable structures of the limbic system. (55 ref)

3511. Nickel, Bernd; Neumann, Jochen & Schirmer, Siegfried. (Humboldt U Berlin, Nerve Clinic, E Germany) [The forensic significance of pneumoencephalographic findings.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 144-150.—Suggests that diminished capacity due to cerebral imbalance at the time of a criminal offense can be positively related to pathological pneumoencephalographic findings. In a case of questionable decompensation at the time of a crime, the assumption of psychological imbalance can be justified only by a definite corroborative finding of pathological EEG.

3512. Norris, T. W.; Stelmachowicz, P.; Bowling, C. & Taylor, D. (U Nebraska, Medical Ctr, Div of Audiology, Omaha) Latency measures of the acoustic reflex. *Audiology*, 1974, Vol 13(6), 464-469.—Obtained an ordered series of latency measures of the acoustic reflex on 23 normal-hearing and 23 sensorineural hearing-impaired Ss (mean ages = 22 and 14 yrs, respectively). 5 parameters from each reflex recording were defined and measured. Statistical analysis revealed no difference between the 2 groups for the contraction or initial portion of the response. However, following the cessation of the stimulus, the sensorineural group demonstrated a significantly longer relaxation time. (French summary)—*Journal abstract*.

3513. Perret, E. (U Zurich, Switzerland) The left frontal lobe of man and the suppression of habitual responses in verbal categorical behaviour. *Neuropsychologia*, 1974(Jul), Vol 12(3), 323-330.—Hypothesized that previously reported findings of a reduction in word fluency caused by left frontal lesions is due to the coincidence of lesions in the left hemisphere entailing verbal deficits generally and frontal lesions producing deficits in the ability to suppress habitual behavior to adapt to unusual situations. A test of word fluency and a modification of the Stroop Color-Word Test were given to 118 patients with circumscribed cerebral lesions. Data to 118 patients with circumscribed cerebral lesions confirm the deficit in word fluency after left frontal lesions reported earlier. Left frontal lesions produced an increasing performance deficit as compared with lesions localized elsewhere in the brain. Correlations between performance in word fluency and on the Stroop test were

highest in left frontal patients. Results corroborate the hypothesis of the role of the frontal lobe in the adaptation of behavior to unusual situations, the left frontal lobe being of fundamental importance when verbal factors are involved. (French & German summaries)—*Journal abstract*.

3514. Prescott, Thomas E. & Tesauero, Patricia A. (U Denver) A method for quantification and description of clinical interactions with aurally handicapped children. *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 235-243.—Reports on the development of a system for objectively scoring and quantifying the events of a clinician-parent-child remedial session. Scoring procedures, sequence identification, and ratio identification and calculation are described. The system can be used to provide parents and clinicians information about their interactions with the child as well as to analyze the effects of the treatment sessions on the child's performance.

3515. Rabe, Richard H. et al. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) A model for life changes and illness research: Cross-cultural data from the Norwegian Navy. *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 172-177.—Presents a life stress and illness model based on studies of recent life changes data and near future illness reports of 1,058 17-27 yr old Norwegian Navy enlisted men. Results of these studies closely agreed with previously reported findings for 2,485 US Navy Ss. Recent life changes for both samples were assessed with the Schedule of Recent Experience; both groups also completed the Health Opinion Survey to assess perceptions of body symptoms. Both sets of data indicate that the fewer intervening variables and the less the time interval between Ss' recent life changes and their near-future illness symptoms, the higher the correlation between these 2 parameters. (32 ref)—*Journal abstract*.

3516. Rašković, Jovan. (Sibenik Medical Ctr, Neuropsychiatric Service, Yugoslavia) [Consciousness as a parameter of brain trauma.] (Ser) *Vojnosanterski Pregled*, 1974(Mar), Vol 31(2), 91-94.—Describes the phenomenology and clinical picture of disturbed consciousness during brain trauma in 427 patients. The parameters were perceptivity and reactivity. Perceptivity was taken as a separate category while reactivity was considered from several aspects, leading to a new classification of the syndrome of craniocerebral trauma. (French & Russian summaries) (18 ref)—*Journal summary*.

3517. Reitan, Ralph M. (U Washington) Psychological effects of cerebral lesions in children of early school age. In R. M. Reitan & L. A. Davison (Eds), *Clinical neuropsychology: Current status and applications*. Washington, DC: V. H. Winston & Sons, 1974. xiii, 417 p.—Presents results of a comparative psychological examination of 29 cerebrally damaged and 29 normal 5-8 yr old children. Distinctly different types of impairment were evident in the cerebrally damaged Ss when compared with normals, and psychological deficits were more marked than in adults and of a different type, although there was some indication that certain types of deficits were correctable when they developed at an early age.



3518. Rolf Jensen, Marchen. (Danish Coll for Educational Studies, Aarhus) [Comment on "Hyperkinesis: Delineation of two patterns."] (Danish) *Skolepsykologi*, 1974, Vol 11(4), 313-320.—Continues discussion of the 2 patterns of hyperkinesis postulated by S. J. Marwit and A. J. Stenner (see PA, Vol 50:1557). Some behavioral symptoms from Pattern 1 are referred to Pattern 2, and both patterns are discussed in terms corresponding to the proposed etiology: subcortical damage in Pattern 1 and cortical damage (frequently with personality deviation) in Pattern 2. Pattern 1 patients should receive medical treatment in the form of drugs that stimulate the central nervous system. For Pattern 2 patients, sedatives may complement psychological-educational treatment, taking into account secondary emotional instability and anxiety.—P. Mylov.

3519. Russek, Henry I. (New York Medical Coll, NY) **Emotional stress as a cause of coronary heart disease.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 120-123.—Conducted a questionnaire survey of 25,000 professional men in 20 occupational categories which demonstrated a marked gradient in the distribution of coronary disease, strikingly related to the stressfulness of occupational activity. The negative effect of the American high-fat diet combined with stress is cited. The potential for harm to the cardiovascular system by stressful patterns of living is diminished, if not nullified, by subsistence on a diet low in fat. The relationship between smoking and heart disease reflects the association between heart disease and stress, since smoking is a sign of anxiety. The need for change in patterns of schooling—which has become a traumatic experience for most students—is emphasized. (17 ref) —R. S. Albin.

3520. Salk, Lee; Grellong, Bruce A. & Dietrich, Jeanne. (New York Hosp-Cornell Medical Ctr, NY) **Sudden infant death: Normal cardiac habituation and poor autonomic control.** *New England Journal of Medicine*, 1974(Aug), Vol 291(5), 219-222.—Reports that a male infant who died of sudden-infant-death syndrome at the age of 5 wks showed more lability and poorer stabilization of the cardiac rate after stimulation at the age of 2-5 days than did normal infants. Findings suggest a dysfunction of the central mechanism for stabilizing the autonomic response, especially after stimulation. (21 ref)

3521. Scherzer, Alfred L. (Cornell U, Medical Ctr, New York) **Early diagnosis, management, and treatment of cerebral palsy.** *Rehabilitation Literature*, 1974(Jul), Vol 35(7), 194-199.—Because the major motor manifestations of cerebral palsy are not present at the time the precipitating cause occurs but rather emerge as the result of the maturation of an abnormal nervous system, it is no longer acceptable practice to await the obvious presence of motor disabilities before making a diagnosis. Developmental evaluation of the young child must consider the history of pregnancy, labor, delivery, the sequence of developing milestones, and especially the postural reflex patterns. Early identification of abnormalities will lead to a more efficient program of management and treatment, including appropriate positioning, handling, feeding, and general care. For the severely affected child, management alone may ultimately

ly be the only aspect that can be offered. Such a program requires the expertise of a team which includes physicians, social workers, educators, psychologists, and others. (31 ref)—S. L. Warren.

3522. Schulze, Heinz A. (Humboldt U, Berlin, Nerve Clinic, E Germany) [Incidence and duration of the simultaneous occurrence of ideokinetic aphasia, apraxia, and agraphia.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 130-135.—Reports on inability of some patients to carry out sequential functions of speech, movement, or writing. A graphic record is presented to show relations among these syndromes for each of 42 patients over a 20-wk period. It is suggested that statistical analysis could yield an empirical basis for differential diagnosis.

3523. Silva, Alessandro. (U Cattolica del Sacro Cuore, Inst di Psicologia, Milan, Italy) [Intellectual functions and congenital infantile hypoacusis.] (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 77-92.—Reports that congenital deafness and mutism in children indicate a lack of connection between intellectual functioning and auditory input or verbal output.

3524. Smoczyński, Stefan. (Gdansk Medical Academy, Clinic for Mental Disorders, Poland) [Psychopathology in cases of tumor in the cerebral temporal region.] (Poln) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 505-510.—Studied 28 female and 23 male patients with temporal brain tumor, hospitalized in 1961-1971 in the psychiatric department of the Medical Academy in Gdańsk. Diagnoses were confirmed during surgery or post-mortem examination. In 31 patients the tumor was localized in the left temporal region, in 20 patients in the right region. All patients showed symptoms of the psychorganic syndrome. There were 17 cases of dementia, 13 of the temporal syndrome, and 8 character disorders. Behavior disorders and dementia were preceded by neuroathenic complaints. The clinical pattern of these abnormalities seems to depend on the character of the morbid process and on the severity of the damage to the central nervous system. (Russian summary) (17 ref) —English summary.

3525. Spudis, Edward V. & Griffin, Albert. (Forsyth Memorial Hosp, Winston-Salem, NC) **Adams-Stokes attacks associated with hysteria.** *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(12), 1636.—Reports that a serious case of heart disease in a 55-yr-old woman went undetected because of a confusing mixture of psychogenic convulsions and Adams-Stokes attacks. The patient's reasons for producing caricatures of grand mal attacks are unclear. However, these intense convulsions may also have caused some of the attacks of the heart block.

3526. Sterman, M. B.; Macdonald, L. R. & Stone, R. K. (U California, Los Angeles) **Biofeedback training of the sensorimotor electroencephalogram rhythm in man: Effects on epilepsy.** *Epilepsia*, 1974(Sep), Vol 15(3), 395-416.—Previous studies with cats demonstrated a discrete 12-16 Hz rhythm in sensorimotor cortex (SMR), present only during absence of movement, that could be operantly conditioned. Trained cats were resistant to drug-induced seizures. In the present study similar biofeedback training procedures were employed with 4 epileptic and 4 nonepileptic human Ss, utilizing lights,

tones, and slides. Initially SMR activity was detected only at low voltage by tuned filters. Biofeedback training sessions resulted in a significant increase in this activity after 2-3 mo. Learned SMR responses in nonepileptic Ss were trains of pure or polyrhythmic 12-16 Hz activity at 20-25  $\mu$ V over central and frontal areas. Although epileptic Ss failed to develop the enhanced SMR amplitude, they did demonstrate increased occurrence of this frequency. Training in 4 epileptics who previously were not controlled by chemotherapy was accompanied by a significant reduction of EEG and clinical epileptic manifestations, as indicated by sequential power spectral analysis, clinical EEG records, and seizure logs. Tonic-clonic and myoclonic seizures were most markedly reduced. (French, Spanish, & German summaries) (23 ref)—*Journal summary*.

3527. Straker, Norman & Tamerin, John. (Mt Sinai School of Medicine, City U New York) **Aggression and childhood asthma: A study in a natural setting.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 131-135.—Studied 28 boys and 14 girls 5-16 yrs old (mean age 11 yrs) with a diagnosis of chronic perennial asthma. 2 methods were used to assess the severity of symptomatology. A manifest aggression score was also derived for each S by utilizing a modification of the Teacher's Rating Scale. Results reveal a statistically significant negative relationship between the severity of asthmatic symptomatology and aggressive behavioral expression.—W. G. Shipman.

3528. Tait, Perla. (U North Dakota) **A descriptive analysis of the play of young blind children.** *Education of the Visually Handicapped*, 1972(Mar), Vol 4(1), 12-15.—Observed seeing and blind children in a controlled play situation to determine whether the play of the 2 groups differed. The blind children had difficulty in orienting themselves spatially. Seeing children assigned more roles to play objects than blind children. Blind children asked more questions than sighted children. This is interpreted as an attempt by blind children to open avenues of communication. Specific recommendations are made concerning the play of blind children.—C. L. Nicholson.

3529. Tweedie, David. (Gallaudet Coll) **Observing the communication behavior of deaf-blind children.** *American Annals of the Deaf*, 1974(Jun), Vol 119(3), 342-347.—The use of observational techniques for rating the communication of multihandicapped children was assessed by raters viewing videotaped behavioral situations. 5 groups of 15 raters each participated: professionals working with deaf-blind populations, speech pathologists, speech pathology students (Master's level), speech pathology students (Bachelor's level), and undergraduate students. After viewing the videotape, each rater completed the Telediagnostic Protocol for each of 8 behavioral situations. Results indicate that the training and experience of the observer did not show significant differences on the rating instrument. (53 ref)—C. K. Miller.

3530. Van Imschoot, K.; Liesse, M.; Mertens, C. & Lauwers, P. (Catholic U Louvain, Belgium) **[Psychological characteristics and physiological reactions to stress of normal and coronary subjects: II.]** (Fren) *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 75-87.

—Compared the physiological reactions to stress of 40 male coronary patients and 40 normal males. Of each group of 40 Ss, 20 accomplished mental or physical tasks under stress and 20 under normal conditions. Various physiological measures were taken (EKG, respiratory quotient, O<sub>2</sub> intake, and blood count), in 3 phases of the experiment: (a) while Ss were at rest, (b) after mental effort, and (c) after physical effort. One set of reactions (blood pressure, heart rate, respiratory rate, and biological parameters) differentiated the normal stressed from normal nonstressed Ss, thus indicating good adaptation, while another set (O<sub>2</sub> intake, CO<sub>2</sub> output, and respiratory quotient) differentiated the coronary stressed Ss from the unstressed, pointing to exhaustion of the organism. (38 ref)—W. G. Shipman.

3531. Van Thiel, David H. & Lester, Roger. (U Pittsburgh) **Sex and alcohol.** *New England Journal of Medicine*, 1974(Aug), Vol 291(5), 251-253.—Discusses data concerning the possible causes and mechanisms of the gross feminization observed in male alcoholics before the onset of Laennec's cirrhosis. Data suggest that alcohol ingestion permanently alters the patient's mechanisms for the biosynthesis and excretion of steroid hormones, and produces irreversible testicular germ-cell injury. (26 ref)

3532. Walther, Rolf. (Psychotherapeutic Clinic, Limbach, E Germany) **[Derivations of basic psychic properties: The depressive syndrome.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Feb), Vol 26(2), 70-77.—Relates depression syndrome to disturbances in biological rhythms such as menstruation. (32 ref)

3533. Ward, J. (U Manchester, England) **The investigation of motor control in a five year old hemiplegic child: Results of a mini experiment.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 33-35.—Investigated aspects of motor control in a 5-yr-old hemiplegic child. The task required the S to draw crosses within outline circles placed in various positions in his visual field. It was found that in addition to position in visual field, the method of holding the pencil (penholder or palm grasp) and whether or not the pencil was weighted were important components in S's success.—*Journal summary*.

3534. Weil, Annemarie P. (Child Development Ctr, New York, NY) **Children with minimal brain dysfunction: Diagnostic and therapeutic considerations.** *Psychosocial Process*, 1970, Vol 1(2), 80-97.—Reviews the literature on minimal brain dysfunction in children. Typically the minimally impaired child is hyperkinetic and displays a constant desire to contact the environment. However, definitive diagnosis requires (a) a complete medical history, (b) psychological testing, and (c) a neurological examination. In terms of therapy, turning down the life and environment of a child with minimal brain dysfunction will limit his impulsiveness and foster his capacity to delay, both of which are important for ego growth and for maintaining or establishing a good self-image. Specific and careful training will help improve reality testing, secondary



process thinking, and pleasure in functioning and mastery, thus fostering neutralization. (31 ref)—J. M. Kleinman.

3535. Yamada, Hiroaki. (Kyushu U Hosp, Central Clinical Lab, Fukuoka, Japan) [A familial narcolepsy.] (Japn) *Kyushu Neuro-psychiatry*, 1971(Dec), Vol 17(3-4), 129-136.—Reports the results of medical examinations and EEG analyses of a family of 8: a mother (85-yr-old narcoleptic), 4 sons (60- and 46-yr-old narcoleptics and 56- and 53-yr-old non-narcoleptics) and 2 daughters (51- and 49-yr-old non-narcoleptics). A slight difference in EEG pattern between narcoleptic and non-narcoleptic siblings was found (i.e., 22.7% and 21.2% in a waking pattern, 66.4% and 60.5% in a drowsy pattern, and 10.9% and 18.3% in a sleep pattern, respectively). The occurrence of a drowsy or sleep pattern in a resting EEG in non-narcoleptic siblings resembled that of narcoleptic members. The EEGs of the non-narcoleptics showed a trend toward disturbances in the wakefulness pattern similar to those of narcoleptic members. All family members except 1 son were hypertensive, but narcolepsy was not related to the hypertension. (English summary) (19 ref)—S. Ashida.

3536. Zarit, Steven H. & Kahn, Robert L. (City Coll, City U New York) **Impairment and adaptation in chronic disabilities: Spatial inattention.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 63-72.—The phenomenon of spatial inattention was measured quantitatively in 89 38-84 yr old persons with chronic brain dysfunction and was observed as long as several years after the onset of the disorder. All Ss completed a battery of tests assessing the occurrence and extent of inattention, deficits of sensory, motor, visual field, and mental functions, and attitudes toward illness and affective state. Differences due to side of lesion were found to be artifacts of sampling and of greater severity of deficits of testable, nondominant side Ss. Although visual field impairments were a significant factor, there were many cases of inattention and no apparent visual deficit. The amount of inattention was related to the total severity of all deficits, rather than to 1 specific dysfunction, and also more pronounced in persons who were withdrawn or who denied their illness and impairments. (28 ref)—*Journal abstract*.

3537. Zienkiewicz, Hanna. (Wroclaw Medical Academy, Psychiatric Clinic, Poland) [Suprarenal reserve in schizophrenia patients on the basis of a synacthen test.] (Poln) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 511-517.—Investigated the functional suprarenal cortex reserve (SCR) in 30 chronic schizophrenic patients. A synacthen (tetracosactide) test was used. The plasma cortisol level was determined by the fluorimetric method of J. Daly and J. Spencer Peet. The mean value of the initial plasma cortisol level in these Ss did not differ from that of a control group of 10 Ss. Despite a slight decrease, the mean value of the functional SCR was within the dispersion limits of the control group. Detailed analysis of the material showed that the functional SCR was lower in 9 of the 30 Ss. The usefulness of the synacthen test in investigations of the SCR, both under clinical conditions and in routine examinations, is stressed. (Russian summary) (21 ref)—*English summary*.

## TREATMENT AND PREVENTION

3538. Christensen, J. K. (Glostrup State Hosp, Copenhagen, Denmark) **A 5-yr follow-up study of male schizophrenics: Evaluation of factors influencing success and failure in the community.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 60-72.—A 5-yr follow-up of 119 discharged schizophrenic men identified 53 patients who were not readmitted (arbitrarily defined as successes). Out of 66 failures, 47 were readmitted and discharged and 19 were readmitted and not discharged. Successes were older at discharge, had a longer duration of illness and a longer stay in hospital, lived to a greater extent under sheltered conditions, and had a better employment record. There were fewer chronic successes, and the failures had had more readmissions before the 5-yr follow-up period. More successes than failures had not attended outpatient control before or after the last admission. More failures left the hospital against medical advice. The successes were less accepted by their relatives and had less of an awareness of being mentally ill. Aggravation of psychotic symptoms because of the patients' omission to take prescribed drugs was the most important cause of readmissions. At the time of follow-up, more successes were severely disturbed. All patients showed increasing social and familial problems during the follow-up period. Variables that appear to be important in preventing readmissions and making life easier for the patients and their families in the community are discussed. The need for more extensive aftercare facilities and a closer contact with relatives is emphasized. (19 ref)—*Journal abstract*.

3539. Dreger, Ralph M. & Johnson, William E. (Louisiana State U, Baton Rouge) **Characteristics of volunteers, nonvolunteers, and no shows in a clinical follow-up.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 746-747.—Tested differences on the 16 Personality Factor Questionnaire (16 PF) and the MMPI between those who accepted and kept clinic appointments (29 volunteers), those who refused appointments (14 nonvolunteers), and those who accepted but did not keep appointments (16 no shows). Only the Q<sub>1</sub> scale of the 16 PF distinguished volunteers from nonvolunteers, with volunteers significantly less anxious. When combined with lower anxiety, however, higher sociability and self-esteem significantly differentiated volunteers from nonvolunteers.

3540. Glennon, Claire A. & Nason, Doris E. (Connecticut Public Schools, Coventry) **Managing the behavior of the hyperkinetic child: What research says.** *Reading Teacher*, 1974(May), Vol 27(8), 815-824.—Discusses hyperkinesis in terms of its characteristics, its educational management, its medical management, etc. The hyperkinetic is the source of considerable concern to teachers, the public, and the news media. Much gross misinformation concerning the hyperkinetic syndrome has been given out, and it is a great help to the family and teacher of the hyperkinetic child to realize that the child's difficulties do not arise from simple, willful disobedience, or a "doubledip" in original sin. The need for parents and professionals to know more about the problem of hyperkinesis persists.—P. D. Leedy.

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—Reviews the current antipsychiatry movement in Great Britain, Italy, and France, especially as seen in the 1970 French Mental Hygiene League Annual Convention. One trend is the development of a social psychiatry based on phenomenological psychiatry.

3551. Oelrich, Margaret. (City of Hope Medical Ctr, Duarte, CA) **The patient with a fatal illness.** *American Journal of Occupational Therapy*, 1974(Aug), Vol 28(7), 429-434.—Discusses concepts that may assist the occupational therapist to understand grief, mourning, and death. Suggestions are made as to how the therapist can help the patient and members of his family.

3552. Rubottom, R. L. **The differences and similarities of Zen, autogenic training, hypnosis and acupuncture.** *Journal of the American Institute of Hypnosis*, 1973(Sep), Vol 14(5), 226-227.—Suggests that in all forms of the healing arts (e.g., Zen, formal hypnosis, acupuncture, and conventional Western medicine) there is a certain element of hypnosis or suggestibility involved, in that the patient believes that he will become better through these procedures. The effectiveness of acupuncture, however, differs significantly from the other modalities, although exactly how it does has not yet been completely explained.

3553. Sloboda, Sharon B. (Catholic U of America, School of Nursing) **The children of alcoholics: A neglected problem.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 605-606.—Advocates the inclusion of children of alcoholic parents in treatment programs, since these children frequently suffer serious emotional damage as a result of problems related to a parent's drinking. Some of the effects observed among children of alcoholics are discussed.

3554. Spitzer, Robert L.; Endicott, Jean; Cohen, Jacob & Fleiss, Joseph L. (New York State Psychiatric Inst, New York) **Constraints on the validity of computer diagnosis.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 197-203.—Issues in the constraints on the validity of computerized psychiatric diagnosis are illustrated by the analysis of diagnoses produced by treating clinicians, expert diagnosticians, and the DIAGNO III computer diagnostic system. Results indicate modest agreement between the computerized diagnoses and both clinicians and experts, and not much better agreement between the experts and between the treating clinicians. The main constraint on the validity of computerized diagnoses is not in any inherent limitation on computer processing but rather in the limitations of the current diagnostic system itself. It is concluded that improvements in computer diagnosis await improvements in the diagnostic system, along the lines of simplification, explicit criteria, and limitation of the categories to those conditions for which validity evidence exists. (18 ref) —*Journal abstract.*

3555. Steiner, Betty W.; Zajac, A. S. & Mohr, J. W. (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **A gender identity project: The organization of a multidisciplinary study.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 7-12.—Describes a project to study problems of gender identity (especially transsexualism) and to offer treatment when appropriate which was established at the University of Toronto in 1968. Methods used by the project—which took a multidisciplinary

approach—are discussed, and results for 88 patients are presented. (French summary) (23 ref)

3556. Trostorf, Sieglind v. (Humboldt U Berlin, Div of Medicine, E Germany) **[On past-dreaming (associated dreaming).]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 183-185.—Analyzes a dream according to K. Leonhard's interpretative method.

3557. Weisman, Gaby. **A psycho-social model for limiting mental reaction during stress.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 161-167.—Presents a model of personal and situational needs arising from stress situations in the armed forces. The main responsibility for fulfilling these needs and preventing the occurrence of stressful situations lies with the commanding officer because of his proximity to the soldiers. The model, which suggests levels of intervention appropriate for specific situations and allows for the hierarchical structure of the military, is focused at the unit rather than at the individual level. Suggestions for training commanding officers in principles of mental health and therapeutic procedures are presented.—*L. Gorsey.*

3558. Welner, Amos; Liss, Jay L. & Robbins, Eli. (Washington U, Medical School) **A systematic approach for making a psychiatric diagnosis.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 193-196.—Suggests that a systematic approach, using diagnostic classification by criteria, enhances psychiatric research that, in turn, leads to an increase in accuracy of that classification. Also, using diagnostic criteria to arrive at a psychiatric diagnosis serves as a safeguard against bias in diagnostic impression when a major psychiatric symptom dominates the clinical picture. Some recent studies are described and it is concluded that (a) most patients whose conditions were undiagnosed by clinical impression were diagnosed when systematically studied, using criteria for diagnostic classification; and (b) with the exception of antisocial personality, personality disorders could not be classified by criteria; rather, most of these patients met the criteria for 1 or more psychiatric disorders. (28 ref)—*Journal abstract.*

3559. Whol, Theodore H. (Cincinnati Ctr for Developmental Disorders, OH) **Thorough behavioral analysis and description: Its relationship to social planning.** *Mental Retardation*, 1974(Aug), Vol 12(4), 21-23.—Presents an argument for the utility and necessity of thorough behavioral analysis and description using W. Wolfensberger's (1965) "5 embarrassments in the diagnostic process" as a point of departure. It is noted that an interdisciplinary approach goes far beyond mere descriptive labeling of clinical signs and symptoms. Nosology is eschewed for comprehensive descriptive statements permitting effective and specific treatment. It is considered that, in order to program for social competency, certain priorities must be determined, as well as what aspect of a particular child's behaviors is in most need of attention and most amenable to change.—*Journal abstract.*

#### Psychotherapy & Psychotherapeutic Processes

3560. Booth, D. A. (U Birmingham, England) **Food intake compensation for increase or decrease in the**

**protein content of the diet.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 31-40.—Conducted an experiment with 22 male Sprague-Dawley albino rats in which daily protein intakes compensated rather precisely for current over- or under-supply of amino acids to provide energy and protein, when feeding was not dominated by energy need, extremes of palatability, or inappropriate selection habits. Interactions between protein-induced satiety and acquired protein appetites may possibly be sufficient to explain the observed compensatory behavior. Results confirm that control of food intake can play the primary role in regulation of nitrogen exchange as well as in the regulation of energy exchange in the rat. (31 ref)  
—*Journal abstract.*

3561. ———. **Gestalt therapy reading list: An annotated bibliography.** *Counseling Psychologist*, 1974, Vol 4(4), 60-63.—Presents an annotated listing of 12 primary references, 22 books, and 71 articles.

3562. ———. **Therapeutic art programs around the world: X. Collage in the treatment of disturbed adolescents.** *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 59-62.—Describes the therapeutic use of collage. This medium enables the disturbed adolescent patient to achieve a paste-up autobiography without being limited by the lack of specific artistic skills.

3563. **Abraham, Ada.** (Hebrew U, Jerusalem, Israel) **Death and psychodrama.** *Group Psychotherapy & Psychodrama*, 1972, Vol 25(3), 84-92.—Discusses the application of psychodrama methods to reinforce man's ability to face death. Different psychodrama methods are described for use in cases where a problematic attitude toward death is accompanied by symptoms of personality disturbances and in cases where a normal personality has determined a certain attitude toward death in the general framework of its integrative endeavors. It is concluded that psychodrama can help find ways of releasing the energy which is invested by the individual and the group in mechanisms of defense against death. Case examples are provided. (17 ref)—*R. S. Albin.*

3564. **Alpert, Augusta.** (Child Development Ctr, New York, NY) **Reversibility of pathological fixations associated with maternal deprivation in infancy.** *Psychosocial Process*, 1970, Vol 1(2), 14-28.—Reviews the method of Corrective Object Relations (COR), a form of therapy which attempts to reverse the pathology of children suffering from early maternal deprivation. COR therapy is based on need, satisfaction and gratification. The principal criteria for progress are the child's growth in object relations beyond need satisfaction and in reality testing. The 1st step in COR is to establish an exclusive, need-satisfying relationship between the child and the special teacher, which induces regression to the point of traumatic fixation. Early in treatment the special teacher follows and encourages regressive cues; later the teacher encourages growth cues and uses the child's verbalizations and play to assist reality testing. 3 cases are presented. (38 ref)—*J. M. Kleinman.*

3565. **Anderson, Frances E. & Landgarten, Helen.** (Illinois State U) **Survey on the status of art therapy in the Midwest and Southern California.** *American Journal of Art Therapy*, 1974(Jan), Vol 13(2), 118-122.—Discusses art therapy programs now in existence and planned

for the future, and types of programs for training art therapists.

3566. **Armstrong, Renate G. & Schur, David.** (VA Hosp, Northport, NY) **Warm-up techniques in a married couples group.** *Group Psychotherapy & Psychodrama*, 1972, Vol 25(3), 93-101.—Defines the warm-up technique as the process of getting an individual or group to loosen up and become ready to actively participate in a session of psychodrama. The use of this method with a group of psychiatric patients in a Veterans Administration hospital and their spouses is described. Various participation-enhancing techniques are cited, and the use of tape recordings, rating scales, and sociograms. Case examples are provided. The progress of the group from warm-up techniques to participation in actual psychodramas is traced.—*R. S. Albin.*

3567. **Baldwin, Bruce A.** (U North Carolina, Medical School, Chapel Hill) **Self-disclosure and expectations for psychotherapy in repressors and sensitizers.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 455-456.—Identified 2 groups of 49 university students as repressors and sensitizers based on scores on Byrnes's Repression-Sensitization Scale. Ss completed the Jourard Self-Disclosure Questionnaire and a Likert-type scale rating dimensions of psychotherapy to assess effects of defensive orientation on expectations for a psychotherapy relationship. Repressors indicated significantly more willingness than sensitizers to self-disclose during the 1st 4 hrs of therapy. Repressors expected more planned than spontaneous activity by the therapist, felt therapist personality less important than sensitizers in facilitating change, and rated themselves significantly less likely than sensitizers to enter psychotherapy in the future. Results are discussed within the framework of repressing and sensitizing defensive styles. *Journal abstract*

3568. **Bauersfeld, K. H.** [Existential analysis in child psychiatry.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 348-356. [Discusses L. Binswanger's existential analysis and its possible use in psychotherapy with children and juveniles. The case of a 4½-yr-old boy who lost his father is presented as an example: the death of the father, as an event of exterior life, became a determinant happening and led the child to abandon his childhood image of the world. (English summary)]—*T. Fisher.*

3569. **Beckett, John A.** (U New Hampshire, Whittemore School of Business & Economics) **General systems theory, psychiatry and psychotherapy.** *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 292-305.—Presents a state of the art analysis of general systems theory and its meaning for psychiatry and psychotherapy. The historical background is reviewed. A critique is presented regarding 3 aspects of the theory (the concept of systems, the idea of holism, and the paradigm of general systems). In psychiatry, general systems theory is concerned with the interface between psychiatry and anthropology. However, the culture in which individuals exist is only 1 class of input into psychiatry. The physical and biological worlds must also be considered. (16 ref)—*R. S. Albin.*

3570. **Berg, Albert J.** **Psychoanalysis versus hypnoanalysis.** *Journal of the American Institute of Hypnosis*, 1973(Sep), Vol 14(5), 239-241.—Discusses the



relative effectiveness of psychoanalysis and hypnotherapy in curing mental illness. Hypnoanalysis as developed by W. J. Bryan is described, and 3 cases of psychiatric patients for whom the psychoanalytic prognosis was not good but who did respond adequately to hypnoanalysis are reported.

3571. Blanck, Rubin. Countertransference in treatment of the borderline patient. *Clinical Social Work Journal*, 1973(Sum), Vol 1(2), 110-117.—Points out the need for psychotherapists to take a careful inventory of themselves while working with the borderline patient. A clinical vignette is presented to clarify the importance of therapist restraint, the key to handling countertransference.

3572. Bomba, Jacek. (Cracow Medical Academy, Psychiatric Clinic, Poland) [Transsexualism: Problems in treatment.] (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 569-575.—Presents various views expressed in the literature on the etiopathogenesis and treatment of transsexualism. 7 transsexuals received psychotherapy aiming at improving self-concept and relationship to self. 3 were markedly improved in regard to social readaptation and gave up the desire for sexual transformation. 2 applied for formal change of name in accordance with the choice of gender identity. (Russian summary) (45 ref) —English summary.

3573. Bommert, Hanko et al. (U Münster, Psychological Inst, W Germany) [Empirical control of the effects and processes of client-centered psychotherapy in psychoneurotic clients.] (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 1(1), 48-63.—Studied the effects of client-centered therapy on 44 15-40 yr old psychoneurotic patients (33 males and 11 females) of IQ 90-128. Ss were randomly divided into a psychotherapy group of 22 and a no-therapy control group of 22; the groups differed only insignificantly in pretests administered by Es. Ss of the therapy group received an average of 6 therapy sessions in 9 wks, administered by 13 same-sex therapists. Controls received no therapy. After 9 wks both groups received psychodiagnostic tests to measure attained changes: the Minnesota Multiphasic Personality Inventory, Eysenck Personality Inventory (Form B), Bastine D scale, Horn Test, and the Strupp and Barrett-Lennard questionnaires. The data are tabulated and analyzed. Corrected regression values show that Ss of the therapy group—even allowing for spontaneous remissions—achieved significant positive changes in essential psychic dimensions. The process variables of therapists and clients correlated in several respects with the changed test results obtained by the Ss. (English summary) (22 ref)—T. Fisher.

3574. Brandsma, Jeffrey M. & Ludwig, Arnold M. (U Kentucky, Medical School) A case of multiple personality: Diagnosis and therapy. *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 216-233.—Describes a case of multiple (4) personality and the psychological tests of ability, memory, and personality which were administered. These data lead to a discussion of the practical and theoretical problems of diagnosis. It is contended that dual or multiple personalities should be considered a unique category apart from the traditional concepts of hysteria or schizophrenia. A therapeutic "fusion" is described and evaluated. (Ger-

man, French & Spanish summaries) (18 ref)—*Journal abstract*.

3575. Bucher, Bradley D. (U Western Ontario, London, Canada) Problems and prospects for psychotherapy research design. In O. I. Lovaas & B. D. Bucher (Eds), *Perspectives in behavior modification with deviant children*. Englewood Cliffs, NJ: Prentice-Hall, 1974, xiii, 562 p.—Cites the problems inherent in evaluating the effectiveness of psychotherapeutic techniques, notably that the complexity of the treatment process tends to mask the phenomena that should be investigated. Viable research procedures—the control-group design and within-S designs—are discussed, and the problem in control-group design of the replicability of treatment results over a definable class of clients is examined. (21 ref)

3576. Buckley, Peter & Sander, Fred. (Albert Einstein Coll of Medicine, Yeshiva U) The history of psychiatry from the patient's viewpoint. *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1147-1150.—Describes a course in the history of psychiatry in which patients' autobiographies are used to illustrate different eras and approaches to the treatment of the mentally ill. This approach is useful because it highlights recurrent historical themes and provides a perspective on the present transitional state of psychiatry in addition to expressing the viewpoints of certain subordinate groups of psychiatric patients (e.g., women and blacks). Several books used in the course are also discussed. (33 ref) —*Journal abstract*.

3577. Chiles, John A. (U Washington, Medical School) A practical therapeutic use of the telephone. *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1030-1031.—Notes that the telephone in psychotherapy is frequently used as an emotional safety value. Its use as a planned, often daily, part of therapy in which positive behavior is reinforced is described. 2 cases are presented, together with a discussion of the technique involved.

3578. DeMuth Berg, Constance. (Northwest Community Unit Schools, Sciota, IL) Helping a child deal with a matter of life and death. *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 39-51.—Presents the case of a 5-yr-old boy and how art therapy enabled him to cope with problems caused by his mother's death. Speculations are offered concerning the psychological meanings of the colors used by the child in his paintings, attempting to relate colors to specific psychological states.

3579. Dewdney, Selwyn. (Royal Ontario Museum, Toronto, Canada) Elda's art therapy in the context of a quarter century of psychiatric treatment: I. *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 3-21.—Presents the 1st of 2 articles reviewing 25 yrs of art therapy with a female patient. The intensive treatments are described, the patient's development during therapy is examined, and the effects of the various therapies she has thus far experienced are discussed.

3580. Dewdney, Selwyn. Elda's art therapy in the context of a quarter century of psychiatric treatment. *American Journal of Art Therapy*, 1974(Jan), Vol 13(2), 123-140.—Presents the 2nd of 2 articles describing 25 yrs of art therapy with a female patient.

3581. Emerson, Patricia & Smith, Edward W. (Georgia State U) **Contributions of Gestalt psychology to Gestalt therapy.** *Counseling Psychologist*, 1974, Vol 4(4), 8-12.

—A principle of Gestalt psychology is to stay in the present as opposed to emphasizing the past. Gestalt psychology states that a whole is different from its assembled parts, and deals with "wholes." Unconscious processes are rejected. It is suggested that Gestalt psychology has been absorbed into general psychology and Gestalt therapy may become a part of traditional psychotherapy, thus losing its distinct flavor.—H. Silverman.

3582. Fabbri, Remo & Dy, Antonio J. (Yale U) **Hypnotic treatment of trichotillomania: Two cases.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 210-215.—Presents 2 case histories of a 21-yr-old white male and female with trichotillomania (compulsion to pull out one's hair), and discusses the use of hypnotic techniques in the management of this problem. Positive results are reported, and some of the possible theoretical explanations for the success of these techniques are considered. (German, French & Spanish summaries)

3583. Fagan, Joen et al. (Georgia State U) **Critical incidents in the empty chair.** *Counseling Psychologist*, 1974, Vol 4(4), 33-42.—Discusses "the empty chair" approach as one of the most effective Gestalt techniques. There are 2 seats, one occupied by the patient and the other representing the presence of a significant person in his environment, with whom he carries on a dialogue that expresses and resolves hidden conflicts. The patient relates to both places. The method looks easy, but the therapist should be prepared for the expression of powerful feelings and must provide emotional support in the event of a crisis. 3 transcripts of "empty chair" sessions are included.—H. Silverman.

3584. Fagan, Joen. (Georgia State U) **Three sessions with Iris.** *Counseling Psychologist*, 1974, Vol 4(4), 42-60.—Presents transcripts of 3 sessions with a resistant female client who had no prior experience with Gestalt therapy, to illustrate the method of "training" a client "into" Gestalt procedures. In a follow-up contact the patient indicated that the therapy had been beneficial, helpful, and meaningful.

3585. Gaddini, Renata. (U Rome, Italy) **Early psychosomatic symptom and the tendency towards integration.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 26-33.—Argues that each time psychosomatic symptoms appear in a child, something has adversely affected the use he is making of the object. The focal point in treating these cases has to be the integration between mother and infant, rather than infant or mother exclusively, because the child's early development is based on interaction. The mother-child system safeguards the narcissistic needs of the child and may gradually, through a facilitating environment, bring out narcissism towards the external environment. It is concluded that focus should be placed on this early facilitating or nonfacilitating environment in order to produce rational and preventive interventions in psychosomatic medicine.—*Journal abstract.*

3586. Garai, Josef E. (Pratt Inst) **The use of painting to resolve an artist's identity conflicts.** *American Journal*

*of Art Therapy*, 1974(Jan), Vol 13(2), 151-164.—Discusses esthetic and psychological conflicts in the work of a professional art student who was involved for 4 yrs in both an art therapy group and regular therapy.

3587. Gelso, Charles J. (U Maryland, Counseling Ctr) **Effects of recording on counselors and clients.** *Counselor Education & Supervision*, 1974(Sep), Vol 14(1), 5-12.—A review of early research on the effects of audio recording on counselors and clients found no adverse effects, particularly on clients. This research fostered a set of beliefs about recording which is now being extrapolated to the area of video observation. Recent research, however, does suggest that audio and, in particular, video recording has an inhibitory effect on clients and counselors. The nature of these effects on clients appears to depend on several client characteristics (e.g., the type of presenting problem). Although recording is not as inhibitory as clients expect it to be, counselors tend not to be sensitive to the inhibiting effects that do occur in their clients. (28 ref)—*Journal abstract.*

3588. Greenspan, Stanley I. & Mannino, Fortune V. (NIMH, Mental Health Study Ctr, Adelphi, MD) **A model for brief intervention with couples based on projective identification.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1103-1106.—Considers that projective identification has been described by many Os from different perspectives in a variety of settings, but has been most frequently associated with rather disturbed families as an interpersonal mechanism involved in distorted perceptions, identifications, and communication. How this mechanism manifests itself in couples with relatively intact, although neurotic, personality organizations is described, along with how it interferes with their capacity to resolve problems and experience joint interpersonal growth. It is suggested that a short-term treatment approach with such couples may usefully organize itself around the identification and correction of the perceptual distortions involved in projective identification.—*Journal abstract.*

3589. Haas, Wolfgang & Haas, Monika. (Humboldt U Berlin, Nerve Clinic, E Germany) **[A cybernetic model of the development and treatment of neuroses.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Mar), Vol 26(3), 151-154.—Presents a simple block diagram representing a cybernetic model of neuroses. Neurotic reactions and developments are regarded as expressing a relative stabilization of behavioral control outside physiological limits. Return of the system to its physiological limits, accompanied by internal limiting values, guarantees lasting therapeutic results.

3590. Hanegbi, Rivka; Krasilowsky, David & Feuerstein, Reuven. (Hadassah-Wizco-Canada Child Guidance Clinic, Jerusalem, Israel) **The corrective object relations (COR) theory and the treatment group technique (TGT): A common theoretical framework for two different techniques.** *Psychosocial Process*, 1970, Vol 1(2), 29-46.—Describes TGT and discusses its similarities with COR. Both treatments attempt to reverse the pathology resulting from early maternal deprivation, COR in nursery school and kindergarten children and TGT in preadolescents and adolescents. TGT takes place within a youth village of normally functioning adoles-



cents and seeks to satisfy 2 important needs of the disturbed adolescent: the need to be protected and accepted and the need to preserve contact with the normal peer group. In contrast to COR, in which successful organization of the peer group is dependent upon the adult figure, in TGT the role of the adult is less decisive than that of peers in establishing the social unit of healthy interrelated functions. Both COR and TGT have evolved 4 strategies as basic in dealing with disturbed individuals: unconditioned acceptance, reduction of anxiety, induced regression, and planned and controlled relationships with the normal peer group. A case history illustrates TGT.—*J. M. Kleinman.*

3591. Heilbrun, Alfred B. (Emory U) **Improved detection of the early defecting counseling client.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 633-638.—Research into the factors predisposing clients to terminate prematurely from counseling often requires the ability to measure and predict defection or continuation, the readiness variable. This study attempted to improve upon the Counseling Readiness Scales by the empirical development of correction keys using the remaining items from the Adjective Check List. Ss were 186 female and 243 male undergraduate counseling clients. This effort was successful as far as improved discrimination between both male and female true negatives (clients predicted to drop who actually drop) and false negatives (clients predicted to drop who actually stay). However, similar efforts to improve the discrimination between true positives (clients predicted to stay who actually stay) and false positives (clients predicted to stay who actually drop) were unsuccessful.—*Journal abstract.*

3592. Hertz, Dan G. (Hebrew U—Hadassah Medical School, Jerusalem, Israel) **Problems and challenges of consultation psychiatry in gynecology and obstetrics.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 67-76.—Reviews clinical experiences of liaison psychiatry and emphasizes specific reactions in the consultee in a survey of 23 gynecologists and obstetricians in a general teaching hospital. Long-term cooperation between gynecologist and psychiatrist in the ward setting and in special integrated clinics is urged, and the concept of clinical duality—the function of the gynecologist in his alternating active and passive therapeutic role—is stressed. (30 ref)

3593. Hollander, Carl & Moore, Charles. **Rationale and guidelines for the combined use of psychodrama and videotape self-confrontation.** *Group Psychotherapy & Psychodrama*, 1972, Vol 25(3), 75-83.—Recommends the use of videotape self-confrontation (VSC) in conjunction with psychodrama. In this technique the S's psychodrama performance is recorded on tape and played back, enabling him to become his own audience and observe his behavior as a spectator, which is impossible during the acting. VSC is regarded as the best available form of behavioral feedback. Comments and suggestions regarding the best way to use VSC with psychodrama are offered. The S should portray himself. Immediate playback may assist in integrating the psychodrama and stimulate self-disclosure; postsession playback may be preferable, however, in some circumstances. The therapist's need for flexibility is emphasized. There should be

a time limit on viewing feedback, to encourage continuous active involvement rather than passive viewing as of a commercial TV program. (27 ref)—*R. S. Albin.*

3594. Irwin, Eleanor; Levy, Paul & Shapiro, Marvin. (Pittsburgh Child Guidance Ctr, PA) **Assessment of drama therapy in a child guidance setting.** *Group Psychotherapy & Psychodrama*, 1972, Vol 25(3), 105-116.—Compared the effectiveness of drama therapy, activity therapy, and recreation therapy in treating disturbed children. Ss were 15 latency-age boys in 3 treatment groups of 5 each, which met weekly for 1½ hrs for 20 wks. Pre- and postevaluative measures were the Rorschach Index of Repressive Style (RIRS), a measure of verbal fluency, a semantic differential, and a parent competence scale. Drama group members made significant gains on the RIRS and verbal fluency test, while the other 2 groups did not. No significant changes were noted for the semantic differential or the parent competence scale for any of the groups. Results appear to validate the usefulness of drama therapy as a treatment technique for disturbed children.—*R. S. Albin.*

3595. Kardener, Sheldon H. (U California, Medical School, Los Angeles) **Sex and the physician-patient relationship.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1134-1136.—Presents a psychodynamic discussion of why sexual relationships between physician and patient are not therapeutically beneficial. The concept of the physician as parent surrogate and its relationship to the incest taboo, the need to be loved, and the physician's position of power in relation to his patients are discussed. It is noted that these concerns must also be applied to the growing number of nonphysicians who engage in various modes of quasi-psychotherapy. (17 ref)—*Journal abstract.*

3596. Koran, Lorrin M. & Costell, Ronald M. (NIMH, Rockville, MD) **Early termination from group psychotherapy.** *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 346-359.—Conducted a study of 11 outpatient psychotherapy groups to search for criteria that would identify patients likely to terminate group psychotherapy prematurely. Results indicate that patients who fail or refuse to complete questionnaires which probe feelings, personality, and projected group behavior are likely to terminate early. This criterion identifies 53% of terminators, and signals an 80% risk of terminating, in a clinic with a low termination rate (17% within 20 meetings). The criterion compares very favorably with others in the literature and is more useful than therapists' evaluations, correctly categorizing 89.5% of patients vs 67.5% with a lower false positive rate—3% vs 70%. Contrary to previous studies no relation was found between group FIRO-B (Fundamental Interpersonal Relations Orientation-Behavior) interchange compatibility and termination rate or between individual interchange compatibility and early termination. Early termination also was unrelated to questionnaire measures of cohesiveness and of preference for therapy-relevant behavior. (18 ref)—*R. S. Albin.*

3597. Krakowski, Adam J. (Champlain Valley-Physicians Hosp Medical Ctr, Div of Psychiatric Liaison & Research, Plattsburgh, NY) **Consultation psychiatry, present global status: A survey.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 78-85.—Argues that

psychiatric consultation services are inadequate and their usefulness widely unrecognized. Such services are more numerous where there are satisfactory numbers of psychiatrists and where general hospitals have psychiatric services and psychosomatic orientation. (17 ref)

3598. Lachman, Mildred. (Hillcrest Children's Ctr, Washington, DC) **The use of movement in art therapy.** *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 22-34.—Describes the art therapy program at Hillcrest Children's Center in Washington, DC, and presents examples of the author's recent research in the area of movement in art therapy.

3599. Levin, Lawrence S. & Shepherd, Irma L. (Georgia State U) **The role of the therapist in Gestalt therapy.** *Counseling Psychologist*, 1974, Vol 4(4), 27-30.—Discusses the Gestalt therapist's approach to dealing with everyday life in the present. The therapist starts with the client rather than with his own preconceived notions; he does not heal, but tries to lead the patient to heal himself. He takes responsibility for the therapy, but the client is responsible for his own feelings. The emphasis of Gestalt therapy is on the patient's feelings, emotions, and awareness.—H. Silverman.

3600. Lewis, Shelia. **Creative drama in the treatment of emotionally disturbed children from six years of age to pre-adolescence.** *Australian Occupational Therapy Journal*, 1974(Jan-Mar), Vol 21(1), 8-22.—Presents suggestions for the implementation of a therapeutic creative drama program for children. Some of the causes of emotional disturbances in children, general methods of treatment, and the value of creative drama are discussed. (21 ref)

3601. Maxmen, Jerrold S.; Tucker, Gary J. & LeBow, Michael D. (Dartmouth Coll, Medical School) **Rational hospital psychiatry: The reactive environment.** New York, NY: Brunner/Mazel, 1974. xii, 282 p. \$12.50.—Presents an integrated theoretical and practical framework for the treatment of hospitalized mental patients. A typology of contemporary inpatient facilities; 3 types of reactive environment—crisis intervention, token economy, and a therapeutic community; specific hospital procedures; and the roles of teaching, research, and record keeping are discussed. (12 p ref)

3602. McMurrer, James & Clark, Francis. (Georgetown U, Medical Ctr, Student Psychiatric Health Service) **Psychiatric intervention in the case of a terminally ill college student.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 134-137.—Presents the case history of a college freshman who entered her 1st semester with a prognosis of 4-18 mo to live. The emotional problems of this student and those around her, as the cancer progressed, are described.

3603. Minsal, W. R.; Bommert, H. & Pieritz, R. (Christian-Albrechts-U, Inst for Psychology, Kiel, W Germany) **[Relationship between formal speech characteristics of psychotherapists and the success of client-centered psychotherapy.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1972, Vol 20(4), 303-310.—Conducted an experiment with 10 psychoneurotic males (mean age 24 yrs) and 8 male therapists of various degrees of experience to test the hypotheses (a) that the formal speech characteristics of a therapist can be

broken down into objective categories and statistically expressed and (b) that these characteristics are significantly correlated with the success of client-centered therapy. The sessions were recorded, transcribed, and rated by 7 naive students for formal components in the therapists' language. The patients were rated before and after the therapy for increased or decreased neuroticism and the results analyzed. The data reveal that (a) 5 patients improved, 5 did not; (b) the observers agreed to a large extent in their ratings of objective speech characteristics, and (c) the connection between therapeutic success and speech characteristics (computed by Spearman rank correlation) was significant. It is concluded that both hypotheses were confirmed. (English summary)—T. Fisher.

3604. Mullins, June B. (U Pittsburgh) **The expressive therapies in special education.** *American Journal of Art Therapy*, 1973(Oct), Vol 13(1), 52-58.—Discusses the role of art therapy in special education programs of public schools. Approaches suitable for children with physical as well as psychological problems are presented. The interrelationship of all the arts, and its implications for therapy, are considered.

3605. Nadelson, Carol; Notman, Malkah; Arons, Elissa & Feldman, Judith. (Harvard U, Medical School, Boston) **The pregnant therapist.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1107-1111.—Discusses the relevance of a therapist's pregnancy to the therapeutic interaction, presenting case histories to illustrate the issues that arise. The therapist must deal with increased vulnerability, role integration, and dependency issues with colleagues. In the patient, the pregnancy may evoke infantile feelings, intensified maternal transference, and internal sexual conflicts. It is suggested that the therapist deal with her pregnancy openly and realistically and that working through the reactions of both therapist and patient may be an effective aspect of therapy.—*Journal abstract.*

3606. Neubauer, Peter B. (Child Development Ctr, New York, NY) **Review of Augusta Alpert's corrective object relations program.** *Psychosocial Process*, 1970, Vol 1(2), 7-13.—Describes the Corrective Object Relations (COR) treatment technique developed by A. Alpert. COR is used to treat children who display pathological behavior as a result of prolonged maternal deprivation. COR modifies the child's pathology by establishing a need-satisfying relationship between the child and a special teacher.

3607. Nichols, Michael P. & Reifler, Clifford B. (U Rochester) **The study of brief psychotherapy in a college health setting.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 128-133.—Describes a rationale and design for the study of psychotherapy in a university health service setting. Well-controlled studies of treatment variables are suggested, and one variable, catharsis-producing techniques, is discussed. Patient variables are not considered important in evaluating treatment. Therapists are described in terms of training, experience, orientation, and familiarity with technique used. The feasibility of conducting such a study with minimal disruption of a clinic's operation is confirmed, and recommendations are made for future studies. In



addition to careful design, the need for a cooperative team approach is underscored. (49 ref)—*R. S. Albin.*

3608. Pfeiffer, W. M. (U Erlangen-Nürnberg, Neuro-clinic & Polyclinic, W Germany) [Evolution of the client-centered psychotherapy of C. R. Rogers.] (Germ) *Praxis der Psychotherapie*, 1973(Apr), Vol 18(2), 75-81.

3609. Pickford, Ruth. The versatility of the World Technique. *British Journal of Projective Psychology & Personality Study*, 1973(Dec), Vol 18(2), 21-23.—Describes M. Lowenfeld's World Technique and discusses its use in clinical practice and research, including psychotherapy, diagnosis, and assessment of handicapped children. Detailed instructions for administration are presented together with illustrative case studies.

3610. Pine, Sandra. (Albert Einstein Coll of Medicine, Bronx Municipal Hosp Ctr, Yeshiva U) **Fostering growth through art education, art therapy, and art in psychotherapy.** *American Journal of Art Therapy*, 1974(Jan), Vol 13(2), 83-117.—Reports results of a masters thesis project in a general elementary school in New York City demonstrating the use of art as a tool for self-reflection both in public school and hospital settings.

3611. Pope, Benjamin; Nudler, Sylvia; Vonkorff, Michael R. & McGhee, James P. (Sheppard & Enoch Pratt Hosp, Baltimore, MD) **The experienced professional interviewer versus the complete novice.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 680-690.—Compared interviewer behavior and efficacy of complete novices and experienced professionals. In each of 2 studies interviewees were 16 female undergraduates. 16 interviewers were professionals, and 16 were novices. Interviewees rated the novices more benignly than the professionals but the professionals were rated as more skilled. There were no significant differences between the 2 groups on genuineness and warmth, with 1 questionable difference in favor of the professionals on empathy, as measured by the Truax and Carkhuff scales, Non-Possessive Warmth, Genuineness or Self-Congruence, and Accurate Empathy. Novice interviewers were more anxious (higher non-ah ratios). None of the payoff variables (e.g., productivity) in interviewee response distinguished between the professionals and novices. The "novice" but not the "professional" interviews conformed to a synchrony model on productivity. (42 ref)—*Journal abstract.*

3612. Remschmidt, H.; Dauner, I. & Schultz, U. (Philipps U Marburg, Clinic for Child & Adolescent Psychiatry, W Germany) [Structural analysis of patients in a psychiatric-psychotherapeutic ward for children and adolescents.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 42-46.—Reports on 153 inpatients 6-13 yrs old admitted to a child psychiatric clinic in 1969. 60% of the patients were boys. 30% grew up in broken homes. 48% suffered from school problems, 46% from disorders of socialization, 37% showed aggressive behavior, and 32% anxiety states. 3 essential needs are emphasized: (a) for family therapy, (b) for additional training for all personnel working in the ward, and (c) for a continuous flow of information about all events in the ward.—*Journal summary.*

3613. Rock, Nicholas L. **Childhood psychosis and long-term chemo and psychotherapy.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 303-308.—De-

scribes a multidisciplinary approach to the problem of childhood psychosis which involves individual and group psychotherapy with children and parents and adjunct chemotherapy. Procedures involved in conducting the prepsychiatric examination, determining the type and dosages of antipsychotic medications, and diagnosing the specific type of psychosis early in therapy are described. A case history of a boy receiving long-term psychotherapy and chemotherapy is presented, as well as summaries of child, parent, and professional staff characteristics. The complexity of childhood psychosis is emphasized. It is concluded that with early detection and appropriate medication and supportive care, secondary mental retardation and/or deterioration of the child to a more severe psychotic state can be prevented.—*L. Gorse.*

3614. Rubin, Judith A. (Pittsburgh Child Guidance Ctr, PA) **Mother-child art sessions: I. Treatment in the clinic.** *American Journal of Art Therapy*, 1974(Jan), Vol 13(2), 165-181.—Presents the 1st of 2 articles, dealing with clinical treatment of mother and child by art therapy. The use of such therapy as part of a broader range of treatment of family problems is discussed.

3615. Runkles, J. E. (Bonnie Doon Baptist Church, Edmonton, Alberta, Canada) **Religion and psychiatric practice.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 79-85.—Describes 70 patients referred to the author, a clergyman as well as a psychiatrist, according to religious affiliation, diagnosis, age, sex, and referral source. Data suggest that the evangelical patient requesting a psychiatrist of similar religious orientation is most likely to be a depressed woman in her 20's and referred by a physician. A case example is used to illustrate both the integrative and the dysfunctional effects of religious faith. In manic patients religious experience is grandiose, self-centered, and superficial, representing a regressive identification by the patient. (French summary)—*F. Auld.*

3616. Rüger, Ulrich. [Indications for psychoanalytical therapy by multifactorial symptoms.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 33-41.—Endeavored to obtain criteria for a differentiated indication of analytical psychotherapy with children having organic brain damage coupled with a neurotic personality development. 2 criteria were found: (a) lack of processes of drive and drive reduction, and (b) a certain amount of introjection. These criteria are also considered good indicators for defective perception of emotions. Based on observations from a 1-yr intake of a psychiatric institute (355 5-10 yr olds, of whom 65 had organic brain damage) a description is given of the problems arising from the primary and secondary neuroses of these organically damaged children.—*H. A. Euler.*

3617. Schmidtchen, Stefan. (U Kiel, Psychological Inst, Clinical Div, W Germany) [Effects of client-centered play therapy.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 1(2), 49-63.—Studied the effects of client-centered play therapy with 30 emotionally and socially disturbed children 9-12 yrs old to test 4 hypotheses: that this therapy would (a) diminish emotional difficulties such as psychoneuroticism and anxiety; (b) improve speech behavior by increasing vocabulary,

fluency, mental flexibility, and creativity; (c) reduce emotional and social behavioral disorders; and (d) achieve personality changes such as greater independence and social adjustment. Ss were divided into a therapeutic and a control group of 15 each, matched, on the basis of a battery of pretests, for IQ, neuroticism, intro-extraversion, anxiety, social maturity, and adjustment and behavioral disorders. In a 4-mo period the therapeutic group took part in 15 nondirective play therapy sessions administered by 6 therapists who coordinated their approach and procedures. The ensuing changes were evaluated by educators and therapists in posttests. Analyses of the data produced 68 significant correlations ( $p < .05$ ). Results confirm the 4 hypotheses. (English summary) (34 ref)—*T. Fisher*.

3618. **Shapiro, Rodney J.** (U Rochester, Medical Ctr, Family Studies & Treatment Program) **Therapist attitudes and premature termination in family and individual therapy.** *Journal of Nervous & Mental Disease*, 1974(Aug), Vol 159(2), 101-107.—Randomly assigned patients at a child study clinic to individual or family therapy. Each of the 24 patients and 27 families was rated by the therapist in charge on the therapist's affective responses to the patients, for degree of psychopathology, and the treatment prognosis. These ratings for individuals and families who dropped out prematurely were compared with ratings of those who continued in treatment. The most significant difference between continuers and terminators emerged in the therapists' ratings of their own affective reactions to the patients or families; responses to the continuers were consistently much more positive than to the dropouts. However, this difference was less marked for families than for individual patients. No significant difference was found between continuers and terminators on ratings of psychopathology. This held true for both individual patients and families. Finally, continuers were perceived by the therapists as having significantly better treatment prognoses than terminators. These findings suggest that (a) patients who terminate prematurely are not more disturbed than those who continue, (b) premature termination may be a behavioral reaction to the negative feelings of therapists, and (c) families seem to evoke less negative countertransference than do individual patients. (15 ref)—*Journal abstract*.

3619. **Sheldon, Robert B.; Davis, Harry G. & Kohorn, Ron L.** (Big Spring State Hosp, TX) **Individual counseling and therapy with the alcoholic abuser.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Suggests that individual therapy is the best method for treating alcoholics in a variety of best settings and under different circumstances, particularly when part of a comprehensive alcoholism program. Practical considerations for the therapist, the therapist's orientation to the alcoholic, and techniques of individual therapy with alcoholics are discussed.

3620. **Shelton, John L. & Ackerman, J.** (Colorado State U, Counseling Ctr) **Homework in counseling and psychotherapy: Examples of systematic assignments for therapeutic use by mental health professionals.** Springfield, IL: Charles C Thomas, 1974. xiii, 293 p. \$16.75(cloth), \$12.95(paper).—Describes the rationale of

and procedure for the therapeutic use of homework assignments in counseling and psychotherapy. Case examples and sample homework assignments for 7 types of disorders are presented, and the history of and relevant research on homework as an adjunct to counseling are discussed. (13 p ref)

3621. **Shrout, Richard N.** (Hypnotherapy Clinic, Miami, FL) **Rehabilitation of a delinquent youth by means of hypnotic suggestion.** *Journal of the American Institute of Hypnosis*, 1973(Sep), Vol 14(5), 227-228.—Describes the use of hypnotherapy and self-hypnosis instruction in treating a chronic 14-yr-old male delinquent. Projective test results, anxiety scale evaluations, and observations conducted after 1 mo indicate greatly reduced levels of anxiety, an absence of antisocial and resentful attitudes, and improved interpersonal relationships and self-control.

3622. **Stewart, R. Dugald.** (Georgia State U) **The philosophical background of Gestalt therapy.** *Counseling Psychologist*, 1974, Vol 4(4), 13-14.—Discusses the views of F. Perls who was more concerned with living reality than with a "systems" approach. He was not interested in complex philosophical questions, but dealt with the individual and his relationship to himself and his environment. Perls was more attracted to the "how" than to the "why." The German philosopher S. Friedlander influenced him more than anyone else. Perls was not a systematic thinker. His therapy followed the principle of "creative" indifference.—*H. Silverman*.

3623. **Tardiff, Kenneth J.** (Greater Vancouver Mental Health Project, British Columbia, Canada) **A survey of psychiatrists in Boston and their work with violent patients.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1008-1011.—Results of a survey responded to by 156 Boston psychiatrists indicate that fewer than half of the psychiatrists evaluate or treat violent patients. Psychiatrists working with violent patients tended to be under 40 yrs old and in residency training. Patterns of treatment, suggestions for prevention of violent episodes, types of patients, and sources of referral are described. (19 ref)

3624. **Thorne, Sylvia.** (Georgia State U) **Translations of Gestalt theory into technique: Polarities and centering.** *Counseling Psychologist*, 1974, Vol 4(4), 31-33.—Describes the individualized approach of Gestalt therapy. A major technique involves role-playing of exaggerated aspects of one's self, so that uninterpreted conflicts can be absorbed into the psyche. Growth involves becoming aware of what has been repressed. Past events are examined in terms of their relevances to the present. It is suggested that Gestalt therapy can be called "the psychology of the obvious." The aim is to free the patient's feelings and thus lead to action. 11 techniques to accomplish this are listed.—*H. Silverman*.

3625. **Toomim, Marjorie K.** **The child of divorce.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Discusses problems encountered by the child whose parents are divorced, including losses of faith and trust, the parent-child relationship, environmental supports, and the child's own predivorce personality and life-style. Suggestions for helping the child through the necessary



mourning process are presented, and characteristic child defenses against loss are described. (24 ref)

3626. Van Den Aardweg, Gerard J. [The factor "complaining," neurosis and homophilia.] (Duth) *Psychologica Belgica*, 1973, Vol 13(3), 295-311.—Explains neurosis by the central concept of autonomous self-pity, a repressed reaction to psychic traumatization in childhood that has priority over sex, anxiety, and aggression. 2 types of therapy are suggested: (a) self-observation and self-analysis to recognize the inner child of the past and (b) humor therapy. Homophilia (homosexuality) is defined as neurosis. Factor analysis of data from a homosexuality questionnaire administered to 51 homosexuals revealed 6 factors: (a) neurosis, (b) will to change, (c) character weakness, (d) mother-bind factor, (e) social extraversion, and (f) "lone wolf" pattern in childhood. Therapy was successful in 8 cases, partly successful in 18, and incomplete in the others. (English abstract) (34 ref)—S. Slak.

3627. von Dürckheim, K. [The use of meditative practices in psychotherapy.] (Germ) *Praxis der Psychotherapie*, 1973(Apr), Vol 18(2), 63-74.

3628. Yampey, Nasim. [Transference and countertransference.] (Span) *Acta Psiquiátrica y Psicología de América Latina*, 1974(Feb), Vol 20(1), 11-22.—Discusses 4 approaches to the processes of transference and countertransference: the orthodox method, ego psychology, the doctrine of Melanie Klein, and the concepts of the Argentine psychoanalytic school. A distinction is made between concordant transference (when the therapist's ego is identified with the patient's ego) and complementary transference (when identifications are made with the patient's internal objects).—English summary.

### Drug Therapy & Drug Rehabilitation

3629. Arfwidsson, L. et al. Can self-rating replace doctor's rating in evaluating anti-depressive treatment? *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 16-22.—16 depressive outpatients with endogenous or mixed endogenous-psychogenic depression were rated before and during antidepressive drug treatment with imipramine or chlorimipramine. Rating measures used were a Swedish version of the Zung Self-Rating Depression Scale, B. Cronholm and J. O. Ottosson's depression scale, and a global rating. The scores displayed a parallel course, but the correlations between them were only moderate, and correlations between the score differences were still lower. When levels of significance of score differences and global ratings were used as measures of treatment effects, the self-ratings were least sensitive. The study gives no support for a replacement of the doctor's rating scale with the Self-Rating Depression Scale.—Journal abstract.

3630. Atia-Muftic, Isaad. (Merced Hosp, Dublin, Ireland) Control of hypertension during electrical hypnosis. *Journal of the American Institute of Hypnosis*, 1973(Sep), Vol 14(5), 235-239.—Investigated the effects of adrenergic blocking agents (phentolamine hydrochloride), ganglion blocking agents (pentolinium tartrate), and axon membrane potential blocking agents (tetrodotoxin and physalaemin) on 8 patients with essential hypertension in whom electrical hypnosis had been

induced. All agents used had some protective effects on the increased blood pressure rates resulting from electrical brain stimulation, although the best results were obtained with physalaemin, which acted immediately and did not interfere with the induction and maintenance of hypnosis. The ganglion and adrenergic blocking agents prevented increases in blood pressure but almost doubled induction time and, after the electrical current had been stopped, S appeared to be withdrawn and uncommunicative.—L. Gorsey.

3631. Ballinger, Brian R.; Simpson, Elliott & Stewart, Michael J. (Royal Dundee Liff Hosp, Scotland) An evaluation of a drug administration system in a psychiatric hospital. *British Journal of Psychiatry*, 1974(Aug), Vol 125, 202-207.—Assessed the reliability of drug administration to 236 psychiatric inpatients following the introduction of a new drug administration system. Patients' urine was tested for various psychotropic drugs. Results show that in 15 patients, prescribed drugs were not detected, in 24 patients nonprescribed drugs were detected, and in 4 patients both kinds of discrepancy were present. The relationships between these discrepancies and certain characteristics of the patients and drugs are discussed. Possible causes of these findings include nurse error, patient noncooperation, laboratory error, and abnormalities of metabolism. The inpatients resident in a portion of a mental subnormality hospital were also investigated, and discrepancies were found both before and after the introduction of the new system. (16 ref)—Journal summary.

3632. Bartoszewicz, Sławomir; Czerwiński, Andrzej; Strzyżewski, Włodzimierz & Lisowska, Jadwiga. (Poznań Medical Academy, Psychiatric Clinic, Poland) [Remarks on the usefulness of combined pharmacological treatment in endogenous depressive syndromes.] (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 557-561.—Observed 24 cases of endogenous depressive syndromes and concluded that combined treatment with thymoanaleptics and neuroleptics is a beneficial therapeutic method which provides relatively rapid and simultaneous control of several main depressive symptoms, particularly anxiety. The treatment requires lower doses of thymoanaleptics and neuroleptics for a shorter time than are usually required in treatment with antidepressive agents only. (Russian summary) (18 ref)—English summary.

3633. Bauer, Raymond B. & McHenry, John T. (Wayne State U) Comparison of amantadine, placebo, and levodopa in Parkinson's disease. *Neurology*, 1974(Aug), Vol 24(8), 715-720.—A double-blind cross-over trial of amantadine hydrochloride and placebo, each given for 3-wk periods, was performed on 40 outpatients with Parkinson's disease. Conventional antiparkinsonian drugs were continued during the 3-wk period. Amantadine was effective by objective measurements (timed tests) and subjective ratings of tremor and rigidity. Amantadine produced an average 16% objective improvement over baseline in the 40 patients. At the end of a 3rd 3-wk period, during which conventional drugs had been stopped, amantadine produced a 21% improvement compared with baseline. After 6-9 wks of levodopa added to amantadine, there was a 28% improvement over baseline. Amantadine appears to be a useful adjunct in the treatment of Parkinson's disease, and amantadine

and levodopa together may be effective combination therapy.—*Journal abstract.*

3634. **Biermann, I. & Pflug, B.** (U Tübingen, Neuro-clinic, W Germany) [A case of childhood cyclothymia associated with familial loading.] (Germ) *Acta Paedopsychiatrica*, 1974, Vol 40(5), 196-203.—Presents the clinical picture of a 13-yr-old boy, a cyclothymic in the pattern of his mother's family, which was characterized by a bipolar course, not differing from that seen in adults. Was this a genuine psychogenic disorder, or an anomaly induced by the mother and imitating her symptoms? Episodic mood changes in the years before the manifestation of the psychosis might be seen as prodromal episodes within the framework of the course of the disorder. Thymoleptics, neuroleptics, and shock therapy brought about amelioration to a normal state. With the help of lithium prophylaxis no relapse was seen after more than 2 yrs.—*G. Rubin-Rabson.*

3635. **Brambilla, F. ; Guerrina, A.; Riggi, F. & Ricciardi, F.** (Ospedale Paolo Pini, Milano Affori, Italy) **Psychoendocrine investigation in schizophrenia: Relationship between pituitary-gonadal function and behavior.** *Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 362-367.—Examined 12 18-36 yr old hebephrenic schizophrenic males to determine the possible connections between the schizophrenic syndrome and the hypothalamo-pituitary-gonadal system. Ss were treated for 30 days with haloperidol, and then for 45 days with an equal dose of haloperidol plus chorionic gonadotropin (HCG). 5 hormonal assays (e.g., total urinary gonadotrophins) were performed twice prior to therapy, twice during the haloperidol therapy, twice during the haloperidol plus HCG therapy, and 1 mo after therapy withdrawal. Psychological-behavioral parameters were examined using the Wittenborn Rating Scale. Results show a stimulatory effect of the haloperidol plus HCG therapy on the deficient hormonal status. A constant correlation also existed between biochemical improvement and behavioral improvement, particularly in affective disorders, adjustment to reality, and active behavior. (21 ref)—*Journal summary.*

3636. **Carlson, Eric T.** (New York Hosp—Cornell Medical Ctr, NY) **Cannabis indica in 19th-century psychiatry.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1004-1007.—Presents the history and usage of cannabis indicus (the 19th-century pharmacological term referring to the plant today called cannabis sativa indica). A review of the drug's physiological and psychological effects reveals that most of the effects reported in the 1960s were known to writers of the 19th century when the drug was alternately considered a cure for and a cause of insanity. (36 ref)

3637. **Charalampous, K. D.; Freemesser, G. F.; Maley, J. & Ford, Kathryn.** (Baylor Coll of Medicine, Houston, TX) **Loxapine succinate: A controlled double-blind study in schizophrenia.** *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 829-837.—Compared loxapine succinate to thiothixene and placebo in a 4-wk study of 60 hospitalized schizophrenics. Statistical analyses of the expanded Brief Psychiatric Rating Scale showed the thiothixene group to be more improved than the other 2 groups, as did the physicians Clinical Global Improvement (CGI) ratings at 2 wks. Nurses Observation Scale

for Inpatient Evaluation ratings at 2 and 4 wks and CGI ratings at 4 wks failed to discriminate between groups. Side effects were reported by significantly more patients in the active treatment groups than in the placebo group. Extrapyramidal side effects and drowsiness were the most frequently reported symptoms in the active groups, with extrapyramidal effects more prevalent in the thiothixene than in the loxapine group. Results are compared with 4 similar investigations. Inconsistencies in methodology are discussed. (15 ref)—*Journal abstract.*

3638. **Cull, John G. & Hardy, Richard E.** (Eds.). (Virginia Commonwealth U) **Alcohol abuse and rehabilitation approaches.** Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.

3639. **de Leon, George.** (Phoenix House Foundation, New York, NY) **Phoenix House: Psychopathological signs among male and female drug-free residents.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 135-151.—Administered a battery of psychological tests (e.g., Beck Depression Inventory and the Multiple Affect Adjective Check List) to 148 male and 60 female drug addicts participating in the Phoenix House therapeutic community program. Results show that (a) males and females consistently scored in the psychiatric range on all scales, although the magnitude of the scores reduced with time in program for both sexes; (b) scores dropped significantly for a subgroup of males and females retested after 7½ mo; (c) male and female dropouts scored consistently higher than their counterparts who remained in the program; and (d) black males and females scored significantly lower than all others, white males and females and Spanish females scored highest. The meaning and modification of addiction requires clarification of psychological differences between males and females.—*Journal abstract.*

3640. **Dooling, Elizabeth C.; Schoene, William C. & Richardson, Edward P.** (Massachusetts General Hosp, Boston) **Hallervorden-Spatz syndrome.** *Archives of Neurology*, 1974(Jan), Vol 30(1), 70-83.—Reports on 2 sisters with Hallervorden-Spatz syndrome. One died when 24 yrs old; the other survived at that age under levodopa treatment that improved the motor abnormalities. Both patients showed characteristic clinical features: occurrence at a young age; motor disorder, mainly of the extrapyramidal type; mental changes indicative of dementia; and a relentlessly progressive course of the disease, extending over several years. Postmortem examination of 64 Ss with this syndrome revealed considerable variability in clinical features and in the extent of neuropathologic changes, justifying the identification of several subgroups of symptoms. Further studies of Ss with Hallervorden-Spatz syndrome should include catecholamine analyses of cerebrospinal fluid and brain tissue, and a search for possible viral infection. (72 ref)—*E. A. Gavin.*

3641. **Dwarshuis, Louis; Kolton, Marilyn S. & Gorodezky, Michael.** (U Michigan, Organization for Applied Science in Society) **The treatment approach of innovative drug programs for youth.** *Drug Forum*, 1974(Spr), Vol 3(3), 249-257.—Study of the treatment approaches of 72 innovative drug programs showed that a wide variety of services were offered on a routine basis, including individual and group counseling, crisis inter-



vention, consciousness-raising techniques, and alternative activities.

3642. **Elizur, Avner & Klein, Morris M.** (Bar Ilan U, Tel Aviv, Israel) **Similarity, complementarity and difference of marital couples in problem and non-problem areas.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 145-155.—Administered Plutchik's Emotional Profile Index (EPI) to 30 couples referred to family therapy because of marital maladjustment. 24 couples completed the EPI twice, rating themselves once and their spouses the 2nd time. EPI scores were compared for (a) self-rating of the husband vs the self-rating of the wife, (b) self-rating of husband vs husband's rating of the wife, (c) self-rating of the wife vs wife's rating of the husband, and (d) husband's rating of the wife vs wife's rating of the husband. When the husband and wife each rated themselves, they manifested fewer problems than when they each rated their partner. Spouses rated their mates more negatively than mates rated themselves. It is suggested that in assessing a marital relationship, it may not be sufficient to compare the traits of each spouse individually; it may also be necessary to compare how each rates himself and his mate on the same traits. Findings also indicate that while couples do not complement each other on emotional traits, one partner compensates for the problems of the other by exhibiting fewer problems. (23 ref)—*Journal abstract*.

3643. **Escobar, Javier I.; Schiele, Burtrum C. & Zimmermann, Robert.** (U Minnesota, St Paul-Ramsey Hosp & Medical Ctr) **The tranlycypromine isomers: A controlled clinical trial.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1025-1026.—Tested the positive (+) and negative (-) isomers of tranlycypromine (Parnate) under double-blind conditions on 11 depressed inpatients. The (-) isomer was the more effective and produced fewer side effects. Because the (-) isomer has been shown to be a stronger blocker of the reuptake mechanism for brain amines and a weaker inhibitor of monoamine oxidase than the (+) isomer, the results obtained here are of particular interest.—*Journal abstract*.

3644. **Fabre, Louis F. & Harris, Robert T.** (U Texas, Medical School, Houston) **Pilot open-label study on U-28,774, in anxious in-patients.** *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 848-852.—Conducted an uncontrolled study of ketazolam (U-28,774) in 25 patients diagnosed as experiencing anxiety neurosis of such severity as to require hospitalization. A general and rather profound amelioration of anxiety symptoms was noted after 2 wks of treatment in all patients. This improvement persisted throughout the 4-wk study period. Side effects were observed in only a few patients, and these were limited to mild dizziness or drowsiness and occurred only upon initiation of treatment or when dosages were increased to any considerable extent.—*Journal abstract*.

3645. **Fann, William E. & Lake, C. Raymond.** (Duke U, Medical Ctr) **On the coexistence of Parkinsonism and tardive dyskinesia.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 324-326.—Describes the evaluation and treatment of 3 male 52-, 55-, and 58-yr-old psychiatric patients who exhibited clinical evidence of

both parkinsonism and a marked buccofaciolingual dyskinesia. Changes in the manifestations of parkinsonism associated with trihexyphenidyl and amantadine therapy, and the possible reciprocity of symptoms in the 2 disorders are discussed.

3646. **Fann, William E.; Lake, C. R.; Gerber, C. J. & McKenzie, G. M.** (Baylor Coll of Medicine, Houston, TX) **Cholinergic suppression of tardive dyskinesia.** *Psychopharmacologia*, 1974, Vol 37(2), 101-107.—Notes that tardive dyskinesia (TD), a hyperkinetic disorder associated with long-term neuroleptic treatment, may be a manifestation of imbalance of opposing dopamine and acetylcholine dependent systems in the central nervous system (CNS) (i.e., hyperdopamine activity or hypocholinergic function). Dopamine blocking agents give some transient relief of symptoms. In the present study, physostigmine, an anticholinesterase which enhances CNS acetylcholine action, was given to 7 55-70 yr old schizophrenic inpatients with TD, and measurements of their pathological movements were made before, 45 min, and 24 hrs later. All 7 Ss showed significant suppression of movement at 24 hrs. Many showed measurable decrement at 45 min. Side effects were minimal and transient. (15 ref)—*Journal abstract*.

3647. **Favazza, Armando R. & Martin, Patricia.** (U Missouri, Medical School, Columbia) **Chemotherapy of delirium tremens: A survey of physicians' preferences.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1031-1032.—To clarify the confusion in the literature concerning the chemotherapy of delirium tremens, questionnaires were sent to selected experienced physicians throughout the nation. Out of 101 useful responses, 86 physicians chose a benzodiazepine as a primary drug of choice. Of these, 64 favored chlordiazepoxide and 22 favored diazepam. The overall mortality of the patients they treated appeared to be quite low.—*Journal abstract*.

3648. **Flemenbaum, Abraham.** (Texas Tech U, Medical School) **Affective disorders & "chemical dependence": Lithium for alcohol and drug addiction?** *Diseases of the Nervous System*, 1974(Jun), Vol 35(6), 281-285.—Presents a working hypothesis for the treatment of some types of "chemical dependence," based on data that alcoholism and/or chemical dependence (as well as other disorders such as sociopathy) are heterogeneous syndromes. The literature suggests that some types of alcoholism may be genetically related to affective disorders, and that alcoholism and other related disorders could be "parapsychiatric" manifestations of subpsychotic mood swings. There has been increasing evidence that selected cases of depressive disorders respond to prophylactic administration of lithium carbonate, and that lithium seems to be beneficial in disorders other than affective ones. It is suggested that lithium could be of benefit in the prophylaxis of these types of parapsychiatric disorders. (36 ref)—*Journal summary*.

3649. **Fontana, A. E. & Loschi, J. A.** (Argentinean Assn of Psychotherapy, Buenos Aires) **[Antidepressive therapy with CI 581.]** (Span) *Acta Psiquiátrica y Psicología de América Latina*, 1974(Feb), Vol 20(1), 32-39.—Reports on the use of a substance, 2-(orto-chlorophenyl)-2-(methylamine) cyclohexanone hydrochlorate, to achieve regression in the psychoanalytic treat-

ment of depression. The drug's main advantages over other pharmacological agents are outlined.

3650. Fried, Suzanne R. (Jerusalem Mental Health Ctr, Israel) **Supportive services in the rehabilitation of the drug user.** *Drug Forum*, 1974(Spr), Vol 3(3), 277-282.—In an attempt to prevent the return of addicts to drug use, treatment followed by efforts at rehabilitation are offered. Sometimes these efforts are concurrent. Supportive services which can be used to increase the effectiveness of rehabilitation are described, and the use of existing community services is advocated.

3651. Gallenkamp, Ulrich. (Kassel Hosp, Neurological Clinic, W Germany) **[A 14-year-old boy with reactively caused "amnesia."]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 46-50.—Reports a case of pretended sudden loss of memory which was recovered after 2 days of neuroleptic therapy. The cause of the "amnesia," uncovered in 2 drawings of a tree, was an inescapable chronic depressive conflict. (18 ref)

3652. Goldberg, Harold L.; Finnerty, Richard J. & Cole, Jonathan O. (Boston State Hosp, MA) **Doxepin: Is a single daily dose enough?** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1027-1029.—Conducted a post hoc comparison of 2 very similar doxepin studies that included outpatients with mixed anxiety and depression. The 1st study used a 3 times/day schedule with 23 patients and the 2nd used a bedtime schedule with 21 patients. All differences between the 2 treatments favored the bedtime regimen. Although the 2 separate studies cannot take the place of a direct comparison between the 2 dosage schedules, they offer evidence for the usefulness and value of single-dose bedtime medication of anxious-depression outpatients receiving doxepin treatment. (15 ref)—*Journal abstract*.

3653. Goldman, Mark S. (Wayne State U) **To drink or not to drink: An experimental analysis of group drinking decisions by four alcoholics.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1123-1130.—Examined the effects of social influence on the initiation, maintenance, and termination of drinking in 4 male 37-51 yr old chronic alcoholics. Ss made decisions in a group setting about alcohol and cigarette use for which they earned reinforcement points redeemable for drinks and cigarettes during the study or for money at its end. Decision making delayed the initiation of drinking and lowered overall alcohol consumption during a period of prolonged drinking but was not effective in inducing early termination of the drinking episode. Mood disturbances (assessed by the Mood Adjective Check List), physical symptoms, and psychopathology (Wittenborn Psychiatric Rating Scales) became more pronounced when the amount of alcohol consumed increased. The extent of decision making changed during times of high motivation for drinks or cigarettes; these decisions were mainly a function of individual leadership. The possible utility of the group decision-making model as a tool for the treatment of alcoholism is discussed. (23 ref)—*Journal abstract*.

3654. Green, J. R. et al. (U Washington, Seattle) **Sulthiame: Evaluation as an anticonvulsant.** *Epilepsia*, 1974(Sep), Vol 15(3), 329-349.—Results of double-blind crossover study show that sulthiame as sole anticonvul-

sant was preferable to diphenylhydantoin in only 4 of 21 seizure patients. Other patients had more seizures or unbearable toxicity on sulthiame. When the concentration of diphenylhydantoin in serum was increased and other anticonvulsants withdrawn, seizures were better controlled and side effects often diminished. Although the few patients who benefited by sulthiame alone felt more alert, neuropsychologic tests showed that organic communications and intellectual processing deficits were accentuated. Hyperpnea could be troublesome. It is concluded that previous favorable reports on sulthiame may have been due to the increase it causes in serum diphenylhydantoin when the 2 drugs are given together. (French, German, & Spanish summaries) (34 ref)—*Journal summary*.

3655. Guilleminault, Christian; Carskadon, Mary & Dement, William C. (Stanford U, Medical School, Sleep Disorders Clinic & Lab) **On the treatment of rapid eye movement narcolepsy.** *Archives of Neurology*, 1974(Jan), Vol 30(1), 90-93.—Obtained subjective sleep reports approximately every other month from 50 Ss diagnosed as having rapid-eye-movement narcolepsy. 21 were females 23-52 yrs old and 29 were males 15-61 yrs old. Daytime sleep attacks and cataplexy were the indexes for judging effectiveness of medication with amphetamine, tricyclic antidepressant drugs, imipramine hydrochloride, and clomipramine hydrochloride. None of these provided effective and harmless treatment for daytime sleep attacks. However, for cataplexy, sleep paralysis, and hypnagogic hallucinations imipramine hydrochloride and clomipramine hydrochloride appeared to be effective. (25 ref)—E. A. Gavin.

3656. Haig, John R.; Schroeder, Carolyn S. & Schroeder, Stephen R. (U North Carolina, Chapel Hill) **Effects of methylphenidate on hyperactive children's sleep.** *Psychopharmacologia*, 1974, Vol 37(2), 185-188.—Compared EEG sleep patterns recorded from 6 8-14 yr old male hyperactives taking methylphenidate daily to those of 6 6-12 yr old normal male controls. For the hyperactive Ss significant increases in latency to both sleep onset and the 1st rapid eye movement period were obtained. Other sleep measures were normal. The hypothesis that the therapeutic effects of stimulants upon hyperactive children are independent of any pathological disruption of sleep was supported. (17 ref)—*Journal abstract*.

3657. Harshman, Gordon A. (U Arizona) **Alternatives to divorce and their implications.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Describes several alternatives to divorce, including continuation of the status quo, trial separation, renegotiation with accommodation, and working through to constructive integration. Activities and exercises for improving self-understanding and clarifying the decision-making process are also discussed, and suggestions for counselors working with couples deciding about divorce are included.

3658. Haslam, M. T. (Clifton Hosp, York, England) **The relationship between the effect of lactate infusion on anxiety states, and their amelioration by carbon dioxide inhalation.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 88-90.—Administered either sodium



D, lactate or glucose saline infusions to 16 patients showing symptoms of pervasive anxiety or agoraphobia. Ss received both treatments 4 days apart. Regardless of the response to the lactate infusions, Ss received a series of carbon dioxide inhalation therapy treatments 2 times/wk for the next 6 wks. 10 patients showed positive responses to lactate infusions in that a panic reaction was evoked within a few minutes which ceased on discontinuance of the infusion; of these 10, 9 showed immediate positive responses to the relief of anxiety symptoms with the carbon dioxide treatment. 6 patients showed no panic reactions with either lactate or glucose saline infusions.—*L. Gorsey.*

3659. Heilbrum, Alfred B. (Emory U) **Predicting rehabilitation outcome in alcohol abuse.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Defines and discusses the reasons for outcome prediction, and considers problems inherent in setting up a prediction system in an alcoholic treatment program. Possible directions of future outcome prediction systems are presented.

3660. Henry, George M. (U Kentucky, Medical School) **Treatment and rehabilitation of narcotic addiction.** In R. J. Gibbons et al (Eds), *Research advances in alcohol and drug problems: I*. New York, NY: John Wiley & Sons, 1974. xvii, 428 p.—Discusses and reviews evidence of the effectiveness of various therapeutic rationales and programs for narcotic addiction, including detoxification, maintenance on opioid drugs or opioid antagonists, and psychosocial management. Problems in interpreting evaluations and treatment outcomes are discussed, and the relative advantages of the 3 apparently most successful rehabilitation procedures (abstinence, narcotic antagonists, and the use of authority) are considered. (118 ref)

3661. Jansen, Donald R.; Brown, Barry S. & Bass, Urbane F. (Narcotics Treatment Administration, Washington, DC) **Comparison of attitudes and beliefs about methadone of clients retained and lost to treatment.** *Drug Forum*, 1974(Spr), Vol 3(3), 215-223.—40 addict clients retained in treatment 1 mo and 69 not retained were administered open-ended interviews and semantic differentials tapping attitudes regarding heroin and methadone. Attitude toward heroin was an effective predictor of retention in treatment beyond 1 mo. Retained clients became more favorable toward methadone in that 1st treatment month but limited the length of time they planned to remain on methadone. Moreover, time actually spent on methadone correlated with length of time expected to remain on methadone.—*Journal abstract.*

3662. Johnson, D. A. (Crumpsall Hosp, Manchester, England) **A study of the use of antidepressive medication in general practice.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 186-192.—Surveyed 3 separate groups of patients ( $n = 112, 82$ , and  $167$ , respectively) suffering from depression to evaluate the prescribing habits of a total of 104 general practitioners in the treatment of depression. An analysis of survey results suggests that psychotropic drugs were often used inappropriately in general practice. This view was confirmed by the opinions expressed by a group of

general practitioners who were questioned. The reasons for drug defaulting by patients were also explored. It is concluded that in the setting of urban general practice the potential for the traditional family doctor-patient relationship is strictly limited, and that in practice the interest in and knowledge of psychiatry and psychotropic drugs is relatively small.—*Journal summary.*

3663. Keegan, David L.; Pettigrew, Andrew & Parker, Zilla. (U Saskatchewan Hosp, Saskatoon, Canada) **Amitriptyline in the psychotic states of Down's syndrome: The comparison of two cases.** *Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 381-383.—Describes 2 cases of psychosis associated with Down's Syndrome in a 23- and a 25-yr-old female where amitriptyline, a tricyclic antidepressant drug, was used successfully. Similarities between these cases and other psychotic disorders in Mongoloids are presented.

3664. Krakowski, Mark & Smart, Reginald G. (Addiction Research Foundation, Toronto, Ontario, Canada) **Social and psychological characteristics of heroin addicts dropping out of methadone treatment.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 41-47.—Describes characteristics of 53 male and 37 female heroin addicts, all over 21 yrs of age, in a methadone maintenance program. Patients who stayed in treatment for at least 1 yr were compared with those who dropped out. Ss remaining in treatment had a higher proportion who were married, who lived with spouse or children, and who were employed in white-collar jobs. Dropouts had records of more criminal charges before entering the program and had histories of heavier drug use. MMPI profiles of the dropouts evidenced more pathology than profiles of those staying in treatment.—*F. Auld.*

3665. Krippner, Stanley; Silverman, Robert; Cavallo, Michael & Healy, Michael. (Maimonides Medical Ctr, Brooklyn, NY) **Stimulant drugs and hyperkinesis: A question of diagnosis.** *Reading World*, 1974(Mar), Vol 13(3), 198-222.—Discusses the controversy surrounding the use of stimulant drugs in hyperkinetic children. 3 basic areas are discussed: the possibility of misdiagnosis, the question of adverse side effects of drugs, and the failure of authorities to examine nondrug alternatives in treating hyperkinetic children. Various definitions and symptoms of hyperkinetics are cited, and case histories of children diagnosed as hyperkinetic are presented. An experiment that compared 47 7-19 yr old hyperkinetic children (for whom medication had been prescribed) with 27 7-14 yr old nonhyperkinetic children is reported. Results of the experiment show that the 2 groups did not differ significantly on tests for brain dysfunction but did differ on tests for mental ability, creativity, and mental health. (57 ref)—*R. S. Albin.*

3666. Landsman, Richard. (COPAY, Inc, Great Neck, NY) **A pre-trial court diversion program for narcotics addicts: An alternative to incarceration.** *Drug Forum*, 1974(Spr), Vol 3(3), 295-306.—Describes a process which demonstrates that early identification and diversion away from the potential harmful effects of the criminal justice process will be beneficial in providing the addict with a source of rehabilitation as an alternative to incarceration. Intake, procedural, and aftercare techniques are described.

3667. **Lech-Sobczak, Andrzej.** [Neuroleptic treatment of prisoners with mental abnormalities.] (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 563-567.—42 prisoners with mental abnormalities (psychopathy, character disorders, and mental debility) were given neuroleptics in daily doses of 50-200 mg: chlorpromazine (Fenactil), thioridazine, perazine, and triphenol. While the drugs had a beneficial influence on the Ss' general behavior, their effect was less marked in the spheres of affect, impulse, and psychomotor drive. Ss were reluctant to submit to systematic treatment because they believed the drugs to be harmful and observed that they did not produce the expected euphoria. (Russian summary)—*English summary*.

3668. **Lee, J. Hillary et al.** (Rockland State Hosp, Research Ctr, Orangeburg, NY) **Once versus thrice daily thiothixene in the treatment of schizophrenic in-patients.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 73-78.—Conducted a double-blind cross-over study of 38 chronic schizophrenic inpatients who received thiothixene either 1 or 3 times/day. Improvement over the placebo baseline occurred with both regimens, although improvement appeared somewhat earlier with the multiple doses. During the final maintenance phase, there was no difference between the treatment regimens. Extrapyramidal side effects were more marked with the multiple dosage regimen, although the difference was significant on only a few occasions. Issues involved in maintenance therapy for both in- and outpatients and recommendations for improved prescription compliance in outpatients are discussed. (21 ref)—*Journal summary*.

3669. **Levy, Norman M. & Tortelli, Joseph A.** (Renaissance Project, New Rochelle, NY) **Methadone dropouts in a drug free therapeutic community.** *Drug Forum*, 1974(Spr), Vol 3(3), 225-231.—Surveyed the 17 methadone dropouts from a population of 68 residents enrolled in a facility of a drug-free therapeutic community on a certain date. The great majority of dropouts continued drug abuse and diverted methadone illegally while on methadone programs. There was a short time interval between dropping out and involvement in the drug-free program. Dropping-out was probably related to a lack of sufficiently intense psychotherapy in methadone programs. It is concluded that ex-methadone patients are more sophisticated than the average resident and require an aggressive approach to rehabilitation.—*Journal abstract*.

3670. **Lofft, John G. & Demars, Jean P.** (Washington Hospital Ctr, DC) **A chemotherapeutic alternative to the anti-anxiety agents for the extended treatment of psychoneurosis.** *Diseases of the Nervous System*, 1974(Sep), Vol 35(9), 409-415.—Compared the effects of thioridazine and diazepam in 26 18-60 yr old patients with anxious or depressive neuroses, the majority of whom had histories of alcohol abuse. After a 2-wk drug washout period, Ss received either 20-200 mg of thioridazine or 4-40 mg of diazepam each day. The Hamilton Anxiety Scale and the Lipman Self-Rating Symptom Scale were completed at the beginning of the double-blind trial and 4 wks later. Results show that on the Hamilton scale, the 12 thioridazine Ss improved significantly more than the diazepam Ss on 15 items ( $p < .10$ ). These differences were confirmed when the

groups' pretrial vs 4-wk ratings were compared. Lipman data, however, show a strong trend favoring patients on diazepam. It is suggested that the behavioral manifestations of anxiety measured by the Hamilton scale are modified by thioridazine more than by diazepam, while the subjective feelings of relief from anxiety are more prominent and sustained with diazepam. It is concluded that thioridazine can effectively relieve tension and anxiety associated with psychoneurosis.—*L. Gorsey*.

3671. **Lukaszewicz, Andrzej; Komar, Januta & Tolwinski, Tomasz.** (Białymstok-Choroszczy Medical Academy, Clinic for Mental Diseases, Poland) [Experiences with chlormethiazol (Hemineurine).] (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 551-556.—Studied the effects of chlormethiazole (Hemineurine) on 68 patients with various disorders (neurotic 16, depressive 25, psycho-organic 17, and other 10). Marked improvement of the mental state was observed in 31 Ss, moderate improvement in 28, and no improvement in 9. None of the cases showed complete remission of the morbid symptoms under the action of the drug. Its beneficial effects in insomnia of varying etiology, in anxiety states, and in psychomotor excitation were confirmed. It was less successful in states of psychomotor inhibition and in depressive syndromes, and still less successful with hypochondriacal symptoms. Its action was found to be only symptomolytic. (Russian summary)—*English summary*.

3672. **Martin, Roger D.** (U Saskatchewan, Saskatoon, Canada) **Reduction of adolescent drug abuse through post-hypnotic association.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 211-216.—Describes the treatment procedures used with 4 Indian-Metis and 2 white 14-16 yr old females who were involved in drug misuse. Ss were self-referrals for treatment because they were anxious and frightened because of adverse drug reactions. Treatment consisted of an initial comprehensive psychological examination and orientation interview, 3 intensive sessions of hypnosis where the Ss practiced and learned to develop cue association, and finally a procedure to develop cue association in situations where the Ss felt tense, anxious, and prone to drug misuse. Total number of sessions ranged from 6 to 15; a follow-up interview was conducted 6 mo later. In all cases it was found that drug misuse, as determined by interviews with the Ss and with significant people in their environment, had virtually stopped, although there was some mild use of alcohol. (French summary)—*Journal abstract*.

3673. **Mason, Aaron S. & Dewolfe, Alan S.** (VA Hosp, Downey, IL) **Usage of psychotropic drugs in a mental hospital: I. As needed (PRN) antipsychotic medications.** *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 853-860.—Results of a survey of the use of PRN antipsychotic medication support the viewpoint that a large number of mental hospital physicians have not developed expertise in using antipsychotic agents in the most effective and economical manner. Only 38% of the 227 patients with PRN orders were receiving regular antipsychotic medication at greater than the conservative recommended moderate dosage level. Only 45% of the PRN orders called for intramuscular administration. Further analysis indicated that PRN orders are often both unnecessary and continued almost automatically.



In 33% of the cases, the PRN order had been in force for over 6 mo and 89% of the orders had been active for more than 1 mo. The original PRN order had been written for the patient by a previous physician in 36% of the cases. Staff physicians routinely continued PRN orders month after month without a critical review as to their need. 52% of the patients with active PRN orders resided on an open ward. In addition, 47% of the PRN orders had never been carried out. It is concluded that further research in the prescription practices of PRN antipsychotic agents is indicated.—*Journal abstract.*

3674. Mayer, Joseph & Black, Rebecca M. (Tufts U) **A description of some selected treatment approaches in alcohol abuse.** In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 203 p. \$12.75.—Discusses the necessity of utilizing different approaches in the treatment of alcoholism depending on the patient's level of social and economic functioning, social class, and depth of psychopathology. It is also pointed out that patients frequently require various approaches at the same time and at different times in their lives. (26 ref)

3675. McNair, Douglas M. (Boston U) **Self-evaluations of antidepressants.** *Psychopharmacologia*, 1974, Vol 37(4), 281-302.—Analyzes antidepressant clinical drug trials conducted from 1955 to 1972 to determine the most frequently used patient self-rating scales and to estimate their relative sensitivities (validities). Other analyses suggest how the methodology of the trials may have influenced measurement sensitivity. Interpretive problems are discussed, and some tentative recommendations are presented. (5 p ref)—*Journal abstract.*

3676. Mester, Roberto. **Psychiatrists' reactions to their patients' refusal of drugs.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 373-381.—The reactions of each of 6 psychiatrists (including the author) in a mental hospital to refusal by their patients of prescribed psychotropic drugs are described, classified, and analyzed in terms of motivation and effect on patients. Results indicate that refusal of the drug, which implied a rejection of the doctor himself, aroused aggressive impulses which formed the center of the motivational system underlying the reactions. These aggressive impulses could be ordered on an active-passive dimension. It is concluded that self-analysis by the doctor administering psychopharmacological treatment can help greatly in transforming his behavior into a useful instrument in the success of the chemical treatment.—*Journal abstract.*

3677. Milstein, Victor & Small, Joyce G. (Indiana U, Medical Ctr, Larue D. Carter Memorial Hosp, Indianapolis) **Photic responses in "minimal brain dysfunction."** *Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 355-357.—Investigated the effect of a long-acting nomphetamine stimulant, magnesium pemoline, on the EEG recordings of 20 6-12 yr olds with hyperkinesia; controls were 10 normal children matched for age, sex, and grade level with 10 of the experimental Ss. The study was based on T. Shetty's hypothesis (see PA, Vol 48:11830) that the fundamental impairment in children with minimal brain damage is a disorder of inhibitory mechanisms in the central nervous system (CNS). Findings that photic driving did not decrease with the

stimulant drug contradict Shetty's results and suggest that drugs effective in the treatment of childhood hyperkinesia exert a stimulant effect upon the CNS. (17 ref)—*M. E. Pounsel.*

3678. Morgan, R. & Cheadle, J. (St Wulstan's Hosp, Malvern, England) **Maintenance treatment of chronic schizophrenia with neuroleptic drugs.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 78-85.—Discusses the difficulties for the short-stay doctor of managing the drug treatment of long-stay schizophrenic patients. Some principles developed by the senior author to meet these difficulties are presented, and results of following the principles for 7 yrs are analyzed. Only 74 out of a population of 475 chronic schizophrenics had been considered suitable for trial without drugs. Only 5 of these still remained off drugs. The relapses of the other 69 patients occurred after an average of about 4½ months. Possible reasons for the widely different results of drug withdrawal trials are suggested. (15 ref)—*Journal abstract.*

3679. Mormont, C. (U Liege, Psychiatric Clinic, Belgium) **[Rating of psychological effects induced by "ordinary" Noveril and time-released Noveril.]** (Fren) *Psychopharmacologia*, 1974, Vol 37(4), 365-370.—Rated 2 groups of depressed inpatients (9 and 11 Ss) before, during, and after the study on 2 depression scales (Hamilton, Breulet), an anxiety scale (Cattell), and the MMPI. The Mann-Whitney U test was used to analyze statistically the results of the double-blind, cross-over, and randomized evaluation of the antidepressant characteristics of ordinary and of time-released Noveril (dibenzepin). Results confirm that both forms of Noveril are antidepressant, but that ordinary Noveril is more active.—*English abstract.*

3680. Nail, Richard L.; Gunderson, Eric & Arthur, Ransom J. (US Navy Medical Neuropsychiatric Research Unit, Drug Problems Branch, San Diego, CA) **Black-white differences in social background and military drug abuse patterns.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1097-1102.—Studied drug-abuse patterns and social backgrounds of 833 US Navy enlisted men (764 white and 69 black) admitted to a drug rehabilitation center. Black Ss reported better school adjustment, less delinquency, and fewer difficulties in their home lives than did whites. They had used heroin more frequently than whites but were less involved with hallucinogenic drugs. It is suggested that different cultural patterns may underlie the drug-abuse behaviors of the 2 groups. White users seem to be expressing new varieties of delinquent or antisocial behavior, while blacks are following long-established subcultural patterns of drug use. (25 ref)—*Journal abstract.*

3681. Namyslowska, Irena. (Warsaw Medical Academy, Psychiatric Clinic, Poland) **[The influence of pharmacological treatment on schizophrenic associations.]** (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 539-545.—Administered the Kent-Rosanoff Free Association Test to 77 schizophrenic patients before and after pharmacological treatment and compared the results with those of a control group of 80 randomly selected normal Ss. The mean number of individual responses in patients before treatment was 21, twice the number for

the normal Ss. Similarly, the mean association frequency (22.8) for patients before treatment was significantly lower ( $p < .01$ ) than for the control group (32.2). Following pharmacological treatment, the mean number of responses decreased significantly ( $p < .01$ ) to 14, and the mean association frequency increased significantly ( $p < .01$ ) to 32.4. The data support the hypothesis that association disorders respond favorably to pharmacological treatment and are not a permanent feature in the thinking of schizophrenic patients. (Russian summary)

—English summary.

3682. Nanry, Charles. (Rutgers State U) **Program evaluation: The use of content analysis.** *Drug Forum*, 1974(Spr), Vol 3(3), 233-238.—The content analysis of available pronouncements about the goals of a local drug abuse program is suggested as a means whereby conflicting definitions of purpose can be sorted out. Each definition of goals tends to create a collectivity of persons or groups who then see further program development as an implementation of those particular goals. (15 ref)

3683. Nelson, Arthur A. & Gagnon, Jean P. (U Illinois) **Physician acceptance of three proposed programs designed to reduce prescription prices.** *Drugs in Health Care*, 1974(Sum), Vol 1(1), 27-37.—Analyzes data from a national sample of 323 physicians who responded to a questionnaire on attitudes toward 3 programs for reduction of prescription drug prices: repeal of state antistubstitution laws, a federal formulary, and a community formulary. The hypothesis that physicians' attitudes toward these programs would be related to their perception of these prices as excessive was supported by the results.

3684. Palatucci, Donald M. (Neurodiagnostic Lab, San Francisco, CA) **Iatrogenic dyskinesia: A unique reaction to parenteral methylphenidate.** *Journal of Nervous & Mental Disease*, 1974(Jul), Vol 159(1), 73-76.—Reports the case of a psychiatric patient given 40 mg of methylphenidate intravenously who developed a severe dyskinetic reaction. Similar dyskinesias have been reported in rare instances in patients who have taken oral methylphenidate, but never previously in a patient who was given the drug intravenously. Some implications of this unique occurrence are discussed.

3685. Pazzaglia, Piero et al. (U Milan, Inst of Clinical Psychiatry, Italy) **[Modifications on the Rorschach test during psychopharmacological treatment of schizophrenic patients.]** (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 498-508.—Compared the Rorschach psychograms of hospitalized schizophrenics before, during, and after various drug treatments. Rorschach patterns and clinical symptomatology were highly correlated.

3686. Pineda, Mario R. & Russell, Stanley C. (VA Ctr, Jackson, MS) **The use of a tricyclic antidepressant in epilepsy.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 322-323.—Reports the case of a 50-yr-old male with a known seizure disorder who developed an increased frequency of seizures associated with severe depression. When desipramine was added to the treatment regimen of phenobarbital and diphenylhydantoin, seizures markedly decreased and depressive symptomatology improved greatly.

3687. Pokorny, Alex D. & Prien, Robert F. (VA Hosp, Psychiatry Service, Houston, TX) **Lithium in treatment and prevention of effective disorder: A VA-NIMH collaborative study.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 327-333.—Describes a 4-yr study of (a) the effectiveness of lithium carbonate vs chlorpromazine in reducing manic symptoms over a 3-wk period; (b) the effectiveness of lithium vs placebo in preventing recurrence of affective episodes in manic patients over a 2-yr period; and (c) the relative effectiveness of lithium, imipramine, and placebo in preventing affective episodes in depressed patients over a 2-yr period. A total of 665 patients, including manics, schizo-affectives, and depressives, participated in the study. Rating scales included the Brief Psychiatric Rating Scale, the Inpatient Multidimensional Psychiatric Scale, the Psychotic Inpatient Profile, and self-reports of mood and side effects. Data on blood level effects, patient drop-outs, and optimal dosage levels are presented. Lithium carbonate appears to be a safe and effective treatment for preventing effective episodes in both unipolar and bipolar illnesses. For unipolar patients, however, imipramine was equally effective.

3688. Prien, Robert F.; Caffey, Eugene M. & Klett, C. James. (VA Hosp, Central Neuropsychiatric Research Lab, Perry Point, MD) **Factors associated with treatment success in lithium carbonate prophylaxis.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 189-192.—Conducted a multihospital collaborative study to evaluate prophylactic lithium carbonate therapy in 205 patients with bipolar manic-depressive illness. Factors associated with poor lithium carbonate response were the following: (a) a recent history of frequent affective episodes requiring hospitalization, and (b) previous failure of lithium carbonate treatment. Results also suggest that lithium carbonate response may be related to the presence of schizo-affective illness and a family history of bipolar affective illness, but the small numbers of patients in these groups limit interpretation. Most failures on lithium carbonate therapy occurred during the 1st year. Ability to remain on the maintenance schedule with no episodes for a year may be the most potent predictor of ultimate prophylactic success. There are important implications in these findings for the clinician selecting patients for prophylactic treatment. (22 ref)—*Journal abstract.*

3689. Rapoport, J.; Quinn, P.; Scribanu, N. & Murphy, D. L. (Georgetown U Hosp) **Platelet serotonin in of hyperactive school age boys.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 138-140.—Examined platelet serotonin content before and during treatment of 39 6-12 yr old hyperactive males with methylphenidate and imipramine. Ss were age-matched with 19 normal controls. Results show that imipramine treatment markedly reduced platelet serotonin, while methylphenidate had no similar effects. These findings suggest that since both drugs are clinically effective, it seems unlikely that change in serotonin transport or storage is closely related to the mechanisms of action of these drugs on hyperactive behavior.—*Journal summary.*

3690. Raskin, Allen. (NIMH Psychopharmacology Research Branch, Rockville, MD) **Age-sex differences in response to antidepressant drugs.** *Journal of Nervous &*



*Mental Disease*, 1974(Aug), Vol 159(2), 120-130.—Conducted 2 multihospital studies with a total of 880 patients in 4 age-sex groups who received 3-wk drug treatment with chlorpromazine, imipramine, and placebo in Study 1 and diazepam, phenelzine, and placebo in Study 2. Older males in both studies generally responded better to one of the active treatments than to a placebo. Older females were more selective and did well only on imipramine. Young females in Study 1 did well on placebo and poorly on imipramine, whose negative effects were primarily on the hostility variables. Response to a placebo by young males was negative in Study 1 and positive in Study 2, indicating that placebo response must be judged in the context of the active comparison drugs. Hostility was a serious problem for many young males and chlorpromazine relieved symptoms in this area. This was not true of either of the active drugs in Study 2. These results indicate that an analysis of sex differences alone could prove misleading, since there were as many differences in drug response between younger and older women and between younger and older men as there were between the sexes. Findings could be "explained" in terms of relationships among factors such as presenting symptoms, initial severity of illness, sensitivity to side effects, pharmacological action of the study drugs, and placebo response. (41 ref) —*Journal abstract*.

3691. Reed, Harvey D. & Janis, Irving L. (U Michigan) **Effects of a new type of psychological treatment on smokers' resistance to warnings about health hazards.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 748.—Hypothesized that if a person is induced to acknowledge his use of rationalizations for continuing a potentially dangerous activity (e.g., heavy smoking) before being given information refuting each rationalization, he will be less likely to use these cognitive defenses as effective forms of resistance when subsequently exposed to fear-arousing warnings about health risks he is taking. Data from 74 adults who sought aid in an anti-smoking clinic support the hypothesis.

3692. Rickels, Karl et al. (U Pennsylvania) **Thiothixene and thioridazine in anxiety.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 79-87.—Compared the effectiveness of thiothixene, thioridazine, and placebo in treating anxiety in 155 anxious neurotic outpatients. 96 patients completed at least 4 wks of treatment with 6 mg doses of thiothixene and 75 mg of thioridazine daily. Thioridazine produced the most and placebo the least amount of side effects. Significant trends for both active drugs to produce more improvement than placebo appeared after 2 wks of treatment but not after 4 or 6 wks. Even at the 2-wk period, however, treatment differences were somewhat less than those usually observed with anti-anxiety agents. It is suggested that this may be due to the tendency for physicians to assign more treatment-resistant patients to trials involving antipsychotic agents than to those involving anti-anxiety agents. While the initial level of anxious and overall neurotic psychopathology had no differential effect on treatment outcome, the initial level of secondary depression had a mild effect, with both drugs producing more improvement in the initially high than in the initially low depressed patients. (17 ref)—*Journal summary*.

3693. Rucker, T. Donald. (Ohio State U) **Public policy considerations in the use of psychotherapeutic drugs.** *Drugs in Health Care*, 1974(Sum), Vol 1(1), 5-15.—Critiques industry practices related to the use of brand names and promotional techniques. The establishment of a nationally coordinated information system where computer technology would be used to help improve the quality of professional decision making is urged. Characteristics of a model organization for providing continuing professional education, the potential role of placebo and nondrug inputs in treating patient conditions, and health education for patients are discussed. (29 ref)

3694. Runciman, Alexander P. & Doyle, E. Lee. **Orgasmic problems: A counseling demonstration.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p. —Presents a panel discussion/interview between a psychiatrist, sociologist, marriage counselor, and 2 actors who play the role of a couple in which the wife is nonorgasmic. Within the transcript, stages in the couple's recognition of other underlying problems and conflicts, suggestions for therapists, and the steps in the therapeutic adjustment process are detailed.

3695. Rybakowski, Janusz. (Poznań Medical Academy, Psychiatric Clinic, Poland) **[Lithium carbonate in endogenous depression.]** (Polh) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 547-550.—Administered lithium carbonate in daily doses of 900-1,500 mg for 20 days to 8 women patients with endogenous depression (4 unipolar, 4 in the course of manic-depressive illness). All unipolar patients showed complete clinical remission. Of the bipolar patients, 3 were improved, 1 was unchanged. Findings suggest that lithium is likely to be useful in the treatment of depression. (Russian summary) (16 ref) —*English summary*.

3696. Sakalis, George; Sathananthan, Gregory; Collins, Patrick & Gershon, Samuel. (New York U, Medical Ctr, Neuropsychopharmacology Research Unit) **SQ 65,396: A non-sedative anxiolytic?** *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 861-864.—10 psychiatric inpatients manifesting moderate to severe anxiety were treated openly with SQ-65,396, a potent adenosine 3', 5' monophosphate phosphodiesterase inhibitor, up to a maximum dose of 50 mg 4 times daily. At the end of the study, a significant reduction in anxiety was observed, whereas schizophrenic symptomatology continued to worsen. None of the patients showed any side effects. It was decided on these findings to start a double-blind study in patients suffering from anxiety states.—*Journal abstract*.

3697. Saraf, Kishore R.; Klein, Donald F.; Gittelman-Klein, Rachel & Groff, Stephen. (Hillside Hosp, Glen Oaks, NY) **Imipramine side effects in children.** *Psychopharmacologia*, 1974, Vol 37(3), 265-274.—Compared the incidence, range, and severity of side effects in 65 6-14 yr old school phobic and hyperkinetic children receiving imipramine treatment with those occurring in 37 others receiving placebo. Minor side effects occurred in 83% of the imipramine group and in 70% of the placebo group. Just under 5% of the Ss in the imipramine group had significant side effects but none were serious enough to necessitate drug withdrawal. The majority of side effects

in both groups occurred during the 1st 3 wks of treatment. However, there may be serious individual idiosyncrasies to high dosage of imipramine, as possibly suggested by the sudden death of 1 6-yr-old girl during imipramine treatment. (30 ref)—*Journal abstract*.

3698. Sathananthan, G.; Shopsin, B. & Peterson, B. (New York U, Medical School, Neuropsychopharmacology Research Unit) **The effects of lithium carbonate on serum gastrin in psychiatric patients.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 86-89.—The effect of lithium treatment on the gastrin level in serum was tested on 4 patients with different psychiatric diagnoses. All patients showed normal serum values during the 1st 3 wks of the treatment period. Possible reasons for the relatively unelevated levels of serum gastrin are discussed. (23 ref)

3699. Smulevitch, A. B.; Zavidovskaya, G. L.; Igonin, A. L. & Mikhailova, N. M. (USSR Academy of Medical Sciences, Inst of Psychiatry, Moscow) **The effectiveness of lithium in affective and schizo-affective psychoses.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 65-72.—Presents findings on the effectiveness of lithium sulfate in 100 patients who received the drug for more than 1 yr. Data were compared with those from 100 control patients not receiving lithium. Of the 100 patients treated with lithium, 50 were diagnosed as having manic-depressive psychoses, 49 as having schizophrenic affective disorders, and 1 as having periodic relapses of affective phases in an organic syndrome of the central nervous system (meningo-encephalitis). Lithium-treated patients exhibited significant reductions in the overall number of affective phases and in the number of days of illness compared with the controls. Treatment failures were most evident in cases of affective and schizoaffective psychoses, while successes were most evident in manic-depressive illnesses. Dosage considerations and the effects of lithium on psychopathological features and progression of the illness are discussed. (30 ref)—*L. Gorsev*.

3700. Spring, Gottfried K. (Case Western Reserve U) **Hazards of lithium prophylaxis.** *Diseases of the Nervous System*, 1974(Aug), Vol 35(8), 351-354.—Presents 2 cases, that of a 20- and a 45-yr-old woman, where severe intoxication with prophylactic lithium occurred, illustrating the potential hazards of using the drug indiscriminately. Symptoms, mechanisms, and successful medical management of lithium toxicity are also described. (16 ref)

3701. Swett, Chester. (Boston Collaborative Drug Surveillance Program, Waltham, MA) **Drowsiness due to chlorpromazine in relation to cigarette smoking: A report from the Boston Collaborative Drug Surveillance Program.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 211-213.—Compared the frequency of drowsiness attributed to orally administered chlorpromazine hydrochloride among 130 nonsmokers, 201 light smokers (20 cigarettes or less/day), and 72 heavy smokers (more than 20 cigarettes/day). All Ss were psychiatric patients (mean age = 36 yrs). Drowsiness occurred in 16, 11, and 3%, respectively. More rapid metabolism of chlorpromazine in cigarette smokers may explain these findings.—*Journal abstract*.

3702. Tansella, Michele; Zimmermann-Tansella, Christa & Lader, Malcolm. (Istituto di Clinica Psichiatrica di Verona, Italy) **The residual effects of N-desmethyldiazepam in patients.** *Psychopharmacologia*, 1974, Vol 38(1), 81-90.—Treated 60 10-63 yr old anxious-neurotic inpatients complaining of insomnia with 10 or 20 mg of N-desmethyldiazepam, 200 mg of amylobarbitone sodium, or placebo, given at night. The hypnotic effects of these treatments were assessed by self-rating, psychiatrists' ratings, and night nurses' observations after 1 night's treatment and after a week of treatment, and compared with pretreatment values. The residual effects of the treatments were estimated 12 hrs after ingestion using a series of cognitive and motor tasks. No significant differences between the treatments were found after 1 night. After the week of treatment, the benzodiazepine groups were achieving the best quality of self-rated sleep with fewest subjective feelings of hangover. Some improvement in performance was found over time for all groups. However, on 2 motor tests, the higher dose of N-desmethyldiazepam was associated with less improvement (i.e., some impairment relative to placebo was detected). (15 ref)—*Journal abstract*.

3703. Toomim, Marjorie K. **Separation counseling: A structured approach to marital crisis.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Describes the rationale and principles of separation counseling which attempts to use the separation crisis to maximize growth and self-understanding. Couples commit themselves to a 3-mo period during which they agree to certain rules which stress the values of choice, risk, and honesty. Emphasis is placed on both individuals' reaction to separation, their personality structures, and their evolving relationship.

3704. van Praag, H. M. (U Groningen, Netherlands) **Therapy-resistant depressions: Biochemical and pharmacological considerations.** *Psychotherapy & Psychosomatics*, 1974, Vol 23(1-6), 169-178.—Investigated whether a central monoamine (MA) deficiency occurs in depressive patients, and whether, if this disorder is present in only a proportion of the patients, this can explain the apparent selectivity of antidepressants in the sense that MA-deficient patients benefit particularly from this type of therapy. A review of the research shows that, in depressive patients the cerebral MA turnover can be diminished. These disorders do not occur in all patients but seem to be confined to certain categories of depression. Diminution or nondiminution of the central MA turnover is a (not the) factor which determines whether antidepressant medication will succeed or fail. (21 ref)—*Journal abstract*.

3705. Vista Hill Psychiatric Foundation. (San Diego, CA) **Darvon N: Its role in opiate addiction.** *Drug Abuse & Alcoholism Newsletter*, 1974(Mar), Vol 3(1), 4 p.—Describes the pharmacology of propoxyphene hydrochloride (Darvon) and propoxyphene napsylate (Darvon N) and the history and characteristics of their abuse. Detoxification of heroin addicts with Darvon N and its role as a maintenance agent are discussed, and side effects and special considerations in the administration



of these drugs to treat opiate-dependent persons are examined.

3706. Vore, David A. & Wright, Logan. (U Oklahoma, Health Sciences Ctr, Children's Memorial Hosp) **Psychological management of the family and the dying child.** In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Presents suggestions for clinicians for understanding and managing the stages of conceptualization of death and the needs expressed by both the dying child and his family. Examples of pathology which sometimes occur in families with dying children are presented, and various counseling techniques that can be used with both the children and their families are described.

3707. Wächter, H. M. & Leuner, H. (U Göttingen, Psychiatric Clinic, W Germany) [Short-term psychotherapy of a male drug user with the *Katathymen Bilderleben* (Unterstufe).] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Apr), Vol 23(3), 81-88.—Reports the case of an 18-yr-old male user of hallucinogenic drugs treated with 15 sessions of a guided affected imagery daydreaming technique. Improvement was shown on clinical test scales. A 6-mo follow-up showed abstinence, improved tolerance toward frustrations, and improved social adjustment. (16 ref)

3708. Wheatley, David. (General Practitioners Research Group, Twickenham, England) **Viloxazine: A new antidepressant.** *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 821-828.—Assessed 4 daily dose levels of viloxazine—120, 200, 240, and 300 mg—in 77 depressed patients treated for 4 wks. Similar results were recorded with all 4 dose schedules, there being no statistically significant differences on 3 measures (physicians rating scales, patient self-assessment, or global ratings) at any period of the trial. Findings are similar to those recorded with tricyclic antidepressants. An important advantage for viloxazine was apparent in the fact that there was only 1 case of drowsiness at 3 days only and only 3 cases of dry mouth. However, on the 2 higher doses, nausea occurred fairly frequently and necessitated omission of treatment in a number of cases. It is concluded that the optimum dose for treating ambulant patients at home is 200 mg daily.—*Journal abstract*.

3709. Wilmarth, Stephen S. & Goldstein, Avram. (Addiction Research Foundation, Palo Alto, CA) **Therapeutic effectiveness of methadone maintenance programs in management of drug dependence of morphine type in the USA.** Geneva, Switzerland: World Health Organization, 1974. 53 p.—Discusses the pharmacology of methadone and the rationale of methadone maintenance, government regulations over methadone maintenance, and 3 selected methadone programs—those in New York City, Chicago, and Santa Clara County, California. Outcome analyses of methadone use are detailed. (8 p ref)

3710. Wilson, Byron K.; Elms, Roslyn R. & Thomson, Captane P. (California Dept of Public Health, Mental Health Services Div, Woodland) **Low-dosage use of methadone in extended detoxification: An experimental comparison.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 233-236.—Studied 30 18-57 yr old heroin addicts to examine the effects of methadone hydrochloride

given in low dosages in extended narcotic detoxification. Treatment procedures were divided into 2 phases, extending over 90 days. Initial phase (7-10 days) included both hospital and outpatient supervision and was terminated when addicts were reduced to a 10-mg dose of methadone. The 2nd phase of treatment was conducted exclusively on an outpatient basis and double-blind techniques were employed. Results show that few patients became drug-free and most soon returned to heroin use. No significant differences were found between treatment modalities, and the data do not suggest that hospital treatment affected the results of a 90-day treatment program.—*Journal abstract*.

3711. Wittenberg, Diana. (Roosevelt Hosp, New York, NY) **Art therapy for adolescent drug abusers.** *American Journal of Art Therapy*, 1974(Jan), Vol 13(2), 141-149.—Discusses the art program in a residential drug treatment center in New York City, describing how it was integrated into the general therapy and overall programs at the center. The possibilities for further use of art in this kind of therapy are considered.

3712. Woodrow, Kenneth M. (VA Hosp, Palo Alto, CA) **Gilles de la Tourette's disease: A review.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 1000-1003.—Describes the characteristics and symptoms of Gilles de la Tourette's disease, and suggests that the disorder may be behaviorally related to schizophrenia and biochemically related to the amphetamine psychosis. The treatment of choice is haloperidol. (45 ref)

3713. Zakowska-Dabrowska, Teresa & Strzyzewski, Wlodzimierz. (Poznań Medical Academy, Psychiatric Clinic, Poland) [The action of Noveril on bioelectric brain activity.] (Poln) *Psychiatria Polska*, 1972(Sep), Vol 6(5), 523-528.—Studied 27 patients with diagnoses of endogenous depression who were treated with dibenzepin (Noveril). The EEG changes occurring in the course of treatment with this drug did not differ from those occurring during treatment with other thymoanaleptics (e.g., imipramine). These changes consisted chiefly of synchronization of alpha activity, intensification of morphological changes existing prior to treatment, occurrence of paroxysmal potentials, and slow activity. EEG changes indicating "sensitivity" of the bioelectric brain activity to the action of the drug seem to be a favorable prognostic sign during treatment with dibenzepin. (Russian summary) (16 ref)—*English summary*.

### Behavior & Group Therapy

3714. Allen, Jon G. (Northern Illinois U) **Implications of research in self-disclosure for group psychotherapy.** *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 306-321.—Reviews the literature on self-disclosure (SD) in group psychotherapy and emphasizes its importance in the therapeutic process. The paper-and-pencil measure of SD, developed by S. M. Jourard (1958), and its variants, are described. Patterns of SD vary as a function of individual, relationship, and situational factors. There is substantial regularity in what people are willing to disclose and the most probable recipients of disclosure. The SD process, methodological issues, and its implications for group psychotherapy are summarized. (50 ref)—*R. S. Albin*.

3715. **Berger, Lynne F. & Berger, Milton M.** A holistic group approach to psychogeriatric outpatients. *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 432-444.—Re-examines previous attempts at group psychotherapy with geriatric patients. The development of a new approach, in a group involving 8 outpatients, is described. The goals, selection criteria, procedures, and results of the program are detailed. (18 ref)

3716. **Braswell, Michael.** The problem inmate: An adjustment process. *Southern Journal of Educational Research*, 1974(Spring), Vol 8(4), 292-300.—Designed and implemented an adjustment process for unmanageable inmates in a maximum security prison. The process provides a behavioral program for "problem" inmates with special emphasis on behavior management training for correctional officers. Program results based on the 1st 8 wks of data collection indicate that the adjustment process is successful to a significant degree.—*Journal abstract*.

3717. **Brown, R. Michael & Brown, Norma L.** (U North Carolina, Chapel Hill) The increase and control of verbal signals in the bladder training of seventeen month old child: A case study. *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Apr), Vol 15(2), 105-109.—Attempted to increase systematically the frequency and accuracy of verbal signaling of urination in a 17-mo-old female child by means of operant procedures. Results show that when the reinforcing contingencies were present, signal frequency and accuracy increased above baseline level.

3718. **Brown, Ronald E.; Copeland, Rodney E. & Hall, R. Vance.** (U Kansas) School phobia: Effects of behavior modification treatment applied by an elementary school principal. *Child Study Journal*, 1974, Vol 4(3), 125-133.—Used systematic reinforcing and shaping procedures successfully to modify an 11-yr-old school-phobic boy's intense fear of the classroom. The procedure resulted in a significant improvement in the S's attendance record. The treatment conditions consisted of the S's earning tickets for himself and his mother to a professional football game, contingent upon his meeting the set criterion for daily attendance. The S was reinforced first for being in the library and hall or classroom then for being in the classroom only. A changing criterion design was used to demonstrate that the reinforcing and shaping procedures, applied by the principal, were responsible for the student's improvement in daily attendance.—*Journal abstract*.

3719. **Conrad, Rex D.; Delk, John L. & Williams, Cecil.** (U Arizona) Use of stimulus fading procedures in the treatment of situation specific mutism: A case study. *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 99-100.—An 11-yr-old American Indian child who had never spoken a word in a reservation classroom during the entire 5 yrs of her schooling was treated using stimulus fading procedures. Success of treatment was enhanced by reinforcing the desired verbal behavior in several situations which successively approximated the classroom setting, and by the use of an indigenous mental health worker who successfully served as a positive stimulus and reinforcer. A 1-yr follow-up showed that the girl continued to

respond verbally to her teacher in routine classroom interactions.—*Journal abstract*.

3720. **Cox, Murray.** (Broadmoor Hosp, Crowthorne, England) Group psychotherapy as a redefining process. *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 465-473.—Suggests that self-definition occurs within group situations and redefinition takes place either spontaneously or as part of psychotherapeutic strategy within a group context. The theory underlying this process is based on the sociological interactionist perspective. The concept of the value-free therapist is criticized, and it is stated that the relevant question to ask is what value system actually operates. Group therapy has advantages over individual therapy in terms of the shared here-and-now experience and also in terms of the social class distance between therapist and patient. It is suggested that the group is of particular value in treating people who are regarded as social outcasts.—*Journal summary*.

3721. **Cull, John G. & Hardy, Richard E.** (Eds.). (Virginia Commonwealth U, School of Community Services) Group work with distressed families. In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches*. Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Describes aspects of group marital counseling, including marital roles that may surface during counseling, relationships necessary for effective group interaction, ground rules for group marital sessions, time requirements, and types of sessions. The role of the group leader and problems which may be encountered in the course of the sessions are also examined.

3722. **Daniels, Lloyd K.** (Central Connecticut State Coll) Rapid extinction of nail biting by covert sensitization: A case study. *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 91-92.—Describes a case of chronic compulsive nail-biting in a 23-yr-old male undergraduate treated by covert sensitization. 2 1-hr treatment sessions resulted in complete cessation of the nail-biting.

3723. **Davidson, William S.** (U Illinois) Studies of aversive conditioning for alcoholics: A critical review of theory and research methodology. *Psychological Bulletin*, 1974(Sep), Vol 81(9), 571-581.—Reviews studies of the applications of aversive conditioning procedures to alcoholics. The review is divided into sections on electrical and chemical aversive stimulation and is organized according to the level of research design used. While many positive outcomes are reported, inconsistent theoretical underpinnings of the research are also reported. The lack of systematic investigation of relationships between therapist, patient, and technique characteristics indicate the need for further investigation. The ethics of using the techniques reviewed with human Ss are discussed. (62 ref)—*Journal abstract*.

3724. **Davis, Harry K. & Dorman, Kenneth R.** (U Texas, Medical Branch, Galveston) Group therapy versus ward rounds. *Diseases of the Nervous System*, 1974(Jul), Vol 35(7), 316-319.—Describes the effectiveness of an open-ended group therapy program for psychiatric inpatients compared to the traditional ward rounds by staff therapists. The therapy groups included both patients and staff psychiatrists and residents and



were based on supportive, semidirective principles to encourage open discussions of problems. The composition of the groups by diagnosis of personality problems is described for the initial 9-mo trial period. 7 advantages of the group therapy program are discussed, including the opportunities for the patients and professionals to have more exposure to each other and for observing potential problem behavior patterns. 4 disadvantages are identified, including a decrease in one-to-one contacts between patients and therapists. It is concluded that observations of small group processes among psychiatric patients are an effective addition to methods of assessing a patient's current mental status.—*L. Gorsey.*

3725. Denney, Douglas R. (U Kansas) **Active, passive, and vicarious desensitization.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 369-375.—Studied 2 variations of desensitization therapy for reducing test anxiety: active desensitization in which the client describes his visualizations of the scenes and vicarious desensitization in which the client merely observes the desensitization treatment of another test-anxious client. 48 undergraduates with high scores on the Test Anxiety Scale (I. G. Sarason, 1972) were assigned to 1 of 6 groups. Active, passive, active-vicarious, and passive-vicarious desensitization groups were compared with relaxation and untreated control groups. Ss were given a battery of pre- and posttreatment measures assessing intelligence and anxiety (e.g., the Fear Survey Schedule). For measures on which desensitization had a significant effect, no significant differences were discovered between either direct and vicarious or active and passive forms of desensitization. The relaxation treatment which emphasized application of one's relaxation skills was effective. (19 ref)—*Journal abstract.*

3726. Foster, Carol. (Camelot Behavioral Systems, Bureau of Child Research, Parsons, KS) **Developing self-control.** Kalamazoo, MI: Behaviordelia, 1974. vii, 135 p. \$4.25.—Presents a programed text on principles of self-reinforcement and behavior modification. Methods of changing, measuring, and maintaining behavior changes and designing self-control programs are described. (22 ref)

3727. Foster, S. E. (Mt Gravatt Teachers' Coll, Brisbane, Qld, Australia) **Use of behaviour modification techniques in behaviour training of severely and profoundly retarded children.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 24-37.—Discusses the techniques used by researchers to modify behavior problems of the severely and profoundly retarded. Unfortunately, it is punishment which seems to have had some measure of success when severe self-injurious behavior has been involved. Mild and moderate punishment has been found ineffectual if there were no alternate responses which would produce reinforcement. Severe punishment suppressed a response totally and for a long time, inhibited other responses, and increased frequency of response if it produced reinforcement. Aggressive behavior, including self-inflicted wounds, is dealt with by technological innovations, environmental alterations, and other means. Training methods sometimes used are said to be either too lenient or too cruel, but no one workable system has yet been established.—*C. L. Nicholson.*

3728. Galassi, John P.; Galassi, Merna D. & Litz, M. Carol. (U North Carolina, School of Education, Chapel Hill) **Assertive training in groups using video feedback.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 390-394.—Investigated the effectiveness of group assertive training with 16 male and 16 female college students who were nonassertive (as measured by the College Self-Expression Scale, Galassi et al, 1974). Ss were assigned randomly to 2 experimental and 2 control groups. Experimental Ss received 8 training sessions consisting of videotape modeling; behavior rehearsal; video, peer, and trainer feedback; bibliography; homework assignments; trainer exhortation; and peer-group support. All Ss were posttaped enacting role-playing situations. Significant differences were found between experimental and control Ss on the College Self-Expression Scale, the Subjective Unit of Disturbance Scale, eye contact, length of scene, and assertive content, but not on response latency. Significant pretest effects were evident for several of the behavioral dependent variables. (15 ref)—*Journal abstract.*

3729. Gold, Vivian J. (Mt Zion Hosp, Crisis Clinic, San Francisco, CA) **Dreams in group therapy: A review of the literature.** *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 394-407.—Reviews the 1950-1972 literature on dreams in group therapy and discusses the possibilities raised by such studies. Various clinical approaches to dreams brought up in group therapy suggest ways to help patients become aware of unconscious aspects of themselves. Theoretical questions have been raised regarding the occurrence of a "group dream" distinguishable from other dreams. Some dreams brought into group therapy may help to elucidate covert, affective group processes involving the entire group. The study of dream content in relation to a therapy group is one approach to studying the relationship between dreams and waking life. The basis for bonds within the group may also be studied through the group dream. It is hoped that other studies will be carried on dealing with the interplay between the group setting and the dreams of its members. (45 ref)—*I. Davis.*

3730. Gottwald, P. et al. [Behavioral therapeutic experiments to improve speech construction and social behavior in a schizophrenic child: Limits of the effects of reinforcement and generalization of punishment effect.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 1(2), 1-26.—Studied the case history of a 12-yr-old girl with early childhood schizophrenia to obtain data concerning the improvement of abstract speech by behavior conditioning and modification; the effects of punishment on psychotic behavior, and generalization possibilities; the build-up of social behavior and the importance of a number of "free" variables such as emotional reactions, eye contact, etc. For 9 mo 4 behavioral therapists recorded abnormal and modified behavior during sessions of speech training, social behavior training, and combined training. During a short period of the verbal training, psychotic behavior was punished by one of the therapists. Results are discussed in detail. Food reinforcement was valuable for improving behavior. Punishment proved effective in suppressing psychotic behavior, with a limited generalization of punishment effects. Language training was effective with

pronouns but not with prepositions. Improvements during training sessions did not generalize to daily behavior on the psychiatric ward. It is concluded that social training rather than speech training should be the therapeutic goal and that the use of punishment is questionable. (English summary) (15 ref)—*T. Fisher.*

3731. **Graessner, Dietrich & Bastine, Reiner.** (U Hamburg, Psychological Inst, W Germany) [Experience with group training and systematic desensitization in the treatment of smokers: A critical report.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 1(2), 64-74.—Studied modification of smoking habits in 24 male students with an average daily consumption of 15-30 cigarettes, all eager to cooperate and reduce their consumption rate. Ss were divided into 2 groups of 12, one treated by negative group practice and the other by systematic desensitization. 5 Ss of the 1st group and 7 of the 2nd completed the experiment. In Group 1, 1 wk of negative practice with minimal therapeutic contact reduced consumption by about 80%, and 6 wks after completing the treatment the reduction was 50%. In Group 2, 7 wks of desensitization therapy with intensive therapeutic contacts reduced consumption by about 50%, and 5 wks later the reduction was still about 50%. Results are analyzed and the merits of the 2 systems are compared. (English summary) (16 ref)—*T. Fisher.*

3732. **Hardy, Richard E. & Cull, John G. (Eds.).** (Virginia Commonwealth U) *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches.* Springfield, IL: Charles C Thomas, 1974. xv, 240 p.

3733. **Himle, David P. & Shorkey, Clayton.** (U Michigan) *The systematic desensitization of a car phobia and the recall of a related memory.* *Journal of Biological Psychology*, 1973(Dec), Vol 15(2), 4-7.—Presents the case study of a 35-yr-old severe car phobic. The phobia was successfully treated with the use of systematic desensitization procedures incorporating methohexital as a relaxing agent. In vivo techniques were used to assess the results of treatment and to enhance transfer to treatment to the natural environment. A simulation of the phobic situation was used in place of the traditional desensitization hierarchy. Clinical implications of the case are discussed.—*Journal abstract.*

3734. **Hutzell, Robert R.; Platzek, Denna & Logue, Patrick E.** (Florida State U, Human Development Clinic) *Control of symptoms of Gilles de la Tourette's syndrome by self-monitoring.* *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 71-76.—Treated an 11-yr-old male, diagnosed as having Gilles de la Tourette's syndrome, by self-monitoring therapy. A 5-step procedure of successively refined control was employed. Symptom emissions were decreased both in the therapeutic setting and in the natural environment. Control was demonstrated through employment of a multiple-baseline design. Follow-up sessions conducted 1.5 and 12 mo after the termination of therapy indicated that the symptom behavior rate remained lowered in the therapeutic setting. Reports from the S's parents and teachers indicated that the symptom behavior rate had decreased to zero in the natural environment.—*Journal abstract.*

3735. **Ingram, Gilbert L.** (Federal Correctional Inst, Tallahassee, FL) *Families in crisis.* In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches.* Springfield, IL: Charles C Thomas, 1974. xv, 240 p.—Briefly reviews historical trends in the behavior of families and methodological issues in studies of the relationship between delinquency and family structure and atmosphere. Parental contributions to delinquency are discussed, and suggestions for working with hostile or inadequate families or those with an already incarcerated delinquent are presented. (3½ p ref)

3736. **Inutsuka, T. & Mike, D.** (Hizen National Mental Hosp, Kyushu, Japan) [The application of behavior therapy to chronic schizophrenics: I.] (Japn) *Kyushu Neuro-psychiatry*, 1971(Dec), Vol 17(3-4), 137-145.—Reports the results of operant conditioning and aversive therapy applied to severely regressed female chronic schizophrenic patients. 7 patients treated by operant conditioning showed distinct improvement in a relatively short time, while 2 patients treated by aversive therapy did not. Operant conditioning was effective not only in modifying unwanted behavior but also in helping Ss acquire new adaptive behavior, expand life space, increase interpersonal contacts, and diminish and extinguish abnormal experiences. It also permits the nursing staff to easily maintain a systematic and consistent approach to the patients, which can itself achieve effective results. (English summary) (23 ref)—*S. Ashida.*

3737. **Johnson, James H. & Thompson, Daniel J.** (U Texas, Medical Branch, Div of Child Psychiatry, Galveston) *Modeling in the treatment of enuresis: A case study.* *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 93-94.—Reports the successful treatment of enuresis in a 5-yr-old boy in which filial modeling procedures, accidentally introduced by the mother and later included as part of the treatment program, are thought to have played a major role.

3738. **Kahn, Aman U.; Staerk, M. & Bonk, C.** (Northwestern U, Medical School) *Role of counter-conditioning in the treatment of asthma.* *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 89-92.—Assessed the effectiveness of "conditioned bronchodilation" as a treatment for asthmatic attacks. 20 asthmatic children 8-16 yrs old were given a counterconditioning treatment which involved the instigation of bronchial constriction followed by training in bronchial dilation through biofeedback reinforcement. Results indicate that the improvement in the experimental group as a whole was significantly greater than in the control group. Instrumental learning appears to be related to the conditioning of certain emotional reactions (e.g., fear of separation or feeling of rejection). (18 ref)—*W. G. Shipman.*

3739. **Kaplan, Helen S. et al.** (Cornell U, Medical Coll, New York) *Group treatment of premature ejaculation.* *Archives of Sexual Behavior*, 1974(Sep), Vol 3(5), 443-452.—Treated 4 heterosexual couples, in which premature ejaculation by the male was the chief sexual complaint, in a group setting. Therapy was based on the idea that the premature ejaculator does not perceive sensations premonitory to orgasm and therefore does not



learn control of the ejaculatory reflex. 2 couples were successfully treated in 6 45-min group sessions, and 2 gained successful ejaculatory continence 2 mo later. At 4 mo followup, all 4 couples reported continued and improved sexual functioning. Therapist time average was 1.5 hrs for each couple.—*Journal abstract.*

3740. Kaplan, Seymour R. (Albert Einstein Coll of Medicine, Yeshiva U) **The "group dream."** *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 421-431.—Describes the characteristics of some dreams reported by patients in group therapy. Two dreams and the group processes they represent are discussed. (22 ref)

3741. Kaufman, Gershen & Krupka, Judy. (Michigan State U, Counseling Ctr) **Integrating one's sexuality: Crisis and change.** *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 445-464.—Describes a sexual therapy group program at the counseling center of a state university, aimed at the treatment of youthful individuals experiencing sexual dysfunction and conflict. Included are the methods of screening and selecting group members, an analysis of the dropouts, the rules for the groups, moral and ethical issues and the goals of therapy, characteristics of the groups, the value of male-female therapist teams, and an assessment of the changes attributable to the program. The interpersonal processes which produce sexual dysfunction are discussed: deprivation, permission and guilt, power struggles, hostility, expectations, and adequacy and potency.—R. S. Albin.

3742. Kennedy, Thomas D. & Kimura, Harry K. (Arizona State U, Ctr of Criminal Justice) **Transfer, behavioral improvement, and anxiety reduction in systematic desensitization.** *Journal of Consulting & Clinical Psychology*, 1974(Oct), Vol 42(5), 720-728.—Studied the degree of transfer and fear change associated with 4 levels of desensitization, pseudodesensitization, and no treatment in 74 female snakephobic undergraduates. Only Ss desensitized to 75% or more of the hierarchy demonstrated reliably greater reductions in avoidance behavior than controls. However, Ss completing 50% or less of the hierarchy showed smaller transfer decrements than those who finished the hierarchy. Results also suggest that repeated exposure tends to improve transfer efficiency. On the posttest, desensitization Ss reported significantly less anxiety than no-treatment controls when repeating their highest pretreatment responses, but were no different from either control group when performing new approach responses, suggesting that behavioral improvement is not dependent upon the elimination or inhibition of conditioned emotional arousal. (23 ref)—*Journal abstract.*

3743. Kessler, Sheila. (Georgia State U, Counseling Ctr) **Treatment of overweight.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 395-398.—18 motivated 19-41 yr old participants who responded to an advertisement concerning the formation of a weight reduction group were divided randomly into 3 groups: (a) a control group; (b) Treatment 1, involving the application of learning theory plus group therapy; and (c) Treatment 2, involving the same principles as Treatment 1 plus mutual help principles. Both treatment groups lost significantly more weight over a 7-wk period than did the control

group, but little difference existed between the 2 treatment groups.—*Journal abstract.*

3744. Kilmann, Peter R. (U South Carolina) **Direct and nondirect marathon group therapy and internal-external control.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 380-384.—Investigated whether direct and nondirect therapist techniques within a 23-hr marathon format would differentially induce client shifts in locus of control (as measured by Rotter's Locus of Control Scale). Ss were 84 female narcotic addicts. The no-treatment control group experienced a significant shift toward externality, while the marathon Ss did not fluctuate significantly from pre- to posttherapy. No significant difference in shift was found between the direct and nondirect treatment conditions. A significant Periods  $\times$  Locus of Control  $\times$  Treatment Conditions interaction showed that internal Ss in the direct and control conditions shifted significantly toward externality. Future studies need to investigate whether a posttherapy shift in locus of control is associated with changes on other personality measures. (17 ref)—*Journal abstract.*

3745. Krishna, Ajay; Singh, S. B. & Srivastav, J. R. (GSVM Medical Coll, Kanpur, India) **Behaviour disorders in children: Causes and cure: A Horney theory approach.** *Child Psychiatry Quarterly*, 1974(Apr), Vol 7(2), 1-10.—Treated 50 2-4 yr old children in a child guidance clinic in India. Organic basis was ruled out for each disturbance and operant levels were measured at the start of treatment. 2 sorts of problems were encountered: external stress manifestations (e.g., tantrums and stealing) and internal manifestations (e.g., stammering and vomiting). Techniques used included withdrawal of reinforcing factors, relaxation, aversion, modeling, reward, conditioning, and desensitization. In the 1st group of problems, the cure rate was 100%, while in Group 2 it was 88%. (22 ref)—R. S. Albin.

3746. Lambley, Peter. (U Cape Town, S Africa) **Treatment of transvestism and subsequent coital problems.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 101-102.—Established successful heterosexual behavior in a 26-yr-old male transvestite by means of rewards for heterosexual imagery and planned heterosexual encounters. Subsequently, erectile failure was eliminated by use of a series of graded in vivo exposures, and orgasmic failure by orgasmic reconditioning.

3747. Lambley, Peter. (U Cape Town, South Africa) **Differential effects of psychotherapy and behavioural techniques in a case of acute obsessive compulsive disorder.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 181-183.—Evaluated the effects of various behavioral methods and psychotherapy in the treatment of a female undergraduate. Results suggest that covert reinforcement may have some advantages over other techniques in the acute phase of an obsessive-compulsive disorder, since it allows the patient to develop self-control over the impulses that create the acute condition.

3748. Lewis, Phillip & McCants, Jane. (U Georgia) **Some current issues in group psychotherapy research.** *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 268-278.—Outlines the crucial issues and a tentative framework for future research in group psychotherapy, which is not merely a more complex version

of individual psychotherapy. One important task of the researcher is to specify and manipulate important variables unique to the group situation. The problem of evaluating, in the group psychotherapy setting, the influence of broad variables derived from the literature on group dynamics is discussed in detail. Relevant variables and research approaches are described. A model of group psychotherapy as interpersonal learning is provided. (29 ref)—*R. S. Albin.*

3749. Litrownik, Alan J. (San Diego State U) **A method for home training an incontinent child.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 77-80.—Describes a home training method for incontinent children utilizing a signal apparatus. Effective toilet training was accomplished through simple conditioning procedures using an auditory signal apparatus in a profoundly retarded 7-yr-old male for whom traditional training methods had failed. These procedures involved pairings of first the buzzer and running to the bathroom, and then bladder distension and the buzzer. After a number of such pairings the child began to indicate when his bladder was distended. This served as a cue for the parents to prompt the appropriate toileting response. Independent toileting behavior was effected within a 7-wk period and maintained over a 5-mo follow-up with generalization to new situations.—*Journal abstract.*

3750. Lovaas, O. Ivar & Bucher, Bradley D. (Eds.). (U California, Los Angeles) **Perspectives in behavior modification with deviant children.** Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 562 p.

3751. Lovaas, O. Ivar; Schaeffer, Benson & Simmons, James Q. (U California, Los Angeles) **Building social behavior in autistic children by use of electric shock.** In O. I. Lovaas & B. D. Bucher (Eds), *Perspectives in behavior modification with deviant children.* Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 562 p.—Describes 3 experimental investigations carried out on 2 5-yr-old identical twins diagnosed as childhood schizophrenics with pronounced autistic features. The studies show that electric shock modified their reluctance to approach adults and eliminated pathological behaviors such as self-stimulation and tantrums. Social behavior and affection toward adults increased after the adults had been associated with shock reduction.

3752. Lubin, Bernard & Lubin, Alice W. (U Missouri, Medical School, Kansas City) **The group psychotherapy literature: 1972.** *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 474-513.—Summarizes the 1972 group therapy literature under the following headings: (a) group psychotherapy (past, present and future; problems and techniques; training, cotherapy and supervision; psychoanalytic group psychotherapy; and transactional analysis; psychodrama, sociodrama and role-playing; Gestalt training and therapy; group treatments derived from learning theory; and group counseling, group discussion, and group work); (b) client populations (inpatients; outpatients; community groups and self-help groups; family therapy; marital therapy and couples therapy; children; adolescents; addictive behavior; mentally retarded; crime and delinquency; special problems; racial and ethnic issues; and leaderless groups); (c) intensive small group experiences; and (d)

research (group psychotherapy; transactional analysis; and intensive small group experiences). (500 ref)—*Journal abstract.*

3753. Marvit, Robert C.; Lind, Judy & McLaughlin, Dennis G. (Hawaii State Dept of Health, Mental Health Div, Honolulu) **Use of videotape to induce attitude change in delinquent adolescents.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 996-999.—Use of videotape techniques in the treatment of antisocial attitudes in 44 Hawaiian adolescents was most effective in allowing increased reality testing coincident with reduced use of denial. This effect was enhanced with support provided through the peer-group process.

3754. Mash, Eric J. (U Calgary, Alberta, Canada) **Has behaviour modification lost its identity?** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 271-280.—Considers the current identity of behavior modification from a recent historical perspective. An examination is made of the identity changes occurring during the evolution of behavior modification, from academic operant psychology to a treatment approach concerned with socially important behaviors. It is pointed out that changes taking place over this time period have resulted in a lack of clarity concerning what behavior modification is, and that several possible resolutions for this lack of clarity could occur. Recommendations are made for an identity characterized by the application of experimental analysis to treatment endeavors based upon a wide range of theoretical constructs, rather than treatment based solely upon a conditioning model. (French abstract) (15 ref)—*Journal abstract.*

3755. McLachlan, John F. (Donwood Inst, Toronto, Ontario, Canada) **Therapy strategies, personality orientation and recovery from alcoholism.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 25-30.—74 male and 20 female alcoholic inpatients received 26 hrs of group therapy for 3 wks in a group conducted by 1 of 5 therapists. Patients and therapists were assigned conceptual level ratings based on responses to D. E. Hunt's paragraph-completion test. 12-16 mo after treatment, staff members rated the patients on changes in drinking behavior. It was expected that patients with low conceptual levels would need a more directive therapist and that those of high conceptual level would need a more nondirective therapist. Patients whose conceptual level matched that of their therapist had better outcome (70% recovered) than those who were mismatched (50% recovered). Aftercare matching was also related to recovery: matched patients (high conceptual levels with out-of-town care and low levels with in-town care) showed a 71% recovery rate, while mismatched patients showed a 49% recovery rate.—*F. Auld.*

3756. Miller, Peter M.; Hersen, Michel & Eisler, Richard M. (VA Ctr, Jackson, MS) **Relative effectiveness of instructions, agreements, and reinforcement in behavioral contracts with alcoholics.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 548-553.—Evaluated the effects of the components of behavioral contracting on drinking in 40 chronic alcoholics. Ss were divided into 4 groups matched on age, education, length of problem drinking, and initial operant drinking responses. They were then exposed to 1 of the following conditions: (a) verbal instructions to limit alcohol



consumption, (b) signed written agreement to limit consumption, (c) verbal instructions plus reinforcement for compliance, and (d) signed agreement plus reinforcement. Pre- and postoperant analog drinking sessions, in which leverpressing was reinforced with alcohol on a fixed ratio reinforcement schedule, served to assess effects of the experimental conditions. Results indicate that while instructions and signed agreements had limited influence on drinking, both groups receiving reinforcement for compliance significantly decreased their operant drinking.—*Journal abstract.*

3757. Moxnes, Paul. (U Oslo, Norway) **Verbal communication level and anxiety in psychotherapeutic groups.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 399-403.—Hypothesized a linear relationship in psychotherapeutic groups between verbal behavior (defined as the level of communication) and experienced anxiety. However, trained judges' ratings of 6 2-hr tape-recorded group sessions revealed a curvilinear relationship between these 2 variables. The maximum level of anxiety occurred on the border of communication of private and unknown-self material. When communication increased above these levels, the anxiety tended to decrease. This is explained in terms of S. Epstein's 1967 finding that bodily arousal and experienced anxiety increase progressively to a certain stimulus intensity level. Then, with still increasing stimulus intensity, the bodily arousal and physiological anxiety will continue to increase while the experienced anxiety will tend to decrease because of the intervention of certain inhibitory mechanisms. (17 ref)—*Journal abstract.*

3758. Norton, Robert; Feldman, Charles & Tafoya, Dennis. (U Michigan) **Risk parameters across types of secrets.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 450-454.—Developed a content analysis system to examine the frequency of themes for 359 written secrets obtained anonymously from 359 undergraduates in an encounter group exercise. Sex-related secrets occurred most often, followed by failure-related secrets. A stratified, random sample of 49 secrets was drawn. 190 other undergraduates then rated the levels of risk associated with various secrets. Secrets ranged from the risky, "I have had incestuous relations with a member of my family," to the nonrisky, "I smoke dope." Secrets relating to sex, mental health, and violence or destruction were perceived as the most risky statements.—*Journal abstract.*

3759. Orwin, Arnold. (Hollymoor Clinic, Regional Behaviour Research Unit, Birmingham, England) **Treatment of a situational phobia: A case for running.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 95-98.—Describes the treatment of specific situational phobia (of high-level lavatory cisterns) in a 24-yr-old woman by using the autonomic excitation caused by vigorous muscular anxiety as an inhibitor of the situational anxiety. The near-lifelong phobia was removed in 5 short sessions with little psychiatric involvement.

3760. Peshkin, M. M. & Abramson, H. A. **Psychosomatic group therapy with parents of children with intractable asthma: IV. The Saul family.** *Journal of Asthma Research*, 1974(Mar), Vol 11(3), 127-138.—Includes excerpts from transcribed discussions during therapy with the parents of an asthmatic boy, demon-

strating the interaction between therapists and family members and describing the emotional climate in the home which might have led to the intractability of the asthmatic syndrome.

3761. Pipineli-Potamianou, A. **Listening to the family interplay: A parent-child interview.** *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 338-345.—Presents and analyzes an interview with a father, a mother, and their 5-yr-old son. The boy's problems are discussed. The mother's hysterical structure and her rejection of the child are considered in relation to the father's ambivalence toward his son. The role of the therapist, a third party intervening in this situation, is described. Emphasis is placed on the need to understand the demands of all those involved in the therapy situation.—*R. S. Albin.*

3762. Rasbury, Wiley C. (U Florida, Shands Teaching Hosp) **Behavioral treatment of selective mutism: A case report.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 103-104.—Describes an in vivo desensitization program designed to reinstate normal verbal communication in an 11-yr-old girl who was selectively mute for approximately 6 yrs. Contrary to traditional desensitization therapy, the procedure was conducted within the context of the patient's everyday environment, and used the emotional effects of positive reinforcement as the postulated reciprocal inhibitor of fear.

3763. Redmond, Daniel P.; Gaylor, Michael S.; McDonald, Robert H. & Shapiro, Alvin P. (U Pittsburgh, Medical School, Div of Hypertension & Clinical Pharmacology) **Blood pressure and heart-rate response to verbal instruction and relaxation in hypertension.** *Psychosomatic Medicine*, 1974(Jul), Vol 36(4), 285-297.—Instructed 6 hypertensive patients to alternately raise (up) and lower (down) their blood pressure by concentrating on changing heart rate, force of contraction, and blood vessel resistance to flow. Paired 10-min periods were separated by the E's entry and exit. 5 Ss were taught progressive muscular relaxation (PMR), and the immediate cardiovascular response was studied in both the presence and absence of the E. Systolic and diastolic blood pressure (BP) and heart rate (HR) were measured every 30 sec in all sessions. Direction of changes in BP and HR for up and down periods was appropriate and significant in both instruction sessions, and BP differences frequently reached significant levels of magnitude. PMR uniformly lowered BP and HR, but was of significant magnitude only when induction of PMR involved active participation by the E. Interviews revealed considerable dramatic mental imagery associated with directional shifts in BP. Results indicate that directional instruction may result in appropriate changes in BP and HR of a magnitude comparable to those reported in studies using external biofeedback. PMR did not alter the response. This study supports other data indicating that "placebo" effects may operate in conditioning studies. (33 ref)—*Journal abstract.*

3764. Richardson, Frank C. & Suinn, Richard M. (U Texas, Austin) **Effects of two short-term desensitization methods in the treatment of test anxiety.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 457-458.—2 short-term desensitization methods, accelerated massed

desensitization and anxiety management training, were compared with standard systematic desensitization in terms of reducing self-reported test anxiety in 44 high test-anxious undergraduates. Posttreatment scores on the Suinn Test Anxiety Behavior Scale indicate that all 3 treatment procedures significantly reduced test anxiety as compared with a waiting-list control group. However, self-reported anxiety following treatment for the anxiety management training group was higher than for the standard desensitization and accelerated massed desensitization groups, and the standard desensitization procedure was significantly more effective than anxiety management training. Anxiety management training, a general or nonspecific program for anxiety control, reduced test anxiety with just 1 hr of direct training in counteracting anxiety. It did not, however, reduce other salient fears as measured by scores on a fear survey schedule.—*Journal abstract.*

3765. Ritchie, Agnes M. & Serrano, Alberto C. (Community Guidance Ctr, San Antonio, TX) *Family therapy in the treatment of adolescents with divorced parents.* In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches.* Springfield, IL: Charles C Thomas, 1974, xv, 240 p.—Describes the use of multiple impact therapy (MIT) for emotionally disturbed adolescents of divorced parents. MIT requires at least 2 therapists and includes both individual and family sessions aimed at recognizing and assessing family roles, patterns of communication, and interactions. 4 patterns of family functioning are described, and several case examples are presented.

3766. Robinson, Luther D. & Weathers, Olethia D. (St Elizabeths Hosp, Washington, DC) *Family therapy of deaf parents and hearing children: A new dimension in psychotherapeutic intervention.* *American Annals of the Deaf*, 1974(Jun), Vol 119(3), 325-330.—Describes a 6-mo joint therapeutic effort by a psychiatrist and a psychiatric social worker with a family in which both parents were deaf and mute. The family was referred for treatment by a pediatrician when the 10-yr-old middle child of 3 developed bizarre eating habits followed by life-threatening weight loss. The therapists used a combination of manual language (sign language and finger spelling) and the spoken word as the medium of communication. The treatment goals were accomplished. The ability of mental health professionals to intervene in cases where special communication skills are necessary is discussed.—*C. K. Miller.*

3767. Rosenberg, Jerome. (New Coll, U Alabama) *Counseling the parent of the chronic delinquent.* In R. E. Hardy & J. G. Cull (Eds), *Therapeutic needs of the family: Problems, descriptions and therapeutic approaches.* Springfield, IL: Charles C Thomas, 1974, xv, 240 p.—Examines the concept of chronic delinquency and procedures for assessing the role of the parent in a particular family situation. 3 models of intervention are described: (a) a support model in which the therapist helps the parents adjust to the particular problems presented by their child, (b) a change intervention model in which the parents learn to alter significantly their relationship with the child, and (c) a dual intervention model in which the parents learn basic skills to work more effectively with their child. (2 p ref)

3768. Ross, Joel A. (Hofstra U) *The use of contingency contracting in controlling adult nailbiting.* *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 105-106.—A 33-yr-old woman agreed to contribute money to a strongly disliked organization for failure to increase fingernail length. Nail-biting was discontinued for the duration of the contingency contract and a follow-up 3 and 6 mo later indicated that the increase in nail length was maintained.

3769. Ross, Steven M. (VA Hosp, Drug Dependence Treatment Ctr, Salt Lake City, UT) *Behavioral group therapy with alcohol abusers.* In J. G. Cull & R. E. Hardy (Eds), *Alcohol abuse and rehabilitation approaches.* Springfield, IL: Charles C Thomas, 1974, xxi, 203 p. \$12.75.—Offers behavioral therapy as a method of treating alcoholism. Pre-group preparations and group meetings are structured so that they can be used regardless of individual theoretical orientations. Techniques and definitions of relevant behavioral terms are also included. (15 ref)

3770. Scher, Maryonda. (U Washington, Medical School) *Observations in an aftercare group.* *International Journal of Group Psychotherapy*, 1973(Jul), Vol 23(3), 322-337.—Describes the processes and functioning of an open-ended aftercare group in which therapists worked with patients discharged from a psychiatric hospital. The group purposes were (a) to assist patients in their return to the community, (b) to train psychiatric residents in small-group therapy, (c) to demonstrate small-group therapy to appropriate students, and (d) to study small-group processes and gather pertinent research data. Over a 10-yr period the group held 557 sessions with a total of 230 patients; individual sessions had 6-12 members. Patients' reasons for attendance and absence, patient turnover, therapist changes, and duration of participation are discussed.—*R. S. Albin.*

3771. Schulman, Michael. (Fordham U, Lincoln Ctr Campus) *Control of tics by maternal reinforcement.* *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 95-96. Reports the case of a 14-yr-old boy whose multiple tics appeared to be maintained by his mother's response to them. Social contingency therapy directed at removing the mother's attention led to the tics being successfully eliminated in about 3 mo. In 2 subsequent months the tics had to some extent returned, in association with renewed attention to them by the mother.—*Journal abstract.*

3772. Schulte, Dietmar. (U Munster, Psychological Inst, Div of Clinical Psychology, W Germany) [Behavioral therapy and phobic anxiety: Development of therapy methods.] (Germ) *Zeitschrift für Klinische Psychologie*, 1972, Vol 1(1), 64-78. Discusses behavioral literature, theory, research, and therapy concerning phobic anxiety. The approach to phobic anxiety as a form of respondent behavior, the lack of extinction due to operant escape and avoidance behavior, and the method of systematic dissolution of the stimulus-response (S-R) connection in order to attain desensitization are described briefly. The frequent failure of the desensitization process (in about 40% of patients) is blamed on the circumstance that phobic anxiety is also maintained by positive social reinforcers. Therapy, in order to be successful, must combine extinction of the S-



R connection through systematic desensitization with an operant extinction therapy. (English summary) (36 ref) —T. Fisher.

3773. Shaw, David W. & Thoresen, Carl E. (Ohio State U) **Effects of modeling and desensitization in reducing dentist phobia.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 415-420.—Notes that although many persons avoid dentists and dental work, counseling techniques that eliminate dental avoidance behavior and reduce stress have not yet been systematically examined. The present study explored the effects of systematic desensitization and social-modeling treatments with placebo and assessment control groups. Each of the 4 groups contained 9 dental-phobic adults (mean age = 30 yrs). A behavioral measure as well as several attitude and fear arousal scales (e.g., the Fear Survey Schedule) were used as dependent variables. Modeling was more effective than desensitization as shown by the number of Ss who went to a dentist, and modeling and desensitization were more effective in reducing arousal and improving attitudes than placebo and assessment groups. The importance of demonstrating behaviors coupled with covert practice, or self-modeling, is discussed. (24 ref) —*Journal abstract.*

3774. Shorkey, Clayton & Himle, David P. (U Texas, Austin) **Systematic desensitization treatment of a recurring nightmare and related insomnia.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 97-98.—Treated a case of a recurring nightmare and related insomnia in a 38-yr-old male chronic paranoid schizophrenic by systematic desensitization, using methohexital (Brevital) as the relaxing agent. A portion of the nightmare was treated as a simple phobia. The nightmare and insomnia disappeared after 11 treatment sessions. 4 weekly interviews following the termination of treatment and subsequent 6-mo and 2-yr assessment interviews revealed no evidence of the recurrence of the nightmare or insomnia.—*Journal abstract.*

3775. Sperling, Eckhard. (U Göttingen, Psychiatric Clinic, Div of Psycho- and Sociotherapy, W Germany) **[Family therapy methods: Meaning, hopes and problems.]** (Germ) *Praxis der Psychotherapie*, 1973(Apr), Vol 18(2), 82-89.—Reviews the 9 family therapy methods of N. Ackerman.

3776. Stahl, J. R.; Thomson, Laurence E.; Leitenberg, Harold & Hasazi, Joseph E. (U Vermont) **Establishment of praise as a conditioned reinforcer in socially unresponsive psychiatric patients.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 488-496.—Studied the establishment of social praise as a reinforcer for clinically relevant behaviors in 3 socially unresponsive Ss: a 46-yr-old male catatonic schizophrenic, a 17-yr-old male obsessive-compulsive neurotic, and a male catatonic schizophrenic hospitalized for 19 yrs. A within-S multiple baseline design was employed. During an initial baseline period, praise was not effective in modifying the behavior of any S. The contiguous association of social praise with token reinforcement served to enhance the reinforcing properties of praise, establishing praise as an effective modifier of the target behaviors. (18 ref) —*Journal abstract.*

3777. Thomson, Nancy; Fraser, Douglas & McDougall, Alexander. (Kings Coll, Aberdeen, Scotland) **The reinstatement of speech in near-mute chronic schizophrenics by instructions, imitative prompts and reinforcement.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 83-89.—Studied the effectiveness of instruction supplemented by imitative prompts with speech-contingent reinforcement in the reinstatement of speech in 2 very withdrawn chronic schizophrenics. The 2 patients, aged 60 and 61 yrs, were drawn from a pool of chronic schizophrenics described as mute by ward staff. Ss were informed what response was required, and imitative prompts were supplied where necessary. Reinforcement was contingent upon adequate speech. Reinstatement of speech was rapid and effective. Reinforcement, while effective in reinstating speech, was not necessary for its maintenance.—*Journal abstract.*

3778. Turnage, John R. & Logan, Daniel L. (North Texas State U) **Treatment of a hypodermic needle phobia by in vivo systematic desensitization.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 67-69.—Describes the successful treatment of a hypodermic needle phobia in a 27-yr-old female in 10 sessions, using in vivo systematic desensitization. It is suggested that this treatment is well-suited to the alleviation of pain when the experience of pain is compounded by fear and anxiety.

3779. Welgan, Peter R. (Orange County Dept of Mental Health, Newport Beach, CA) **Learned control of gastric acid secretions in ulcer patients.** *Psychosomatic Medicine*, 1974(Sep-Oct), Vol 36(5), 411-419.—Conducted 2 experiments to train increases in the pH of gastric acid secretions in peptic ulcer patients. In Exp I, in the presence of pH feedback, 10 Ss showed significant increases in pH of gastric acid secretions, while acid concentration and volume of secretions significantly declined. When feedback was subsequently withheld, no significant changes appeared in these measures. A 2nd study then tested if initial changes following the basal period were experimental effects. In Exp II 10 Ss were divided into 2 groups—1 group received no feedback after a basal condition, while a 2nd group received feedback after the basal condition. Results show that significant increases in pH and decreases in acid concentration and volume occurred only after the onset of pH feedback. Results suggest that gastric acid secretions may be altered and controlled with the appropriate feedback. (23 ref)—*Journal abstract.*

3780. Westlake, Robert J.; Levitz, Leonard S. & Stunkard, Albert J. (Butler Hosp, Outpatient Div, Providence RI) **A day hospital program for treating obesity.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 609-611.—Describes a day hospital program used to treat obese patients which includes actual meal preparation and group behavior therapy. Average weight loss was 14 lbs at the end of 10 wks. A 6-mo follow-up showed that patients either continued to lose or maintained their weight loss.

3781. Whitman, Roy M. (U Cincinnati, Medical School) **Dreams about the group: An approach to the problem of group psychology.** *International Journal of Group Psychotherapy*, 1973(Oct), Vol 23(4), 408-420.—Presents examples of 6 dreams of patients, 5 of whom

were in individual therapy and simultaneously exposed to a group situation of an emotionally involving nature. The 1st 2 dreams dealt with the group's unique affect-mobilizing ability by its own valence. The middle 2 dealt with the group as it activated memories of the family of origin and current participation. The last 2 dealt with the earliest developmental sequence, the relationship with the mother on both narcissistic and object-love levels. Each of these dreams offered primary-process glimpses into the individual's empathic perception of the group and added to the knowledge of that individual, and often of the group to which he was responding. (22 ref)  
—*Journal summary.*

3782. Wickramasekera, Ian. (U Illinois, Coll of Medicine, Peoria) **Heart rate feedback and the management of cardiac neurosis.** *Journal of Abnormal Psychology*, 1974(Oct), Vol 83(5), 578-580.—Describes the treatment of a 55-yr-old male with chronic cardiac neurosis who had failed to respond to several prior medical and psychological interventions. Significant and durable symptomatic response appeared to be correlated with the application of a combination of procedures including heart-rate feedback, patient-administered desensitization, and therapist-administered flooding.—*Journal abstract.*

3783. Wickramasekera, Ian. (U Illinois, Medical School) **Hypnosis and broad-spectrum behavior therapy for blepharospasm: A case study.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 201-209.—Describes the apparently successful treatment of a 45-yr-old white female with blepharospasm (severe eye-blink tic) which had not responded to the analytic psychotherapy previously attempted. The dynamics and etiology of the symptoms seemed clear to the previous therapist, present therapist, and the patient. Combining hypnosis and behavior therapy in a manner calculated to strengthen the ego appears to have been the critical therapeutic intervention. (German summary)—*Journal abstract.*

3784. Wiltz, N. A. & Gordon, S. B. (U Washington, Clinical Training Unit) **Parental modification of a child's behavior in an experimental residence.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 107-109.—Used an apartment-like setting with observational facilities to train the parents of a 9-yr-old hyperactive, aggressive boy in the application of behavioral principles. The entire family lived in this setting for 5 consecutive days, receiving training by instructional materials, prompting, modeling, and feedback. They then returned home and maintained contact by telephone. There were significant reductions in the child's rate of noncompliance and in destructive acts towards people and property.—*Journal abstract.*

3785. Wodarski, John S.; Feldman, Ronald A. & Flax, Norman. (Jewish Community Ctr Assn, Group Integration & Behavioral Change Project, St Louis, MO) **Social learning theory and group work practice with antisocial children.** *Clinical Social Work Journal*, 1973(Sum), Vol 1(2), 78-93.—Presents a theoretical framework for behavior modification principles and delineates the ways in which these principles can be useful for establishing relationships within groups of antisocial children. Positive reinforcement, time-out procedures, shaping, and

stimulus generalization are discussed. Emphasis is placed on the therapist's structuring group contingencies, rather than individual contingencies within the group.—S. R. Stein.

3786. Wooden, Howard E. (Katherine Hamilton Mental Health Ctr, Terre Haute, IN) **The use of negative practice to eliminate nocturnal headbanging.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Jul), Vol 5(1), 81-82.—Used negative practice to eliminate long-standing head-banging during sleep in a 26-yr-old male, a behavior which seemed to increase during periods of stress and anxiety. Results support the idea that a crucial variable in negative practice is the aversive property of the discomfort associated with having carried out the head-banging behavior in excess. The generalization of the effects of negative practice from waking to sleeping is discussed.—*Journal abstract.*

3787. Yulis, Sergio et al. [Systematic desensitization in phobic patients: An evaluation.] (Span) *Acta Psiquiátrica y Psicología de América Latina*, 1974(Feb), Vol 20(1), 46-50.—Used objective measures and subjective reports of the therapeutic change to evaluate the therapist's role in systematic desensitization (SD) outcome. 60 spider-phobic Ss were exposed to (a) SD administered by a permanent therapist, (b) SD with a different therapist at each therapeutic session, (c) tape-recorded SD, or (d) no treatment (control group). The objective measures did not show statistically significant differences among the 3 experimental groups, but all 3 evidenced a significant therapeutic gain compared to the control group.—*English summary.*

### Psychoanalysis

3788. Giovacchini, Peter L. **Character disorders: Form and structure.** *International Journal of Psychoanalysis*, 1973, Vol 54(2), 153-160.—Describes 2 aspects of patients with characterological disorders: (a) the patient's primitive preverbal fixations which allow the therapist to contribute to the patient's psychopathology as he attempts to conceptualize psychic mechanisms and ego defects in secondary process terms, and (b) the specific type of ego defect encountered in such patients which leads to a need for reassurance that they are capable of being helped, although they prove to themselves the hopelessness of such a pursuit. Such patients are not easily understood and the problems arising from misinterpretation are discussed.—*Journal summary.*

3789. Kestenberg, Judith S. **Psychoanalytic contributions to the problem of children of survivors from Nazi persecution.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 311-325.—Mailed questionnaires to child psychoanalysts in Europe, Israel, the US, and Canada to obtain data on their experiences in treating the children of survivors of Nazi persecution. The study attempted to determine whether there is a specificity in the mental organization of these children, whether the experiences of survivor-parents are transmitted to subsequent generations, and whether this transmission effects structural changes either as special areas of ego strength or ego split which enrich or burden the psychic organization of the offspring. It was found that only a small number of



survivors' children had been psychoanalyzed, perhaps reflecting the resistance of the psychoanalyst, combined with that of survivors and their children, to probe into the tragic experiences in depth. There was a consensus of opinion that survivor-parents can generate strength of the ego or damage to the children's ego, but that many more analyses need to be reported before any generalizations can be made about specificity in mental organization of survivors' children. (26 ref)—*Journal abstract*.

3790. Marcus, Robert L. **Historical perspectives on the development of psychoanalytic psychotherapy.** *Israel Annals of Psychiatry & Related Disciplines*, 1972(Dec), Vol 10(4), 289-304.—Discusses Freud's delineation of the limitations of formal psychoanalysis, which can provide guidelines for the technique of psychoanalytic psychotherapy. It is argued that formal psychoanalytic techniques of free association, interpretation, and the avoidance of guidance are usually inappropriate for psychotherapy. Psychoanalytic psychotherapy should be considered basically as a conversational technique. Explanation is a more accurate description of the therapist's intervention than interpretation. Counseling and advice that give proper consideration to the patient's strengths and weaknesses are frequently indicated and are far preferable to manipulative techniques which employ ostensibly nondirective interpretations. However, the most crucial therapeutic activity encompasses the many-faceted effort to achieve an optimal working relationship. The relationship is the main instrument for mastering the emotional disabilities that interfere with psychological and behavioral functioning.—*Journal abstract*.

3791. Myerson, Paul G. **The establishment and disruption of the psychoanalytic *modus vivendi*.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 133-142.—Discusses the process set up by a patient in psychoanalysis whereby the patient maintains a view of the analyst as a helpful figure but resists becoming more involved in the ways that the analyst considers helpful for the analytic process. The question is raised of how analysts can best present themselves as helpful and be actually helpful when it is necessary to disrupt a *modus vivendi* which has evolved out of the patient's complex reactions. Case material is provided to illustrate fundamentals of these concepts.—*R. S. Albin*.

3792. Nishizono, Masahisa. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[Modern psychiatry and patient care: IX. Psychoanalysis.]** (Jpn) *Kyushu Neuro-psychiatry*, 1971(Dec), Vol 17(3-4), 152-160.—To emphasize the importance of psychoanalysis in the field of psychiatry, a brief history and some practical applications of psychoanalytic theory are presented. Psychoanalysis has value not only as a theory but also in its applications to the understanding of man and the symbolic meanings of human behavior, literature, and other arts.

3793. Olinick, Stanley L.; Poland, Warren S.; Grigg, Kenneth A. & Granatir, William L. **The psychoanalytic work ego: Process and interpretation.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 143-151.—Describes the work ego as the temporarily built-up "person" who functions under the circumstances and for the period of his work. The primary data of the work ego

are the processes of the analyst as they parallel those of the patient. The work ego operates autonomously and exercises diatrophic functions. Within the therapeutic alliance it regresses with and observes both the patient and itself, thus enabling the paralleling of processes. The work ego responds to its own regression as a signal, and is motivated by empathic regression in the service of the other. A unitary model of the intrapsychic and interpersonal processes involved in certain functions of the work ego is presented. (19 ref)—*R. S. Albin*.

3794. Silber, Austin. (State U New York, Downstate Medical Ctr, Div of Psychoanalytic Education, Brooklyn) **Secondary revision, secondary elaboration and ego synthesis.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 161-168.—Discusses the secondary revision of the dream and its relation to the specific functions of the ego that can be isolated and highlighted in the exposition and analysis of a dream. Instances in which secondary revision of a dream occur are cited with particular reference to Freud's work. Case material is provided to illustrate relevant procedures of dream interpretation, and the therapeutic alliance, the working alliance, and the transference relationship are discussed. It is concluded that ego synthesis is an extremely complex process, operative in a host of structures within the system ego. (19 ref)—*R. S. Albin*.

3795. Stierlin, Helm. (NIMH Adult Psychiatry Branch, Bethesda, MD) **Interpersonal aspects of internalizations.** *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 203-213.—Discusses the relationship between interpersonal processes and internalizations, focusing on the dimensions of the exclusivity of dependence, interpersonal intensity, and the status of boundaries. It is necessary to determine whether these mechanisms serve the patient's defensive or growth needs. The concept of different transactional modes—"binding," "expelling," and "delegating"—is introduced to illustrate these interpersonal dimensions and how they can differentially affect evolving internalizations. The problems of adolescent separation particularly demonstrate how internalizations may serve the needs of defense, growth, or both. (53 ref)—*Journal summary*.

#### Counseling & Community Mental Health & Crisis Intervention

3796. Adis Castro, Gonzalo. (Inst of Psychological Investigations, Faculty of Sciences & Letters, San José, Costa Rica) **[Community psychology and psychiatry.]** (Span) *Acta Psiquiátrica y Psicología de América Latina*, 1974(Feb), Vol 20(1), 23-31.—Discusses the new community orientation of psychiatry, which emphasizes both primary and secondary prevention. The 1st implies an effort to reduce the probability that a case of mental illness will occur, while the 2nd tries to reduce the already existing cases of mental illness, emphasizing early detection and treatment as close to the home and community of the individual as possible. The emphasis of community psychology is on primary prevention, while that of community mental health is on secondary prevention.—*English summary*.

3797. Ahmed, M. Basheeruddin & Stein, David D. (Sound View—Throgs Neck Community Mental Health Ctr, Bronx, NY) **Children's mental health services: A**

**case study of a successful grant proposal.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 591-595.—Describes the methods used by a mental health center's staff and members of its community advisory boards to develop a grant application for children's psychiatric services. The process involved community assessment of needs, the reconciliation of conflicting priorities among funding agencies, and delineation of the specific services to be developed. The important role played by the community advisory board members is emphasized.—*Journal abstract*.

3798. Barnabei, Fred; Cormier, William H. & Nye, L. Sherilyn. (John Carroll U, Counseling Ctr) **Determining the effects of three counselor verbal responses on client verbal behavior.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 355-359.—Determined the effects of 4 counselor stimulus conditions on 3 measures of client verbal behavior, using 20 female college sophomore clients. The counselor stimulus conditions were reflection of feeling, probe, confrontation, and unspecified responses. The 3 dependent variables were client affect words, self-referent pronouns, and present verb tense. 20 subjects were assigned randomly to 1 of 4 trained Es (2 male and 2 female counselors) for a 42-min session. The 1st 2 min were a preliminary orientation period. The remaining 40 min were divided into 4 10-min counselor stimulus conditions. The sequence of stimulus conditions was randomized for each session. A  $2 \times 2$  factorial analysis with repeated measures on the 2nd factor indicated no significant differences for each dependent variable. The implications for indiscriminate use of these 4 counselor stimulus conditions are discussed with respect to counselor training and research. (24 ref)—*Journal abstract*.

3799. Beigel, Alan et al. (Southern Arizona Mental Health Ctr, Tucson) **Planning for the development of comprehensive community alcoholism services: I. The prevalence survey.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1112-1116.—Points out the need for adequate prevalence data in the planning of comprehensive community alcoholism programs and that such planning must be based on the needs of the specific community. Data from a survey of 5,160 problem drinkers is presented in terms of socioeconomic status, race, age, and other prevalence variables. A method of obtaining useful prevalence data in a brief period of time and at a modest cost is presented, with examples of how these data can be used in planning a rational program for a specific community.—*Journal abstract*.

3800. Beigel, Allan et al. (Southern Arizona Mental Health Ctr, Tucson) **Planning for the development of comprehensive community alcoholism services: II. Assessing community awareness and attitudes.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1116-1121.—Considers that in the development of an effective community education and treatment program for alcoholism the following dimensions need to be assessed: (a) attitudes toward alcohol use and abuse, (b) drinking habits, (c) awareness of available services and facilities for the alcoholic, (d) extent of personal drinking problems, and (e) comparative perceptions of alcohol abuse in different ethnic groups. The procedure to make

these assessments is described, and examples of how the data gathered can be used in planning of comprehensive community alcoholism services are presented. Data from a survey of persons in one county in Arizona are presented to show community perceptions of alcoholism and sources of help for drinking problems.—*Journal abstract*.

3801. Bender, M. P. **The role of a community psychologist.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 211-218.—Defines the 4 functions of the community psychologist (CP) as assessment, therapy, research, and policy, and discusses the principles that should determine priorities among these areas and guide operations. It is suggested that the assessment function should not include routine intelligence testing; when assessment by the CP is necessary, it should be understood to involve the client's family. Therapy (except behavior modification) can be performed as well by the psychiatric social worker as by the CP. The conduct of research is an important function, and the CP should also be involved in formal policy planning, especially in instigating change at field level and in developing plans for needed further research and surveys. Some overlapping between the roles of the CP and the psychiatric social worker is unavoidable, but both should have a place in the structure of community health services.—*R. S. Albin*.

3802. Bermudes, Robert W. (Irondequoit United Church of Christ, Rochester, NY) **A ministry to the repeatedly grief-stricken.** *Journal of Pastoral Care*, 1973(Dec), Vol 27(4), 218-228.—Results of a questionnaire administered to 101 wives of submariners associated with civilian churches and Navy Protestant and Roman Catholic chapels showed evidence of stages of the normal grief response observable in individuals who are grieving the death of a loved one. The questionnaire, composed of 94 true-false, multiple choice, and sentence completion questions, measured psychological and physiological responses before, during, and after separation resulting from submariners' life-style. A ministry was designed using small groups, changes in worship, and opportunities for work, to meet the particular needs of the repeatedly grief-stricken family. This grief reaction, while similar in form to that of the loss of a loved one by death, is usually not as intense nor lasts as long.—*B. Smith*.

3803. Cheng, Alexander Hsin-Hsiung. (National Taiwan U, Taipei, Republic of China) **Rapport in initial counseling interview and its impact on effectiveness.** *Acta Psychologica Taiwanica*, 1973, Vol 15, 31-40.—Investigated the variables underlying the establishment of rapport between a counselor and a client and attempted to determine the correlation between rapport and counseling effectiveness. Ss were 6 counselors from a university counseling center and their 16 videotaped cases. Judges rated the cases on Correll's Rapport Rating Scale (RRS) and Hurst et al's Counseling Service Assessment Blanket. Findings suggest that (a) describable variables contributed to the quality of counseling rapport according to the RRS and (b) there was a significant relationship between counseling rapport and the resolution of interpersonal and environmental problems in counseling effectiveness.—*Journal abstract*.



3804. Clark, Stewart C. & Rootman, Irving. (U Calgary, Faculty of Medicine, Alberta, Canada) **Street level drug crisis intervention.** *Drug Forum*, 1974(Spr), Vol 3(3), 239-247.—Describes the Calgary Drug Information Center, a youth-oriented clinic that deals with drug related crises. The Center has approximately 80 nonprofessional volunteers and 7 paid staff members and may prove a useful model upon which to base other youth-oriented drug crisis intervention facilities.

3805. Comstock, Lloyd K. & Slome, Cecil. (U North Carolina, Chapel Hill) **A health survey of students: I. Prevalence of perceived problems.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 150-155.—Describes the physical and mental health problems reported by 1,260 university undergraduates and graduates in response to a self-administered questionnaire. Aims of the survey were to help plan health services needed in a student community and seek possible solutions to health problems. (16 ref)

3806. Comstock, Lloyd K. & Slome, Cecil. (U North Carolina, Chapel Hill) **A health survey of students: II. Satisfaction, attitudes, and knowledge.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 156-159.—Reports the general attitude toward the university's health services among 1,260 students as "neutral satisfaction." Specific aspects of the services, however, suggested possible improvements. Student knowledge of available services was deficient. Student participation in policy making and administration is strongly recommended.—R. S. Albin.

3807. d'Augelli, Anthony R. et al. (Pennsylvania State U, Div of Individual & Family Studies) **Interpersonal skill training for dating couples: An evaluation of an educational mental health service.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 385-389.—In a previous study by S. Schlein (1971) of a preventative mental health program which stressed relationship improvement by maximizing empathy and self-disclosure, the efficacy of the program in improving communication and the general quality of the relationship between 48 college dating couples was demonstrated. The present reanalysis of Schlein's data shows that the experimental group, compared to the control group, also improved significantly on 2 key behavior rating scales by R. R. Carkhuff which are widely used to assess the efficacy of general helping relationship skills. As a result of less than 20 hrs of training, participants moved from providing levels of skills typical of college students to levels provided by typical counselors. The Empathy scale was highly correlated with 2 other Carkhuff scales, Respect and Immediacy. The trained Ss also showed a significantly greater increase in self-disclosure. (28 ref)—*Journal abstract*.

3808. D'Augelli, Anthony R. (Pennsylvania State U, Div of Individual & Family Studies) **Nonverbal behavior of helpers in initial helping interactions.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 360-363.—Although helper nonverbal behavior presumably is important for effective helping, few studies have examined its importance for clients in actual helping interactions. In the present study with 168 undergraduates, several nonverbal behaviors of helpers in a small group were tallied and related to independent judgments of the

helper made by observers and the person being helped. Trained observers' ratings of overall effectiveness were related to frequency of smiling and nodding. Ratings made by other group members also showed significant relationships to the nonverbal behaviors. Helpee-related understanding and warmth correlated with frequency of helper nodding. The low but significant correlations suggest that nonverbal behaviors are but one set of cues that lead to clients' first impressions of their helpers.—*Journal abstract*.

3809. Darley, Philip J. (Fishponds Health Ctr, Britsol, England) **Who shall hold the conch? Some thoughts on community control of mental health programs.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 185-191.—The author's experiences at an English day center for recovered psychotics suggests a need for mental patients to be given considerable control over their own program or else succumb to the Queequeg syndrome. This results from patients accepting and adapting to unrealistic roles that a prejudiced society has thrust upon them. It appears that the syndrome applies equally to other disadvantaged groups, notably to the poor. An appropriate form of treatment will be to give consumers a large measure of control over mental health programs.—*Journal abstract*.

3810. Denner, Bruce. (Illinois Mental Health Inst, Chicago) **Returning madness to an accepting community.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 163-172.—The varieties of care for the chronically mentally ill reflect to a greater or lesser extent 3 distinct orientations: to seclude and punish, to treat and rehabilitate, and to provide refuge and retreat. Unfortunately contemporary small intensive treatment hospitals and rehabilitation-oriented halfway houses tend to revert back to traditional seclusion and punishment techniques out of a sense of professional responsibility. A more radical alternative, the cooperative commune (e.g., R. D. Laing's Kingsley Hall) avoids seclusion and punishment and provides refuge and treatment, but because of its permissive and elitist attitudes is unlikely to win public support. Given this dilemma, the developing of nonprofessional neighborhood groups that have no vested interest in controlling the mentally ill but that are naturally accepting and therapeutic is recommended. To illustrate this approach, a history of a volunteer community group is related. (19 ref)—*Journal abstract*.

3811. Dressler, David M. & Nash, Kermit B. (New Britain General Hosp, CT) **Project team organization and its application to crisis intervention.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 156-162.—Describes a team approach to the treatment of clients in a state of crisis. The team consists of mental health specialists selected on the basis of expertise in performing tasks required by a particular client. The team leader is designated based on skill in establishing effective client rapport. The leader manages the team activities, expanding or contracting the team membership according to the needs of the client. The leader represents the team in its interface with the sponsoring service and is accountable to the service for completion of task assignments. The team model is applicable to various health care systems and provides a mechanism for the training of mental health professionals.—*Journal abstract*.

3812. **Ewalt, Patricia L.** (Greater Framingham Mental Health Assn, Youth Guidance Ctr, MA) **Use of child guidance services: Some indicators of changing patterns.** *Massachusetts Journal of Mental Health*, 1974(Spring), Vol 4(3), 13-26.—Studied family behavior patterns in a child guidance clinic where half of all families terminate before evaluation is completed and treatment undertaken. Continuance was found to be related to the following situations: (a) when the child was younger than 12; (b) when the mother's education went beyond high school; (c) when the parents were worried about the child's behavior rather than about how the authorities viewed it; (d) when stubbornness was a problem; and (e) when parent(s) asked for help in learning to manage the problem, rather than asking the clinic to do something directly to the child. It is suggested that intervention, not in-depth diagnosis, should be stressed from the outset. —A. Krichev.

3813. **Fiester, Alan R.; Mahrer, Alvin R.; Giambra, Leonard M. & Ormiston, D. W.** (U Illinois, Medical Ctr, Neuropsychiatric Inst, Chicago) **Shaping a clinic population: The dropout problem reconsidered.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 173-179.—Compared dropout and nondropout community outpatients on a number of demographic variables (e.g., age, sex, religion, diagnosis, and source of referral). Ss were 618 adult and child patients who had been seen at a state-supported mental health outpatient center during 1967-1968. A cross-validation sample consisted of 513 Ss seen during 1968-1969. "Dropout" was operationalized in terms of both session-number cutoff and failure to appear for scheduled appointment(s). With the exception that early dropouts had less previous therapy than later dropout or nondropout patients, no important group differences occurred. Findings suggest that outpatient clinics "shape" patients into 2 groups: those who make repeated use of a variety of mental health services, and those who quickly turn away from these services and are unlikely to reapply at a later date. (23 ref)—*Journal abstract*.

3814. **Frankel, Fred H.** (Beth Israel Hosp, Boston, MA) **The use of hypnosis in crisis intervention.** *International Journal of Clinical & Experimental Hypnosis*, 1974(Jul), Vol 22(3), 188-200.—Presents 3 case summaries (of a 31- and a 36-yr-old woman and a 28-yr-old man) in which the clinical symptoms are reminiscent of features of trance. The dramatic quality of the clinical pictures led to crises which required rapid and effective intervention. The spontaneous development of hysterical psychoses and states of somnambulism in persons with marked hypnotic susceptibility suggests that less flamboyant clinical symptoms might be produced spontaneously by smaller degrees of hypnotic susceptibility. The trance-like clinical manifestations are discussed as maladaptive defenses against anxiety. The role of hypnosis in the treatment plan is considered. (German, French & Spanish summaries)—*Journal abstract*.

3815. **Goldberg, Alan D.** (Syracuse U) **Conceptual system as a predisposition toward therapeutic communication.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 364-368.—Investigated the relationship between conceptual level and counselor trainee behavior in a counseling analog. Comparison of the verbal responses

of 86 graduate student counselors, using the 6 categories of E. Amidon's counselor interaction analysis and Griffin's Counselor Verbal Response Scale, indicated differences in the response patterns of students as a function of their conceptual level. It is concluded that conceptual level may be an important variable for counselor selection and program development. (16 ref)—*Journal abstract*.

3816. **Goodman, Marvin.** (Board of Education for the Borough of North York, Downsview, Ontario, Canada) **Day treatment: Innovation reconsidered.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 93-97.—Describes the development of a day care program for disturbed children within a child guidance clinic. Problems in making policy, carrying out day-to-day operations, giving in-service training, and evaluating results are reported. (French summary)

3817. **Halpern, Esther.** (Tel-Aviv U, Israel) **Volunteering in times of community crisis: An integration within Caplan's theory of support systems.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 242-250.—Uses community work done during a period of national crisis, the October 1973 War in Israel, as a basis for discussing some assumptions about the mental implications of volunteering. Within G. Caplan's theory of support systems (1974), volunteering is considered a phenomenon that can be "mimicked," as avenues for mental health intervention are sought for populations hit by a disaster. The issue of how to best utilize the services of volunteers is raised, as the phenomenon appears to proceed through different phases. Following Caplan's distinction between 2 types of informal care-givers, the "generalist," and the "specialist," it is suggested that volunteers be used differently at specific phases of crises, in order to provide mental health benefits for both helpers and those being helped. (French abstract) (15 ref)—*Journal abstract*.

3818. **Heard, D. H.** (Tavistock Inst of Human Relations, Unit for the Study of Psycho-Social Transitions, London, England) **Crisis intervention guided by attachment concepts: A case study.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Apr), Vol 15(2), 111-122.—Uses a case study of a suicide attempt by a young adolescent boy to illustrate how attachment concepts, expressed through the metaphor of personal assumptive worlds, may be used to guide intervention in crisis situations in child and adolescent psychiatry. (31 ref)

3819. **Heilbrun, Alfred B.** (Emory U) **Interviewer style, client satisfaction, and premature termination following the initial counseling contact.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 346-350.—57 female and 38 male clients at a university counseling center were interviewed by 1 of 4 interviewers (3 male and 1 female) to test 2 alternative explanations for early defection of female counseling clients. One explanation proposes that the dependent, self-disclosing female is frustrated by nondirective, initial interviews which fail to provide the structure she needs to formulate her problems. Dissatisfaction leads her to leave counseling. The 2nd alternative is that nondirective, initial interviews are satisfying because they provide the dependent, self-disclosing female with the opportunity for cathartic relief. She subsequently terminates because she feels



better. Likelihood to defect was measured by Adjective Check List scores prior to the interview, and evaluations of interviewer directiveness and interview satisfaction were obtained from clients immediately following the initial interview. Greater satisfaction with nondirective interviewing by females more likely to defect was found, which favored the catharsis alternative.—*Journal abstract*.

3820. Heinemann, Shirley H.; Perlmutter, Felice & Yudin, Lee W. (West Philadelphia Community Mental Health Consortium, PA) **The community mental health center and community awareness.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 221-227.—Surveyed 108 residents living within half a mile of local satellites of a community mental health center. Findings reveal that only 15% were aware of the existence of the parent agency, with no differences among local centers. Residents' awareness of the satellite centers and their services ranged from 18 to 62% with an overall mean of 32%. Questions are raised concerning relevant differences contributing to the residents' differential awareness of the centers, and suggestions are offered for raising the level of awareness via outreach techniques, especially with respect to emergency interventions.—*Journal abstract*.

3821. Herman, Melvin & Freeman, Lucy. **The pursuit of mental health: For the individual, the community, and the nation.** New York, NY: Macmillan, 1974. 142 p. \$6.95.—Investigates the services available for the treatment of psychiatric disturbances. Mental illness in general, out-patient therapies, and treatments available in both public and private mental hospitals are discussed. Among the topics treated are the varying needs for hospitalization or out-patient therapy, the length of hospital stay, and hospital programs for the alcoholic and drug addict.

3822. Holland, Winford E. & Huntoon, Harrison H. (U Houston) **The evaluation of experimental social service delivery systems at the community level: An organizational effectiveness view.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 41-51.—Discusses issues relevant to the evaluation of experimental or pilot programs at the community level. A concept of organizational effectiveness is detailed in terms of an environmental impact model, and the role of the evaluation function is presented in terms of information production. The evaluation coalition is portrayed as a major factor in the political environment for evaluation. 3 alternative organizational configurations are described and evaluated. Generalized steps for the design and implementation of the evaluation subsystem are presented.—*Journal abstract*.

3823. Hornstra, Robijn K. & Udell, Bess. (U Missouri, Medical School, Kansas City) **A measure of delivery patterns in psychiatric care.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 84-88.—Illustrates the practicality of using the ratio of a 1-yr applicant count over a 1-day caseload count to evaluate service delivery patterns. The measure is used to compare the ratios of various facilities and of major diagnostic groups, and as an index of change of delivery patterns.

3824. Jolliff, James W. **Community service by eclectic private psychiatry.** *American Journal of*

*Psychiatry*, 1974(Sep), Vol 131(9), 976-980.—Presents a subjective and statistical study of the nature and contribution of the author's private psychiatric practice before and after the establishment of a community mental health and mental retardation center in his community. He defends the practical values of patient triage, limited therapeutic goals, and eclecticism in private practice.

3825. Kidori, Irwin W. & Thomas, Lisa A. (Cumberland County Guidance Ctr, Millville, NJ) **Happiness is being known.** *Journal of the Medical Society of New Jersey*, 1974(Aug), Vol 71(8), 591-594.—Mailed questionnaires to 580 randomly selected county residents in an attempt to determine how well the services of the county community mental health center were known by residents; 102 questionnaires were returned. It was found that 83% of the respondents claimed some knowledge of the center. Income level and location of residence within the sample did not significantly affect level of awareness, although demographic data were important. The clergy were named most frequently as a source of emotional help, and newspaper advertising appeared to have been effective in increasing knowledge of one service. Results are compared with other studies, and differences are discussed.—*Journal abstract*.

3826. MacDonald, K. R.; Hedberg, A. G. & Campbell, L. M. (Sioux Falls Mental Health Ctr, New Ulm, MN) **A behavioral revolution in community mental health.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 228-235.—Considers that there are many professionals who are predicting the eventual demise of community mental health because of a failure to develop a relevant conceptual model for community intervention. It is argued that behavior theory offers the potential for conceptualizing the individual's interaction with his environment. Further, the behaviorally oriented mental health worker has several choices of intervention available to him, including the roles of consultant-therapist, consultant-educator, or consultant-systems engineer. These models or choices are described and recommendations for the enhancement of community mental health service delivery are presented.—*Journal abstract*.

3827. McKelvie, William H. (Bowie State Coll) **An evaluation of a model to train high school students as leaders of Adlerian guidance groups.** *Individual Psychologist*, 1974(May), Vol 11(1), 7-14.—Formed 3 groups of 11th graders—counselor helper (CH), active control (AC), and inactive control (IC)—to determine if they could (a) be trained to lead Adlerian-oriented guidance groups for junior high students in which the 11th graders would be able to accurately assess behavioral patterns of their group members and (b) make the group discussions enjoyable for group members. A comparison group of students in an elementary counseling practicum was also used. At the end of 10 training sessions, CH and AC Ss conducted 3 group discussions each with groups of 5 junior high students. Results suggest that high school students are capable of learning and utilizing the Adlerian model of leading small group discussions. It is also suggested that the skills utilized in counseling situations may be both learned and utilized without requiring students to complete lengthy training periods.

A comparison of CH- and AC-led groups indicates that while initial sessions of both groups began enthusiastically, AC leaders immediately began to flounder and the attendance of their groups dropped during the next 2 sessions. In similar situations, CH leaders employed various techniques to keep the interest of their group members. (33 ref)—*M. E. Pounsel.*

3828. McWilliams, Spencer A. & Morris, Larry A. (U Arizona) **Community attitudes about mental health services.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 236-242.—Assessed community attitudes toward a new mental health center by calling 110 randomly selected residences. Drugs and alcohol were seen as the community's most pressing social problem. Respondents were favorable to mental health centers and public funding and had accurate information about many aspects of mental health problems, although misinformation about types of services, professional staffing, and length of treatment was present. The favorable community attitude is seen as providing a base for increased public education in areas of misinformation and more consultation and preventive programs in areas of community concern.—*Journal abstract.*

3829. Mendonca, Marcus & Mariz, Paulo. (Hospital Psiquiátrico de Tamarineira, Recife, Brazil) [The current trend and status of the state mental care in Pernambuco, Brazil.] (Port) *Neurobiologia*, 1974(Jan), Vol 37(1), 51-70.—Considers the quality of the assistance offered mental patients and the type of preventive measures employed and suggests a philosophical and political scheme of mental health care based on functional and financial goals for the years 1972-1975. (20 ref)

3830. Meyers, William R.; Dorwart, Robert A.; Hutcheson, Bellenden R. & Decker, Douglas. (U Cincinnati) **Organizational and attitudinal correlates of citizen board accomplishment in mental health and retardation.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 192-197.—A previous report by W. R. Meyers et al (see PA, Vol 49:9694) described the methodology used in identifying 4 types or strategies of accomplishment among the 37 Massachusetts Mental Health and Retardation Area boards: service creation, mobilization of outside resources, local autonomy, and coordination. Further research reported here indicates that organizational and administrative characteristics of the boards (e.g., affiliation with private mental health associations or the presence of a permanent office for the board's use) were related to the type of accomplishment strategy pursued by a board. In addition, the attitudes, beliefs, and length of membership of citizen board members, as gathered from a mail questionnaire, were also related to the strategy of board accomplishment.—*Journal abstract.*

3831. Minde, Klaus K.; Benierakis, Costas E.; Sykes, Elizabeth & Anderson, R. A. (McGill U, Montreal, Quebec, Canada) **The response of school children in an upper-middle-class area to intensive psychiatric counseling of their teachers: A controlled evaluation.** *Journal of Special Education*, 1972(Fal), Vol 6(3), 267-277.—Rated the classroom behavior of 20 normal and 40 disturbed 3rd-6th graders in an upper-middle-class school, using a frequency-counting technique. Following an initial observation period, 20 of the disturbed Ss were given an intensive period of treatment. All Ss were reevaluated at

the end of treatment and 3 and 12 mo later. The method of measurements discriminated well between the normal and treated disturbed Ss in all but 1 category of behavior. The untreated disturbed Ss varied in their psychopathology from the treated group, showing more neurotic symptoms, while the symptoms of the treated Ss included more disruptive behavior. During treatment, the selected group improved significantly on 3 out of 9 behaviors, which, however, accounted for more than 77% of all observed behavior time, but did not maintain their improvement following termination of teacher counseling. Findings are discussed in terms of the children's psychopathology, duration of treatment, and involvement of the total family. (19 ref)—*Journal abstract.*

3832. Nelson, Bardin H. & Pecarchik, J. Robert. (Mon Valley Community Health Ctr, Experimental Health Services Delivery System Project, Monessen, PA) **A computerized program audit for community mental health clinics.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 102-110.—Describes a computer prototype system developed on a demonstration basis for a mental health-mental retardation clinic. The objectives of the system were to (a) simplify the data collection, storage, and reporting tasks in order to free staff for service delivery duties; and (b) provide the clinic with the means for conducting accurate and meaningful evaluations of its operation and service delivery. The economic advantages of such a system for smaller community mental health clinics are noted.—*Journal abstract.*

3833. Nuehring, Elaine M.; Fein, Sara B. & Tyler, Mary. (Florida State U) **The gay college student: Perspectives for mental health professionals.** *Counseling Psychologist*, 1974, Vol 4(4), 64-72. Proposes that the "illness" model is not appropriate for dealing with gay clients. Their primary problem is like that of any other minority—discrimination. Homosexuality is discussed from the viewpoint of the gay liberation movement. Definitions of homosexual words and phrases are given. Data regarding homosexual identity, the gay couple, the gay friendship group, and the gay contraculture are analyzed. It is concluded that the homosexual's relations with a hostile cultural environment should be emphasized rather than his personal pathology. (31 ref)—*H. Silverman.*

3834. Otto, Jean & Moos, Rudolf. (Stanford U) **Patient expectations and attendance in community treatment programs.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 9-15.—Used the Community Oriented Programs Environment Scale to assess the effect of the expectations of newly admitted members to 4 community-based psychiatric programs. 27 "good" patients (those who attended regularly and participated well in the program) and 26 "poor" patients (those who had been absent frequently and made little use of the program) were used to ascertain whether prospective members would make better use of the program if their expectations of the social climate matched those of actual program participants. Results indicate that there was a tendency for all new program members to have somewhat unrealistic expectations. Both groups had similar expectations of how free they would be to express angry feelings and how orderly the program would be, expected staff control to be fairly high, and expected



more emphasis in most areas than is found in the average community treatment program. Results suggest that patients who show unrealistically positive expectations have a greater likelihood of absenteeism, dropout, and poor participation in such a program.—*M. Pounsel.*

3835. Pimm, June B. (Pimm Consultants, Ottawa, Ontario, Canada) **Community-oriented private practice.** *Ontario Psychologist*, 1974(Aug), Vol 6(3), 9-15.—Discusses the provision of school psychological services by a private consulting firm. The arrangement has resulted in lower costs to the community without sacrifice of professional standards.

3836. Safer, Daniel. (Baltimore County Dept of Health, School Mental Health Service, MD) **Factors affecting outcome in a school mental health service.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 24-32.—Tested the efficacy of the type of treatment offered by a school mental health service and attempted to determine the factors that appear to have affected the outcome of that treatment. The study was based on teacher-judged classroom behavior change in 70 children in a suburban area department of health who were selected because (a) school-related aspects of their personal and social difficulties were deemed moderate to severe, (b) the school personnel team reported that their efforts had been unsuccessful, and (c) the family was not utilizing private mental health professionals. Findings indicate that 40% of the children showed a hyperactive-learning impaired pattern. The use of stimulant medication for the majority of the group resulted in classroom improvement. Time-limited therapy for academically retarded, chronically misbehaving children produced limited classroom benefits. Parental antagonism toward school authorities was frequently related to student suspensions. The child's IQ was a significant positive outcome factor, and persistence in treatment was greater when medication was prescribed. (24 ref)—*Journal abstract.*

3837. Sharfstein, Steven S. (Alcoholism, Drug Abuse & Mental Health Administration, Office of Program Planning & Evaluation, Rockville, MD) **Neighborhood psychiatry: New community approach.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 77-83.—Describes the function of a neighborhood psychiatric team, using a "family life center" as a base of operations for a comprehensive preventive and treatment program in one neighborhood of Boston. This program consists of direct treatment services to neighborhood residents, consultation with health and social service professionals and paraprofessionals in the family life center itself, and consultation with other community agencies. The advantages of working in a neighborhood—early intervention in crisis with individuals and agencies, accessibility to the entire family, integration with general health services, and easy follow-up and aftercare of recently discharged psychiatric patients—are described with case examples.—*Journal abstract.*

3838. Tapp, Jack T.; Ryken, Virginia & Kaltwasser, Carl. **Counseling the abusing parent by telephone.** *Crisis Intervention*, 1974, Vol 5(3), 27-37.—Discusses procedures and issues involved in operating a 24-hr crisis service dealing with child abuse. The focus is on ways in which phone workers can help potentially abusing

parents; special problems to be anticipated with this population are identified.

3839. Thompson, David & Thompson, Jennifer. (U Lancaster, England) **Nightline: A study self-help organization.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 200-211.—Presents an account, for those interested in setting up student self-help organizations, of the origins and growth of the Nightline group at a British university. Modeled on principles of the Samaritans (a suicide prevention crisis center), Nightline functions as an adjunct to the official welfare services provided by the university. Details are given of the selection and preparation of its student volunteers, the organization of the group, and the nature and incidence of its usage during its 1st complete academic year.—*Journal abstract.*

3840. Thoreson, Richard W. (U Missouri) **The evolution of counselling.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 171-181.—Presents the history of counseling in the US in terms of 4 developmental stages: infancy, early childhood, late childhood, and adolescence. It is suggested that client-centered counseling may be an inadequate model as counseling moves into adulthood. The emphasis on relationship is necessary but not sufficient. A more active approach is needed in which the counselor is prepared to (a) use a wider variety of techniques, (b) take actions about clients' problems rather than just talk about them, and (c) devote more attention to a training and support role in relation to a wide variety of community agencies. (33 ref)—*Journal abstract.*

3841. Walsh, Joseph A. & Phelan, Thomas W. (Du Page County Mental Health Ctr, Wheaton, IL) **People in crisis: An experimental group.** *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 3-8.—Discusses the planning, operation, and termination of a community mental health center's 17-member crisis group. Observations of Ss over a 6-mo period indicate the following: (a) It would be helpful to involve other significant people in the patient's life in the pregroup interview or in the group itself. (b) Cases involving chronic depression do not appear to be good candidates for a short-term group treatment approach, even though the depression might flare up periodically into situations that are more or less acute crises. (c) A male and female cotherapy combination might be more effective than 2 male therapists, thus encouraging the patient to perceive the therapists in the former combination as symbolic parents and helping him to see the group as supportive. (d) It would be helpful to get people involved either with the group therapists or with the group itself earlier in the course of their involvement with the clinic.—*Journal abstract.*

3842. Waxer, Peter. (York U, Toronto, Ontario, Canada) **Community psychology in colleges: II. Psychologist as administrator.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 251-257.—Discusses community psychology programming where the psychologist is an integral part of the target community. Examples of primary and secondary prevention are discussed, along with an example of how organizational psychological principles can be utilized within a university community. It is suggested that a community psychological approach to universities not only facilitates administrative policy-making, but is

also valuable in introducing university students to a paradigm of thinking about their living and working environment that they can carry out to the community at large. (French abstract)—*Journal abstract*.

3843. Weissman, Sidney; Diers, Arthur & Bemederfer, Sandra. (Michael Reese Youth Clinic, Chicago, IL) **Psychiatric services in a youth corrections unit.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 602-605.—Presents 4 cases as illustrations of a midwestern psychiatric clinic's method of treating delinquents. The program involves the delinquent, his parents, and other public organizations.

3844. Wideman, Harley. **The effects of discriminatory practices in funding upon the development of professional practice in psychology.** *Ontario Psychologist*, 1974(Aug), Vol 6(3), 31-35.—Asserts that the development and availability of psychological services in Ontario are impeded by their exclusion from publicly funded health insurance schemes. There is no evidence to suggest that including such services increases costs; in fact, the evidence indicates that early treatment of mental health disorders reduces overall costs of medical expenses. The private practitioner is considered likely to give better and cheaper service than the institutional program. It is concluded that insurance coverage would lead to greater and more innovative utilization of psychologists and would benefit the entire profession.—A. Krichev.

3845. Wilson, Charles J.; Muzekari, Louis H.; Schneps, Suzanne A. & Wilson, Dorothy M. (Albert Einstein Community Mental Health Ctr, Philadelphia, PA) **Time-limited group counseling for chronic home hemodialysis patients.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 376-379.—Compared the effects of 6 sessions of group counseling of 9 chronic home hemodialysis patients with a comparable no-treatment control group of 9 patients. Scores on Rotter's Internal-External Control Scale and selected California Personality Inventory scales revealed no significant differences between groups. However, observed changes were noted within the experimental group from pre- to posttesting on 2 of the measures. Subsequent testing 1 yr later of 11 of the Ss suggested that hemodialysis patients use the defensive mechanism of denial in adapting to their condition.—*Journal abstract*.

3846. Winer, Jerome A.; Dinello, Frank A.; Pasca, Alyce & Weingarten, Samuel. (U Chicago) **University mental health services in Illinois.** *Journal of the American College Health Association*, 1973(Dec), Vol 22(2), 138-142.—Presents a survey of the health services available to students attending Illinois universities. More universities in this state were found to have mental health programs organized to serve students than those surveyed elsewhere. Negative factors include poor staffing, services restricted to students only, inadequate referral services, absence of outpatient mental health services, and male directorship of 95% of the school health programs studied. These are the results of a questionnaire sent to 56 clinic directors.—R. S. Alvin.

#### Physical Treatment

3847. Carney, M. W. & Sheffield, B. F. (Northwick Park Hosp, Harrow, England) **The effects of pulse ECT**

**in neurotic and endogenous depression.** *British Journal of Psychiatry*, 1974(Jul), Vol 125, 91-94.—Administered the Hamilton Depression Rating Scale, the Purpose-in-Life Test (PILT), Kellner and Sheffield's self-rating scales of psychological distress, and a 4-point global rating scale to 53 endogenous and 22 neurotic depressives before and after they received pulse electroconvulsive therapy (ECT). After ECT, significantly more endogenous (72%) than neurotic (32%) depressives were rated as socially improved, and endogenous depressives showed a significantly greater decrease in Hamilton scores. Unlike the neurotic depressives, endogenous depressives also showed significant decreases in self-ratings of the number of symptoms and increases in PILT scores.—*Journal summary*.

3848. Foulon, L. **[Bilateral or unilateral electroshock? A review of the literature.]** (Fren) *Acta Psychiatrica Belgica*, 1973(May), Vol 73(3), 356-378.—Reviews the literature on unilateral and bilateral administration of electroconvulsive therapy (ECT). The majority of studies indicate that unilateral ECT applied to the nondominant hemisphere of the brain reduces confusion and memory loss. It permits daily administration and appears no less effective therapeutically than bilateral ECT. (French, Dutch, English, German, Italian, & Spanish summaries) (3 p ref)—E. Coché

3849. Hay, G. G.; Jolley, D. J. & Jones, R. G. (Withington Hosp, Manchester, England) **A case of the Capgras syndrome in association with pseudo-hypoparathyroidism.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 73-77.—Describes 2 brief episodes of psychosis in a 57-yr-old female patient with pseudo-hypoparathyroid syndrome. The psychotic phenomena occurred in clear consciousness, were schizophrenia-like, and included the Capgras symptom. Both episodes occurred after a course of electroconvulsive treatment given for depressive symptoms, and EEG recordings showed evidence of reduced stability. The content of these psychotic episodes, especially the Capgras symptom, was understandable in view of the patient's restricted social situation. It is suggested that the effect of electroconvulsive treatment acting on a previously abnormal central nervous system was sufficient to produce these schizophrenia-like psychosyndromes.—*Journal abstract*.

3850. Heller, Joyce C.; Gens, George W.; Moe, Diana G. & Lewin, Michael L. (Kean Coll New Jersey, Union) **Velopharyngeal insufficiency in patients with neurologic, emotional, and mental disorders.** *Journal of Speech & Hearing Disorders*, 1974(Aug), Vol 39(3), 350-359.—Investigated the management of 70 4-27 yr old patients with velopharyngeal insufficiency coexistent with neurologic, emotional, or mental disorders, and evaluated changes in the voice quality of those patients who had had pharyngeal flap surgery. Half achieved normal or near normal voice quality; 36%, although not reaching normal voice quality, did show improvement. Thus 86% showed either improved or normal voice. Results fall within the upper range of improvement reported by previous investigators of nonhandicapped patients. Judging from the results of this study, previously reported decisions not to perform surgery on patients with coexisting handicaps may have been too conservative.—*Journal abstract*.



3851. Hoenig, J. (Memorial U Newfoundland, St John's, Canada) **The management of transsexualism.** *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 1-6.—Considers that sex-change operations cause not only legal complications but also psychological problems. Legal aspects of the operation are reviewed. The indications for such operations are unclear. It is suggested that more clinical studies and statistical analyses are needed to offset premature theorizing and to circumscribe more precisely transsexualism. (36 ref)

3852. Hunter, Harold G. et al. (Human Resources Research Organization, Alexandria, VA) **Development and evaluation of self-applied plaque indices for children.** *HumRRO Professional Paper*, 1974(Jun), No 10-74, 12 p.—Tested 4 experimental systems for encouraging children to remove dental plaque. Ss were 128 11-12 yr old children. The Count Method, in which the child counts the number of stained teeth and the use of additional materials (photographs) is not required, was superior in reliability and teachability.

3853. Kohli, K. L. & Sobrero, A. J. (Margaret Sanger Research Bureau, New York, NY) **Vasectomy: A study of psychosexual and general reactions.** *Social Biology*, 1973(Sep), Vol 20(3), 298-302.—Analyzed responses to questionnaires obtained from 189 vasectomized males. Except for 2 men who reported discomfort or pain during intercourse, all Ss reported more or the same desire for and enjoyment of sex. Marital harmony also seemed improved. These results are similar to those of other studies. The large majority of vasectomized males expressed general satisfaction with the operation and were willing to recommend it to others.—R. S. Albin.

3854. Kornfeld, Donald S.; Heller, Stanley S.; Frank, Kenneth A. & Moskowitz, Reed. (Columbia U, Coll of Physicians & Surgeons) **Personality and psychological factors in postcardiotomy delirium.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 249-253.—Observed 142 patients through their open-heart surgery experiences. Preoperative psychiatric ratings and psychological tests of personality (including the 16 Personality Factor Questionnaire, WAIS, and the Benton Visual Retention Test) were obtained as well as physical and operative data. 25% of the patients developed a postcardiotomy delirium following a lucid interval and 6% an immediate organic brain syndrome apparent immediately on awakening from anesthesia. It is suggested that postcardiotomy delirium be viewed as a psychosomatic syndrome. There was evidence that beyond the influence of physical and operative variables, a high degree of psychological activity and dominance may contribute to delirium. Further, a group seen by the research team had half the delirium incidence of a comparable group not seen, suggesting that such intervention has a prophylactic-therapeutic function. Prior investigations showing a relationship between delirium and physical and operative variables were confirmed. (28 ref)—*Journal abstract*.

3855. Mark, Vernon H. (Harvard U, Medical School, Boston) **A psychosurgeon's case for psychosurgery.** *Psychology Today*, 1974(Jul), Vol 8(2), 28-33, 84-94.—Explains the use of psychosurgery, particularly for the control of violent behavior. However, it should be confined to the small minority of patients whose mental illness is characterized by aggression and has not

responded to other treatments. The antipsychiatry movement, which includes the attack on psychosurgery, is discussed and criticized in detail.

3856. Martel, Pierre C. (U Sherbrooke, Quebec, Canada) [Study of a case of male transsexualism.] (Fren) *Canadian Psychiatric Association Journal*, 1974(Feb), Vol 19(1), 13-16.—Reports the case of a male patient exhibiting the sexual behavior pattern described by category 6 of H. Benjamin's Sex Orientation Scale (i.e., S had always thought of himself as a female). Neither observation of the patient nor other data reported indicated any sign of castration anxiety, and the patient's identification appeared in all aspects to be a real and complete identification with a female. A 1-yr follow-up after the patient's sex-change operation revealed a generally more relaxed and well-adjusted person; signs of depression, suicidal gestures, and hysterical features had all disappeared. (23 ref)—*English summary*.

3857. Quinlan, Donald M.; Kimball, Chase P. & Osborne, Florence. (Yale U) **The experience of open heart surgery: IV. Assessment of disorientation and dysphoria following cardiac surgery.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 241-244.—Studied 76 20-69 yr old patients undergoing major cardiac surgery. An 11-item behavior checklist was obtained for the 58 patients observed postoperatively. Factor analysis of the checklist yielded 2 factors: (a) Orientation including Alertness, Orientation, Appropriateness, and an Absence of Confusion and Agitation, and (b) Dysphoria including Anxiety, Depression, Agitation, Complaints, and Delusions. The Orientation factor significantly correlated with (a) preoperative absence of organic brain syndrome; (b) lower mortality; (c) earlier discharge; and (d) absence of complications. Age, sex, length of disability, and estimated risk did not correlate. The Dysphoria factor was correlated significantly with complications but not with preoperative depression or emotional stability. (16 ref)—*Journal abstract*.

3858. Squire, Larry R. (VA Hosp, La Jolla, CA) **Amnesia for remote events following electroconvulsive therapy.** *Behavioral Biology*, 1974(Sep), Vol 12(1), 119-125.—20 psychiatric inpatients undergoing a series of electroconvulsive therapy (ECT) treatments for depressive illness were given a test of remote memory for public events, covering the years 1940-1969. Patients tested 40-80 min after their 1st treatment did nearly as well on this test as did a matched control group of medical inpatients. Patients tested 40-80 min after their 5th treatment were markedly impaired across nearly the entire time period sampled by the test. Patients were not impaired on the verbal portion of the WAIS. Results suggest that the amnesic effects of ECT can extend to remote memory as well as to recent memory. (21 ref)—*Journal abstract*.

3859. Wolfers, H.; Subbiah, N. & bin Mazurka, Ariffin. (Columbia U, International Inst for the Study of Human Reproduction) **Psychological aspects of vasectomy in Malaysia.** *Social Biology*, 1973(Sep), Vol 20(3), 315-322.—Presents detailed results of a survey of the medical and psychological effects of vasectomy as reported by 246 Malaysians 1-4 yrs after the operation. Medical findings of the investigation will be reported

separately. In response to a verbal questionnaire, approximately 12% of the Ss reported psychological problems arising from the operation, and these Ss were re-interviewed in depth. 4 variables were studied: regret at having had the operation, fears resulting from it, loss of libido, and marital problems attributed to it. The 1st 3 variables were examined in relation to demographic, social, and other variables. Reported loss of libido is compared with findings of similar studies in India and Europe. The strongest predictor of anxiety concerning vasectomy was disagreement with the S's wife about the advisability of the operation. Specific conclusions are (a) that more detailed preoperative counseling is required for Malaysian vasectomy candidates who have fewer than 4 or 5 children or have children of only one sex, and (b) that more explicit explanation of the fate of the sperm should be elaborated for all candidates in lectures and pamphlets. (16 ref)—R. S. Albin.

### Social Casework & Rehabilitation

3860. Balint, Enid. Technical problems found in the analysis of women by a woman analyst: A contribution to the question "What does a woman want?" *International Journal of Psycho-Analysis*, 1973, Vol 54(2), 195-201.—Describes a major problem in the treatment of a woman patient by a female analyst, which involves the attachment of the patient to her mother. This problem, if not detected, can hold up the treatment and become repetitive. The patient's feeling that the analyst looks to the patient for satisfaction and is excited by her has to be understood not only in terms of a wish to satisfy the mother and the analyst but also as the method the patient adopts to keep her own femininity. Such patients appear to center their lives around their mothers and to choose their husbands in order to repeat this pattern.—*Journal summary*.

3861. Brolin, Donn & Kokaska, Charles. (U Missouri, Rehabilitation Service Education Program, Columbia) Critical issues in job placement of the educable mentally retarded. *Rehabilitation Literature*, 1974(Jun), Vol 35(6), 174-177.—Identifies 7 issues concerning the training and placement of mentally retarded individuals which, if adequately resolved by professional workers, would materially improve the chances that these retarded individuals would take their rightful place in society. The issues are satisfactory vocational adjustment, sufficient employment opportunities, adequate skill evaluation, training considerations, responsibility for employment, the use of labels, and a feasible placement approach. (17 ref)—S. L. Warren.

3862. Brown, Barry S. & Schuman, Alan M. (Narcotics Treatment Administration, Office of Research & Development, Washington, DC) A correctional program for the not too distant future. *Community Mental Health Journal*, 1974(Spr), Vol 10(1), 33-40.—Proposes a program of correctional advocacy constructed on the foundation of an existing system of parole supervision. Key persons in such a program would be community consultants and aides whose primary responsibilities would be to maintain and strengthen, or to establish, prosocial reference groups in the community capable of mitigating the effect of the asocial and antisocial reference groups at work in the institution. These efforts

would be initiated as soon as an individual is admitted into a correctional setting and would continue for a time beyond release, thereby providing a continuity of correctional services rarely encountered in current practice.—*Journal abstract*.

3863. Chambers, Mary. (North Middlesex, Hosp, England) Aspects of social work on a cancer research and treatment unit in a London teaching hospital. *British Journal of Social Work*, 1974(Sum), Vol 4(2), 143-161.—Notes that, with the rapid growth of technology and science, an increasingly large number of people are becoming patients in specialized research and treatment units. The present study describes work in a cancer unit and illustrates ways in which the work is specialized. 4 types of patients treated with cytotoxic drugs are discussed, the unit social worker's role as a team member is outlined, and means of communicating with patients and relatives and of dealing with the patient's defensive processes and affective responses are treated. (29 ref)—*Journal abstract*.

3864. Dibney, Andrew S. (Boston U) Semi-integrated camping for the physically handicapped child. *Rehabilitation Psychology*, 1973(Sum), Vol 20(2), 84-93.—Compared 45 8-16 yr old handicapped boys with a normal control group using critical incidents, brief interviews, tests, questionnaires, and observation forms. The handicapped Ss showed greater gains in self-concept than normals. Counselors who dealt mainly with normal children in the camp showed improved attitudes toward disability based on pre- and posttest evaluations, while the counselors in the unit for handicapped showed less positive attitudes at the end of the camping period. Suggestions for training counselors are presented.—*Journal abstract*.

3865. Ducros, Huguette. (U Grenoble, France) [Psychology in action: Does the psychologist have a place in a functional re-education center?] (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 71-79.—Describes, on the basis of personal experience as a patient, the role that a psychologist could perform in a center for the functional re-education of paraplegics. The importance assigned to psychological factors in the patients' improvement is contrasted with the absence of psychologists in the hospital environment. 2 main functions for a psychologist in such a center are visualized. The first would be to prevent mutually supporting groups from being broken up for purely administrative reasons. The second would be to educate physiotherapists and help them deal with their patients. The relationships between a physiotherapist and his patient are similar in many respects to those between a psychoanalyst and his client. Physiotherapists are not trained to understand their role nor their patients' "strange" reactions, defenses, and transferences and their own countertransferences.—A. Blasi.

3866. Fischer, Joel & Miller, Henry. (U Hawaii, School of Social Work) The effect of client race and social class on clinical judgments. *Clinical Social Work Journal*, 1973(Sum), Vol 1(2), 100-109.—360 professional social workers employed by the State of California received mailed questionnaires with written case histories which randomly varied in terms of client race, social class, and extent of pathology. Subjects were asked to



complete a Treatment Decision Inventory (TDI) containing 24 items intended to represent diagnostic, treatment, and attitudinal judgments. 5 factors emerged from factor analysis of the 360 returned TDIs: Factor A, "Assessment"; Factor B, "Suitability for Treatment"; Factor C, "Social Emphasis in Treatment"; Factor D, "Tenor of Relationship"; and Factor E, "Attitude." Analysis of variance, carried out on each of the 5 factors, indicate clearly that race, social class, and degree of pathology affected clinical judgments. Black clients were judged more positively than white clients. Lower-class clients were viewed more negatively than upper-class clients, and the more "pathological" case was judged less favorably. Treatment implications are considered in some depth.—S. R. Stein.

3867. Goldberg, Richard T.; Satow, Kay L. & Bigwood, A. Winton. (Massachusetts Rehabilitation Commission, Boston) Vocational adjustment, work interests, work values, and rehabilitation outlook of women on long term hemodialysis. *Rehabilitation Psychology*, 1973(Sum), Vol 20(2), 94-101.—Assessed 22 women on 2 similar semi-structured interviews to obtain pre- and post-dialysis histories yielding comparisons on 12 measures of adjustment. (15 ref)

3868. Goldin, George J.; Margolin, Reuben J.; Stotsky, Bernard A. & Marci, Joseph N. (Northeastern U) Psychodynamics and enablement in the rehabilitation of the poverty-bound client: An approach to reducing dependency. Lexington, MA: D. C. Heath, 1970. xiv, 134 p.—Describes the design, operation, and outcome of a government-sponsored employment and vocational rehabilitation program for the socioculturally disadvantaged poor in New Haven, Connecticut. Demographic and community characteristics, administrative and staff training functions, research and evaluation methodologies, philosophical and psychological issues in the rehabilitation of the poor, data on sample job placements, and implications for broader rehabilitation programs are examined.

3869. Hartlage, Lawrence C. & Johnsen, Russell P. (Medical Coll Georgia, Augusta) Video playback as a rehabilitation tool with the hard-core unemployed. *Rehabilitation Psychology*, 1973(Fal), Vol 20(3), 116-120.—75 experimental Ss, mean age 25 yrs and mean IQ 83, received 15-min daily video playback of their work behavior, while a control group received 15 min of counseling daily. Variables measured included production, time working, socializing, and distractibility. After 15 days the experimental group showed significant improvement on all variables except distractibility, while the controls did not improve significantly on any variable. Informal short-term follow-up on job placement showed a better job retention rate for experimental Ss.—*Journal abstract*.

3870. Iglitzin, Lynne B. (U Washington) A case study in patriarchal politics: Women on welfare. *American Behavioral Scientist*, 1974(Mar), Vol 17(4), 487-506.—Contends that the institution of public welfare reinforces society's feminine stereotype by supporting the traditional wife-mother role, enforcing outdated standards of morality, maintaining the "women's work" orientation, etc. Policy recommendations to counteract patriarchal welfare regulations are made. (21 ref)

3871. Johnson, Roosevelt. (Howard U. Inst for Urban Affairs & Research) A counselor education outreach program: Serving the black inmate. *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jan), Vol 2(2), 80-85.—Assessed the independent variable of age for interaction with other dependent variables and demographic data to ascertain the implications for counseling reformatory-type inmates. 200 men in an Ohio prison school system (academic high school and vocational shops) were introduced to Outward Bound, a program designed to provide a prerelease program for inmates of Ohio reformatories with Ohio State University graduate counselor education students as the chief program agents. Inmates were administered a 2-part questionnaire that solicited demographic information which would assist incoming teacher-counselors in becoming acquainted with prospective clients and which determined the areas in which inmates needed help with respect to the prerelease activities. Results show that age did not indicate the kind of academic assistance an inmate needed with respect to remediation when such remediation was categorized into discipline and skill areas. It is concluded that a program such as Outward Bound is viable in view of the characteristics and needs expressed by the inmates.—M. E. Pounsel.

3872. Keskiner, Ali & Zalcman, Marilyn. (U Missouri, Medical School, Inst of Psychiatry) Returning to community life: The foster community model. *Diseases of the Nervous System*, 1974(Sep), Vol 35(9), 419-426.—Describes the rationale, administration, and goals of the Foster Community Project designed to facilitate the return of psychiatric patients to the community. In contrast to traditional mental health rehabilitation programs, the foster community assumes an active role and works in partnership with the hospital in the rehabilitation process. The program is sponsored by the community through a nonprofit corporation, which assumes publicity, placement, and feedback functions. Steps in determining the suitability of a particular community are described, along with the role of the hospital, its prereturn resocialization program, and patient selection criteria. Results of a demonstration project are presented in terms of community response, success of patient placements, staff training, and implementation feasibility.—L. Gorsey.

3873. Kowalska, Barbara. (U Warsaw, Inst of Penal Law, Poland) [Recidivism among boys discharged from correctional institutions.] (Polh) *Przegląd Penitencjarny i Kryminologiczny*, 1972, Vol 10(1), 28-39.—Examined the court records of 7,439 boys discharged on probation from all correctional institutions in Poland 1963-1967 to see how many had again been deprived of freedom. Over a follow-up period of 3-7 yrs, 36% were sentenced to further detention. Most of the later offences were committed during the 1st 4 yrs after leaving the institution, and 20% were committed during the 1st 18 mo. Correctional institutions were classified into 8 categories according to the age of the boys incarcerated and the facilities available. Recidivists were found more often among the youngest and most delinquent boys and those who had psychological abnormalities. (French summary)—A. Z. Arthur.

3874. Martin, Garry L. (U Manitoba, Winnipeg, Canada) **The future for the severely and profoundly retarded: Institutionalization? Normalization? Kin care? Foster homes?** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 228-241.—Examines some of the anti-institution and pronormalization statements as they pertain to rehabilitating severe and profound retardates. A "home-style" community residence for rehabilitating former severe and profound retardates is described and compared to foster home placement. Although institutions have been under heavy attack, it is suggested that they might survive in a desirable way for many years if a new role in partnership with community rehabilitation programs is adopted. (French abstract) (22 ref)—*Journal abstract*.

3875. Meyer, Alfred; Irro, Franz & Rödszus, Rudi. (Hochschule der Deutschen Volkspolizei, Berlin, E Germany) **[Informative report on the activity of expert groups for the prevention of relapsing criminality and education of criminally endangered persons and the possibilities for the psychiatrist's effective participation.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Feb), Vol 26(2), 98-103.—Describes formation of some consultative groups in forensic medicine. These groups advise the police in solving sociopsychiatric problems, especially recidivism.

3876. Paul, Lyndell L. (Gestalt Inst, Los Angeles, CA) **The relevance of Gestalt therapy for social work.** *Clinical Social Work Journal*, 1973(Sum), Vol 1(2), 94-99.

3877. Sackheim, Gertrude. **The practice of clinical casework.** New York, NY: Behavioral Publications, 1974. 214 p.—Discusses the processes of intake, treatment, interpretation, and recording in clinical social work, as well as the special relationships of transference, dreams, and cultural factors to casework. Attention is given to treatment of adolescents and schizophrenics and to the practice of supervision and consultation.

3878. Sieg, Kay W. (U Florida) **Applying the behavioral model to the occupational therapy model.** *American Journal of Occupational Therapy*, 1974(Aug), Vol 28(7), 421-428.—Recommends the direct, conscious application of behavioral principles and procedures to occupational therapy. When occupational therapy terminology in planning a treatment program is compared to behavioral terminology in applying the behavioral equation, the treatment session becomes the disposition; the activity becomes the discriminative stimulus; the patient's performance becomes the response; the treatment plan the contingency; and the treatment goal the consequence. To systematically apply these behavioral techniques, the therapist must understand the basic systems of applied behavioral analysis as well as the procedures for designing a behavior modification project that includes (a) identifying the terminal behavior; (b) timing, counting, recording and charting; (c) selecting the reinforcer; (d) choosing a fixed or interval schedule of reinforcement; and (e) shaping, chaining, and modeling to establish new behaviors.—*Journal abstract*.

3879. Tyler, Nancy B.; Kogan, Kate L. & Turner, Patricia. (U Washington) **Interpersonal components of therapy with young cerebral palsied.** *American Journal of Occupational Therapy*, 1974(Aug), Vol 28(7), 395-400.—Evaluated the interactive behaviors of 10 preschool

children with cerebral palsy, their mothers, and therapists, in a longitudinal study. 6 interaction sessions were recorded and processed for each pair of Ss. 2 sessions of unstructured play between mother and child, 2 sessions of therapy conducted by the mother, and 2 sessions of therapy conducted by the therapists were studied. These 6 sessions were recorded and evaluated 3 times at 10-month intervals. Each member of the dyad was rated on scales for status, affect, and involvement. Group results indicate significant differences in behaviors of mothers, children, and therapists when situations were compared. Differences over time were also identified.—*Journal abstract*.

3880. Wendland, Leonard V. (U Arizona, Coll of Education, Rehabilitation Ctr) **The measuring of patient cooperativeness.** *Rehabilitation Psychology*, 1973(Fal), Vol 20(3), 121-125.—Describes the use of 3 scales to quantify patient behaviors which are related to cooperativeness. Each scale consisted of 30 items depicting some aspect of cooperative-uncooperative behavior. Each item, or "behavior descriptor," was contributed by a person professionally associated with a rehabilitation program. The scale value of each item was determined by Thurstone's technique.

3881. Zaretsky, Herbert H.; Ince, Laurence P. & Lee, Mathew H. (New York U, Medical Ctr, Goldwater Memorial Hosp) **Hansen's disease in a rehabilitation hospital: A preliminary report.** *Rehabilitation Psychology*, 1973(Sum), Vol 20(2), 108-112.—Presents 2 case histories of patients with leprosy (Hansen's disease).

#### Hospital Programs & Hospitalization & Institutionalization

3882. Anthony, William A. & Buell, Gregory J. (Boston U) **Predicting psychiatric rehabilitation outcome using demographic characteristics: A replication.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 421-422.—Attempted to replicate G. J. Buell and W. A. Anthony's (see PA, Vol 51:3600) finding that psychiatric hospital recidivism could be predicted by number of previous hospitalizations, and that posthospital employment could be predicted by employment history. Multiple linear regression analyses of data from 79 released psychiatric patients support the findings of the original study for posthospital employment but not for recidivism. Based on this replication and T. W. Lorei and L. Gurel's 1973 study, the usefulness of attempting to predict recidivism from demographic data must be questioned.—*Journal abstract*.

3883. Bath, Kent E. & Smith, Stuart A. (Galesburg State Research Hosp, Mental Retardation Unit, IL) **An effective token economy program for MR adults.** *Mental Retardation*, 1974(Aug), Vol 12(4), 41-44.—Presents data on a token economy program conducted with 17 19-51 yr old female institutionalized retardates. The program produced increased desirable behavior and maintained low levels of undesirable behavior when the system was fully intact. It was found, however, that an unplanned period of program disruption (during which time the regular ward attendant was absent) had profound deteriorative effects on the behavior of the residents. The major effect of this inconsistency was a dramatic increase in undesirable behavior, though some decrease



in desirable behavior was also observed.—*Journal abstract.*

3884. Bieliauskas, Linas A. & Webb, James T. (Ohio U) **The Social Readjustment Rating Scale: Validity in a college population.** *Journal of Psychosomatic Research*, 1974(Apr), Vol 18(2), 115-123.—Attempted to validate the findings by Batlis et al that a modified form of the Social Readjustment Rating Scale (SRRS) differentiates between college students who had been hospitalized in the previous 6 mo and those who had not. Ss were 116 females and 137 males who completed a paper-and-pencil test. Test items included 20 demographic variables, 42 items of the standard SRRS form, and 46 items of the college-modified form. While the college-modified SRRS provided slightly greater differentiation between the 2 groups than the standard SRRS, the difference was not significant. Special item weighting did not significantly alter the results. The findings of previous studies were confirmed; however, the predictive utility of the test is deemed to be poor. (18 ref)—*W. G. Shipman.*

3885. Bill, Arthur. (Federal Political Dept, Swiss Federal Council for Disaster Relief, Berne) **The Pestalozzi Children's Village in Trogen, Switzerland.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 599-601.—Presents a historical view of a Swiss children's village established for World War II orphans; residents are now victims of social conditions or new international conflicts. The goal of the village is to provide educational and vocational training that will enable the children to support themselves and promote the ideas of international cooperation in their home countries. The village's 13 national houses are managed by houseparents who are responsible for the educational and social training of the children. Classes are conducted in the children's native tongue as well as in German, the village language. Results of an inquiry conducted 5 yrs ago are provided and indicate the employment status and location of many of the former residents.—*Journal abstract.*

3886. Blackman, Sheldon & Catalina, Don. (North Richmond Community Mental Health Ctr, Research & Evaluation Services, Staten Island, NY) **Relationships between ratings of improvement and ethnicity, age and gender: II. Some further analyses.** Staten Island, NY: North Richmond Community Mental Health Center, 1974. 2 p.—An analysis of the findings of a 1973 title report reveals that (a) nonwhite, male, and under-30 patients are less likely to be related as "improved" at discharge; (b) patients under 30 and nonwhite patients present milder problems; and (c) the duration of treatment is significantly shorter for males and nonwhites.

3887. Büttner, Christian. **[Social insecurity in the behavior of institutionalized boys.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Apr), Vol 23(3), 103-107.—Presents a questionnaire to estimate social insecurity in residents of boys' homes. Experts collected 42 items describing situations of increasing difficulty with respect to social insecurity. The item pool was administered to 11 adolescents. The questionnaire can be applied to the construction of an individual hierarchy of situations for use in assertive training.

3888. Clarke, Michael & Waller, Jane. (St Thomas's Hosp Medical School, London, England) **Descriptive**

**studies of a psychiatric hospital population.** *British Journal of Psychiatry*, 1974(Aug), Vol 125, 208-209.—Discusses 3 methods which were used to describe in gross detail features of a specific psychiatric hospital population: (a) routine data which were misleading unless such factors as changes in catchment area were considered; (b) census information which showed a large, long-stay, elderly population; and (c) a cohort study which demonstrated that only 5% of the patients admitted during 1968 were still inpatients after 2 yrs.

3889. Cohen, Melvin & Klein, Donald F. (Long Island Jewish—Hillside Medical Ctr, Glen Oaks, NY) **Posthospital adjustment of psychiatrically hospitalized drug users.** *Archives of General Psychiatry*, 1974(Aug), Vol 31(2), 221-227.—Compares the in-hospital and posthospital behavior of 4 groups of 203 15-25 yr old psychiatric patients with either negative, mild, moderate, or heavy drug use histories. Measures of in-hospital behavior, assessments of covert drug use, and sociometric evaluations of social affiliations indicate that the greater the drug use before hospitalization, the more likely the patient would continue drug use within the hospital and associate with primarily other drug users. The posthospital measure of community adjustment and degree of drug use, as determined by a 6-mo follow-up interview, indicates that in-hospital drug use and social affiliations predict posthospital drug use only for those patients with a history of heavy drug use and that only among this latter group is posthospital drug use related to poor posthospital adjustment.—*Journal abstract.*

3890. Corry, Suzanne; Sebastian, Vivian & Mosey, Anne C. (Bellevue Psychiatric Hosp, New York, NY) **Acute short-term treatment in psychiatry.** *American Journal of Occupational Therapy*, 1974(Aug), Vol 28(7), 401-406.—Considers the role of the mental health worker in acute, short-term care of psychiatric patients. The following goals of acute treatment are identified and discussed: orientation to the hospital, adjustment to somatic treatments, satisfaction of current needs, opportunity for meaningful communication, maintenance of present functioning, health education, problem-solving for immediate stress-provoking life situations, and readjustment to community living. Sections on management of symptoms and drug side effects are included. The approach is pragmatic and does not take a position as to the nature of mental illness.—*Journal abstract.*

3891. De Caro Orzalesi, Bianca et al. (U Rome, Inst of Psychiatry, Italy) **[The experience of a discussion group in a university hospital ward.]** (Ital) *Rivista di Psichiatria*, 1973, Vol 8(5), 509-540.—Describes a continuing group which consists of 9-14 patients, 4-6 physicians, nurses, and at least 1 social worker. The group was conceived as a place for 2-way communication and exchange of ideas. The topics discussed and the oral tradition developed enhance ward culture and promote autodetermination of the group. The group has occasionally become the core activity of the ward. Social learning has been used to establish a therapeutic atmosphere. Percentages of patient recovery are compared with percentages of attendance.—*Journal summary.*

3892. Doron, Roland. (U Bordeaux, France) **[Clinical observations of juvenile psychopathology.]** (Fren) *Psychologie Française*, 1972(Jun), Vol 1(1-2), 3-9.—Studied

the characteristics of 210 adolescent males who had been in a residential treatment center as these factors were related to favorable and unfavorable treatment outcome observed approximately 3 yrs after discharge from the center. Ss were of average IQ, and the most frequent diagnosis had been character disturbance. Favorable outcome, defined as the ability to function and survive without external assistance in a normal environment, was noted for 75% of the Ss. There was no obvious relation between type of disturbance and outcome. Significantly related to favorable outcome ( $p < .01$ ) were the presence of both parental figures while the S was 4-6 yrs old, a "passive personality" (carelessness and imprecision of gestures and thoughts), and a residence longer than 1 yr at the center. Significantly related to unfavorable outcome ( $p < .01$ ) were early traumatic separation from the mother, institutionalization for more than half of the S's life prior to referral to the center, and weak "mental tonus" (lack of perseverance and inability to channel one's energy).—A. Blasi.

3893. Dy, Antonio J. (Yale U, Medical School) **Correctional psychiatry and phase psychotherapy.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1150-1152.—Discusses the evolutionary nature of psychiatry in correctional institutions and describes one approach to treating prison inmates that focuses on the different phases inmates go through from the time they are apprehended to the time they are released from prison. These phases include the initiation phase which covers the time from arrest to initial jail confinement, the disorganization phase which covers the time before the trial and sentencing, the short incarceration phase, the long incarceration phase, the parole phase, and the prerelease phase. Therapeutic guidelines for dealing with the varying degrees of hostility, anxiety, and other emotions and behaviors experienced by the inmate during these phases are presented.—L. Gorsey.

3894. Goldfarb, William. (Jewish Board of Guardians, Henry Huttenlocher Ctr for Child Research, New York, NY) **A follow-up investigation of schizophrenic children treated in residence.** *Psychosocial Process*, 1970, Vol 1(1), 71 p.—Evaluated the ego status and social adjustment of 37 male and 11 female schizophrenic children. Outcome at follow-up (average of 7 yrs 1 mo following discharge from the residence) was related to ego status at admission to treatment, ego status at discharge, and psychosocial adjustment of the child's family. (32 ref)

3895. Handy, Imena A. (VA Hosp, Brecksville, OH) **Judgments of release readiness as related to discharge from a neuropsychiatric hospital.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 198-204.—Determined whether judgments of release readiness are related to discharge. Ss included 465 male schizophrenic patients continuously hospitalized in a Veterans Administration hospital for a minimum of 30 days. Findings show that (a) over the 4-yr period, the differences in percentages discharged between the "ready" and "not ready" groups were statistically significant; (b) judgments of release readiness were significant in relationship to discharge or nondischarge of patients; and (c) patient's previous hospitalization was significant in relationship to release readiness judgments and discharge for those judged ready but not for others.—*Journal abstract*.

3896. Henisz, Jerzy E.; Goldblatt, Phillip B.; Flynn, Hulda R. & Garrison, Vivian. (Yale U, Medical School) **A comparison of three approaches to patient care appraisal based on chart review.** *American Journal of Psychiatry*, 1974(Oct), Vol 131(10), 1142-1144.—Tested a 3-level approach to auditing charts of psychiatric patients (review by clerks, research assistants, and clinical consultants) against 2 other methods. There were no significant differences among the 3 methods in scores of adequacy of patient care and adequacy of documentation. While there is a need for more research in the area of assessing quality of patient care, research assistants and other nonclinician reviewers can make a contribution to peer review.—*Journal abstract*.

3897. McGarry, A. Louis & Parker, Lawrence L. (Massachusetts Dept of Mental Health, Div of Legal Medicine, Boston) **Massachusetts' operation Baxstrom: A follow-up.** *Massachusetts Journal of Mental Health*, 1974(Spring), Vol 4(3), 27-41.—Conducted a follow-up study of 234 inmates at an institution for the criminally insane who were transferred to open mental health institutions. The Ss tended to be elderly and had spent nearly half their adult lives incarcerated. 33 mo after transfer, 33% were successfully discharged and only 7% were absent without leave. Recidivism was low (1 felony).—A. Krichev.

3898. Moura, Gilberto V.; Pereira, Lúcia F. & Santos, Derlange K. (Universidade Federal de Pernambuco, Recife, Brazil.) [Integration of a psychiatric unit in a general hospital.] (Port) *Neurobiologia*, 1974(Jan), Vol 37(1), 79-82.—Describes the consultation service and functioning of the psychiatric unit with respect to inpatient and outpatient referrals from other departments in a Brazilian hospital. From analysis of numbers, percentages, and nosological distribution of the patients, it is concluded that the unit is insufficiently integrated within the hospital although some improvement is seen in the outpatient department.

3899. Muller, Walter J. (La Amistad, Winter Park, FL) **La Amistad: Starting an inpatient program for severely disturbed young adults.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 587-590.—Describes the efforts of a private psychiatrist to establish a model inpatient program for young people with schizophrenia-related illnesses. The program is designed to provide residential treatment for up to 6 male and 6 female 16-22 yr old patients. The main treatment method is behavior modification, though family and group therapy and group activities are also used. Follow-up 44 mo after the program's opening shows that about 1/3 of 70 former residents were considered "improved" or "much improved."—*Journal abstract*.

3900. Murphy, I. C. & Elder, Robin. (Nether Edge Hosp, Sheffield, England) **Treatment of a psychotic non-autistic child.** *Acta Paedopsychiatrica*, 1974, Vol 40(5), 190-195.—Describes the case history of a child with a late-onset psychosis who made good recovery during 1 yr of hospital care. Therapy included drugs, an active therapeutic community, an educational system designed for autistic children, and psychotherapy for the mother. Recording the times of treatment and improvement allowed assessment of the contribution of the several



treatment variables. However, improvement may have been spontaneous.—*G. Rubin-Rabson.*

3901. **Peretti, Peter O.** (Kennedy-King Coll, Chicago, IL) **Precipitating factors of readmission of psychiatric patients.** *Community Mental Health Journal*, 1974(Spring), Vol 10(1), 89-92.—Attempted to determine the precipitating factors of rehospitalization for 100 patients who had formerly been hospitalized for mental illness and had been rehabilitated in a halfway house. Ss had been terminated by the halfway house after having successfully completed its vocational and social programs for a period of approximately 1 yr. Results of interviews with the patients indicate that they had realistic viewpoints regarding the significance of employment, but a nonrealistic viewpoint about the significance of self. A profile of these readmitted patients shows that they were most likely to have no job, to be loners, and to have negative self-concepts.—*Journal abstract.*

3902. **Remnet, Valerie L.** (Family Service of Long Beach, Homemaker Services, CA) **A group program for adaptation to a convalescent hospital.** *Gerontologist*, 1974(Aug), Vol 14(4), 336-341.—Describes a group program in a convalescent hospital established to help the elderly patient make a positive adaptation to the hospital. A 42-member patient discussion group, The Pacesetters (named by the patients themselves), met weekly. It was observed that when the patients participated in such a program, social interaction among patients, families, and staff increased. This socialization created a milieu in which the elderly person could adapt more easily to his new role as a patient in a long-term care facility. (24 ref)—*Journal abstract.*

3903. **Scher, Maryonda E.; Volberding, Noel K.; Helgerson, Steven D. & Ruoff, Paul A.** (VA Hosp, Seattle, WA) **The effect of a national crisis on patient government.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 607-609.—Describes a breakdown in patient government on the psychiatric ward of a Veterans Administration hospital following the resignation of the Vice-President of the US. It is suggested that the psychiatric ward is an ideal laboratory in which to study the reactions of human groups to external forces.

3904. **Serban, George & Thomas, Alexander.** (New York U, Medical Ctr) **Attitudes and behaviors of acute and chronic schizophrenic patients regarding ambulatory treatment.** *American Journal of Psychiatry*, 1974(Sep), Vol 131(9), 991-995.—Examined the attitudes toward and behavioral compliance with posthospitalization treatment and adjustment of 641 acute and chronic schizophrenics of both sexes. Results reveal a marked discrepancy between positive attitudes toward medication, outpatient care, and employment and noncompliance with these therapeutic interventions. An examination of the relationship between compliance with ambulatory treatment and the need for rehospitalization revealed that, at least for the chronic schizophrenic patient, such compliance led to a diminished need for rehospitalization. Findings are discussed in terms of the different views of their illness which these patients may hold. Implications for psychiatric treatment of posthospitalized patients are explored. (16 ref)—*Journal abstract.*

3905. **Smith, Alexander B. & Berlin, Louis.** (John Jay Coll of Criminal Justice, City U New York) **Treating the**

**criminal offender: Issues and problems.** Dobbs Ferry, NY: Oceana, 1974. ix, 372 p.—Assesses past developments and contributions in the correctional field and reviews and evaluates new proposals. Among the issues discussed are probation and parole, punishment vs treatment, traditional and innovative group therapies, drug addiction, sexual offenses and their treatment, the violent offender, alcoholism, marital problems and crime, and the pathology and psychology of gambling.

3906. **Wikler, Lynn & Stoycheff, Judy.** (Neuropsychiatric Inst, Los Angeles, CA) **Parental compliance with postdischarge recommendations for retarded children.** *Hospital & Community Psychiatry*, 1974(Sep), Vol 25(9), 595-598.—Used parental compliance with postdischarge recommendations as the criterion for successful intervention in a study conducted on a short-term inpatient ward for retarded children. A study of 217 recommendations to 80 families was based on the hypothesis that parents will be more likely to follow through on recommendations if they (a) feel comfortable with the diagnosis of the child's problem, (b) feel that the professional caretakers are concerned about the child both during and after hospitalization, and (c) feel relieved of stress and helped by the therapy. Parents' attitudes and the extent to which they had followed the recommendations were assessed in telephone interviews at least 3 mo after the child was discharged. Results indicate that 3 variables were significantly correlated with compliance: agreement with the diagnosis, postdischarge contact with the ward, and preadmission stresses of caring for the child.—*Journal abstract.*

## EDUCATIONAL PSYCHOLOGY

3907. **Acklaw, John & Labon, Don.** **School-based therapy: A pilot scheme.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 35-39.—Describes a pilot scheme to provide school-based help for disturbed predelinquent English primary school children. Activity group therapy was offered by teachers who were selected by the head teachers of the schools concerned and given in-service training conducted by educational psychologists. Children were selected by the head teacher and the "adjustment group" teacher together, and were predominantly those whose disturbance was expressed in behavior of the overtly difficult type (e.g., restlessness, unsettledness, and hostility). Evaluation of the project indicated that this approach provided benefits for the majority of children included, and that such a program exerted a beneficial influence on the general morale and atmosphere within the schools.—*I. L. Zimmerman.*

3908. **Antonouris, George.** (U Nottingham, School of Education, England) **Subsequent careers of teachers trained as counsellors.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 160-170.—Presents a detailed analysis of data concerning 87 Ss who work as counselors within schools, and compares this counselor data with that obtained from a sample of 34 college students on full-time courses. The senior positions which counselor-trained people have achieved in schools are presented, and those employed in other noncounseling

positions within the school are examined. The various routes of possible mobility outside the school milieu which are open to trained counselors are indicated. A group of teachers interested in counseling who have not undergone full-time counselor training is briefly discussed, and various questions raised by the study are posed.—*Journal abstract.*

3909. Baker, Gwendolyn C. (U Michigan, School of Education, Multicultural Program) **Multicultural training for student teachers.** *Journal of Teacher Education*, 1973(Win), Vol 24(4), 306-307.—Conducted a 2-wk multicultural workshop for 299 student teachers. Pre- and posttests showed significant differences in the perceptions of ethnic groups held by students on both pro-irrational and anti-irrational scales. Since perceptions can be altered, teacher training institutions must assume responsibility for such training.

3910. Barkley, William D. & Dickenson, Gary. (Canadian Wildlife Service, Ottawa, Ontario, Canada) **The design and evaluation of a rural land use planning simulation game.** *Adult Education*, 1974, Vol 24(4), 280-292.—Developed a simulation game using land capability data to teach rural adults certain principles and competencies required for effective land use planning. Evaluation instruments were constructed and the simulation game was revised in a pilot study. A field project was carried out in the East Kootenay area of British Columbia where 40 rural people residing on land holdings of 50 or more acres participated in the game. Pre- and posttest mean scores were compared and 3 scores showed statistically significant gains, while the remaining changes were nonsignificant but in the hypothesized direction. Test scores correlated significantly with some characteristics of the participants and with some factors related to success in playing the game. Factors that may have influenced the results are discussed, and it is concluded that simulation gaming is potentially useful for educating rural adults about land use planning. (21 ref)—*Journal abstract.*

3911. Bayer, Alan E. (American Council on Education, Office of Research, Washington, DC) **Teaching faculty in academe: 1972-73.** *ACE Research Reports*, 1973(Aug), Vol 8(2), 68 p.—Presents a statistical summary and descriptive highlights of the 1972 American Council on Education survey of college and university faculty. Over 40,000 faculty, whose responses were weighted to represent the entire population of teaching faculty, answered a comprehensive questionnaire dealing with their demographic characteristics, work activities, attitudes, and opinions. Initial tabulations suggest general satisfaction with teaching and endorsement of academic reform. Typical faculty activities included 3 courses per term, research, and scholarly writing. More detailed analyses are currently underway.—*J. B. Francis.*

3912. Berger, Michael L. (Fordham U, School of Education, Div of Curriculum & Teaching) **Why not specialists in suburban education?** *Journal of Teacher Education*, 1973(Win), Vol 24(4), 285-288.—Points out the need to train teachers specifically for suburban schools, as they are trained for teaching in the inner cities. Courses in urban education are necessary but equal concern must be directed to the school-age youngsters who do not live in urban America.

3913. Bjerstedt, Ake. Department of Educational and Psychological Research, Malmö: **Some notes on current activities.** *Pedagogisk Dokumentation*, 1973(Dec), No 22, 34 p.—Presents information on the organization, research program, and reporting system of the Department of Educational and Psychological Research whose main activities are related to educational problems, researcher training in education, and participation in teacher training. Brief summaries of 21 research projects are included.

3914. Dosajh, N. L. (Government Coll of Education, Chandigarh, India) **The use of multiple regression equation in the selection of trainees.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 59-65.—Used 7 variables derived from previous academic achievements and personality traits (e.g., emotional maturity) to predict academic performance of 251 students in the Bachelor of Education course at a college in India. The prediction equation accounted for 10.2% of the variance in academic performance, suggesting that (a) correlates of effective teaching are not known and (b) much greater sophistication of the predictors is warranted before clear predictions can be made. (20 ref)—*J. B. Francis.*

3915. Flincher, Cameron. (U Georgia, Inst of Higher Education) **The paradox and counterpoint of public expectations for higher education.** *Educational Record*, 1974(Spr), Vol 55(2), 101-109.—Considers 4 issues which illustrate the American public's ambivalent expectations of higher education: (a) diversity vs unity, (b) competition vs accommodation, (c) involvement vs detachment, and (d) efficiency vs effectiveness. Although all of these are reflections of the total American character, the paradox of involvement vs detachment is perhaps the central paradox of the higher education situation: this contradiction comes from the changing role of the research community, the concept of community colleges, and the continuing pressure for relevance. Examples of these issues are presented and some of the suggested solutions for problems are considered: (a) attempts to compromise or average out toward a golden mean ignore the exact nature and intense polarities of the differences, (b) the egocentrism of different educational factions will not allow the establishment of a hierarchy of priorities, and (c) continuing to attack the problems on a piecemeal basis may actually be the best solution. *R. Gutzke.*

3916. Gaudia, Gill. (State University Coll New York, Fredonia) **The Piagetian dilemma: What does Piaget really have to say to teachers?** *Elementary School Journal*, 1974(May), Vol 74(8), 481-492.—Contends that the contribution of Piaget to educational theory and practice is minimal. Almost none of his writings deal directly with education and pedagogy themselves. According to Piaget, development is the process essential to learning and each element of learning occurs as a function of total development. The teacher's dilemma is whether to be wary of Piaget's conclusions or to agree with the current acceptance of his viewpoint. Piaget refuses to be pinned down on the question whether or not the cognitive development of a child can be altered by formal intervention, labeling this problem an "American question." Educators are confused about his position as to the relative influence of heredity and environment



on development. Piaget's comment on this problem has frequently been, "I refuse to be concerned." (39 ref)—A. J. Ter Keurst.

3917. Gilly, Michel. (CNRS Lab de Psychologie Scolaire et Lab de Psychologie Associé, U Provence, France) [Educational psychology: Reflections on the development of practices and relationships between school and psychology.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4), 135-141.—Reviews the development of educational psychology in France and discusses its current functions, including identification of the retarded and deviant, counseling, and research. Research is seen as still strongly influenced by past constrictive approaches but as currently evidencing growing concern with interpersonal relationships and the study of functional interactions throughout the pupil's school career. (English summary) (15 ref)—E. E. Brown.

3918. Henney, Maribeth & Mortenson, W. Paul. (Iowa State U) What makes a good elementary school teacher? *Journal of Teacher Education*, 1973(Win), Vol 24(4), 312-316.—A group of parents, teachers, and administrators observed videotapes of classroom reading lessons given by various elementary teachers, and described positive and negative teaching characteristics. The 7 categories of desirable qualities, derived from comments by the panel, are listed and discussed.

3919. Hibbert, K. A. Teachers' attitudes towards psychologists. *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 25-32.—Developed and tested a 33-item scale to measure teachers' attitudes toward educational psychologists, with open-ended questions appended for teachers' comments. Results of its administration to 147 respondents are described. Overall, teachers seemed to feel that psychologists should give less time to assessment and more to individual guidance and treatment. It is suggested that guidance in reorganizing the work of the school psychological service may be supplied from such feedback of information.—*Journal summary*.

3920. Kaplan, David M.; Smith, Aaron & Grobstein, Rose. (Stanford U, Medical Ctr, Div of Clinical Social Work) School management of the seriously ill child. *Journal of School Health*, 1974(May), Vol 44(5), 250-254.—Discusses management problems that the seriously ill child of school age poses for school administrators and teachers. 9 management and policy issues commonly raised by the seriously ill child for school personnel are cited, along with 6 case summaries of the leukemic child and the reactions caused by these children in the home and in the classroom. Suggestions for successfully coping with the seriously ill child, for both the family and the teacher are presented. It is concluded that those teachers and other school health personnel who can face the painful realities of serious illness and experience the loss and sorrow involved will best be able to help the seriously ill child in his school experience.—R. J. Ambrosino.

3921. Katz, Harvey P.; Sorrentino, Jean & Rodriguez, Alejandro. (Johns Hopkins U, Medical School) Pediatric-child psychiatry team consultation in a community early childhood education center. *Young Children*, 1973(Apr), Vol 28(4), 237-243.—Describes a 2-yr experience with a consultation service which attempted to integrate health

services at a privately-financed early childhood education center. A case report by a pediatrician-psychiatrist team is provided.

3922. Keel, Raymond E. & Rowland, G. Thomas. (Inst for Epistemic Studies, Fort Worth, TX) How children learn: A developmental approach. *Elementary School Journal*, 1974(May), Vol 74(8), 501-507.—Compares the teaching process to an evaluation procedure in educational research. When the objectives of education are expressed in behavioral terms, the ambiguous words "understanding," "appreciation," and "knowing" are replaced by objective ones, such as "sorting" and "stating." 2 theories of learning are presented. B. F. Skinner's model assumes that learning occurs, via operant conditioning, as a response to rewards. Logically, this approach excludes the concept of human freedom and decision making. An approach by I. Illich suggests that learning may be more a matter of chance than of planning. Important factors in the learning process are motivation and social influences on the transmission of cultures. Children learn by experimenting individually with the environment. In contrast to the limited range of behavior among lower animals, the human being exhibits such varied behavior that it is nearly impossible to determine a "maximum potential" or a "genetically endowed limitation" of an individual child. (17 ref)—A. J. Ter Keurst.

3923. Kikuchi, Akio. [Q-typing of the images of the ideal teacher.] (Japn) *Japanese Journal of Educational Psychology*, 1972(Sep), Vol 20(3), 184-189.—Administered the Japanese adaptations of the Gordon Survey of Interpersonal Values and Gordon Survey of Personal Values to 19 groups of 353 Japanese students, teachers, and parents to determine their perceptions of the image of an ideal teacher. The image of an ideal teacher shared by all groups was characterized by benevolence and goal orientation, and not by recognition, practical-mindedness, and variety. Independence and decisiveness were highly valued by students, whereas conformity and orderliness were valued by parents. Younger students tended to agree with the adults' views more than did older students.—S. Choe.

3924. Kluge, K. J. (Rheinland Pedagogical Coll, Cologne, W Germany) [Report on a German-French seminar on the training of remedial and special-school teachers.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Apr), Vol 23(3), 107-112.—Describes how seminar participants were actively involved in group processes and attended lectures on results of research in social psychology and special education. Under the theme "We also belong to Europe," compensatory programs for outgroups were developed and tried.

3925. Leyba, Charles F. (California State U, Los Angeles) Cultural identity: Problems and dilemmas. *Journal of Teacher Education*, 1973(Win), Vol 24(4), 272-276.—Explores issues that must be faced if educational institutions and ethnic communities seriously intend to develop multicultural education. A description of culture suited to the present analysis is developed and applied to relations between majority and minority ethnic groups. Control and cultural erosion are considered, and specific cultural dilemmas are discussed.

3926. Pollard, W. Grosvenor. (U Tennessee) **Implications of the rank concession syndrome for adult education programs: An exploration in social roles and program effectiveness.** *Adult Education*, 1974, Vol 24(4), 255-269.—Discusses the "rank concession syndrome" theory and the theory of "ethnic boundaries," and applies them to the case of an American Indian group in rural Wisconsin. The aims and methods of successful adult education programs for lower income groups are discussed.
3927. Quereshi, M. Y.; Brennan, P. J.; Kuchan, A. M. & Sackett, P. R. (Marquette U) **Some characteristics of undergraduate majors in psychology.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 65-70.—A questionnaire was filled out anonymously by 167 undergraduate majors in psychology. Ss provided information about age, sex, total credits, credits in psychology, grade point average (GPA), ranking of fields of interest, occupational use of the major, reasons for choosing psychology, intention to pursue graduate work, and application to and acceptance by graduate schools. Results indicate that (a) applied areas (abnormal, personality, and developmental) were overwhelmingly popular, (b) the occupational value of a BA degree in psychology was misunderstood, (c) GPA was insignificant as a determinant of admission into graduate programs, and (d) the subject matter itself was the most dominant reason for majoring in psychology.—*Journal abstract*.
3928. Röhm, Hartwig. [Punishment as a psychodynamic problem of the educator: An educational-psychological contribution on the theory and practice of punishment in education.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 56-62.—Discusses 2 concepts of punishment in education: (a) idealistic or social-anthropological concepts, which see punishment as retributive justice; and (b) behavioral concepts, which see it as the isolated administration of aversive stimuli. Both concepts are rejected as misrepresenting the psychology of punishment in the real educational situation. From a psychoanalytical standpoint, the effect of punishment is determined by the totality of the educational situation, and the initiation of punishment is determined not only by educational goals, but to a considerable extent by personal and psychodynamic characteristics of the educator. (27 ref)—*H. A. Euler*.
3929. Ryan, Thomas J. & Moffitt, Alan R. (Carleton U, Ottawa, Ontario, Canada) **Evaluation of preschool programs.** *Canadian Psychologist*, 1974(Jul), Vol 15(3), 205-219.—Reviews the somewhat discouraging results regarding the effectiveness of early childhood educational enrichment programs. It is suggested that one of the failings in this area has been in the development of suitable techniques for evaluation. The results of 3 previous studies are reported in which focus was on process evaluation rather than employing the experimental model. It is argued that descriptions of program content, descriptions of the consistent and inconsistent program goals as stated by the teachers, and demonstrations of the inconsistencies between program goals and teachers' behavior provides information which is more informative and more useful than the traditional experimental model when evaluating the effectiveness of preschool programs. (French abstract) (22 ref)—*Journal abstract*.
3930. Soh, K. C. (Inst of Education, Singapore) **Dogmatism and educational attitudes.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Mar), Vol 17(1), 20-24.—Attempted to determine whether dogmatism should be explicitly or implicitly equated, as is done in most studies, with authoritarianism. Prospective teachers of high and low dogmatism were compared as to their educational attitudes. The differences were related to cultural background and exposure to progressive educational ideas. Ss were 30 women, randomly selected from 2 classes, who were preparing to teach at the lower secondary level. Dogmatism was measured with an adapted version of Rokeach's Dogmatism Scale, Form E. Results show that the high-dogmatism group held more progressive educational attitudes. (15 ref)—*R. D. Nance*.
3931. Strike, Kenneth A. (Cornell U) **On the expressive potential of behaviorist language.** *American Educational Research Journal*, 1974(Spr), Vol 11(2), 103-120.—Treats 2 central concepts of behaviorism, peripheralism and associationism, as doctrines which place semantic and syntactical constraints on acceptable language for human discussion, and discusses how these doctrines affect the description of educational goals and methods. It is argued that peripheralism and associationism are philosophical ideas inherited from British empiricism, and that they are more appropriately treated as part of the philosophy of psychology than as testable empirical claims. The constraints that this philosophy places on a language render the language incapable of expressing some important educational goals, rule out some meaningful empirical hypotheses, and blur some essential ethical distinctions. (20 ref)—*Journal abstract*.
3932. Tate, Sean. (U Pittsburgh) **Anthropological perspectives on evaluation in development education.** *Interchange*, 1973, Vol 4(4), 24-34.—Argues that anthropology is an appropriate source from which to select concepts and methodology for evaluating educational institutions and programs in developing nations. Anthropology can contribute to the evaluation of individual change, of change in organizations, and of the evaluator himself. (75 ref)
3933. Wong, Martin R. & Wong, Joyce M. (U Minnesota) **Reinforcement in the British open classroom.** *Child Study Journal*, 1974, Vol 4(3), 135-143.—Observed the teacher verbal behavior of 2 London primary school open classrooms and categorized that behavior according to a 13-item categorization instrument. Special attention was paid to verbal behavior that could be classified as potentially reinforcing to students. Results indicate that major categories were Substantive Questioning (32.2%), Positive Feedback Giving (17.5%), Substantive Information Giving (16.5%), and Management Directions (13.3%). Teacher statements that could be classified as at least potentially reinforcing to students accounted for 19% of all teacher utterances. Results are compared with another similar study.—*Journal abstract*.



## School Administration &amp; Educational Processes

3934. Almgren, Eva & Gustafsson, Ery. **World citizen responsibility: Assessment techniques, developmental studies, material construction, and experimental teaching.** *Educational & Psychological Interactions*, 1974(Apr), No 48, 34 p.—Summarizes the "world citizen responsibility" project carried out at the Malmö School of Education. Extensive test batteries were constructed to study attitudes toward foreign groups and international relations. Among the older students more negative stereotypes were found, particularly towards minority groups and immigrants. Special teaching packages intended to increase the students' world citizen responsibility were developed and tested. Results give reason for optimism. (26 ref)—*Journal abstract*.

3935. Amigues, René; Bonniol, Jean-Jacques & Stievenart-di Martino, Conception. (U Provence, Marseille, France) [Study of verbal evaluations by teachers of pupils in 1st-year secondary school classes organized by group level.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 29-42.—Studied the determining role of reinforcement (verbal evaluations) in 1st-yr secondary school classes (approximates US 6th grade) that were divided into high- and low-ability groups. Indexes of verbal evaluations given by teachers in French reading comprehension classes reflected number of evaluations, positive vs negative evaluations, and character of evaluations (interpretation, grammar, vocabulary, comment, discipline, and work directives). It was found that (a) Ss in the high group received more positive and fewer negative evaluations than did the low group; (b) teachers gave more discipline and work directives to pupils in the low group; and (c) the high group received more comments in the interpretation category than did the low group, while more of the evaluations in the low group pertained to grammar or vocabulary. Results support the hypothesis that the status of pupils is a determining factor in the quality and quantity of evaluations proffered by the teacher. (English summary)—E. E. Brown.

3936. Barfield, Vivian & Burlingame, Martin. (Colorado Women's Coll) **The pupil control ideology of teachers in selected schools.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 6-11.—Examined the relationships between pupil control ideology and teacher sense of efficacy, bureaucratic level of school, and socioeconomic status (SES) of the students. The Political Efficacy Scale (A. Campbell et al) and the Pupil Control Ideology Form (D. J. Willower et al) were administered to 275 teachers in 9 schools stratified according to SES of clientele and bureaucratic level. Findings indicate that teachers in low-SES schools were more custodial toward pupil control than teachers in middle- or upper-SES schools. Additionally, teachers with low sense of efficacy perceived control of pupils more custodially than teachers with average or high perceptions of efficacy. Results suggest that control ideology may indicate the type of bureaucracy operating within the school.—*Journal abstract*.

3937. Barham, Carl S.; Price, Mary R.; Esham, Yolanda & Spradlin, Faye. (Prince Georges County Public School System, Upper Marlboro, MD) **Implementation of a simulation of change model for elementary students.** *Journal of Non-White Concerns in Personnel &*

*Guidance*, 1974(Jan), Vol 2(2), 71-78.—Discusses a Maryland suburban school system's plan to help prepare some of the elementary school students for the change that was precipitated by desegregation. A team of 3 elementary school counselors, a parent discussion-group leader, and a school psychologist conducted an experiment that attempted to have approximately 500 4th, 5th, and 6th graders, through experiencing group processes and change, assess and evaluate their feelings and behaviors as members of a group, as recipients of new members into their group, and as new members entering an ongoing, previously established group. Results of the 4-phase experiment indicate that (a) the experiential simulation of change model was effective with 6th graders and less effective with 4th graders unless they were quite intellectually and emotionally mature; (b) the model helped children understand change from a functional standpoint; (c) in the initial stages of Phase 1, student leaders, isolates, and other grouping patterns became readily identified as children grouped themselves according to preestablished patterns; and (d) 80% of the students gained insight into their behaviors and the behavior of others.—M. E. Pounsel.

3938. Bonniol, Jean-Jacques; Henry, Christine; Massonnat, Jean & Piolat, Michel. (U Provence, Inst of Didactics & Pedagogy, Marseille, France) [The Center for Teacher Training in Secondary Schools.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 119-128.—Describes the 4-yr history of the Center for Teacher Training in Secondary Schools. During the Center's first 2 yrs, various training methods were tested; the training content was determined by the student teachers themselves. For the past 2 yrs, the focus has been on the concrete problems of the practicing teacher where different training activities (e.g., recitations and lectures) have brought together secondary school teachers who are on assignment and future teachers in initial training. This training has concentrated on theory and practice, initial training, and research-training.—*Journal abstract*.

3939. Bonniol, Jean-Jacques & Pendaries-Galera, Josette. (U Provence, Marseille, France) [Reflections on class organization by group level in the first cycle of secondary education in France.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 105-117.—Attempts to explain the failure of a broad experiment dealing with equalization of opportunity in selected secondary schools in the south of France. It is pointed out that a policy of systematic penury—lack of material means, personnel, organization, and collaboration with competent auxiliary services (e.g., by social workers and primary school teachers)—can lead not only to failure of an experiment but also to ideological and political reinforcement of the policy. The only objectives attained correspond to the objectives assigned to National Education in the official Plan VI—early channeling of pupils into 1 of the 4 courses and aggravation of social segregation in the schools. (English summary)—*Journal abstract*.

3940. Bonniol, Jean-Jacques; Caverni, Jean-Paul & Nolzet, Georges. (National Ctr for Scientific Research, U Provence, Marseille, France) [Experimental training in evaluating scholastic tasks.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 93-104.—Participants in training sessions attempted to establish standards on the varia-

tion in marks given by examiners to the same series of papers. Sessions were designed to define and clarify criteria, construct a uniform evaluation scheme, and decrease the differences of marks and rankings on a 20-point scale. Fewer differences were found between markers following the training sessions. There was less variation in marks given to artificially constructed papers than to those actually produced by students. (English summary)—*E. E. Brown*.

3941. **Bullock, Donald H.** (Catholic U of America) **Application of performance problem-solving to educational problems.** *Improving Human Performance*, 1973(Win), Vol 2(4), 245-262.—Applies performance problem-solving to the specific educational problem of reading deficiency. The general relevance of performance problem-solving for education is discussed in terms of its effect on the marketability of graduates, the cost-effectiveness of educational programs, and the drop-push-failout rate among students.—*Journal abstract*.

3942. **Centra, John A.** (Educational Testing Service, Princeton, NJ) **The relationship between student and alumni ratings of teachers.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 321-325.—Determined that student and alumni ratings for 23 teachers correlated .75 (somewhat less for teachers rated only by graduates of their department). This substantial agreement between current students and alumni of 5 yrs regarding effective or ineffective teachers suggests a good deal of persistence in judgments of teachers by students.

3943. **Frankel, Edward & Kassirnov, Howard.** (Hofstra U) **Effects of required effort, perceived expertise, and sex on teacher compliance.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 187-192.—Investigated the effect of school psychologists' required effort (moderate vs low), level of expertise ("Dr" vs "Mr"), and sex on teachers' compliance with their recommendations. 144 elementary school teachers served as Ss. The psychologists evaluated a child from each teacher's class and recommended that she send for materials which would help the child's perceptual and reading development. Results indicate that compliance varied directly with required effort but was unrelated to level of expertise and sex. It is argued that psychologists in schools may influence teachers as a function of legitimate power, whereas expert power is operative when dealing with the public.—*Journal abstract*.

3944. **Gardner, P. L.** (Monash U, Clayton, Vic, Australia) **Research on teacher effects: Critique of a traditional paradigm.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 123-130.—Process-product studies of the effects of teacher behaviors upon pupil outcomes often employ class mean scores as measures of the outcome variable. Assuming that all the measures used are reliable, a zero correlation between the teacher measure and the pupil outcome implies that the teacher behavior being studied does not affect pupils in any lawful way. However, results of the present study, in which attitudes toward physics held by 1,014 students were assessed, indicate that such a conclusion may be faulty. It is argued that research on teacher effects should consider pupil variables; teacher behaviors and pupil outcomes may enter into lawful relationships with

one another, the nature of the relationship being different for different kinds of pupils.—*Journal abstract*.

3945. **Hanlon, Noel N.** (Hamilton Teacher's Coll) **Teacher personality and teacher effectiveness.** *Delta*, 1973(Jun), No 12, 30-37.—A review of studies on teaching effectiveness indicates that few significant findings have emerged because of the complexity of the problem. Definitions of personality and teaching effectiveness vary with the researcher, thus leading to contradictory results. Faulty research methodology often further complicates the issue. Despite the research limitations, an indirect relationship between personality and teaching effectiveness can be established. It is concluded that (a) specific descriptions of teachers be used in future research since teachers vary on dimensions such as age, experience, and sex; (b) student behaviors influence teaching behaviors such that effective teaching in 1 situation may not be effective in another situation; and (c) external variables (e.g., classroom setting and people other than students) may affect teaching behavior. Teacher personality is only 1 of many variables that influence teaching behavior. (27 ref)—*M. H. Apt*.

3946. **Jamieson, David W. & Thomas, Kenneth W.** (Management Responsibility Guidance Corp, Los Angeles, CA) **Power and conflict in the student-teacher relationship.** *Journal of Applied Behavioral Science*, 1974, Vol 10(3), 321-336.—Examined some parameters of power and conflict in the classroom. Questionnaire data were collected from 105 high school, 61 undergraduate, and 41 graduate students on their teachers' bases of power and their own methods of handling conflict with teachers. Results highlight the imbalance of power between students and teachers and the prevalent use of coercion by teachers at the high school and undergraduate levels. This use of coercive power was shown to be negatively related to student satisfaction, learning, and the extent to which teacher influence transcends the classroom. Despite considerable dissatisfaction, students at all levels reported relative passivity in attempting to change what occurs in the classroom. (42 ref)—*Journal abstract*.

3947. **Keith, L. Thomas; Tornatzky, Louis G. & Pettigrew, L. Eudora.** (Michigan State U) **An analysis of verbal and nonverbal classroom teaching behaviors.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 30-38.—Attempted to (a) construct an operationally explicit instrument to measure verbal and nonverbal teacher-learner classroom behaviors and (b) determine the relationships among verbal and nonverbal teacher-learner behaviors. Videotaped observations of 43 teacher-interns in a federally sponsored teacher training program were conducted in the classrooms of 6 public elementary schools containing kindergarten and Grades 1-6. 5-min segments of tapings were analyzed by 4 trained judges, who used a behavior rating schedule developed for this study to categorize verbal and nonverbal behaviors. These ratings yielded the data for correlational analyses. Results indicate that the behavior rating schedule was operationally functional. Cluster analysis indicates that teacher-interns' approval tended to be passively, nonverbally expressed whereas disapproval tended to be explicitly, verbally communicated. Smiling, verbally probing teacher-interns were associated



with thoughtful and responsive pupils over a variety of verbal performance measures. (51 ref)—*Journal abstract.*

3948. Kuzma, Kay J. & Stern, Carolyn. (Loma Linda U) The effects of three preschool intervention programs on the development of autonomy in Mexican-American and Negro children. *Journal of Special Education*, 1972(Fal), Vol 6(3), 197-205.—Assigned 42 Mexican-American and 35 Negro children in 9 Head Start classes to either an autonomy, language, or control group to determine (a) the effects of a 7-wk summer program upon the development of autonomy, and (b) whether the instructional treatments produced significantly different changes in autonomy or cognitive ability as a function of ethnicity. Scores on the Cincinnati Autonomy Test Battery increased for all children, with Mexican-American children showing significant gains on 9 and Negro children on 5 of the 11 autonomy measures. Using the Peabody Picture Vocabulary Test as a measure of mental functioning, results indicate that IQ scores increased significantly ( $p < .01$ ) for children receiving either the language or autonomy curriculum.—*Journal abstract.*

3949. Lepot-Froment, Christiane & Verbeke, Ronald. (U Nationale, Zaïre) [Prediction of the efficiency of Zaïre teachers on the basis of personality tests.] (Fren) *Revue Belge de Psychologie et de Pédagogie*, 1973(Sep), Vol 35(143), 57-78.—Rated 48 male and 17 female 1st-grade teachers in Zaïre on their efficiency, measured by pupil progress. Personality tests used were Gough's California Psychological Inventory (CPI), the Thurstone Temperament Schedule, the Object Relations Technique, and the Rorschach. Though the number of variables yielded amounted to 62, which were applied to 2 criterion measures, pupils' final achievement in calculus could not be predicted. Significant negative correlations occurred between 5 CPI scales and final achievement in reading, whereas 2 areas of responses to the Rorschach showed a positive relationship to the same criterion measures. Content analysis indicated that efficient teachers tended to describe themselves on the CPI without complacency and to express their personal problems rather freely, according to the Rorschach. (42 ref)—*L. A. Ostlund.*

3950. Madden, John L. & Krislov, Joseph. (U Kentucky) A university experience with academic ombudsmen. *Educational Record*, 1974(Spr), Vol 55(2), 110-114.—Discusses the establishment of the position of ombudsman in 1970 at the University of Kentucky in an attempt to improve the relationship between students and administrators in the aftermath of 1968 student uprisings. Students, faculty, and administrators participate in selecting the ombudsman, and the position is outside the university's normal administrative structure. The influence of the ombudsman has been limited to 2 basic areas. (a) He has dealt with a few specific complaints, brought by 1-2% of the student body; these problems have chiefly involved conflicts over judgments of student performance, disagreements regarding penalties for violation of academic rules, student unhappiness with general faculty performance, and inadequately administered academic rules. (b) Existence of the position of ombudsman seems to have created a psychological climate that is conducive to the settlement

of academic conflict. Although the same problems continually recur, they appear to be problems that might not otherwise have come to the fore at all. And although the position has not yet caused any changes in rules that are under debate, an increase in the attractiveness of the position may recruit personnel who will aggressively push for radical changes.—*R. Gutzke.*

3951. Mosher, Ralph L. (Boston U) Knowledge from practice: Clinical research and development in education. *Counseling Psychologist*, 1974, Vol 4(4), 73-82.—Discusses clinical research and development (CRD) as a method which can give new insights to the educational process. A project is described in which adolescents demonstrated ability to absorb counseling skills and superior effectiveness in relating to peers with problems. Analysis through CRD involves reflection, teaching, and evaluation. (16 ref)

3952. Moskovitz, Sarah. (California State U, Northridge) Behavioral objectives: New ways to fail children? *Young Children*, 1973(Apr), Vol 28(4), 232-235.—Discusses the use of behavioral objectives in education and how well they solve classic educational problems. Dilemmas of early childhood education are discussed and alternative approaches are suggested.

3953. Panda, Kailas C. & Bartel, Nettie R. (Virginia Commonwealth U) Teacher perception of exceptional children. *Journal of Special Education*, 1972(Fal), Vol 6(3), 261-266.—Investigated the effect of specialized training and experience of teachers on their perception of exceptional children. 20 teachers with and 20 without specialized training and experience with exceptional children served as Ss. They were asked to rate 10 types of exceptionalities on 9 scales using the semantic-differential procedure. Ratings were analyzed by a 2-way analysis of variance for each factor. Significant differences in the perception between the 2 groups of teachers did not occur in any factors. There were, however, significant differences in the ratings of various concepts in all factors. Concepts labeled in terms of physical impairments were rated higher than those labeled on a sociopsychological basis. (20 ref)—*Journal abstract.*

3954. Placus, John. (Rand Corp, Santa Monica, CA) Incentives for innovation in the public schools. *Review of Educational Research*, 1974(Win), Vol 44(1), 113-144.—Formulates certain propositions about the structure and incentive systems of public schools as they relate to (a) the adoption of innovations and (b) their implementation. The general thesis is that the market structure of the public school "industry" has a major effect on the school's decision to adopt innovations, and the bureaucratic structure and incentives of schools shape in specific ways the transition from adopting innovations to implementing them. The factors that operate to maintain this structure are analyzed in detail, and many recommendations for improving the situation are offered. (4 p ref)—*P. D. Leedy.*

3955. Popkewitz, Thomas S. & Wehlage, Gary G. (U Wisconsin) Accountability: Critique and alternative perspective. *Interchange*, 1973, Vol 4(4), 48-62.—Argues against the prevailing conceptions of educational accountability which stress the application of human engineering and management theory to school problems. Schools should be accountable to several constituent

cies—the community, parents, and students. Each has a different set of interests and requirements to be satisfied. Schools are accountable to their constituencies to the extent that they involve parents and students in educational decision-making. Accountability involves developing opportunities for experiences that can be reflective, expressive, and creative for students. (90 ref)—H. E. Yunker.

3956. Posthuma, Allan B. & Carr, John E. (U London Hosp, Ontario, Canada) **Differentiation matching in school desegregation workshops.** *Journal of Applied Social Psychology*, 1974(Jan-Mar), Vol 4(1), 36-46.—Describes an attempt to test the effectiveness of matching the conceptual structure of participants in educational training and psychotherapy experiences in a school desegregation workshop designed to promote a mandatory bussing proposal by a local school board. Results indicate that differentiation matching had little effect on participants' global judgments of satisfaction with workshop goals but was significantly and inversely related to the decision to voluntarily bus a child, especially among blacks. Abstractness of topics discussed affected participant endorsement of workshop goals but did not affect bussing decision. These findings suggest that the methods of workshop organization are dependent on whether workshop success is to be evaluated on the basis of community public relations or actual decisions to bus children. (24 ref)—*Journal abstract*.

3957. Romine, Stephen. (U Colorado) **Perceptions of an effective community college instructional climate.** *Journal of Higher Education*, 1974(Jun), Vol 45(6), 415-429.—Analyzed replies to a questionnaire by 2,058 students and 325 faculty members at 29 community junior colleges in 15 states. In response to questions regarding the level of general satisfaction with the overall instructional climate of their institution, 48.1% of the students and 70.5% of the faculty reported they were satisfied or highly satisfied. The remainder were uncertain, dissatisfied, or did not respond. 70 possible attributes of an effective instructional climate were rated on a 5-point scale. Faculty mean scores were higher than student mean scores for 54 attributes. For 68 attributes the distribution of student responses was significantly different ( $p < .05$ ) from the faculty distribution. Using student responses, factor analysis resulted in 4 clusters: instructional management, student learning obligations, instructor-student interpersonal relations, and supplemental instructional provisions. An instructional climate appropriate for a community junior college is characterized on the basis of these findings.—E. L. Tatham.

3958. Simon, Roger I. & Levin, Malcolm A. (Ontario Inst for Studies in Education, Toronto, Canada) **The irrationality of rationalized program development.** *Interchange*, 1973, Vol 4(4), 63-76.—Contends that local schools should be responsible to their communities, not to provincial educational authorities, for developing to provincial environments that reflect the community's learning values, expectations, and priorities. Provincially rationalized systems conflict with the trend toward decentralization of program development to the local school level. (15 ref)

### Curriculum Development & Teaching Methods

3959. Anderson, J. Harold. (Western Carolina U) **Sex education in North Carolina.** *Western Carolina University Journal of Education*, 1974(Spr), Vol 6(1), 20-22.—Reports on a sex education questionnaire sent to 100 randomly chosen North Carolina schools, with answers received from 74. In 23% of the schools, the administration instructed teachers to give sex education as appropriate, but in 38% sex education was a planned part of the curriculum. Males were instructed in sex education more than females. The larger the school, the better the quality of sex education. In 41% of the schools, instruction was given in terms of the sexual understanding needed by the individual student. Broader sex education programs in North Carolina, making use of all community resources, are recommended.—J. Joesting.

3960. Argyros, Nicholas S. & Rusch, Reuben R. (State U New York, Albany) **Trimodal programmed instruction in reading.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 1-5.—Evaluated the instructional effectiveness of the introductory units of the Trimodal Programmed Instruction in Reading. Ss in Grades 2-4 from a low socioeconomic area were given the Word Recognition and Functional Reading subtests of the Criterion Test before and after completing the program. Results show substantial improvement in posttest scores for all Ss.

3961. Asher, James J.; Kusudo, Jo A. & de la Torre, Rita. (California State U, San Jose) **Learning a second language through commands: The second field test.** *Modern Language Journal*, 1974(Jan), Vol 58(1-2), 24-32.—Studied the effectiveness of motor activity in foreign-language learning, using 27 undergraduates in an experimental course in Spanish. Instruction began with simple motor commands which were gradually elaborated so that nonimperative structures could be embedded within them. Later, students' commands, skits, and problem-solving situations were included. Performance was assessed after 45 hrs, and compared with that of 3 control groups: a group of high-school students with 1 yr of Spanish (C1), and 2 groups of college students, one finishing the 1st semester (C2), and one finishing the 2nd semester (C3) of Spanish. The experimental group outperformed all control groups in listening comprehension, and were equal to C2 in reading skill. The Pimsleur Spanish Proficiency Test, Form A, was administered, and the experimental group's mean performance was at the 70th percentile for listening, 85th for reading, and 76th for writing. Speech skill was "good" on a poor-fair-good scale. After 90 hrs, the Pimsleur, Form C, assessed performance at beyond the 50th percentile for all skills except listening (49th percentile). It is concluded that the program demonstrates high transfer from listening to other linguistic skills in half the time of conventional programs.—*Journal abstract*.

3962. Barlow, R. M. (U Wisconsin, Stout) **An experiment with learning contracts.** *Journal of Higher Education*, 1974(Jun), Vol 45(6), 441-449.—Used the learning contract method in a philosophical ethics course. After 4 wks of orientation, contract negotiations were held. In cooperation with the instructor, each student developed a set of objectives, identified needed resources, developed a sequence of learning activities.



and indicated the evidence of achievement and the mode of evaluation. The instructor assessed the experiment using a log of learning activities, evidence of student achievement, and student evaluations of the method. Although the instructor was originally a traditionalist and approached the experiment with misgivings, his conclusion was that the use of learning contracts has promise in philosophy and that further experiments are needed.—*E. L. Tatham.*

3963. Björk, Lars-Eric. [BASIC programming in the tenth-grade mathematics course and its effects on students' numerical ability and attitudes towards mathematics.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Jul), No 246, 22 p.—Investigated the influence of the introduction of the programming language, BASIC, and work with flow charts, algorithms, and computers on the numerical ability of 10th graders and their attitudes towards mathematics. The mean gain on a repeated numerical test and the result on an attitude test were significantly higher for the computer group than for the comparison group. These positive effects were particularly pronounced for students with low grades in mathematics. (27 ref)—*English abstract.*

3964. Blank, Marion; Koltuv, Myron & Wood, Marilyn. (Albert Einstein Coll of Medicine, Yeshiva U) Individual teaching for disadvantaged kindergarten children: A comparison of two methods. *Journal of Special Education*, 1972(Fal), Vol 6(3), 207-219.—Assigned 44 disadvantaged kindergartners to one of 3 groups: individual teaching in a structured tutorial program, individual teaching oriented toward more traditional preschool techniques, or no supplement to the regular kindergarten program (controls). Selected mothers from the community who were trained by 2 professional teachers did all the teaching. At the completion of the tutoring, Ss in the structured tutorial program showed greater WISC IQ gains than did either of the other 2 groups, which did not differ significantly from each other. A 1-yr follow-up indicated that Ss in the specialized tutorial program maintained their relative superiority and that the gains previously found with the structured tutorial program could not be attributed simply to individual attention. Although the IQ gains in the kindergarten children were comparable to those found when the program was applied to 3- and 4-yr-olds, resistance to the learning situation was considerably more marked in the older children. (17 ref)—*Journal abstract.*

3965. Bundy, Lester L. (Regis Coll, Div of Social Sciences, Denver, CO) Our current reading instruction is inadequate. *Reading Teacher*, 1974(May), Vol 27(8), 774-777.—Contends that developments in communications media have created a need for many new skills in the language arts, which is being ignored. Teachers of reading should recognize the importance of the study of semantic content. The traditional view of reading instruction needs to be greatly expanded to include skills involved in dealing with modern communications techniques. Haney's communications anomalies can serve as a guide in teaching such skills.

3966. Collier, Calhoun C. & Redmond, Lois A. (Michigan State U) Are you teaching kids to read mathematics? *Reading Teacher*, 1974(May), Vol 27(8),

804-808.—Points out that special training is required for reading mathematics texts. The style of the writing differs from that of other reading material, and the vocabulary is not always conventional word symbols but includes mathematical symbols which must be "read" and comprehended differently from conventional word meanings.

3967. Dansereau, Donald F.; Evans, Selby H.; Atkinson, Tomme A. & Long, Gary L. (Texas Christian U, Inst for the Study of Cognitive Systems) Factors relating to the development of optimal instructional information sequences. *US AFHRL Technical Report*, 1974(Jul), No 73-51, 40 p.—Tested Inscal multidimensional scaling and found it useful in (a) defining the information complexity of technical material, (b) developing sequences of key concepts within technical material, and (c) providing an index of expert interrater consensus. When the Inscal measure was obtained after 180 college students were exposed to the material, Inscal provided an indication of the correspondence between experts' and students' understanding of concept interrelationships. Major findings are as follows: (a) Alternative sequences of instructional material influenced student performance. (b) Pictorial technical information sequences resulted in small performance differences compared to verbal print sequences. (c) Technical information difficulty debilitated student performance. (d) Student reading aptitude was significantly related to student performance under both pictorial and verbal print presentation modalities. (e) Instructional sequences did not interact with student aptitude.—*Journal abstract.*

3968. Deitz, Samuel M. & Repp, Alan C. (Georgia State U) Producing better performance in a behaviorally-taught college course by allowing earned exemptions from a final exam. *Improving Human Performance*, 1973(Win), Vol 2(4), 263-266.—Conducted an introductory course in the application of behavior analysis to human growth and development through behavioral methods for 2 quarters with 30 university students. In the 1st quarter, students could avoid taking the final examination by scoring above criterion on unit tests. Students in this quarter performed significantly better than students in the 2nd quarter who could not earn an exemption from the final.—*Journal abstract.*

3969. DeWaard, Richard J.; Jagmin, Nancy; Maisto, Stephen A. & McNamara, Patricia A. (U Wisconsin, Milwaukee) Effects of using programmed cards on learning in a museum environment. *Journal of Educational Research*, 1974(Jul-Aug), Vol 67(10), 457-460.—120 museum visitors over age 13 yrs viewed an exhibit with or without the benefit of programed cards. The presence or absence of feedback and the amount of information on a card were manipulated in a factorial design. The experimental groups were compared to control Ss who received only a test on the material, or who studied and were tested on the exhibit without benefit of the cards. Analysis of posttest scores indicated that while the experimental groups performed significantly better than both control groups, no significant differences were found among the experimental groups. The data compared to that obtained by C. G. Screven (1974) support the hypothesis that the cards directed the visitor's observing behavior.—*Journal abstract.*

3970. Dowsey, M. W. **Easy author-entry systems: A review and a prototype.** *International Journal of Man-Machine Studies*, 1974(Jul), Vol 6(4), 401-419.—Discusses the various types of easy author-entry systems that have been developed for use in computer-assisted instruction, describing the salient features of particular systems and suggesting where each type might be used. A prototype system is described whose design aims have concentrated particularly on the problems of ease of use, documentation, and standardization. (17 ref)

3971. Earp, N. Wesley. (North Texas State U) **Challenge to schools: Reading is overemphasized.** *Reading Teacher*, 1974(Mar), Vol 27(6), 562-565.—Recommends that in teaching a child who is doubtful of his capacity in reading or is unconvinced that he needs to learn to read, the teacher's motto might well be, "Cool it." Aid the child and give him opportunities to deal with his problems of ability, self-concept, social and cultural background, and basic motivation; but do so in a calm emotional climate. For such a child, reading as a set of formal tasks would thus be de-emphasized. However, reading would continue to be seen as a natural learning process for many or most people.—P. D. Leedy.

3972. Esveltdt, Karen C.; Dawson, Patrick C. & Forness, Steven R. (U California, Los Angeles) **Effect of videotape feedback on children's classroom behavior.** *Journal of Educational Research*, 1974(Jul-Aug), Vol 67(10), 453-456.—Used video feedback in a classroom setting with 3 10-yr-old boys who had exhibited disruptive behavior. With observable classroom performance as a dependent variable, comparison was made of the effects of the standard teacher conference, video feedback, and video feedback accompanied by discussion. Results indicate that viewing their own performance in the classroom provided an effect on Ss' classroom behavior quite beyond that expected from teacher discussion alone.—*Journal abstract.*

3973. Fleischer, Anne-Vibeke. [School psychology in the classroom.] (Danh) *Skolepsykologi*, 1974, Vol 11(3), 196-216.—Points out that many of the common problems mentioned by teachers and pupils belong to the classroom group as a whole, and describes workable techniques for use by the teachers supported by school psychologists or special education teachers. Role-playing, group problem-solving, and guided discussions facilitated analysis, but results will depend on adapting the program to the individual classroom.—P. Mylov.

3974. Floyd, John R. & Lumsden, D. Barry. (U Maryland) **Effects of frame size in teaching vocabulary development with programmed instruction.** *Improving Human Performance*, 1973(Win), Vol 2(4), 267-272.—Investigated the effects of differential frame sizes (i.e., 1, 3, 7, and 12 words practiced per frame) in teaching the same set of vocabulary words to 80 6th graders. Differences in the relative effectiveness of the 4 frame sizes were found. Results show that, for Ss engaged in vocabulary development, programs with a 3-word frame size led to greater learning.—*Journal abstract.*

3975. Fricklas, Robert & Rusch, Reuben. (State U New York, School of Education, Albany) **Trimodal reading instruction with inefficient learners.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 44-52.—Evaluated the teaching effectiveness of Trimodal Programmed

Instruction in Reading with inefficient learners who were making limited or no progress in their elementary school reading programs despite other remedial procedures. Based on their performance on a criterion pretest, 9 2nd, 3rd, and 4th graders were assigned to either a full remedial program or a partial program. Work recognition and comprehension skills were fostered by having the pupil actively construct sentences by placing plaques associated with whole words on an interface. A policy of limited supervision and limited directive guidance was employed. Results indicate the Ss in both full and partial programs improved dramatically on work recognition and comprehension tasks when post tested.—C. L. Nicholson.

3976. Fromberg, Doris P. (Hofstra U) **British primary schools: Ideals and realities.** *Elementary School Journal*, 1974(May), Vol 74(8), 468-480.—Describes the open-school characteristics of some British elementary schools. Children and teachers are reported to be "calm, occupied and involved" in the processes of elementary education. Teacher supervision is not so continuous in British schools as in American ones. Also, the change in atmosphere and approach that takes place in American schools between kindergarten and 1st grade is postponed in the British system until children are about 8½ yrs old. The shift to "openness" in British elementary schools has reoriented the testing program; it no longer appraises a child in terms of grade- or age-norms but in terms of his own environment. Emphasis on pupil activity has developed novel ways to teach the scientific method, such as counting the number of heartbeats before and after a child runs for 2 min. The overall concept is that the teachers should assist the children in learning to learn.—A. J. Ter Keurst.

3977. Giroux, Roy F. & Pietrofesa, John J. (St Clair Coll, Windsor, Ontario, Canada) **New directions for disadvantaged adults in the community college.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 156-162.—Discusses the need for new methods of helping disadvantaged adults and youth through community colleges, and suggests that Canadian community colleges can help in the delivery of educational and service programs to disadvantaged students. A life-skills program to assist disadvantaged adults in obtaining employment opportunities is described. The need for faculty to respond to the culturally different, for a new curriculum which has been modified to their needs, and for new teaching consistent with learning styles of the alienated is discussed. Specific program guidelines are presented. (French summary) —*Journal abstract.*

3978. Groff, Patrick. (California State U, San Diego) **The topsy-turvy world of "sight" words.** *Reading Teacher*, 1974(Mar), Vol 27(6), 572-578.—Reviews the literature on sight words and their teaching in beginning reading. It is concluded that most statements made by modern writers about how children recognize sight words are wrong. However, evidence is presented in support of the opinion that "teaching each whole word as a single entity" is currently in bad repute.—P. D. Leedy.

3979. Gross, Susan ; Carr, Martha L.; Dornseif, Allan & Rouse, Sally M. (Matteson School District, IL) **Behavioral objectives in a reading skills program,**



grades 4-8. *Reading Teacher*, 1974(May), Vol 27(8), 782-789.—States 5 assumptions and outlines the following program objectives based on them: word recognition, vocabulary development, interpretive comprehension, literal comprehension, analytical comprehension, study skills, enriched reading, and composition.

1980. Hall, Vernon C. & Turner, Ralph R. (Syracuse U) **The validity of the "different language explanation" for poor scholastic performance by black students.** *Review of Educational Research*, 1974(Win), Vol 44(1), 69-81.—Contends that it would serve no useful purpose to teach English as a second language to speakers of Negro nonstandard English if the goal is to improve comprehension of standard English. The key may lie in a careful study of integration to determine the benefits gained when different cultures learn from each other. It is indicated that no research or demonstration project has yet been concerned with maximizing the values of integration. More effort should be directed toward studying universals of cognitive development rather than relatively superficial differences such as spoken dialects. (2 p ref)—P. D. Leedy.

1981. Herbert, Gwyneth F. (Metropolitan West Area Office of Education, Parramatta, NSW, Australia) **Education through music: An initial assessment of the performance of a group of 150 first grade children whose programme has included Kodaly based music training.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 15-23.—Found that the 150 1st graders who had received Kodaly music training were better equipped than a comparable group who had not received the training, in the functioning areas of discrimination, closure, sequencing, and recall.

1982. Hood, Joyce. (U Iowa, Children's Reading Clinic) **Why we burned our basic sight vocabulary cards.** *Reading Teacher*, 1974(Mar), Vol 27(6), 579-582.—Warns that a good reading exercise can easily go bad if it becomes an end in itself rather than only a means to an end. Some teachers use the Basic Sight Vocabulary as though it were the end rather than the means. They find the words so important and the box of cards so convenient for practicing them that flipping through the cards becomes a major part of the remedial program. When that happens the cards had better be destroyed.—P. D. Leedy.

1983. Houston, J. G. & Pilliner, A. E. (U Edinburgh, Moray House Coll of Education, Scotland) **The effect of verbal teaching style on the attainment of educational objectives in physics.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 163-174.—Observed 6 teachers in a longitudinal study of the cognitive and affective effects of different teaching styles (as identified by N. A. Flanders's 1970 interaction analysis technique) on the learning of physics by 14-16 yr old pupils following a course for the Scottish Certificate of Education. Analyses of variance and covariance revealed that the open-ended style achieved the more complex cognitive educational objectives more successfully than did either the intermediate or expository styles. On the whole, the open-ended procedure was the most successful in developing favorable attitudes towards physics. (19 ref)—*Journal abstract*.

1984. Hunter, Walter E. (Meramec Community Coll, St Louis, MO) **Self-directed learning at Meramec Community College: An alternative to traditional practice.** *Improving Human Performance*, 1972(Mar), Vol 1(1), 13-23.—Results of an experimental self-directed learning program with over 400 college students indicate that (a) many students can assume a major responsibility for their own learning; (b) costs for self-directed and traditional instruction are about the same; and (c) on the basis of course grades, Ss achieved more than students in traditional courses.

1985. Jamison, Dean; Suppes, Patrick & Wells, Stuart. (Educational Testing Service, Princeton, NJ) **The effectiveness of alternative instructional media: A survey.** *Review of Educational Research*, 1974(Win), Vol 44(1), 1-67.—Reviews research on the effectiveness of alternative instructional media: traditional classroom instruction, instructional radio, instructional TV, programmed instruction, and computer-assisted instruction. It is concluded that students learn effectively from all these media. Few studies indicate that one medium is significantly different from another. The key to productivity is not that technology should replace teachers, but that it should be used to make teachers more productive. Technology has thus far been primarily an enrichment of the individual student's experience, but it has seldom, if ever, increased system productivity. It has not yet proved that it can play an important role in American schools. (8 p ref)—P. D. Leedy.

1986. Johnson, Roosevelt & Harshman, Carl L. (Ohio State U, Office for Minority Affairs) **A black experience seminar: An appraisal of impact.** *Journal of Non-White Concerns in Personnel and Guidance*, 1974(Apr), Vol 2(3), 157-171.—Evaluates a black experience seminar that was presented as part of a concerted inservice staff development program aimed at reducing the discrepancies between educational achievements of black and white students in an Ohio school district. Results of a survey indicate that (a) 98% of the seminar participants felt that the seminar was worthwhile, (b) 64% felt that the seminar would eventually have an impact on the school system (31% were undecided), and (c) 88% felt that the materials and references distributed and cited in the seminar were helpful in understanding the dynamics of the black experience. When asked whether they had ample opportunity to express views and ask questions, 17% of the participants felt that such time was inadequate, and 5% were undecided.—M. E. Pounsel.

1987. Judd, Wilson A.; O'Neil, Harold F. & Spelt, Philip F. **Individual differences and learner control: II. Investigation of control over pictorial mediators in computer-assisted instruction.** *US AFHRL Technical Report*, 1974(Jul), No 74-30, 70 p.—Describes Phase 3 of a 3-phase investigation; Phases 1 and 2 are described in volume I (see PA, Vol 53:Issue 1). The learning task for Phase 3 was the identification of edible plants and their critical features and edible parts. Experimental hypotheses centered on the affective advantages of learner control, personality variables which influence the use of learner control, and the instructional effectiveness of pictorial mediators under learner control. 3 experimental groups were used. A Treatment Present (TP) group received a facilitating treatment (pictorial mediators). A

Treatment Absent (TA) group did not receive the treatment, and the Learner Control (LC) group had control over the availability of the treatment. In performance, there was a significant difference between the TP and TA groups, TP having the highest mean performance. This proved that the facilitating treatment was an effective learning variable to be placed under learner control. Performance of the LC group excelled that of the TA group and did not significantly differ from that of the TP group. The presumed affective advantage of learner control was not shown. Of the 2 personality measures used, Rotter's Internal-External Control Scale and the Achievement via Independence (Ai) scale of the California Psychological Inventory, only the Ai predicted individual differences in learner control behavior. The best predictor of learner control behavior and performance was a task-specific measure developed for this project.—*Journal abstract.*

3988. Judd, Wilson A.; O'Neill, Harold F. & Spelt, Philip F. (U Texas, Austin) **Individual differences and learner control: I. Program development and investigation of control over mnemonics in computer-assisted instruction.** *US AFHRL Technical Report*, 1974(Jul), No 74-3, 120 p.—Describes 2 phases of a 3-phase investigation of the effect of learner control on performance and anxiety in a computer-assisted task. Phase 1 developed a 2-hr instruction program on the identification of edible plants, run on an IBM instructional system. Phase 2 attempted to determine the effectiveness of learner control. Ss were 162 university undergraduates divided into 4 groups. Group 1, Treatment Present (TP), received a presumably facilitating treatment (mnemonic devices relating plant names to their critical features); Group 2, Treatment Absent (TA), did not. Groups 1 and 2 served as control groups. Groups 3 and 4 were given learner control over access to the mnemonics but differed as to the amount of instruction they received on the use of learner control. Comparison of TP and TA performance showed that presentation of the mnemonic devices did not have the hypothesized facilitating effect. Consequently, providing access to mnemonics via learner control did not reduce state anxiety or produce better performance than that of the TA group. Relationships between individual differences variables and learner control were complex; they indicate, however, that these variables interact significantly with learner control, given a generally facilitating treatment placed under learned control. For Phase 3, see PA, Vol 53:Issue 1.—*Journal abstract.*

3989. Kingsley, Edward H. & Stelzer, John. (HumRRO, Alexandria, VA) **A theoretical basis for individualized instruction.** *US AFHRL Technical Report*, 1974(Jul), No 74-10, 120 p.—Formulates a theoretical basis for a model of individualized instruction. The theory is semiaxiomatic in nature so that the definitions and assumptions used are stated explicitly. Set theory and symbolic logic are the conceptual tools used. The model includes theories of subject-matter structure and student-state description. These are related by an overall instructional model. A main result shows how subject-matter structure constrains student-state transitions through a subject matter. An application of the subject-matter theory is made to an existing Air Force course. A

number of open problems are given whose further investigation would help make the model a more practical instructional tool. (23 ref)—*Journal abstract.*

3990. Landry, Richard G. (U North Dakota) **A comparison of second language learners and monolinguals on divergent thinking tasks at the elementary school level.** *Modern Language Journal*, 1974(Jan), Vol 58(1-2), 10-15.—Studied the effect of foreign-language learning in the elementary school (FLES) on divergent thinking abilities. 2 pairs of FLES and non-FLES schools were matched for population, city area, and socioeconomic status. Equal numbers of male and female, FLES and non-FLES Ss were randomly selected from each pair, resulting in a sample of 64 1st graders, 80 4th graders, and 80 6th graders. None came from bilingual homes. Divergent thinking was measured by the Torrance Tests of Creative Thinking, producing 6 total scores. Analysis of variance of the results showed that, as expected, no significant differences between FLES and non-FLES Ss emerged for the 1st graders. At the 4th grade level, there was no significant difference between FLES and non-FLES groups when compared within sexes, but when the data were pooled across sex, 5 of the 6 divergent thinking measures were in favor of the FLES group. The FLES 6th graders scored significantly higher ( $p > .05$ ) than the non-FLES 6th graders on all divergent thinking measures, but again only when the data were combined across sex.—C. A. Sherrard.

3991. Landry, Richard G.; Schilson, Elizabeth & Pardew, E. Michelle. (U North Dakota) **Self concept enhancement in a preschool program.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 39-43.—Investigated the effects of a preschool self-concept enhancement program on a group of 4-yr-old middle-class children from diverse ethnic backgrounds. Self-concept was measured by Ss' pre- and posttest scores on the Thomas Self-Concept Values Test and by teachers' reports on the Developmental Profile (H. Bessell et al). Significant increases in self-concept were found on 14 variables in the experimental group. More significant gains in self-concept were made on 5 variables by the experimental group when compared to a control group. It is concluded that self-enhancing education does increase a person's conception of self at the preschool level.—*Journal abstract.*

3992. Lefley, Harriat P. (U Miami) **Effects of a cultural heritage program on the self-concept of Miccosukee Indian children.** *Journal of Educational Research*, 1974(Jul-Aug), Vol 67(10), 462-466.—Investigated the effects of a 10-wk Indian culture program on the self-concept (SC), self-esteem (SE), and Indian self-esteem (ISE) of 20 7-14 yr old Miccosukee reservation children. The 3 variables were measured by means of the Piers-Harris Children's Self-Concept Scale, semantic differential scales, and specially developed tests of ISE. Controls, paired for sex and age, were 20 Seminoles of the same ethnolinguistic group. The Miccosukees were unchanged in global SC, but showed a highly significant rise in SE (actual-ideal-self discrepancy), in preference for Indian over Anglo stimuli, and in the posttest correlation between SC and ISE. SE change in both groups was primarily due to modification of the ideal self. Results are interpreted in terms of dissonance



theory, and their implications for self-concept testing are discussed.—*Journal abstract.*

3993. McCleskey, Joyce. (Troy State U, Reading Ctr, Fort Rucker) **Specific language training as a method of facilitating reading readiness for a select group of first grade children.** *Southern Journal of Educational Research*, 1974(Spr), Vol 8(4), 236-254.—Attempted to determine if specific experimental procedures in paradigmatic language would cause differences in reading-readiness test achievement among 58 experimental, placebo, and control 1st graders. Analysis after structure training indicated that paradigmatic language training did not significantly affect readiness test taking performance of these beginning 1st graders, nor was paradigmatic language a trainable skill at this level. These results suggest that paradigmatic language may be a developmental task in the language development domain.—*Journal abstract.*

3994. McLean, Leslie D. (Ontario Inst for Studies in Education, Toronto, Canada) **It's almost time for CAI.** *Interchange*, 1973, Vol 4(4), 35-47.—Argues that computer-assisted instruction (CAI) will soon be commonly used. Its features are those of a field undergoing development, showing all of the usual problems and inconsistencies. CAI instructional systems may eventually have responsibility for 25% of formal instruction. (34 ref)

3995. Miller, D. D. & Johnson, Gail. (U Missouri, St Louis) **What we've learned about teaching reading to Navajo Indians.** *Reading Teacher*, 1974(Mar), Vol 27(6), 550-554.—Describes teaching Navajo Indians to read as being a problem of cultural differences. Once the bicultural problem is solved and the Navajo student begins to acquire a reading vocabulary of English words, he develops a liking for reading and an increasing mastery of reading skills. Recent surveys have shown increasing Navajo interest in reading. As more English is spoken at home and as the native cultural background improves, children from the reservation are capable of mastering more quickly the technical principles involved in learning to read.—P. D. Leedy.

3996. Mueller, Theodore. (U Kentucky) **Another look at how to teach listening and reading comprehension.** *Modern Language Journal*, 1974(Jan), Vol 58(1-2), 19-23.—Presents foreign-language comprehension exercises based on a theory that comprehension involves 3 levels: sensing the gross syntactic envelope, segmenting, and recoding. Sentences are first presented with emphasized prosody and extended pauses to exaggerate the envelope. Segmentation into clauses follows, stressing within-clause syntactic patterns. Segmentation into vocabulary items is the final stage.

3997. Newman, Morris I.; Williams, Reed G. & Hiller, Jack H. **Delay of information feedback in an applied setting: Effects on initially learned and unlearned items.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 55-59.—94 undergraduates enrolled in an educational psychology course read an assigned article of about 3,700 words. A 30-item multiple-choice test was then administered and followed by 1 of 4 treatments: no feedback, immediate feedback, 1 day delayed feedback, or 7 days delayed feedback. A retention test, consisting of the original items and distractors randomly reordered, was

administered 7 days after the feedback. No overall differences in performance were observed. Likewise, there were no significant differences for the test items analyzed according to initial performance or according to item difficulty. Questionnaire data indicated that immediate feedback stimulated the most rereading. These results raise questions as to the importance of controlling feedback intervals carefully in applied instructional settings.—*Journal abstract.*

3998. O'Day, Rory. (U Waterloo, Ontario, Canada) **Reality teaching: The self-analysis classroom.** *Interchange*, 1974, Vol 5(1), 36-45.—Suggests that classrooms should be structured in such a way that students are able to engage in direct self-analysis of their own behavior. Students should learn to distinguish between how they are behaving and how they think they are behaving. Topics discussed include the role of the teacher, the reactions of students, phases of group development, and applications of the self-analysis method. (20 ref)—H. E. Yucker.

3999. Oller, John W. & Nagato, Naoko. (U New Mexico) **The long-term effect of FLES: An experiment.** *Modern Language Journal*, 1974(Jan), Vol 58(1-2), 15-19.—Investigated the extent to which foreign language instruction in the elementary school (FLES) confers superior FL proficiency in the secondary school. 233 female FLES and non-FLES Ss were selected in paired groups from Grades 7, 9, and 11 at a Japanese secondary school. Their FL proficiency in English was tested by 3 50-item cloze tests, 1 test for each grade. IQ was controlled for. Results show a significant difference ( $p < .001$ ) between FLES and non-FLES 7th graders. In the 9th grade the difference was still significant ( $p < .025$ ), but by the 11th grade the difference was insignificant. It is concluded that since FLES and non-FLES students receive the same FL instruction from 8th grade onwards, FLES students may mark time after this point, which would allow the non-FLES students to catch up with them. The alternative conclusion is that, although FLES confers some initial advantage in secondary school, this is soon lost in the face of the ability of non-FLES students to catch up.—C. A. Sherrard.

4000. Porterfield, Denzil. (U Houston) **Influence of inquiry-discovery science preparation on questioning behavior of reading teachers.** *Reading Teacher*, 1974(Mar), Vol 27(6), 589-593.—Suggests that the types of questions recommended by authors of basic reading series be analyzed to reveal the extent to which the guide questions proposed in the teachers' manuals facilitate the teaching of thinking skills. When the questions are deficient in stimulating thought, supplementary guide questions can be developed. This would enable teachers desiring to achieve a particular cognitive or affective goal to incorporate an effective strategy of questioning into teaching which otherwise might not achieve the desired result.—P. D. Leedy.

4001. Powers, Richard B. & Edwards, K. Anthony. (Utah State U) **Performance in a self-paced course.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 60-64.—Describes the performance of 92 students in an individually paced course in introductory psychology. Ss were required to complete 30 units of material by oral

interviews and every 3rd unit was followed by a written exam. It was found that the earlier an S started to work, the sooner he finished the course, and that more of those who started early completed the course than those who started later. Individual exam records showed that patterns of exam-taking could not be characterized by any single mode. Fixed-ratio, fixed-interval, and pacing schedule patterns of responding were obtained. Most of the Ss who withdrew from the class did so after completing 1 of the 1st 3 exams and there was no history of exam failure associated with these Ss. Early finishers had a slightly more favorable attitude toward the course than late-finishers. Among Ss who indicated a change toward majoring or minoring in psychology, the change was greater for those who finished early. A major implication of this study is that students should be reinforced for starting to work early in a self-paced class since it maximizes the probability that the student will complete the course. (16 ref)—*Journal abstract*.

4002. Ryan, Frank L. (U California, Riverdale) **The effects on social studies achievement of multiple student responding to different levels of questioning.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 71-75.—Exposed 5th and 6th graders to high- or low-level materials (e.g., aerial photographs) and questions on geographical themes. On subsequent achievement tests, Ss responded at levels consistent with the questions posed; both groups outperformed a control group that was taught geography without the materials or questions. (19 ref)

4003. Santhanam, M. R. (Maharaja Sayajirao U Baroda, Ctr of Advanced Study in Education, India) **Some strategies of effective teacher classroom behavior.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 72-75.—Observed 32 randomly selected teachers from comparative and private schools for 6 hrs each, using N. A. Flanders's interaction analysis category system (see PA, Vol 44:21578), to test teacher strategies of transition from (a) short question-short answer to repeated student discussion or (b) short question-short answer to open-ended interchange. Pearson product moment correlations of  $-.17$  (not significant) were found for the (a) sequence and of  $.59$  ( $p < .01$ ) for the (b) sequence. Results suggest that a strategy of open-ended questions eliciting initiation-type responses can facilitate the creative inquiry cycle.—*J. B. Francis*.

4004. Sawyer, Diane J. (Syracuse U) **The diagnostic mystique: A point of view.** *Reading Teacher*, 1974(Mar), Vol 27(6), 555-561.—Criticizes the prevailing attitude that a skill-oriented assessment of a child's reading behavior by a reading expert is the last word in diagnostic workups and that if skill deficiencies can be specified accurately the child will progress. This approach is considered too simple. Suggested remedies are to create learning environments favorable to the attainment of concepts, motivation, and flexible cognitive strategies.—*P. D. Leedy*.

4005. Sepe, Robert. (Montclair State Coll) **An empirical evaluation of an automated cognitive-psychomotor self instruction application.** *Improving Human Performance*, 1973(Win), Vol 2(4), 273-278.—The historical growth of self-paced instructional modules often has been restricted to programing verbal skills. In the present

study 2 cognitive-psychomotor tasks (dry mounting and laminating) were programed, and a hardware delivery system, featuring an autoprogram stop and slide synchronization capability, was developed and tested with 60 undergraduate students. Data disclosed that the system can be successfully used to instruct cognitive-psychomotor tasks which formerly were instructed by teachers on a one-to-one or small group basis.—*Journal abstract*.

4006. Stendig-Lindberg, G. (Karolinska Hosp, Stockholm, Sweden) **Some comments on the sex education in Sweden and on the goals of sex education.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Jun), Vol 12(2), 107-110.—Comments on some of the current books and pamphlets used in Swedish sex education programs and on the ideal goals of sex education programs in general. The need to emphasize responsibility and the unity of sexual and emotional behaviors in sex education programs is examined.

4007. Sullivan, Joanna. (Pennsylvania State U, Capitol Campus, Middletown) **Open—traditional—what is the difference?** *Elementary School Journal*, 1974(May), Vol 74(8), 493-500.—Tested 22 pupils from an open classroom and 26 from a traditional classroom for significant differences in creative thinking, creative writing, independence in decision-making, and self-confidence in a new situation. Ss in both groups were 5th graders matched for intelligence and sociocultural backgrounds. Open-class Ss performed better in invention ( $p < .001$ ) and in fluency with words ( $p < .001$ ). No significant differences were found between the mean scores of the 2 groups on fluency of ideas and ability to predict outcomes. In creative writing, open-classroom Ss surpassed traditional classroom Ss in variety of sentence structure and in production of vivid passages, but not in usage of unusual words and originality of topics. Open-classroom Ss were also superior in all but 2 of the 8 questions in a checklist that indicated the S's independence in task performance. In interviews with undergraduates, open-classroom Ss were more flexible in responses, more spontaneous, and less self-conscious than Ss from the traditional classroom.—*A. J. Ter Keursi*.

4008. Sullivan, Joanna. (Pennsylvania State U, Middletown) **Receptive and critical reading develops at all levels.** *Reading Teacher*, 1974(May), Vol 27(8), 796-800.—Receptive reading skills are those that help the reader to recall what he reads. Critical reading should not be confined to the upper grades. It is suggested that its development should begin in the primary grades; kindergarten children should be taught how to make judgments, predictions, and comparisons among sources of information.

4009. Taylor, P. H. (U Birmingham, England) **Lecturer's perceptions of the influence of ideas on the curriculum of colleges of education.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 131-139.—Using ratings by lecturers in 7 colleges of education, the degree of influence of 20 relevant ideas on the operational curriculum of the college was examined. Results suggest that progressive, child-centered ideas were very influential, and that the ideas fell into discernible groupings, each of which may influence courses of study.



4010. Thomas, Rex & Sims, John A. (Iowa State U of Science & Technology, Computation Ctr) **Effects of chance in an animal selection simulation on college students' attitudes toward simulation.** *Journal of Educational Research*, 1974(Jul-Aug), Vol 67(10), 448-452.

—Investigated the influence on student attitudes of using a random variable to simulate real world phenomena in an instructional simulation. Randomly assigned groups of college juniors ( $N = 74$ ) participated in 2 versions (one realistic and one favorably skewed) of an animal selection simulation as an integral part of a college course. Analysis revealed no significant differences between the attitudes of the 2 groups toward the simulation. However, ex post facto analysis of groups defined by "success" in the simulation revealed a highly significant difference in frustration where the results were publicly posted. Results suggest that the administration of a simulation has greater influence on student attitudes than does the random behavior of the model. —*Journal abstract.*

4011. Thompson, Gerald W. (Old Dominion U) **The effects of ability grouping upon achievement in eleventh grade American history.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 76-79.—Tested the assumption that homogeneous ability grouping reduces the range of learning differences when compared with heterogeneous (random) grouping and that this narrowing of range aids the teaching and learning process. The assumption was not upheld; heterogeneous students showed significantly greater achievement gain in 11th-grade American history at 4 ability levels than did homogeneous students.

4012. Walker, Decker F. & Schaffarzick, Jon. (Stanford U) **Comparing curricula.** *Review of Educational Research*, 1974(Win), Vol 44(1), 83-111.—Reviews experiments since 1957 that compared the achievement of students using innovative curricula with that of students using traditional curricula. It is tentatively concluded that the new curricula are not uniformly superior to the old ones (although this may be true) but rather that different curricula are associated with different patterns of achievement. The philosophic position with respect to these findings is summarized: "Stop thinking of the curriculum as a fixed race course and begin to think of it as a tool, apparently a powerful one, for stimulating and directing the active learning capacities which are ultimately responsible for the achievement we want from schools." (2 p ref)—P. D. Leedy.

4013. Willis, Jerry. (U Guelph, Ontario, Canada) **Effects of systematic feedback and self charting on a remedial tutorial program in reading.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 83-85.—3 elementary school children with reading problems were tutored by undergraduates. After a baseline tutoring condition Ss were given different-colored chips for correctly and incorrectly read sentences. Ss counted their chips and recorded them on a graph. This feedback and self-charting substantially increased the rate of sentences read correctly and for 2 Ss reduced the error rate. (19 ref)

4014. Woody, Robert H. (Ohio U) **Educational television programming and school health.** *Journal of School Health*, 1974(May), Vol 44(5), 246-249.—Discusses the potential role of the school health professional in

educational television programming. A framework and brief literature review on the relationship between television and human behavior is presented and suggestions for school health workers and members of the community to maximize the benefits of educational television in the school are discussed. 5 recommended courses of action are presented, each emphasizing an active participatory role by the school health worker in the design, development, and production of educational television programs.—R. J. Ambrosino.

4015. Yaney, Joseph P. (Ohio State U) **A critical review of the instructional technology mechanism of task analysis.** *Improving Human Performance*, 1974(Sum), Vol 3(2), 64-70.—Discusses task analysis as a respected part of the total instructional programming process and examines the cost-benefit and operational-cost models of task analysis. 2 reasons are proposed for the fact that people respect, but do not use, the process. The 1st is that the ability to make a nonempirical field estimate of initial and terminal behaviors is thought to be highly developed. The 2nd involves the high, often prohibitive, cost of field data gathering techniques. —*Journal abstract.*

#### Academic Learning & Adjustment & Achievement

4016. Batty, W. R. & Wankowski, J. A. (U Birmingham, England) **Admission grades, temperament and degrees of chemistry students.** Birmingham, England: University of Birmingham, 1974. 26 p.—Presents a study of the interrelationships between admission grades, the selection and consistency of academic and learning styles during the transition from secondary school to the university, and personality based on data from a sample of students in a department of chemistry in one university. Comparisons with other student groups are presented, and implications for educational planning and counseling are discussed.

4017. Bayer, Alan E.; Royer, Jeannie T. & Webb, Richard M. (American Council on Education, Office of Research, Washington, DC) **Four years after college entry.** *ACE Research Reports*, 1973(Mar), Vol 8(1), 45 p.—Presents a statistical summary of a follow-up study of 34,346 students who had been part of an American Council on Education survey of entering freshmen 4 yrs earlier. Short descriptive highlights of the results indicate that students (a) became more liberal over 4 yrs with respect to campus and social issues, (b) seemed less inclined to strive for status and financial success, and (c) tended to shift their career choices away from the harder sciences toward the social sciences and education. Analysis continues on these data which are available to educational researchers for further studies.—J. B. Francis.

4018. Bonniol, Jean-Jacques & Henry, Christine. (National Ctr for Scientific Research, U Provence, Marseille, France) **[Class organization by group level: Study of modes and certain results after one year.]** (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 9-27.—Studied the effects of dividing 23 French children entering the 2nd yr of secondary school (approximates US 7th grade) into 10 high-, 8 medium-, and 5 low-ability groups in French and mathematics. Ss were compared to a control group of 23 pupils who were not grouped

according to ability and who were taught by the same teachers. For experimental Ss, assignment to ability level was based on teacher recommendations at the end of the preceding grade under generally stated criteria of scholastic achievement, aptitude test scores, rate of progress, and general impression. Groups were compared in terms of teacher communication in class (similar in mode in experimental and control groups, atypical of traditional mode) and end-of-year results in mathematics and French grammar and composition. Significant differences between experimental and control groups were not found in grades given by the teachers, amount of improvement, or scores on standardized tests. Analysis by level within the experimental group indicated that differing teacher expectations for the 3 groups may have influenced results. (English summary)—E. E. Brown.

4019. Brooks, William & Emery, Lawrence. (Nova Scotia Teachers Coll, Truro, Canada) **College dropouts: A view from two schools.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 146-151.—Mailed a questionnaire to students who withdrew from 2 academic institutions—a teachers' college and a state university—to study their reasons for leaving. The responses of the 113 Ss who returned the questionnaire were classified into 5 categories: academic, health and family, financial, school environment, and other. The most important reason for withdrawal appeared to be the students' feeling that the institution did not offer an academic experience that met their personal objectives. (French summary)—*Journal abstract*.

4020. Cusin, Prune & Piolat, Michael. [Self-evaluation of performance: Some scholastic and intellectual determinants.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 43-57.—Conducted a study with 3 groups of male students with mental ages of 10-11 yrs from 3 educational institutions. 16 Ss were in a regular scholastic regime, 29 were in a "transition" class (4th or lowest secondary school track), and 17 were in a specialized class for pupils with poor scholastic records. Ss were asked to give both a general estimate and an analytic evaluation of their performance immediately following completion of a vocabulary task. Although it was hypothesized that pupils with poor records who had experienced repeated failures would undervalue their performance, results show that both the 4th track and the specialized classes overestimated their performance. It is suggested that the findings might have been a result of the protected atmosphere of the specialized class in which praise and encouragement is the rule and errors tend to be overlooked or de-emphasized, leading to an unrealistic concept of achievement. (English summary) (23 ref)—E. E. Brown.

4021. Di Marco, Nicholas. (U Missouri, St Louis) **Life style, learning structure, congruence and student attitudes.** *American Educational Research Journal*, 1974(Spr), Vol 11(2), 203-209.—Studied the effects of congruence of the life styles of 10 English teachers with those of 196 of their 11th-grade students. Congruence scores were computed for teachers' life styles and students' attitudes toward the teacher, classroom, and learning structure. Results suggest (a) that students' attitudes toward teachers were related somewhat to the

degree to which they shared certain values and (b) that a student's attitude toward his classroom corresponded somewhat to the degree to which the classroom conforms to his life style. (23 ref)—E. J. Mason.

4022. Feichtner, S. H. & Burstyn, J. N. (Carnegie-Mellon U) **Development of individualistic behaviors in the classroom.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 12-17.—Identifies 4 behavior patterns exhibited by students in the classroom: an active learning pattern, a passive learning pattern, a nonparticipative pattern, and a disruptive pattern. Each behavior pattern is a result of the matching or mismatching of a student's affective and cognitive skills with the demands of the classroom environment. Each behavior pattern is characterized by 3 stages—tentative, testing, and patterned—where the student perceives the possibility of reward for a certain behavior, tests whether this reward can be produced on demand, and finally adopts a behavior pattern. It is concluded that shifts in behavior patterns are possible at each stage of development if appropriate changes are made in the classroom environment, but that each stage of each pattern has its own discrete shift and remedy.—*Journal abstract*.

4023. Gruber, Joseph J. & Kirkendall, Don R. (U Kentucky) **Relationships within and between the mental and personality domains in disadvantaged high school students.** *American Corrective Therapy Journal*, 1973(Sep), Vol 27(5), 136-140.—Tested 91 14-17 yr old students in Grades 9-11 and examined whether any differences exist in the nature of relationships between personality traits of the disadvantaged and others. It was found that both high- and low-achieving gifted students from disadvantaged environments displayed more desirable personality scores than others. A low degree of relationship among intelligence variables was also reported. (21 ref)—R. S. Albin.

4024. Hensley, Bonnie. (Stephen F. Austin State U) **The relationship of selected oral language, perceptual, demographic, and intellectual factors to the reading achievement of good, average, and poor first grade reading groups.** *Southern Journal of Educational Research*, 1974(Spr), Vol 8(4), 256-271.—Administered the Metropolitan Achievement Test, Primary I battery, to 45 1st graders. Ss were ranked as good, average, or poor readers and were given additional tests to measure the language or perceptual skill areas of auditory discrimination, auditory memory, spatial relations, eye-motor coordination, form constancy sentence length, T-units, and percentage of different words in oral discourse; socioeconomic status (SES) was also considered a variable in the study. Findings show that oral language and auditory perceptual skills did not seem to differ among groups. The role of visual perceptual tasks was substantiated to a limited degree by the investigation. Additionally, SES was not a factor capable of discriminating among good, average, and poor 1st-grade reading groups. (23 ref)—*Journal abstract*.

4025. Hurtig, Marie-Claude; Hurtig, Michel & Paillard, Monique. (U Provence, Lab de Psychologie de l'Enfant et de l'Education scolaire, France) [Children's playground activities in nursery school and in primary school: Modifications in content and concepts of play.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4),



185-200.—Compared play activities of children in nursery and primary school in terms of social participation and play content. 12 boys and 12 girls were observed in upper nursery school and 5 boys and 5 girls in primary school. 6 boys and 6 girls were followed from nursery to primary school, and 20 boys and 20 girls through the 1st 3 mo of primary school. Nursery school play was characterized by greater variety, less structure, and a greater proportion of nonplay activity than primary school play (37% vs 14%). In the transition from nursery to primary school, differences in amount of structured play were more marked in girls than in boys. In semidirective interviews with 30 children, nursery children described their play without giving it a label. Primary school children would simply name the game, implying a commonly understood play culture. (English summary) —E. E. Brown.

4026. Jackson, Maxie C. & DePuydt, Diane. (Michigan State U, Coll of Urban Development) **Community service: An adjustment motif for minority students.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jan), Vol 2(2), 94-97.—Suggests that in addition to concern about their academic survival, minority students entering predominantly white institutions experience isolation, assimilation, and identity problems. A university-sponsored program, designed to assist in the academic and social adjustment of these students is presented, providing for linkage between students' current and background experiences, for reducing the pressures of assimilation into the campus value system by providing for positive and growth relationships with minority group members, and for promoting a positive self-concept by including students in a meaningful and needed program effort.—M. E. Pounsel.

4027. Kronick, Robert F. (U Tennessee) **Perception of organizational climate as an interactive factor between attitudes and behavior: The academic model.** *Southern Journal of Educational Research*, 1974(Spr), Vol 8(4), 280-290.—Investigated the relationship between attitudes toward learning and academic achievement. 195 junior high school students were administered a questionnaire that included the variables of organizational climate, perception of classroom climate, age, sex, race, and intelligence level; the dependent variable was academic achievement. Results indicate that in selected cases there were significant differences noted in academic behavior because of perception of the setting as "open" or "closed." There were, however, no significant differences between the achievement of males and that of females. Unlike L. G. Warner and M. De Fleur (see PA, Vol 45:4102), who placed the behavior setting as intervening with attitudes and action, it was felt that a more dynamic symmetrical bond was more likely the case with the setting being both antecedent and intervening with attitudes and actions. Thus, in the present study, there were nondemographic factors in explaining academic achievement.—M. E. Pounsel.

4028. Lachar, David. (Fafayette Clinic, Detroit, MI) **Prediction of early US Air Force freshman cadet adaptation with the MMPI.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 404-408.—Tested the predictive ability of MMPI scales to identify US Air Force Academy freshmen who were "high risk" for

problems of emotional adjustment and subsequent separation from the Academy. The entrance profiles from the freshman class ( $N = 1,389$ ) were screened for pathological signs by computer and by clinical evaluation. This screening process identified a 6% subsample of the total class that was labeled "high risk" on the basis of deviant profiles. Evaluation of the 165 cadets who had separated during a 2-mo interval indicated that the rate of attrition and problems in emotional adaptation leading to separation were significantly greater in the high-risk group than in the remainder of the freshman class.—*Journal abstract.*

4029. Lambert, Nadine M. (U California, Berkeley) **Intellectual and nonintellectual predictors of high school status.** *Journal of Special Education*, 1972(Fall), Vol 6(3), 247-259.—Compared assessments of intellectual and nonintellectual behavior of 300 children in the 2nd and 5th grades with their high school status as measured by evidence of successful and unsuccessful functioning and by dimensions of high school behavior derived from a factor analysis of data available in the high school record. Results demonstrate that among the intellectual predictors, elementary school grades predicted a greater range of high school behavior than did measures of intelligence. WISC IQ scores were better indicators of high school status than group IQ scores, and reading- and arithmetic-achievement scores were the least dependable predictors. Teacher, peer, and self-ratings were equally valid predictors of high school status. Results support the need for comprehensive assessments of individual behavior at the elementary level and the planning of educational programs congruent with the affective and intellectual needs of children. (19 ref)—*Journal abstract.*

4030. Lewis, John. (Winona State Coll) **Undergraduate ability-achievement and the earning of graduate degrees.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 383-385.—Investigated the relationship between membership in undergraduate ability and achievement groups and the attainment of advanced graduate and professional degrees later in life. The 874 Ss had graduated in 1948, 1954-1955, and 1959-1960. Results show that high ability and high achievement groups were most likely to obtain advanced degrees. However, a surprisingly large percentage of low-aptitude and high-achievement males completed advanced work.—*Journal abstract.*

4031. Long, Barbra H. & Henderson, Edmund H. (Goucher Coll) **Certain determinants of academic expectancies among southern and non-southern teachers.** *American Educational Research Journal*, 1974(Spr), Vol 11(2), 137-147.—Investigated academic expectancies of 120 teachers for hypothetical children entering school. Teachers rated stimulus children on the probability of learning to read in the 1st grade. Race, class, readiness test scores, activity, and attention of children were varied in a factorial design, with the latter 3 repeated measures. The teacher's background (southern or not) was a 6th independent variable. Results show significant effects for test scores, activity, and attention and 6 significant interactions. It is concluded that teacher expectancies are strongly influenced by both test scores and classroom

behavior, and that such effects may be either realistic or prejudiced. (20 ref)—*Journal abstract*.

4032. Lunemann, Alan. (U California, Berkeley) **Desegregation and achievement: A cross-sectional and semi-longitudinal look at Berkeley, California.** *Journal of Negro Education*, 1973(Fal), Vol 42(4), 439-446.—Studied the scholastic performance of all the pupils in the Berkeley schools to whom the Stanford Achievement Tests (SAT) were administered in Grades 1-3 in 1968-1970, and of those pupils known to have been in the district in 1968, on the basis of other measures, checked against their subsequent SAT scores in 1969 and 1970 in order to determine their eligibility for inclusion. In 1968 the Berkeley system went through voluntary desegregation. Results indicate that scores generally went up over the 3 yrs and pupils who remained in the district for 2 or 3 yrs did better than pupils who were tested in only 1 of those years.—*W. E. Sedlacek*.

4033. Lyons, James E. (Kentucky State U) **The adjustment of black students to predominantly white campuses.** *Journal of Negro Education*, 1973(Fal), Vol 42(4), 462-466.—Mailed a questionnaire to 140 colleges and universities in 1969. By the end of the school year in 1971, 48% had returned the questionnaire. Practically every school had a "Black/Afro-American History Week," and a "Black Art Festival" was the 2nd most popular activity. 62% placed major emphasis on political functions in their black student organizations. Although a few schools stated that 50% of the students were "militant," the average for all schools was 10%. When asked if the "militants" were in control, the respondents were evenly divided; 27 said yes and 27 said no.—*W. E. Sedlacek*.

4034. Mason, G. A. (U Waikato, Hamilton, New Zealand) **Ability grouping: An ethnographic study of a structural feature of schools.** *Australian & New Zealand Journal of Sociology*, 1974(Feb), Vol 10(1), 53-56.—Presents an ethnographic description of how children perceive their school experiences, especially with regard to ability grouping. 100 8-13 yr old children, drawn from all ability groupings, were interviewed. The ability groups established, and the apparent lack of mobility in the system, reinforced the children's concept of their ability in academic areas, principally reading. Children in low-ability groups found it hard to maintain the prestige acquired by others. The group allocation was interpreted as a sign of worth in a social system which places great value on high performance measured on academic criteria, but this allocation ignored other aspects of the individual's personal growth.—*Author summary*.

4035. McClure, Robert F. (Terrell State Hosp, TX) **Multivariate identification and prediction of university student problems.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 44-49.—Used the Omnibus Personality Inventory, the American College Test, the Willingness to Accept Limitations Scale, and self-report questionnaires to identify personality differences between 697 college students who did or did not have emotional problems. These personality differences were then used to predict emotional problems in other students ( $n = 187$ ). Personality differences on 7 measures predicted 3 kinds of emotional problems. The

technique predicted problems with the great silent majority of students who never ask for official help. This information can be used to plan preventive counseling or educational programs early in the college career of potential problem students.—*Journal abstract*.

4036. McIntosh, Barbara M.; Wilson, Lolita N. & Lipinski, Beatrice G. (Simon Fraser U, Burnaby, British Columbia, Canada) **The extent and nature of student attrition in the first five years at Simon Fraser University.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 163-174.—Received a 29% return ( $N = 1,208$ ) of questionnaires mailed to the 4,954 undergraduates who became voluntary and administrative dropouts at a Canadian university during the 1st 5 yrs of its operation. Analysis of the responses indicate that most students left in their 1st year of studies, and did not discuss their plans with university personnel but would have liked to talk with faculty and/or administrators. Ss attributed their reasons for withdrawal almost equally to academic difficulties, personal-emotional problems, and external-environmental pressures. Two-thirds of the Ss had resumed some type of formal study. Women were significantly less likely than men to become administrative dropouts. (French summary)—*Journal abstract*.

4037. Orlando, Charles & Lynch, Jerry. (Board of Cooperative Educational Services of Alleghany County, NY) **Learning disabilities of educational casualties? Where do we go from here?** *Elementary School Journal*, 1974(May), Vol 74(8), 461-467.—Presents several sociopsychological problems of the underachieving pupil. Among these are the lock-step school organization that militates against the progress of the atypical child, and the self-fulfilling prophecy of a misinterpreted testing program. Studies by K. De Hirsch and D. G. Doehring indicate the difficulty in using tests to differentiate between slow maturation in a child and his physiological or psychological problems in learning to read. The teaching program should focus on developing the children individually rather than on how well they conform to the school pattern. The curricula of the children have 2 mutually dependent aspects. In the instructional aspect the pupil learns academic skills and in the educational aspect he learns to apply these skills in his own life and experience. The pattern of an effective inservice program of elementary education is presented. (18 ref)—*A. J. Ter Keurst*.

4038. Pandey, R. E. (East Foothill Child Guidance Clinic, Duarte, CA) **A comparative study of dropout at an integrated university: The 16 Personality Factor Test.** *Journal of Negro Education*, 1973(Fal), Vol 42(4), 447-451.—Administered the 16 Personality Factor Questionnaire to 350 entering freshmen (219 whites, 131 blacks, 193 males, 157 females) at Lincoln University in Missouri in the fall of 1969. 75% of the white students achieved "good" academic standing, 11% became dropouts, and 14% were on probation at the end of the fall semester. 74% of the black students achieved "good" academic standing, 6% dropped out, and 20% were on probation at the end of the fall semester. Analyses of variance indicated ( $p < .05$ ) that the good students were humble and submissive while the dropouts were assertive, stubborn, and independent. Both dropouts and those on probation were assertive, stubborn, and



independent. Dropouts, however, were more intelligent and of stronger superego strength than probationers. —W. E. Sedlacek.

4039. Passi, B. K. & Lalithamma, M. S. (MSU Baroda, Ctr of Advanced Study in Education, India) **Self-concept and creativity of over, normal and under-achievers amongst grade X students of Baroda.** *Indian Journal of Psychometry & Education*, 1973, Vol 4(1), 1-11. —117 10th graders in Baroda high schools, classified as over-, normal-, and under-achievers were tested for self-concept and for creativity by means of the Personality Word List, Passi Tests of Creativity, and Madhooker Patel Intelligence Test. No mean differences were found among the groups in self-concept, but over-achievers were more creative. —J. B. Francis.

4040. Seefeldt, Carol. (U Maryland) **Who should teach young children?** *Journal of Teacher Education*, 1973(Win), Vol 24(4), 308-311. —Studied 31 teachers and 329 children in an urban Head Start program in Florida. The teachers' formal education was found to be significantly related to the achievement scores of the Head Start children.

4041. Seidl, Neil W. & McKeen, Ronald L. (Coll Racine, Milwaukee, WI) **More on the use of student generated learning hierarchies.** *Improving Human Performance*, 1974(Sum), Vol 3(2), 71-80. —Selected 12 high-ability and 12 low-ability Ss from among 60 university student volunteers on the basis of high school percentile rank, grade point average, and lack of knowledge of matrix algebra. Ss constructed learning hierarchies as they learned matrix algebra. The 2 groups did not generate different learning hierarchies. However, the low-ability group required more guidance and time to construct their hierarchy. —Journal abstract.

4042. Solari, Marie-José (CNRS Lab de Psychologie Scolaire et Lab de Psychologie Associé, U Provence, France) **[Mobilization in the nursery school child: An evaluation technique: Initial data.]** (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4), 159-169. —Rather than study attention as such, 2 aspects of mobilization, psychological tension and control of activity in writing and painting, were studied. Criteria in both activities were (a) total time spent working at the task and (b) distribution of work. In total time and in number of shifts between work and nonwork, average results for the 37 male Ss were almost identical in the 2 activities. Ss tended to spend more time working toward the early part of the 15 min allowed for each task. Pauses were longer and more frequent toward the end. Ss who spent the longest time working were also those who registered the most pauses; however, considerable intraindividual variation was noted. Teachers' ratings on characteristics associated with scholastic performance showed considerable interrelationship in the writing task but were not related to ratings of persistence in either task. (English summary) —E. E. Brown.

4043. Stambak, Mira. (CNRS, Paris, France) **[Failure at school: Is the child maladjusted—or is it the school?]** (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4), 143-149. —Argues that, while scientific findings do not permit the affirmation that there are no genetic differences in intelligence, neither do they permit affirmation to the contrary. Findings do affirm the decisive influence

of environmental interactions of the individual. Thus, the equation "school failure = maladjusted child" is rejected at least in part. The equation "school failure = maladjustment of the school" is not rejected and calls into question the school system in relation to its objective. (English summary) —E. E. Brown.

4044. Wilcox, B. (U York, England) **The teaching of serial tasks using chaining strategies.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 175-183. —Investigated the effect of chain length (short, medium, and long) and teaching strategy (backward chaining, forward chaining, and whole method) on the acquisition and retention of 2 types of chain or serial task: paper-folding (regarded as a motor assembly task) and numerical procedures. 176 female college freshmen were randomly assigned to 9 groups defined by chain length and teaching strategy in a 3 × 3 design. Within each group a motor and a number chain were taught by means of self-instructional programs, followed by practice to a criterion of 1 promptless trial. One wk later the tasks were relearned to the same criterion. No advantage was found for backward chaining in the case of the motor chains and the short and medium number chains. However, for the long number chain there was some indication that backward chaining was superior to forward chaining. Both methods were in general inferior to the whole method. (21 ref) —Journal abstract.

### Special Education

4045. Brothers, Roy J. (American Printing House for the Blind, Louisville, KY) **Arithmetic computation by the blind: A look at current achievement.** *Education of the Visually Handicapped*, 1972(Mar), Vol 4(1), 1-8. —Replicated the 1959 research by Nolan and Ashcroft which found that 75% of visually handicapped students in residential schools were below grade level in arithmetic achievement. The present investigation, which included most of the schools in the earlier study, showed that arithmetic achievement of Braille students did not improve over the decade between the 2 studies. Possible reasons for this lack of progress are considered: the caliber of students may not be what it was; there may be more programs for the visually handicapped in local schools; or other concomitant disabilities may be present among children attending residential schools. The use of manipulative devices, and grade level at which they are introduced, and their advantages and disadvantages are discussed. Once the abacus was introduced, the rate of achievement for students using it was greater than that of any group using other manipulative devices. —C. L. Nicholson.

4046. Brown, Lou et al. (U Wisconsin, Madison) **Teaching functional reading to young trainable students: Toward longitudinal objectives.** *Journal of Special Education*, 1972(Fal), Vol 6(3), 237-246. —Taught 2 5-yr-old Mongoloid students to read functionally 12 nouns and 12 adjective-noun phrases. A "whole word method" was employed. After 50 hrs of instruction, results show that Ss had already progressed beyond the reading level expected of many older Mongoloid students. The program presented here, as well as others cited, draws attention to the need for longitudinal instructional

programs for trainable-level retarded students.—*Journal abstract.*

4047. Erber, Norman P. & Zeiser, M. Lynn. (Central Inst for the Deaf, St Louis, MO) **Classroom observation under conditions of simulated profound deafness.** *Volta Review*, 1974(Sep), Vol 76(6), 352-360.—Reports the impressions of 2 professionals who wore earphones with a loud masking noise to prevent hearing. They visited classrooms for the deaf, receiving the same kinds of visual and vibrotactile speech stimuli available to the students. With such limited sensory input, they noticed that optical conditions in classrooms were not optimal for speechreading, and that background noises were distracting when perceived through the vibrator. It is suggested that special classroom communication strategies could partially compensate for these difficulties. Observations of this sort may benefit teachers and audiologists who deal with profoundly deaf children.—*W. A. Hass.*

4048. Forness, Steven R. & MacMillan, Donald L. (U California, Los Angeles) **Reinforcement overkill: Implications for education of the retarded.** *Journal of Special Education*, 1972(Fal), Vol 6(3), 221-230.—Research evidence on the motivation of mentally retarded persons seems to indicate the considerable potency of social reinforcement in the form of adult attention and approval. The use of token economy systems in classes for retarded children appears to be a form of overkill in that checkmarks, tokens, and back-up reinforcers are largely unnecessary when all that is needed is a more systematic form of social reinforcement from the teacher. Social praise and approval, moreover, represent more "natural" consequences for appropriate behavior than tokens or checkmarks. It is noted that teachers may often unintentionally ignore or misuse social-reinforcement techniques to the particular disadvantage of the retarded child. A burgeoning research effort in the area of social-reinforcement approaches to classroom management and motivation has demonstrated the effectiveness of systematic teacher attention and approval.—*Journal abstract.*

4049. Forness, Steven R. (U California, Los Angeles) **Implications of recent trends in educational labeling.** *Journal of Learning Disabilities*, 1974(Aug-Sep), Vol 7(7), 445-449.—Notes that special education has entered a new era of noncategorical approaches toward exceptional children. Beginning with disenchantment with special classes, the trend continues with serious questioning of traditional diagnostic labels and with experimentation in grouping various types of exceptional children together for educational programs. Implications of these events for learning disabled children are explored. (16 ref)—*Journal abstract.*

4050. Gray, Burl B. (Behavioral Sciences Inst, Carmel, CA) **A field study on programmed articulation therapy.** *Language, Speech & Hearing Services in Schools*, 1974(Jul), Vol 5(3), 119-131.—Describes the use by 176 clinicians of a programed articulation therapy in 9 public schools and a university clinic. The observed therapeutic effects were comparable to those reported from the laboratory.

4051. Iida, Sadao. (Yamanashi U, Kofu City, Japan) **[A study of the effects of a resource-room service program for mentally retarded children and slow**

**learners.]** (Japn) *Japanese Journal of Special Education*, 1974(Mar), Vol 11(3), 62-75.—Compared 9 retarded 1st graders in a resource-room program with 10 similar children in regular classes. After a year of the program the experimental group showed a greater increase in IQ and greater progress in Japanese than the control group, and 2 experimental Ss attained the normal achievement level. (English summary)

4052. Ivey, Lillian P. & Teel, Jerry R. (Central State U, School of Education, Edmond) **Tri-sensory language stimulation with the TAVF unit.** *American Annals of the Deaf*, 1974(Jun), Vol 119(3), 318-320.—Describes the use of a teaching device, The Tactile Auditory Visual Feedback Unit (TAVF) with 15 preschool, hearing-impaired children 3-7 yrs old. Of 6 dependent variables associated with language, 5 were statistically significant. The TAVF appears to be an effective tool to use with hearing-impaired children.

4053. Keller, James F. & Moore, Marian B. (Virginia Polytechnic Inst) **Democracy in the hearing impaired classroom.** *American Annals of the Deaf*, 1974(Jun), Vol 119(3), 307-313.—Reports the application of a democratic theoretical model in a classroom for the hearing-impaired. Results show that teachers gained confidence and experienced fewer conflicts. The children began assuming more responsibility for themselves and their classmates and began to use more spontaneous language.

4054. Koegel, Robert L. & Schreibman, Laura. (U California, Santa Barbara) **The role of stimulus variables in teaching autistic children.** In O. I. Lovaas & B. D. Bucher (Eds), *Perspectives in behavior modification with deviant children*. Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 562 p.—Reviews the literature which suggests that transfers or shifts in stimulus control do not always take place in the reinforcement techniques involved in establishing new behaviors. Characteristics of the stimulus and of the learner are discussed, and evidence is provided that the probability of a particular stimulus coming to control a response depends on the context in which it appears.

4055. Kokaska, Charles. (California State U, Long Beach) **Normalization: Implications for teachers of the retarded.** *Mental Retardation*, 1974(Aug), Vol 12(4), 49-51.—Identifies 3 major implications for teachers' functions which can be drawn from the principle of normalization. They involve the use of risk components within instruction, recognition of the transience of the teacher-learner situation, and modification of attitudes toward the retarded's participation in society.

4056. Kristiansen, Birte B. & Kristiansen, Holger. **[Integration related to the course of development.]** (Danish) *Skolepsykologi*, 1974, Vol 11(3), 183-195.—Describes 6 cases from a residential treatment center for children of elementary school age. Conclusions are drawn regarding the need to separate emotionally disabled children from local schools and from their families. It is not a question of segregation but of how to integrate them based on or supported by daytime therapy. Social and mental aftercare treatment may be supplemented by special education in the local comprehensive school.—*P. Mylov.*

4057. Marshall, Margaret. **The effect of special educational treatment of maladjusted pupils in a day**



**school.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 23-25.—Evaluated the progress of 60 pupils who had received part of their education in a day school for maladjusted children. The total population of ex-pupils numbered 75, and for these 60 full records were available regarding their subsequent school and work attainment. 80% had attended normal schools, and of those who left school, 75% had held 1 job for at least a year. Of the 12 Ss interviewed personally, all felt that the special school had helped them in some way, or that they had enjoyed that particular educational experience more than any other.—*I. L. Zimmerman.*

4058. **McLeod, J.** (U Saskatchewan, Saskatoon, Canada) **Problems of diagnosis and placement of the severely sub-normal child.** *Association of Educational Psychologists Journal & News Letter*, 1971(Fal), Vol 2(10), 10-17.—Suggests models relating to the diagnosis and placement of the severely subnormal child, here seen as one whose IQ would generally be expected to be below 50, but who would in all likelihood be attending day training centers. The basic placement of the child is a function of several factors, foremost being the educability of the child and his social and emotional adjustment. Once placed, educational diagnosis and treatment must be continuous and interlocking; and this means that services must be provided within the school itself and that teachers must be trained to become full team members in the diagnostic and placement process.—*I. L. Zimmerman.*

4059. **Meyers, Elizabeth S.; Ball, Helen H. & Crutchfield, Marjorie.** (Manhattan Beach City School District, CA) **Specific suggestions for the kindergarten teacher and the advanced child.** *Gifted Child Quarterly*, 1974(Spr), Vol 18(1), 25-30.—Warns that a kindergarten showing advanced development in one area should not be accelerated to 1st grade unless it is certain that he is equally mature in other areas. A child remaining in kindergarten because he is not physically or emotionally ready for the next level, but having capacity beyond his peers in some respects, must be given day-to-day challenges in his special skill. A number of suggestions for resources and activities are offered.

4060. **Minskoff, Esther H.** (Groves School, Hopkins, MN) **Remediating auditory-verbal learning disabilities: The role of questions in teacher-pupil interaction.** *Journal of Learning Disabilities*, 1974(Aug-Sep), Vol 7(7), 406-413.—Considers 2 aspects in the teacher-pupil verbal interaction for remediating learning disabilities in auditory and verbal areas: (a) the child's retrieval of the response in terms of recognition or recall and (b) the nature of the psychological process used by the child to respond to a question in terms of cognitive memory, convergent and divergent thinking, and evaluative thinking operations. Methods are discussed for constructing questions on the basis of these 2 aspects for children with auditory disabilities in auditory reception, verbal expression, auditory sequential memory, thinking operations, and reading comprehension difficulties. Implications for publication of teaching materials, teacher training, and research related to auditory and verbal learning disabilities and the teacher-pupil verbal interaction are explored.—*Journal abstract.*

4061. **Nielsen, Flemming.** [The institutionalized child: Possibilities of integration.] (Danish) *Skolepsykiologi*, 1974, Vol 11(3), 230-236.—Describes the Geelsgaard boarding school, a special residential treatment center for physically handicapped children and youth. Although the teaching covers the comprehensive school curriculum, the organization and aids are different. The aim of the 61 interns and 81 externs is integration based on individual criteria for each child.—*P. Mylov.*

4062. **Ogawa, Yoshihiro.** (Tokyo Metropolitan Kita Ryoiku Hosp for Cerebral Palsied Children, Japan) [An investigation of cerebral palsied children at the regular schools.] (Japn) *Japanese Journal of Special Education*, 1974(Mar), Vol 11(3), 85-93.—Presents results of a questionnaire survey of the parents and teachers of 61 cerebral-palsied children enrolled in regular schools. Most of the children were spastic and mildly handicapped. 34% were mentally retarded; mean IQ was 99. 53% had been accepted only reluctantly by the regular schools, and 58% were admitted only under special conditions regardless of whether they were severely or mildly handicapped. While Ss were independent in self-care functions, they had difficulty in ambulation and writing. 89% of the parents were satisfied with their children's school life, especially with their psychological growth. 59% of the teachers had felt it a burden to pay special attention to these children to prevent accidents. The level of school performance was not related to the ability to walk, but was affected by motor disability of upper extremities, speech defects, and other neurological disorders. Most teachers felt that the presence of the handicapped had a good influence on the normal children, and that the cerebral palsied with IQs above 90 should be enrolled in regular schools. Only those with IQs below 90 need special education. (English summary) —*S. Ohwaki.*

4063. **Rudel, Rita G.; Denckla, Martha B. & Spalten, Elinor.** (Columbia U, Coll of Physicians & Surgeons) **The functional asymmetry of Braille letter learning in normal, sighted children.** *Neurology*, 1974(Aug), Vol 24(8), 733-738.—Taught 40 male and 40 female right-handed 2nd, 4th, 6th, and 8th graders to read 12 braille letters by palpation, using a paired-associates method. 40 Ss learned 6 letters with their left hand and then 6 other letters with their right; the left-right order was reversed for the remaining 40. Although language was involved, this tactile-verbal paired-associate learning ultimately was better accomplished by the left hand. Results are discussed in terms of other demonstrations that (a) the left hand may be superior to the right on spatial tasks that exclude vision, (b) females develop more slowly in the performance of left-sided (right-hemisphere-dependent) tasks, and (c) females depend more than males on left-hemisphere mediation. (39 ref)—*Journal abstract.*

4064. **Shaw, Otto L.** **Youth in crisis: A radical approach to delinquency.** New York, NY: Hart, 1974. 135 p. \$7.50(cloth), \$3.95(paper).—Describes the history, conceptual basis, administration, staff functions, and goals of the Red Hill School for delinquents in England. The school's founder, Otto Shaw, who was greatly influenced by the work of A. S. Neill, has based rehabilitation on the principle of understanding and respect, instead of punishment, for the young offender.

4065. Silverman, Martin A. & Wolfson, Eva. (Child Development Ctr, New York, NY) **The use of small educational-therapeutic groups in a program for disadvantaged preschoolers.** *Psychosocial Process*, 1970, Vol 1(2), 47-59.—Summarizes results of a day care center program designed to improve the cognitive functioning of disadvantaged children. The 3-6 yr olds entering the program came from families living at minimal subsistence level and displayed deficiencies in language development, fund of information, concept development, self-esteem, initiative, and frustration tolerance. To facilitate learning it was necessary to divide class time between measures to facilitate cognitive development and therapeutic measures to counteract characterological disturbances that interfered with the children's capacity to utilize the program. The earliest gains of the program involved confidence, motivation to learn, ability to take initiative, and peer relations. During the 2nd yr participants stood out as intellectually alert and inquisitive, but with little change in their characterological problems. Both of the 1st 2 groups graduated from the program maintained their gains after they had completed grades 1 and 2.—J. M. Kleinman.

4066. Tinsley, Tuck. (Florida School for the Blind, St Augustine) **The use of origami in the mathematics education of visually impaired students.** *Education of the Visually Handicapped*, 1972(Mar), Vol 4(1), 8-11.—Describes the use of origami (paper folding) in teaching geometric concepts to the visually handicapped. Braille paper was preferred for origami rather than other types of paper. Several exercises of demonstrating geometric concepts are presented with brief discussions of the teaching methods used.

4067. Torrance, E. Paul. (U Georgia) **Interscholastic brainstorming and creative problem solving competition for the creatively gifted.** *Gifted Child Quarterly*, 1974(Spr), Vol 18(1), 3-7.—Advocates creative brainstorming contests between school teams as a way of linking creativity to competitive practices. Teams from all grade levels could compete, and disadvantaged children would not be handicapped by their cultural differences. They might actually perform better than gifted children; this occurred in a creativity contest at a university summer school for the gifted. 2-member teams of disadvantaged children scored significantly higher in creativity, both as to number and originality of ideas produced, than teams of gifted advantaged children. Observers noted important qualitative differences coming from the 2 groups. It is concluded that interscholastic brainstorming competitions can be useful in a variety of ways.—J. C. Gowan.

4068. Wilson, Harriet M. & Holbrook, Anthony. **An instrumental approach to oral-nasal speech balance with a preschool hearing impaired child.** *Volta Review*, 1974(Sep), Vol 76(6), 361-367.—Arranged a visual feedback device, Florida II, to assist in the development of oral vs nasal speech sound production. A 4-yr-old girl with severe hearing impairment and nasal speech was taught that a red light indicated hypernasality but a white light indicated oral sound and led to a reward in the form of candy. In 5 mo of training she learned to produce open vowels without excessive nasality. Vari-

tions in procedure and their application are mentioned.—W. A. Hass.

4069. Wright, Lloyd S. (U Arizona) **Perceptual characteristics of third grade conduct problem boys.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 53-61.—Attempted to determine the incidence of deficits in auditory discrimination, visual motor pattern memory, and visual spatial pattern memory among 3rd grade boys with conduct problems. A learning theory evaluation suggests that problem behavior in middle-class boys may be primarily learned inappropriate behavior, while in working-class boys such behavior may be complicated by perceptual deficits. The large number of perceptual problems in the working-class Ss indicates that teachers of such children should be familiar with remedial techniques for alleviating perceptual deficits.—C. L. Nicholson.

4070. Yoshino, Kimiyoshi. (Tokyo U of Education, Japan) **[An evaluation of regular preschool education for hearing-handicapped children.]** (Japn) *Japanese Journal of Special Education*, 1974(Mar), Vol 11(3), 48-61.—Studied 7 children with severe hearing handicaps who were enrolled in kindergarten or nursery school and were receiving hearing therapy. Teachers' ratings and intelligence and achievement tests were used for evaluation. The group experience facilitated general behavior development, especially language skills. Ss' ability in abstraction was at the level of normal children and was significantly higher than that of children in schools for the deaf. Although Ss took active part in all school activities, their reading ability was 1-1.5 yrs behind that of normal children. Teachers reported difficulty in providing special instruction and attention for these children; it was almost impossible to compensate for the time lost from regular classes while they attended special classes for the hard of hearing. (English summary)—S. Ohwaki.

### Counseling & Measurement

4071. Andrey, Bernard. (U des Sciences Sociales de Grenoble, Inst de Psychologie, France) **[Psychology in the schools: Interpersonal relationships in the institution.]** (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3 4), 151-157.—Outlines the mediational role of the school psychologist in the interpersonal relationships involving the child in interaction with his various environments—a role extending to the intrainstitutional relationships of school and civil personnel. School psychologists are thus in a position to contribute to changes in perspective and modifications of the institution. The adequacy of current training provided to prepare school psychologists for this professional and administrative function is questioned. (English summary)—E. E. Brown.

4072. Baldwin, Bruce A. & Wilson, Robert R. (U North Carolina, Student Health Services, Mental Health Div) **Peer services in human sexuality health education.** *Crisis Intervention*, 1974, Vol 5(3), 12-26.—Discusses the problems of development, staff selection and training, and the operation of a university-based information and counseling service on human sexuality. Data are presented showing the categories of calls over a 2-yr period.

4073. Benenson, Thea F. (Bronx Community Coll, City U New York) **Prediction of first-grade reading**



**achievement: Criterion validation of a measure of visual recognition memory.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 423-427.—Conducted a longitudinal study of 192 1st-graders which examined the predictive efficiency of a newly developed measure of visual recognition memory in predicting 1st-grade reading achievement when analyzed in conjunction with a standardized conventional reading readiness test. Results of extensive regression analyses failed to substantiate any practical predictive utility for the instrument when used with a fairly homogeneous sample.—*Journal abstract*.

4074. **Bonniol, Jean-Jacques; Caverni, Jean-Paul & Noizet, Georges.** (National Ctr for Scientific Research, U Provence, Marseille, France) [Scholastic status of pupils as a determinant of marks assigned on a specific task.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 83-92.—Studied the scholastic status of pupils as it influences the frame of reference and level of teacher expectation when pupil assignments are graded. A series of student compositions was marked by 2 groups of examiners. Group 1 was told that the papers were written by high-level 6th grade pupils, and Group 2 was told that the papers were by low-level pupils. An analysis of variance indicated that papers attributed to low-level pupils were underestimated, and those attributed to high-level pupils were overestimated. Further, results were the same with papers actually written by pupils and those artificially composed to display stated combinations of errors and inadequacies. Student teachers were found to mark higher than experienced teachers, but no significant interaction with the other experimental factors appeared. Test results suggest that experienced teachers do not escape the influence of the label of scholastic status.—*Journal abstract*.

4075. **Brod, Pearl & Brod, Nathan.** (State University Agriculture & Technical Coll, New York, Farmingdale) **Placement counseling: Focus on the community college.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 32-37.—Argues that, because of the vocational emphasis in the 2-yr college, placement is even more important here than in other institutions. Despite the employment needs, placement services have not been adequately developed. Counseling needs in the 2-yr colleges are varied and complex and include career counseling, follow-up, developing opportunities for minorities, and concern with the handicapped, veterans, and marginal students. Community awareness and participation is essential. To accomplish this, an adequate, well-prepared staff is required. (16 ref)—*Journal abstract*.

4076. **Cegelka, Patricia T.; Omvig, Clayton & Larimore, David L.** (U Kentucky, Coll of Education) **Effects of aptitude and sex on vocational interests.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 106-111.—Determined the extent to which vocational interests of adolescents differed as a function of sex and aptitude and whether the effect of aptitude on interests was the same for males and females. A 2-factor multivariate analysis of variance design was used. Ss were 263 9th graders who were measured on the 24 scales of the Ohio Vocational Interest Survey (OVIS), which served as the dependent measure. Significant differences

between males and females were found on 19 of the 24 OVIS interest scales and were fairly typical of male-female role expectations. Ss were assigned to 4 aptitude levels based on the Differential Aptitude Test. Aptitude was significantly related to 6 vocational interests areas. Ss who were low in aptitude were high in the interest areas of manual work, machine work, personal services, inspecting and testing, crafts, and precise operations. There was no interaction between sex and aptitude. Differences between males and females in vocational interests did not change at different aptitude levels. (24 ref)—*Journal abstract*.

4077. **Chitalekhya, Kumari; Sharma, S. N. & Singh, R. P.** (Patna U, Faculty of Education, India) **Development of an inventory to measure academic motivation.** *Indian Journal of Psychometry & Education*, 1973, Vol 4(1), 19-22.—Developed an inventory in Hindi and took measures of item selection, item analysis, reliability, and validity. A correlation of .54 with students' examination marks in academic subjects was achieved.

4078. **Chovan, William L.** (Western Carolina U) **Public policy and ethical considerations of testing in the schools.** *Western Carolina University Journal of Education*, 1974(Spr), Vol 6(1), 5-10.—Examines court decisions and public reactions concerning the use of tests by psychologists in the public schools. The courts have given parents the right to inspect school records. There is a description of how appropriate testing benefits students by helping to identify the conditions under which each child can learn most effectively.

4079. **Cochrane, R. G.; Schonell, Fred & Schonell, Eleanor.** (U Queensland, Educational Research Ctr, St Lucia, Australia) **The effect of context on word recognition.** *Slow Learning Child*, 1974(Mar), Vol 21(1), 38-43.—Compared student scores on the St. Lucia Graded Word Reading scores, and Words in Context; scores from the latter were significantly higher, and context improved word recognition regardless of which test was given first. Bright students showed no significant differences between scores on the 2 tests.

4080. **Crabtree, Paul D. & Hales, Loyde W.** (Minford High School, OH) **Holland's hexagonal model applied to rural youth.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 218-223.—Tested the hexagonal model of occupational classification on a population other than college students. 1,431 high school seniors from rural districts were tested with the Vocational Preference Inventory. The hexagonal configurations obtained in this study validate the hexagonal model. Possible uses of this inventory at the high school level are discussed. These include use as an efficient and economical method of classifying occupational information and to help familiarize students with occupational information.—R. S. Albin.

4081. **Crystal, John C. & Bolles, Richard N.** (Crystal Management Services, McLean, VA) **Where do I go from here with my life?** New York, NY: Seabury Press, 1974. xvii, 253 p. \$7.95.—Presents a life-work planning manual for students, instructors, counselors, and career seekers, including detailed discussion of such topics as skills-identification, educational background and self-assessment, geographical preferences and philosophy of life,

job specifications and job hunting, interviewing, and professional development.

4082. Curtis, David W. (Red River Community Coll, Winnipeg, Manitoba, Canada) **Counseling in a Manitoba community college.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 152-155.—Examines the "training" philosophy of the community college, the historical antecedents of this philosophy, and the implications for the community college student and student personnel worker. The role of the college counselor or as a guidance worker is also discussed. (French summary)

4083. Dalton, Starrette. (Indiana U) **Predictive validity of high school rank and SAT scores for minority students.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 367-370.—Compared the predictive validities of the Scholastic Aptitude Test (SAT) and high school achievement for a sample of minority students, with typical predictor variable truncations absent. Results confirm that high school achievement is a less effective predictor of academic success for minority students than for nonminority students; however, it appeared to be a better predictor than the SAT. This is contrary to previous findings for minority students. The combination of predictors was superior to high school achievement alone as a predictor for both "overachievers" and "underachievers."—*Journal abstract.*

4084. Duari, P. (Inst of Education for Women, Calcutta, India) **A new scaling method for modifying ranks of candidates in public examinations.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 78-83.—Describes a method of transforming obtained scores on board and university examinations to overcome problems of comparisons among students based upon substantially different test items. The method uses  $d$  scores, defined as the ratio of the allotted score to the highest score on a given item or test. The method was used to transform scores of 25 students on a 10-question test. Spearman rank-difference correlations between the original scores and the  $d$  scores was .80, suggesting that  $d$  scores afford better representation of the relative performance of students in these examinations.—*J. B. Francis.*

4085. Ewing, Thomas N. (U Illinois) **Racial similarity of client and counselor and client satisfaction with counseling.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 446-449.—Client evaluations of a precollege counseling interview were obtained for 13 black and 13 white students counseled by 3 experienced black counselors and 8 experienced white counselors. Black students tended to react more favorably to black and to white counselors than did white students. In general, racial similarity of client and counselor was not an important factor in these counseling interviews. The hypothesis that counselors are differentially effective in counseling students of a different racial background than their own lacks support.—*Journal abstract.*

4086. Gallo, Joseph G. (Canada Manpower, Manpower Planning and Management Development, Calgary, Alberta) **Computer-assisted vocational counseling.** *Canadian Counsellor*, 1974(Jun), Vol 8(3), 185-193.—A random sample of 6 males and 6 females from each of Grades 10, 11, and 12 ( $N = 36$ ) used the Computer-Assisted Vocational Counseling System (CAVCS). Each

student had 4, 25-min terminal sessions over a 13-wk period. Using the criterion of usage as evidenced in the number of jobs examined, an analysis of covariance with IQ score as covariate indicated that there were no significant differences in system usage across grade levels or between sexes within grade levels. Kruskal-Wallis analysis of variance testing did not reveal any significant differences in the amount of usage of the 2 modes of operation available. Evidence was found to indicate that a system such as the CAVCS could be of benefit to senior high school students during their preliminary efforts in vocational or career exploration. (French summary) (23 ref)—*Journal abstract.*

4087. Garling, P. & Jarbol, John. [The observation school in the county of Vejle.] (Danish) *Skolepsykologi*, 1974, Vol 11(3), 217-229.—Describes the school and reports a tentative follow-up study of 54 pupils conducted in 1973. The school receives up to 24 boys and girls, chronological age 6-12, for teaching and treatment after referral from a school psychologist in the county. Results of the questionnaire favored continuation of the school program and broadening the social work with families.—*P. Mylov.*

4088. Gilly, Michel; Poitou, Régine; Volle, Claude & Volle, Michel. (CNRS Lab de Psychologie Scolaire et Lab de Psychologie Associé, U Provence, France) [From nursery school to first grade: Some data and comments about predictive techniques for learning to read.] (Fren) *Cahiers de Psychologie*, 1972, Vol 15(3-4), 171-183.—Conducted a validity study of an 8-test battery designed to predict learning to read. 100 6-yr-olds were tested late in nursery school and again 1 yr later in primary school. 5 factors accounted for 76% of the variance, the 2 main factors being Scholastic Efficiency and Application (sacrifice of speed to accuracy). Results caution against the use of the test for prediction of individual accomplishment and differential assignment, but suggest that they may be useful as descriptive aids in foreseeing conditions each pupil needs for best achievement in reading. (English summary)—*E. E. Brown.*

4089. Goldstein, H. & Fogelman, K. (National Children's Bureau, London, England) **Age standardization and seasonal effects in mental testing.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 109-115.—There are 2 distinct types of age standardizations for tests of school attainment. One allows for differences in age between children tested at the same time, and the other allows for average changes in test scores with time of year. Standardization procedures do not normally take this distinction into account. Analysis of data from a previous study of over 13,000 11-yr-olds showed that there was no increase in attainment scores between April and July in the last year of primary school. This "seasonal" effect creates further difficulties in providing satisfactory age standardizations. It is suggested that full age-time standardizations should be carried out by selecting standardization samples over whole age ranges at different times of year.—*Journal abstract.*

4090. Gross, Alan L.; Faggen, Jane & McCarthy, Karen. (City U New York) **The differential predictability of the college performance of males and females.** *Educational & Psychological Measurement*, 1974(Sum).



Vol 34(2), 363-365.—Performed separate multiple regression analyses in 10 undergraduate colleges of the City of New York University, using college freshman grade point average as the dependent variable and 6 high school scores as predictor variables. The multiple correlation coefficients, derived on the cross-validation samples, substantially reinforced previously reported findings that females are more predictable than males in academic settings.

4091. Hakstian, A. R. & Cattell, R. B. (U British Columbia, Vancouver, Canada) **The checking of primary ability structure on a broader basis of performances.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 140-154.—Administered a battery of 57 ability tests (e.g., the Kit of Reference Tests for Cognitive Factors) to a total of 343 15-55 yr old Ss in high school, vocational training school, college, and the military. The aims were to confirm the differentiability of the better-known primary mental abilities and to assess the differentiability of the more recently hypothesized abilities, along with their relationships with the better-established constructs. A common-factor analysis of the 57 variables revealed 19 correlated primary abilities, ranging from such established factors as Verbal and Numerical Ability to less well-understood primaries in the memory and fluency-originality areas. The conceptual nature of the factors and their interrelationships are discussed, and the results are placed in the context of earlier research on abilities. (39 ref)—*Journal abstract.*

4092. Holowinsky, Ivan Z. & Pascale, Pietro J. (Rutgers State U) **Performance on selected WISC subtests of subjects referred for psychological evaluation because of educational difficulties.** *Journal of Special Education*, 1972(Fal), Vol 6(3), 231-235.—Investigated race and sex differences in the WISC performance of 50 male and 27 female black children and 39 male and 18 female white children referred for psychological evaluation. Ss had a mean IQ of 79.55, a standard deviation of 12.52, and an IQ range of 57-129. Significant race differences occurred on only the Vocabulary subtest, with white children performing better than black children ( $p < .01$ ). Boys performed significantly better than girls on the Picture Completion, Information, Vocabulary, and Block Design subtests ( $p < .05$ ). The smallest  $F$  ratio for race differences occurred on the Block Design subtest. Ss performed better on the Picture Completion subtest than on any other subtest. Findings do not support the hypothesis of racial differences in intelligence.—*L. Gorsey.*

4093. Hunt, J. McVicker & Kirk, Girvin E. (U Illinois) **Criterion-referenced tests of school readiness: A paradigm with illustrations.** *Genetic Psychology Monographs*, 1974(Aug), Vol 90(1), 143-182.—Discusses the need for tests of specific units of information, information-processing strategies, motivation, and values that demonstrate a readiness for school or that are needed to plan individualized instruction programs for children from varied backgrounds. The inappropriateness of norm-referenced tests for these purposes is discussed, and the concept of criterion-referenced tests is extended from specific learning/teaching goals to include the general area of school readiness. A paradigm for such criterion-referenced tests is presented, and descriptions of tests of

semantic mastery of color, position, shape, and number concepts are included. Illustrative data from comparative studies of middle-class nursery-school children and children from Head Start programs are presented, which show that while 80-90% of nursery-school children exhibit mastery of color information, only 20% of Head Start children do so. Similar differences are reported for mastery of position, shape, and number. Within the Head Start group, black and white Ss' performance did not differ. (93 ref)—*Journal abstract.*

4094. Kicklighter, Richard H.; Powell, John & Parker, James. (Georgia State Dept of Education, Atlanta) **The Peabody Picture Vocabulary Test and naive versus trained examiners.** *Journal of Experimental Education*, 1974(Sum), Vol 42(4), 27-29.—To verify marketing claims that the Peabody Picture Vocabulary Test is suitable for use by persons without special training in testing, a total of 40 7-11 yr olds, ranging from retarded to gifted, were tested in counterbalanced order by 8 elementary school teachers and by 3 school psychologists. No significant differences were found between the Ss' mean IQs in the experienced vs the naive examiner's data, and there were no significant treatment effects, trial effects, or interactions. However, differences in the test results for certain individuals were large, suggesting the necessity for cautious use in the absence of corroborating data.—*Journal abstract.*

4095. Leviton, Harvey & Kiraly, John. **The effects of a short training program on the Draw-A-Man Test scores of pre-school children.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 435-438.—Used 61 preschool children, in 2 experimental groups and a control group, as Ss in a study designed to test the prediction that a preschool enrichment program could improve performance on the Harris-Goodenough Draw-a-Man Test. Results supported the prediction and are discussed in terms of the validity of the test as a measure of intellectual ability. It is suggested that the test be used as an indicator of school readiness because of its sensitivity to readiness experiences, rather than as an indicator of intelligence.—*Journal abstract.*

4096. Lewis, John. (Winona State Coll) **A pictorial attitude scale for elementary pupils.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 461-462.—Describes the Children's Pictorial Attitude Scale, designed to provide a nonverbal measure of children's attitudes toward elementary school. The scale was developed by identifying areas of activities and drawing pictures representing these areas. Children are instructed to respond according to how they would feel in one of these picture situations. The scale yielded a split-half reliability coefficient of .69 from 607 pupils in Grades 1-6. Scores on the scale have discriminated among pupils in the 6 grade levels.—*Journal abstract.*

4097. Lewis, John. (Winona State Coll) **A study of the validity of the SRA tests of general ability.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 433-434.—Conducted a validity study on the Science Research Associates Ability Series. Ss were 289 pupils, Grades 1-6. The criteria were teachers' ratings. The obtained validity coefficient varied from .42 for Grade 3 to .61 for Grade 4. Smaller criterion standard deviations for Grades 1-3 should be considered in interpreting the

relatively lower validity coefficients for these 3 lower grades.

4098. Lewis, John. (Winona State Coll) **A study of the validity of the Metropolitan Readiness Tests.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 415-416.—40 pupils who had just completed kindergarten were administered the Metropolitan Readiness Test. Lee-Clark Reading Readiness Test scores and teacher ratings were obtained as criteria measures after Ss had completed the 1st grade. The validity coefficient was .67 with Lee-Clark scores and .61 with teacher ratings.

4099. Little, Dolores M. & Roach, Arthur J. (Texas A&M U) **Videotape modeling of interest in nontraditional occupations for women.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 133-138.—Investigated peer social modeling of interest in nontraditional occupations for women as a possible technique in career counseling. Ss in treatment and control groups were female undergraduate, undeclared majors in a liberal arts curriculum ( $N = 32$ ). 2 series of videotaped films, with sex of counselor as a controlled variation of the modeling, were presented to 2 experimental groups. Selected criteria from the Vocational Preference Inventory and a simulated career choice indicated a significant increase in interest in nontraditional occupations by Ss viewing a modeling series with reinforcement by a male counselor.—*Journal abstract.*

4100. Lynch, Mervin D. & Edwards, Thomas M. (Northeastern U) **The Miniscat: Its development and some evidence of its validity.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 397-405.—Describes an elementary grade creativity test, in which word doublets (e.g., peanut and fly) are to be responded to by a third word (e.g., butter). Items represent 6 different associative rule structures. 1st and 3rd graders were judged high or low in creativity from their responses to a story completion test. Ss high in creativity had appreciably higher Miniscat scores than those low in creativity—an outcome supporting the validity of the test. Scores for Grade 3 were higher than for Grade 1 on Form B of the test but not on Form A. Girls scored higher than boys on Form A but not on Form B. Split-half reliability coefficients were high and consistent. The judges of creativity were themselves tested for creativity. Their creativity scores were unrelated to their judgments of children's creativity—a finding that failed to support the notion that it takes a creative person to recognize one.—*Journal abstract.*

4101. Maier, Dennis & Herman, Al. (Preventive Social Service, Provost, Alberta, Canada) **The relationship of vocational decidedness and satisfaction with dogmatism and self-esteem.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 95-102.—Administered the Rok-each Dogmatism Scale (Form E), the Tennessee Self-Concept Scale, and a personal-data questionnaire to 141 college freshmen. The relationship of levels of vocational decidedness and the satisfaction or dissatisfaction of Ss' level of vocational decidedness with dogmatism and self-esteem was analyzed. Results indicate that vocationally decided and undecided Ss represented uniquely different populations on measures of dogmatism and self-esteem. (17 ref)—*Journal abstract.*

4102. Malpas, A. J. & Brown, Margaret. (Chelsea Coll, U London, England) **Cognitive demand and difficulty of GCE O-level mathematics pretest items.** *British Journal of Educational Psychology*, 1974(Jun), Vol 44(2), 155-162.—2 judges assessed 720 mathematics items from pretests written for 2 different syllabuses for "concrete" or "formal" demands, using criteria derived from Piaget's theory of cognitive development. The mean difficulty indices for items placed in concrete and formal categories were compared to test the hypothesis that items classified as making higher demands would be found more difficult. Results show that while there was some variability, there was significant agreement between the judges ( $p < .001$ ) in the placing of the items and a significant correlation ( $p < .001$ ) between classification category and the difficulty index of the items. An unexpected difference between the 2 syllabuses in the distribution of items over concrete and formal categories was also discovered. Several possible interpretations of these results are discussed, and ways of making criteria for formal and concrete operations more rapidly applicable to such mathematical activities as the solution of multiple choice examination items are examined. (15 ref)—*Journal abstract.*

4103. Mandryk, Thomas R. & Schuerger, James M. **Cross-validation of the HSPQ as a predictor for high school grades.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 449-454.—Used Cattell's High School Personality Questionnaire (HSPQ) to predict achievement on a sample of 469 high school students, and compared estimates of achievement with observed values. Multiple linear regression was performed twice; HSPQ scores alone and HSPQ scores in combination with 2 ability measures. Results indicate that (a) the beta weights derived in the present study were essentially consistent with those used by Cattell, (b) one-fourth of the variance associated with achievement was accounted for by personality factors, and (c) predicted achievement scores using Cattell's equation correlated relatively highly with observed scores.—*Journal abstract.*

4104. Massonnat, Jean. (National Ctr for Scientific Research, U Provence, Marseille, France) **[The counseling interview in an educational orientation procedure.]** (Fren) *Cahiers de Psychologie*, 1972, Vol 15(1-2), 59-81.—Examined the way 33 9th-grade students viewed themselves, their studies, and future career plans within family, school, and social situations. Orientation was provided through 2 counseling interviews 3-4 mo apart; interviews proceeded according to detailed schedules of content and were coded as to content and direction by counselors. Results at the end of the year show that while evidencing some growth in environmental perception and self-concept, pupils failed to show greater application of the information and understanding acquired in formulating their plans or preparatory studies. There was no significant increase in the number or scope of scholastic and environmental factors identified as determinants of individual choice. (English summary) (19 ref)—*E. E. Brown.*

4105. Moore, Clifford L. & Retish, Paul M. (U Iowa) **Effect of the examiner's race on black children's Wechsler preschool and primary scale of intelligence**



**IQ. Developmental Psychology.** 1974(Sep), Vol 10(5), 672-676.—Used a test-retest design to investigate the effect of examiner's race on the IQ scores of 28 male and 14 female low-income black 47-69 mo old preschoolers. 6 female examiners, 3 black and 3 white, administered an abbreviated form of the Wechsler Preschool and Primary Scale of intelligence to the Ss. Each S was tested by a black examiner and by a white examiner. Results indicate that the main effect of the examiner's race was significant for the Verbal, Performance, and Full-Scale IQs. The children earned higher mean scores when tested by the examiner of similar ethnic origin. A significant administration effect and Administration  $\times$  Sex effect was revealed on the Verbal scale. (37 ref)—*Journal abstract*.

4106. Neise, Karl. [The problem of precision of test diagnoses.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Feb), Vol 23(2), 62-67.—Surveys the current scientific discussion on the utility of intelligence tests. A formula for determining standard errors and confidence limits is presented. The use of profile analysis of intelligence tests as probabilistic statements is discouraged. (19 ref)

4107. O'Shea, Arthur J. & Harrington, Thomas F. (Boston State Coll) **Measuring the interests of male and female students with the SVIB for men.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 112-117.—Examined the Strong Vocational Interest Blank for Men profiles of 89 male and 113 female counselor education students to determine the extent of sex differences. The differential predictive validity of the SVIB was also studied. Both male and female Ss had similar overall SVIB profiles. However, there were distinct differences along the lines of sex-role stereotypes. The SVIB did not have differential predictive power among various counseling groups—elementary, secondary, college, and community. Results support the direction which the new SVIB is to take.—*Journal abstract*.

4108. Omvig, Clayton P. & Thomas, Edward G. (U Kentucky) **A socioeconomic comparison of vocational interests: Implications for counseling.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 147-155.—Assessed the effects of socioeconomic status on results obtained from the Ohio Vocational Interest Survey (OVIS). The sample consisted of 200 9th graders, half of whom represented the inner-city disadvantaged, with the remaining half representing a high socioeconomic level. Disadvantaged males displayed significantly higher interests for all 24 OVIS work areas; disadvantaged females recorded significantly higher interests for 18 of the 24 work areas. Established OVIS norms were compared with the interest patterns of each group, thus providing a reference point from which to work when counseling special students. It is concluded that established norms were of little value in interpreting OVIS results to inner-city disadvantaged students, especially males. (18 ref)—*Journal abstract*.

4109. Otto, Luther B.; Haller, Archibald O.; Meier, Robert F. & Ohlendorf, George W. (Washington State U) **An empirical evaluation of a scale to measure occupational aspiration level.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 1-11.—Used data from 34,118

American high school students to evaluate the Occupational Aspiration Scale (OAS). The OAS was successively reevaluated for each of 16 subsamples generated by cross-classifying respondents by grade in school (9-12), sex, and socioeconomic status (SES). The reliability of the OAS was slightly lower among females than among males; it did not vary appreciably by grade or SES. The mean scores were lower for youth from low SES families than for those from high SES families. No important differences by age, sex, or SES were found in the standard deviations of the test scores. Results indicate that the reliability and validity of the OAS are sufficient for research on high school youth of both sexes and from both higher and lower SES levels. (20 ref)—*Journal abstract*.

4110. Pitkalski, John J. (U Delaware, Reading Study Ctr) **Assessment of pre-reading skills: A review of frequency employed measures.** *Reading World*, 1974(Mar), Vol 13(3), 171-197.—Describes the dimensions that have been investigated as contributors to a child's readiness for learning to read. Literature on the Bender Gestalt Test, the Marianne Frostig Developmental Test of Visual Perception, and the Illinois Test of Psycholinguistic Abilities is reviewed to determine the extent to which published research has raised or resolved questions regarding the use of these instruments, particularly as they relate to evaluating the pre-first-grade child. Test usefulness is evaluated in terms of what the instrument reveals about the reading process and about its necessary prerequisites. The Peabody Picture Vocabulary Test, the Stanford-Binet Intelligence Scale, and the Wechsler Preschool and Primary Scale of Intelligence are also reviewed. (58 ref)—*R. S. Albin*.

4111. Pinto, Louise R. & Feigenbaum, Louis. (City Coll, City U New York) **Effects of clinical counseling on college achievement.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 409-414.—To investigate the effects of clinical counseling on the academic achievement of college students, each of 132 counseled students was compared to a "hypothetical twin" which represented the average of 5 noncounseled students closely matched to the counseled students on each of 5 control dimensions: age, sex, high school average, number of college credits, and cumulative index. No significant differences in achievement were found between counseled students and their controls. However, when counseled students were grouped according to the counselor they had seen, significant differences emerged.—*Journal abstract*.

4112. Plass, Howard; Michael, Joan J. & Michael, William B. **The factorial validity of the Torrance Tests of Creative Thinking for a sample of 111 sixth-grade children.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 413-414.—Performed a factor analysis of 30 measures of the Torrance Tests of Creative Thinking administered to a sample of 111 6th graders. Each of the 7 rotated factors described a task (content) rather than an hypothesized psychological process for which a task was scored.

4113. Price, Gary E. (St John's U, Jamaica, NY) **Counselor and computer effectiveness in helping students select courses.** *Journal of Counseling Psychology*, 1974, Vol 21(5), 351-354.—Compared the effectiveness of a computer-based counseling system with a

counselor-based system in helping students explore and select high school courses. Ss were 96 students in Grades 9-11. No significant differences were found in grades received and number of courses changed between the students using counselor-assisted and computer-assisted course selection procedures.—*Journal abstract.*

4114. Pryor, Norman M. & Gordon, Michael E. (Ford Motor Co, Detroit, MI) **A statistical model for the examination of the validity of prerequisites.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 349-355.—Compared the grades in upper-division classes of students who had and had not completed the "necessary" prerequisite courses, using a multivariate analysis of variance procedure known as step-down analysis. This made it possible to determine the actual importance of the lower-division courses for future academic success. Grade point average was the variable most closely associated with the level of performance in the target courses, whereas the percentage of prerequisites accounted for only 2% of the variance. Results are examined in the light of possible revisions in admission requirements for upper-division courses.—*Journal summary.*

4115. Reid, Ivan & Cohen, Louis. (U Bradford, School of Research in Education, England) **Male and female achievement orientation and intellectual responsibility: A British validation study.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 379-382.—Administered anglicized versions of the Mehrabian Achievement Orientation Scale and a modified Crandall Intellectual Achievement Responsibility Scale to 168 British students of teacher education who were similarly qualified academically but had variously chosen degree and nondegree college programs. The Crandall Scale differentiated between degree and nondegree course students in both male and female samples. The Mehrabian scale differentiated between degree and nondegree course students in the female sample only. Results are discussed in the light of cultural and institutional differences between British and American students.—*Journal abstract.*

4116. Rubin, Rosalyn A. (U Minnesota) **Preschool application of the Metropolitan Readiness Tests: Validity, reliability, and preschool norms.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 417-422.—Followed 910 Ss from prekindergarten through the latter part of 1st grade. Prekindergarten scores on the Metropolitan Readiness Tests (MRT) correlated .65 with MRT scores obtained 1 yr later at pre-1st grade level. Prekindergarten scores also predicted late 1st grade achievement in reading, spelling, and arithmetic approximately as effectively as scores obtained at pre-1st grade level. Prekindergarten MRT norms based on the study sample are presented.—*Journal abstract.*

4117. Scott, C. S.; Fenske, R. H. & Maxey, E. J. (American Coll Testing Program, Iowa City, IA) **Vocational choice change patterns of a national sample of community-junior college students.** *ACT Research Report*, 1974(May), No 64, 10 p.—Examined changes in expressed vocational choices made over an 18-mo period by a sample of students who were each enrolled in 1 of 62 2-yr institutions. Ability, interest, and family back-

ground measures, including the Career Planning Profile, were used as independent variables. Results indicate that (a) vocational choice changers were very similar to nonchangers in terms of the 23 independent variables examined, (b) vocational choice change patterns varied widely among groups of changers, and (c) there were very substantial differences in the choice changes made by males and females. Theoretical and practical implications of the findings are discussed.—*Journal abstract.*

4118. Shutt, Darold L. & Hannon, Thomas A. (Northern Arizona U) **The validity of the HNTLA for evaluation of the abilities of bilingual children.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 429-432.—Studied groups of 50 Mexican-American and 50 Navajo students enrolled in special education classes in Arizona. 6 test administrators were used. For the combined sample, a significant correlation was found ( $p < .01$ ) between subtests of the HNTLA and those of the WISC Performance Scale.

4119. Tapp, George S. & Barclay, James R. (Morehead State U) **Convergent and discriminant validity of the Barclay Classroom Climate Inventory.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 439-447.—Using self-report, peer judgments, and teacher ratings, the inventory employs the multimethod multitrait factor analysis approach. A computer processing procedure, utilizing criteria developed in this approach, scores, analyzes, and develops a written report on each pupil. These reports can be cumulated to result in descriptions of the social interaction and affective environment in the classroom. A questionnaire comprised of short paragraphs defining the major factors from the inventory was administered to 9 elementary classrooms. Each student rated himself for each of the factors, and was, in turn, rated by a randomly selected peer and the teacher. These 3 rating sources combined with the inventory's factor scores to form a 5-trait, 4-method matrix for the assessment of convergent and discriminant validity. Considerable evidence for these aspects of validity was found.—*R. W. Covert.*

4120. Tatham, Clifford B. & Tatham, Elaine L. (Research Hosp & Medical Ctr, Kansas City, MO) **Academic predictors for black students.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 371-374.—Designated 45 black males and 28 black females as either academically successful (graduation, or grade point average of at least 1.0) or academically unsuccessful. A 2-way (Sex  $\times$  Academic Success) multivariate analysis of variance indicated that with respect to standard scores on the Scholastic Aptitude Test, Verbal and Mathematical, and on the High School Readiness test, males differed significantly from females ( $p < .005$ ). The successful males differed from the unsuccessful males with respect to these 3 variables, but no such difference was found for females. It is concluded that measures of academic achievement should not be the only measures used in selecting black students for admittance to college; others, such as motivation and socioeconomic background, also need to be considered.—*Journal abstract.*

4121. Taylor, George R. & Jackson, Margaret H. (Coppin State Coll) **The effects of direct intervention on school tardiness.** *Southern Journal of Educational Re-*



search, 1974(Spr), Vol 8(4), 272-279.—Sought to determine if intervention initiated by school personnel could successfully reduce the tardiness rate in 13 students in a metropolitan junior high school. Ss had a record of habitual tardiness in Grades 7 and 8. It was hypothesized that the tardiness rate would be significantly decreased after intervention. Data were collected from official school records, interviews, and survey forms. Results indicate that the tardiness rate was significantly reduced by the end of the 9th yr.—*Journal abstract.*

4122. Tsuji, Kazuko. [A study on the therapist's contribution to counseling with junior high school students.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Mar), Vol 21(1), 43-47.—Studied 5 dimensions of therapeutic response, analyzing data provided by 10 Rogerian therapists and 10 counselors of middle school students responding to a questionnaire. The dimension of unconditional positive regard was found to be most effective. (English summary)

4123. Wallner, Nancy K. (Mississippi State U) **The development of a listening comprehension test for kindergarten and beginning first grade.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 391-396.—Developed and validated 2 forms of a test of listening comprehension which fulfilled 2 of the 3 statistical criteria for parallel tests. The alternate-form and internal reliabilities were high. Content, criterion-related, and predictive validities were established.

4124. Washington, Kenneth R. & Anderson, Norma J. (U Massachusetts, School of Education, Amherst) **Scarcity of black counselors: A crisis in urban education.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jan), Vol 2(2), 99-105.—Questions whether positive counseling can occur in a black counselor-white counselor dichotomy and whether the attitudes of white guidance counselors can be modified through effective preservice and inservice programs. A review of the literature on the topic indicates a need for more black counselors and for the development of preservice and inservice programs that address themselves to the cultural and experiential differences which exist between white counselors and black students.—*M. E. Pounsel.*

4125. Wasik, John L. (North Carolina State U) **Teacher perceptions of behaviors associated with creative problem solving performance.** *Educational & Psychological Measurement*, 1974(Sum), Vol 34(2), 327-341.—Conducted a study to determine the perceptual cues used by teachers to identify creative problem-solving ability. A battery of 8 Structure of Intellect (SI) ability tests was administered to 162 10th grade students of 1 suburban school. Ratings of student creative problem-solving ability obtained from 4 teacher teams were compared with the SI measures by using Christal's judgment analysis procedure. It is concluded that the 4 teacher teams were using the same cues (SI abilities) in rating students in terms of their ability to solve problems creatively, and that these cues were related to types of abilities measured by scholastic aptitude tests. (21 ref)—*Journal abstract.*

4126. Williams, Clarence G. (Massachusetts Inst of Technology, Graduate School) **A model for counseling "high promise" minority freshmen.** *Journal of Non-*

*White Concerns in Personnel & Guidance*, 1974(Jan), Vol 2(2), 87-93.—Offers a model for effectively bringing more minority students into the mainstream of university life. The model provides for professional counselors who carry out the fundamental aims of any typical university program. Specifically, in an attempt to achieve both long-term and immediate goals, the model includes individual counseling, faculty consultations, residence hall counselors, residence hall visitations, group process, teachers' and counselors' consultations, a follow-up program, and auxiliaries. It is stressed that face-to-face interviews between counselor and student and extensive training and background experience relative to minority groups on the part of the counselor are basic to the success of the program.—*M. E. Pounsel.*

APPLIED PSYCHOLOGY

4127. Almquist, Elizabeth M. (North Texas State U) **Sex stereotypes in occupational choice: The case for college women.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 13-21.—The choice of a male-dominated occupation rather than a traditionally feminine one was the single occupational variable which meaningfully divided a class of 110 women who were studied intensively over the 4 yrs of college. Women who chose occupations which employ largely men differed predictably from women who selected feminine occupations in terms of familial influence, work values, work experience, role-model influence, and some collegiate activities. The 2 groups did not differ appreciably in sociability experiences or in relationships with parents, so it cannot be argued that work plans of women pioneering in a "male" occupation stem from social isolation, rejection, or lack of appropriate feminine socialization. (15 ref)—*Journal abstract.*

4128. Belk, Russell W. (Temple U) **An exploratory assessment of situational effects in buyer behavior.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 156-163.—Considers that circumstances, contexts, and situations are often cited but rarely studied as explanations for unpredicted behaviors. The amounts and patterns of variance in selected purchase decisions were studied as a function of consumption and purchase contexts. Based on the work of H. Triandis, a "behavioral differential inventory" was developed on which respondents indicate the likelihood that they would make each of a number of responses to a stimulus configuration. 100 adults from 5 business, social, and church groups completed the inventory for 2 product categories (snacks and meats) and 10 situations. Results demonstrate that a large amount of situational influence determines consumer preferences; situational main effects and interactions accounted for almost half the explained variance in meat and snack preferences. Implications for additional research on theoretical problems concerning the relationship of attitudes, personality, and brand loyalty to consumer behavior are discussed. (31 ref)—*L. Gorsey.*

4129. Blum, Milton L.; Stewart, John B. & Wheatley, Edward W. (Florida International U, School of Arts & Sciences) **Consumer affairs: Viability of the corporate**

response. *Journal of Marketing*, 1974(Apr), Vol 38(2), 13-19.—The typical function of newly established departments of consumer affairs in corporations is to coordinate existing departments and improve communication. It is suggested that much more emphasis should be placed on research and innovation. New measures of consumer satisfaction and new methods of diagnosing consumer dissatisfaction are needed.

4130. Bush, Ronald F.; Gwinner, Robert F. & Solomon, Paul J. (U Mississippi, School of Business Administration) **White consumer sales response to black models.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 25-29.—Carried out a controlled sales test in 3 supermarkets using point-of-purchase displays set up with and without black models. No significant differences occurred in sales responses of white consumers to promotional materials utilizing (a) all white models, (b) all black models, or (c) white and black models (integrated). Observations were recorded for 13,443 white consumers during the experiment. (22 ref)—D. W. Twedt.

4131. Cunningham, William H.; Moore, Russell M. & Cunningham, Isabella C. (U Texas, Coll of Business Administration, Austin) **Urban markets in industrializing countries: The São Paulo experience.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 2-12.—Studied the purchasing behavior of a stratified random sample of 602 residents of São Paulo, Brazil. 52% were upper lower class, 15% were lower lower class, and the rest were distributed rather evenly among the top 4 social classes. Purchasing behavior and the importance of different advertising media as sources of purchase information varied significantly by social class. (17 ref)—D. W. Twedt.

4132. Czepiel, John A. (New York U) **Word-of-mouth processes in the diffusion of a major technological innovation.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 172-180.—Presents a microanalytic study of the use of word-of-mouth processes among decision makers in competitive firms in diffusing a major technological innovation (in this study, the use of the continuous casting process in the steel industry). Structured interviews were conducted with 31 of those managerial and technical persons who were directly involved in making the initial recommendation to use continuous casting. The assessment determined (a) whether respondents had contacted any other sources for information about the innovation; (b) whether, after their decision to adopt the innovation, any firms had contacted them for information; and (c) whether respondents had any regular opinion/advice relationships with other firms. Findings indicate the existence of a functioning informal community linking the firms together. The finding of active friendship relationships in information seeking reinforces the idea of diffusion as a behavioral and social process. Data on opinion leadership and centrality in opinion/advice networks are also presented. (23 ref)—L. Gorsey.

4133. Ehrenberg, Andrew S. (London Graduate School of Business Studies, England) **Repetitive advertising and the consumer.** *Journal of Advertising Research*, 1974(Apr), Vol 14(2), 25-34.—An Awareness Trial Repeat purchase approach as to how advertising works is

proposed as an alternative to the conventional Awareness Attitudes Behavior model. This recommendation is based on the argument that consumers' attitudes toward similar brands are very similar and that they tend to ignore advertising for brands they are not already using; therefore there is little scope for persuasive advertising. Advertising's main role is to reinforce feelings of satisfaction for brands already being used. (26 ref)—J. C. Franklin.

4134. Erdos, Paul L. (Erdos & Morgan, New York, NY) **Employee surveys.** *Personnel Journal*, 1974(Apr), Vol 53(4), 294-300.—Discusses several specific purposes for soliciting opinions from employees and managers. Areas to be covered in such surveys are described and typical letters to respondents are shown.

4135. Eye, Glen G. (U Wisconsin, Madison) **Knowledge abundance in an environment of scarcity.** *Journal of Educational Research*, 1974(Jul-Aug), Vol 67(10), 445-447.—Contrasts the recent marked increase in the quantity of knowledge with the marked decrease in materials. The tendency to falsely assume that materials are as inexhaustible as knowledge is discussed. It is argued that while both knowledge and materials are marketable commodities, different laws govern each.

4136. Fox, William M.; Hill, Walter A. & Guertin, Wilson H. (U Florida, Coll of Business Administration) **Dimensional analysis of the Least Preferred Co-Worker scales.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 192-194.—Administered the least preferred co-worker scales to 114 Internal Revenue tax examiners, 147 US Marines, and 180 British managers in an electronics firm. Comparative factor analyses of responses show that it was possible to identify several dimensions of coworker perceptions measured by the LPC scales: Hostile-Ineffective, Remote-Rejecting, Tense, Ineffective-Boring, and Hesitant.

4137. Frank, Austin C. & Kirk, Barbara A. (U California, Berkeley) **Factors within the 1969 SVIB for Women and relationships to Holland's theory.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 79-94.—Assigned Holland codes to the Basic Interest Scales (BIS) and the Occupational Scales (O-S) of the revised Strong Vocational Interest Blank for Women. Component scores of 206 female students on the BIS and O-S were separately developed, intercorrelated, and evaluated along with standardized composite scores representing each of the 11 O-S groups on the profile. The dimensionality of the BIS and O-S was similar, and similar in number to J. L. Holland's theory, but the components were only partially congruent. Some profile groups provided relatively good representations of BIS and/or O-S components, and the grouping of the O-S provided important information not otherwise readily available. Fundamental problems of compatibility appeared to exist in relating the structure of this instrument to Holland's formulations. (15 ref)—*Journal abstract.*

4138. Gaffey, Robert L. & Walsh, W. Bruce. (Community Mental Health Clinic, Delaware, OH) **Concurrent validity and Holland's theory.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 41-51.—Used 4 different operational definitions of vocational orientation to explore the relationships among all possible combinations of same named scales across the 4 inventories.



Concurrent validity was studied by administering the Vocational Preference Inventory (VPI), the Self-Directed Search (SDS), and the Holland scales (Sets I and II) to 153 male workers established in occupational environments consistent with J. L. Holland's 6 vocational environments. Results reveal that 5 scales of the VPI and of the Holland scales and 4 scales of the SDS successfully differentiated the occupational groups consistent with Holland's theoretical framework. All of the correlation coefficients for same named scales for all possible combinations of the 4 inventories were significant and support the validity of Holland's theory.—*Journal abstract*.

4139. Goldman, Roy D.; Platt, Bruce B. & Kaplan, Robert B. (U California, Riverside) **Dimensions of attitudes toward technology.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 184-187.—Administered an 80-item questionnaire measuring attitudes toward mechanization to 45 undergraduate students in physical science, biological science, social science, and fine arts. Responses were factor analyzed using a varimax rotation. Factor scores were created for 6 of the resulting factors: Global Mechanism, Mechanical Curiosity, Preference for Hand-made Goods, Alienation, Spiritual Benefits of Technology, and Human Vitalism. These factor scores were then used as dependent variables in a multivariate comparison of the students in different major fields. Most of the between-group differences in attitude toward mechanization were reflected by differences in mechanical curiosity.—*Journal abstract*.

4140. Guttentag, Marcia. (Harvard U) **Subjectivity and its use in evaluation research.** *Evaluation*, 1973, Vol 1(2), 60-65.—Describes a new model for evaluation research based on the assumption that the inherent subjectivity of decision-making renders classical experimental designs and tests of significance irrelevant to most program evaluation. An alternative approach is derived from decision theory using W. Edwards's method (1971) of measuring multi-attribute utilities (MAU) to quantify decision-makers' subjective judgments about the value of projects. A detailed example of the use of MAU in program planning is presented. An illustration is given of how the outcomes of MAU planning provide evaluation researchers with hypotheses which they can test when objective data eventually replaces the subjective judgments used originally. Bayesian rather than traditional statistical procedures are recommended.—*J. Adams-Webber*.

4141. Hallstrom, Arne G. [The power of prisoners of war to resist interrogation: An overview based on literature study.] (Swed) *MPI A-Rapport*, 1974(Jun), No 26, 26 p.—Notes that methods of obtaining information from prisoners of war and methods of preventing a country's own personnel from revealing information to the enemy have been studied thoroughly, especially in the US after the Korean war. The present study investigated the predictive utility of these methods. It is concluded that generalizations about the firmness of resistance cannot be produced, and if they could be developed, they would probably be on a continuum ranging from qualified and firm to weaker and weaker resistances. If one were aware of the ideologies and interrogation practices on both sides during a war, the

necessary conditions for judging the power of prisoners of war to resist interrogation could be more easily established.—*English abstract*.

4142. Harless, J. H. (Harless Performance Guild, McLean, VA) **An analysis of front-end analysis.** *Improving Human Performance*, 1973(Win), Vol 2(4), 229-244.—Describes the goals and procedures of front-end analysis and discusses ways in which humans can intervene in the performance of another (a) by giving instruction on how and when to make responses, (b) by offering incentives and favorable consequences for desired responses, and (c) by changing the environment in which the responses occur. 4 alternate processes are outlined, and an example of the application of front-end analysis to a specific problem is included.—*B. McLean*.

4143. Harlow, Dorothy N. (U South Florida, Coll of Business Administration) **Professional employees' preference for upward mobility.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 137-141.—Examined why some engineers are more interested than others in upward mobility. The hypotheses were based on R. Presthus's 1962 accommodation theory. 54 graduate engineers completed questionnaires measuring job satisfaction (JS), ambiguity tolerance (AT), and promotional preference (PP). For the total sample, PP and JS were positively correlated ( $p < .05$ ), supporting the theory. AT and PP were also positively correlated for Ss above the median on JS, contrary to the theory. However, AT and PP were negatively correlated for 33 engineering managers. Although data from professional employees did not support the theory regarding AT, it is possible that the individual's career stage should also be considered.—*Journal abstract*.

4144. Imundo, Louis V. (Wright State U) **Attitudes of non-union white-collar federal government employees toward unions.** *Public Personnel Management*, 1974(Jan), Vol 3(1), 87-92.—Surveyed the attitudes toward unions held by nonpostal white-collar government employees who are represented by a union but are not dues-paying members. The sample, randomly selected, consisted of 500 white-collar workers, 10% of those employed at an Air Force base in Ohio. The sampled workers are exclusively represented by a union. 170 usable responses to a mailed questionnaire were received. Workers in the 30-50 yr age group were pro-union and were dissatisfied with their current working conditions, yet were not dues-paying union members. There appear to be 2 reasons for the contradiction. These workers are apprehensive of union power, and they have union representation without paying dues. To increase dues-paying membership, it is suggested that the union should design its promotional appeals around reinforcement of pro-union and reduction of anti-union sentiment.—*S. E. Bowser*.

4145. Johnson, Richard M. (Market Facts, Inc., Chicago, IL) **Trade-off analysis of consumer values.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 121-127.—Describes a computational method for exploring and quantifying value systems of consumers through conjoint measurement. The 3 components of the method are (a) a technique of data collection requiring respondents to consider "trade-offs" among desirable alternatives, (b) a method which derives "utilities" accounting as nearly as possible for each respondent's

choices, and (c) a market simulation model which determines those product attributes that maximize its share of preference within any particular competitive market; the model assumes that the attributes under study are independent and allows for their interaction using Kendall's tau and phi statistics. The advantages of this procedure, external validation data, and other evidence of its appropriateness are discussed.—*L. Gorsey.*

4146. **Jonnada, Rama K. & Fegley, Kenneth A.** (Bell Telephone Lab, Whippany, NJ) **Path analysis in systems science.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Sep), Vol 4(5), 418-424.—Discusses the application of path analysis to the development and evaluation of causal models, which are useful in systems science applied to such typical areas as biological, behavioral, and social systems. Path analysis is described and illustrated with examples, and its usefulness to systems engineers involved in the development of information systems is pointed out.

4147. **Kinnear, Thomas C.; Taylor, James R. & Ahmed, Sadrudin A.** (U Western Ontario, School of Business Administration, London, Canada) **Ecologically concerned consumers: Who are they?** *Journal of Marketing*, 1974(Apr), Vol 38(2), 20-24.—Explored the relationship between socioeconomic and personality characteristics of consumers and the amount, if any, of ecological concern they indicate. Personality data were based upon mail questionnaires returned by 500 members of the Canadian Family Opinion-University of Western Ontario Consumer Panel. Ecologically concerned consumers scored high in perceived consumer effectiveness against pollution, high in openness to new ideas (tolerance), high in need to understand the workings of things and satisfy intellectual curiosity (understanding), and moderately high in their need to obtain personal safety (harm avoidance). A marketing implication is that an ecologically concerned segment of the population may be large enough to warrant exploitation.—*D. W. Twedt.*

4148. **Kirk, Kenneth W.; Johnson, Richard W. & Ohvall, Richard A.** (U Wisconsin, School of Pharmacy, Madison) **Interests of women pharmacists.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 200-208.—Developed a pharmacist scale for the Strong Vocational Interest Blank for Women. A mailed questionnaire was completed by 1,341 female pharmacists. The occupational criterion group was defined: 25-55 yrs old, employed 3 or more yrs, liked her work, and state licensed. A sample of 646 women met these criteria, and 67 items were found that differentiated women pharmacists from women in general. These pharmacists scored high on the biological science and medical service basic scales. Male pharmacists, on the other hand, scored high on the merchandising and medical sciences scales. These sex differences are reflected in the job roles assumed by women and men pharmacists: females are more likely to become hospital pharmacists and men to become community pharmacists.—*R. S. Albin.*

4149. **Lehmann, Donald R. & O'Shaughnessy, John.** (Columbia U, Graduate School of Business) **Difference in attribute importance for different industrial products.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 36-42.—Conducted a binational study of how industrial buyers

evaluate 4 categories of products. Purchasing agents for 19 major US companies and 26 major British companies were asked to indicate on a semantic differential scale the relative importance to them, in choosing a supplier for each type of product, of each of 17 attributes. It was found that suppliers must promote their products in terms of how they are to be used. US and British purchasing agents differed as to the importance assigned to some attributes, indicating that multinational suppliers might need to use different marketing strategies for different national markets.—*D. W. Twedt.*

4150. **Matsumoto, Kei; Kawaike, Kooji; Yoshida, Syuzo & Sameshima, Kazuko.** (Kagoshima U, Faculty of Medicine, Japan) **[The influence upon psychoactivity of high temperature and fatigue.]** (Jpn) *Kyushu Neuro-psychiatry*, 1971(Oct), Vol 17(2), 80-84.—Studied the degree of fatigue of 11 medical and 7 nursing students as measured by the Uchida-Kraepelin test. From July 26 through August 1, 1971, all Ss worked from 5:30 AM to 6 PM under the mean temperature of 32° C or higher. Results of the 1st test, given on July 27, show a normal profile pattern. Results of the 2nd test, given on August 1, show a decrease in both the amount of work produced and the effect of rest. The evidence indicates that high (and low) temperatures influence the degree of fatigue which in turn affects psychoactivity. Arrangements for suitable rest periods are suggested in order to maintain normal patterns of psychoactivity under high temperatures. (English summary)—*S. Ashida.*

4151. **Meyer, John C.** (State U New York, School of Criminal Justice, Albany) **Police attitudes and performance appraisal: The forest and some trees.** *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 201-208.—Investigated the relationship between the employer's appraisal of the employee's performance and the employee's perception of organization morale and client opinion by studying the interaction of these factors in an east coast police department. 833 policemen expressed their views on department morale and public opinion, and an appraisal of each policeman's work was measured by an Index of Recognition (IOR) derived by subtracting the number of complaints regarding a policeman from the number of commendations that he had received. Results appear to indicate that the nature of official recognition has little effect on employee perceptions. However, recognition may reflect the employee's orientation to work as it is measured by the employer. These findings raise the question of whether performance appraisal systems are measuring what they are intended to do.—*R. S. Albin.*

4152. **Nystrom, Paul C.** (U Wisconsin, School of Business Administration, Milwaukee) **Equity theory and career pay: A computer simulation approach.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 125-131.—Used computer simulation to convert E. Jaques's 1961 theory of equitable payment into the composites model utilized by the M. Haire et al's (see PA, Vol 41:14292) study of career pay. Salaries of 100 Ss were stochastically allocated for 25 time periods. A Markovian process model produced a set of pay parameters that more closely replicated past empirical findings than the parameters produced by an independent process model. Distributing pay increases according to differentially



developing work capacity curves yielded pay increases distributed at random with respect to past salaries. Thus, Jaques's theory of equitable payment provides one explanation for the empirical findings generated by previous studies of career pay curves. (22 ref)—*Journal abstract*.

4153. Paloian, A. Y. (Data Enterprises of the Northwest, Bellevue, WA) **An interrogative authoring system.** *International Journal of Man-Machine Studies*, 1974(Jul), Vol 6(4), 421-444.—Reviews requirements for a desirable authoring system and proposes an interrogative authoring system which allows for verb checking prior to entry, logic separation from data, self-documentation of a course, and machine independence of a course (the 1st step toward course sharing). Examples of use of the program are included.

4154. Prediger, Dale J. & Hanson, Gary R. (American Coll Testing Program, Iowa City, IA) **The distinction between sex restrictiveness and sex bias in interest inventories.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 96-104.—Proposes that sex-limiting or sex-restrictive effects of interest inventories do not necessarily constitute sex-bias and that sex restrictiveness is an important characteristic of interest inventories that should be considered separately from sex bias. Tentative definitions of sex-restrictive and sex-biased reporting procedures are provided and applied to 3 interest inventories for purposes of illustration. The types of evidence these definitions require of publishers are also discussed, and parallels with the Equal Employment Opportunity Commission guidelines on test bias are drawn. It is maintained that unless a distinction between sex-restrictive and sex-biased reporting procedures is made, current definitions of sex bias in interest inventories can and will be successfully challenged by inventory authors, and delays in eliminating biased reporting procedures will result. (15 ref)—*Journal abstract*.

4155. Richardson, Mary S. (New York U) **The dimensions of career and work orientation in college women.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 161-172.—Administered 14 presumed measures of career orientation as well as Super's Work Values Inventory to 97 female college seniors. Analysis of the relationships among these variables identified 2 relatively independent clusters. The 1st cluster most closely approximated the usual definition of career orientation. Career-oriented women were highly career motivated and perceived the career role as primary in their adult lives. The 2nd cluster—work orientation—characterized women with well-defined occupational aspirations who placed a high value on both the career role and marriage-family responsibilities in their future. Work-oriented women tended to choose traditionally feminine occupations in contrast to the career-oriented women whose aspirations included higher-level and less traditional occupations. (20 ref)—*Journal abstract*.

4156. Rotondi, Thomas. (Marquette U, Robert A. Johnston Coll of Business Administration) **Creativity and organizational identification in research and development environments.** *Public Personnel Management*, 1974(Jan), Vol 3(1), 53-58.—Presents a theoretical discussion of personal identification with an organization as it relates to creative and innovative employees.

Organizational climates may effectively emphasize either creativity or organizational identification, but not both. Creativity is measurable by objective output (U.S. patents, inventions, publications, etc). Organizational identification includes perception of shared characteristics, a feeling of belongingness, and demonstrated support of the organization. 3 generalized expectations of research and development environments are given: (a) Creativity is inversely related to organizational identification. (b) Creativity is directly related to occupational identification. (c) Organization identification is inversely related to occupational identification. It is postulated that there are 2 types of individuals—innovators and ritualists—in research and development organizations. If management provides a flexible work environment conducive to innovation and change, creative individuals are likely to be self-motivated both to achieve organizational goals, and to remain with the organization. (17 ref)—*S. E. Bowser*.

4157. Sainty, Geoffrey E. (Manitoba Community Coll, Canada) **A validation of the worker trait groups in the DOT.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 173-176.—Performed an empirical validation of the 114 Worker Trait Groups (WTG) of the 3rd edition of the *Dictionary of Occupational Titles* (DOT) by comparing the factor structure of the worker-trait components of the 114 WTG's with the factor structure of 800 jobs. 6 factors were compared and cosines between .8997 and .9657 obtained on the matched factors.

4158. Schiffman, Leon G. & Gaccione, Vincent. (Baruch Coll, City U New York) **Opinion leaders in institutional markets.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 49-53.—Explored opinion leadership in the nursing home industry. A mail questionnaire was sent to the 263 nursing homes in the American Hospital Association, 47% of which responded. Comparison of results of this study with those of household-consumer studies suggests that the institutional opinion leader is similar to his household counterpart in a number of ways. His interaction with administrative personnel of other nursing homes is greater than that of nonleaders, and he is more likely than nonleaders to seek the advice of others. Identification of administrators who are opinion leaders offers 2 advantages: (a) Leaders are more responsive to new products and services. (b) Leaders may serve as sources of information for other purchasers. (16 ref)—*D. W. Twedt*.

4159. Sherman, Lewis J. (U Missouri, St Louis) **A psychological view of women in policing.** *Journal of Police Science & Administration*, 1973(Dec), Vol 1(4), 383-394.—Reviews evidence which supports the thesis that women should be given a broader role in police-work. Examples of this broadened role in the US and foreign countries are presented and discussed.

4160. Singh, N. P. (Bhagalpur U, T.N.B. Coll, India) **Rural or agricultural psychology for developing countries.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 66-71.—Advocates application of principles and theories of psychology to problems of agrarian economy. The industrial psychology model does not take into account fundamental differences in the personal and situational factors which affect the behavior of agricultural workers. Reinterpretation of such

psychological factors as identification, affiliation, and aggression for agricultural workers is required. Current studies of rural or agricultural psychology are cited. (18 ref)—*J. B. Francis.*

4161. Sudman, Seymour & Ferber, Robert. (U Illinois, Urbana) **A comparison of alternative procedures for collecting consumer expenditure data for frequently purchased products.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 128-135.—Reports a pilot study on alternative means of obtaining consumer expenditure data. Results show that compensation clearly increased both the level of cooperation and expenditures reported, that government vs university auspices do not make much difference, and that diaries yield more complete and accurate information than telephone calls, although telephoning may be useful for supplementary purposes.

4162. Taylor, James W. (California State U, School of Business Administration & Economics, Fullerton) **The role of risk in consumer behavior.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 54-60.—Briefly reviews previous publications on the role of risk in consumer behavior, and presents a proposed model of the interrelationships among the different components of risk-taking in consumer behavior as they affect the purchase decision. (45 ref)

4163. Temkin, Sanford. (Research for Better Schools, Philadelphia, PA) **Making sense of benefit-cost analysis and cost-effectiveness analysis.** *Improving Human Performance*, 1974(Sum), Vol 3(2), 39-48.—Clarifies the meanings and implications of the vocabulary of cost-effective analysis and discusses its effects on individual and leadership decision-making. 2 methods that can be applied to public economic problems—benefit-cost analysis and cost-effective analysis—and the information requirements and implications for applying them are detailed.—*B. McLean.*

4164. Tenzel, James H. & Cizancas, Victor. (U California, Medical School, San Diego) **The uniform experiment.** *Journal of Police Science & Administration*, 1973(Dec), Vol 1(4), 421-424.—Describes a continuing experiment which began in 1969 in which police in Menlo Park, California, switched to standard blazers, dress shirts, and ties, with no insignia, badges, or night sticks. This change has been rapidly accepted, has positively affected police attitudes toward education, and has helped police-community relations.

4165. Tregoe, Benjamin B. (Kepner-Tregoe, Inc, Princeton, NJ) **Job enrichment: How to avoid the pitfalls.** *Personnel Journal*, 1974(Jun), Vol 53(6), 445-449.—Discusses several misconceptions of job enrichment and describes a problem-solving program (Analytical Trouble Shooting) adopted by the author's company.

4166. Tucker, W. T. (U Texas, Coll of Business Administration, Austin) **Future directions in marketing theory.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 30-35.—Reports that marketing theory, which has usually looked at products, institutions, consumers, and marketing practices from the viewpoint of the marketing manager, is now splitting up under the force of its own growing sophistication and the irritation of contemporary problems. Novel approaches which might produce new developments in marketing theory and should therefore be given consideration include study of the labor market

(particularly the human resources it has failed to organize), and research in consumer behavior from the standpoint of the consumer's own well-being or that of society.—*D. W. Twedt.*

4167. Weiss, Carol H. (Columbia U, Bureau of Applied Social Research) **Between the cup and the lip . . . Evaluation**, 1973, Vol 1(2), 49-55.—Studied the effects of specific organizational constraints on program evaluation research. Participants in 10 applied research projects were interviewed. Results indicate that (a) researchers, administrators, and staff often held conflicting views concerning the purpose of evaluation research; (b) researchers were dependent on an administrator for major decisions when he controlled research funds; (c) these 2 factors, as well as differences in professional orientations, were frequently sources of tension and conflict between researchers and administrators; (d) rapid turnover in research staff caused instability in conditions of evaluation; (e) it was difficult to coordinate the timing of evaluation research with program schedules; and (f) often there were no direct channels for providing results of evaluation research to potential users. The implications of these findings for planning program evaluations are discussed.—*J. Adams-Webber.*

4168. Winter, Frederick W. (U Illinois, Urbana-Champaign) **The effect of purchase characteristics on postdecision product reevaluation.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 164-171.—Used a purchase simulation design to study consumer evaluations of products during the period immediately after purchase but before consumption. 490 adults (a) completed attitude and product use questionnaires to determine the importance of 6 attributes of 4 brands of scouring pads, (b) viewed a TV program in which \$s received either an advertising exposure to 1 brand or no exposure, (c) completed a 2nd brand attitude questionnaire, and (d) participated in 4 simulated shopping trips in which they indicated that their purchases of the product were either adoption or trial purchases and completed additional attitude measures. Data indicate that the most favorable cognitive response results from an adoption/trial (vs trial/trial) purchase; the consumer has thus made a recent psychological commitment to a brand previously selected on a trial basis. Favorable cognitive change is increased when the purchase is of a brand of somewhat low superiority over unchosen brands and when the alternatives are viewed as heterogeneous or the chosen brand has high familiarity. Implications for cognitive dissonance theory are discussed. (18 ref)—*L. Gorsey.*

4169. Zytowski, Donald G. (Iowa State U, Student Counseling Service) **Predictive validity of the Kuder Preference Record, Form B, over a 25-year span.** *Measurement & Evaluation in Guidance*, 1974(Jul), Vol 7(2), 122-129.—Located a total of 102 males and females 7(2), 122-129.—Located a total of 102 males and females 25 yrs after they had taken the Kuder Preference Record, Form B (KPR-B) at an average age of 14 yrs. 53% were engaged in occupations consistent with their highest interest scores, although 32% were in occupations consistent with their lowest scores. Those in consistent occupations reported significantly greater job satisfaction, but no difference in self-assessed performance. In addition, \$s whose occupations involved a given scale



scored higher on that scale than those whose occupations did not on all except the Clerical scale, although only on the Social Service scale was the difference significant. Results are interpreted to mean that counseling for future occupations should not be done from the age 14 KPR-Bs, but that interests measured this early do bear a relationship to occupations 25 yrs later. (17 ref)—*Journal abstract*.

### Occupational Guidance & Personnel Selection & Training

4170. Baker, Trace A. & Davis, Joel L. (Northern Illinois U) **A simple turntable for vestibular stimulation of cats by acceleration through a fixed angle with description of a head restraint.** *Behavior Research Methods & Instrumentation*, 1974(Jul), Vol 6(4), 399-402.

4171. Angers, William P. (Kean Coll, NJ) **Position in the family in relation to teaching as a career choice.** *Individual Psychologist*, 1974(May), Vol 11(1), 15-21. —Investigated A. Adler's hypothesis that the oldest child, as an adult, seeks an occupation that places him in authority. Ss were 496 teacher college freshmen whose birth order and temperament qualities were assessed through an author-developed questionnaire and the MMPI, respectively. Results suggest that Adlerian concepts as they relate to birth order and resulting life-style do have validity in the counseling situation. Firstborn siblings tended to gravitate toward schools of professional training as delimited by teacher education in greater proportion than did later-born siblings. Average temperament traits among teacher college students indicated that they were aggressive, dominant individuals who were conscious of the importance of rules and regulations and were willing to do something about these items if they were not satisfied with them. The relationship between Adlerian psychology and achievement, motivation, counseling, and guidance is discussed. (21 ref)—*M. E. Pounsel*.

4172. Austin, David L. (Spin Physics, Inc, San Diego, CA) **Transactional interviewing or, who does what to whom?** *Personnel Journal*, 1974(Jun), Vol 53(6), 450-453. —Discusses goals of the interview, describes special skills necessary for effective interviewing, and reviews specific interviewee goals.

4173. Badalamente, Richard V. et al. (Texas Tech U) **Training police for their social role.** *Journal of Police Science & Administration*, 1973(Dec), Vol 1(4), 440-453. —Presents a systems model for police training in which the social work role of police (output); the traits, knowledge, and skills necessary for this role; and various training methods are discussed. Characteristics of police recruits (input) and performance evaluation (feedback) are briefly mentioned.

4174. Bemis, Stephen E.; Bonner, Robert L.; Kearney, Thomas & Goppold von Lobsdorf, Kathleen. (US Dept of Labor, Washington, DC) **The new occupational aptitude pattern structure for the GATB.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 189-194. —Describes the final developmental work and the resulting structure of the new occupational aptitude scales of the General Aptitude Test Battery (GATB). The primary goal was to develop a rationale for relating occupational aptitude patterns to worker trait groups. The new structure is

comprehensive from the standpoint of using available research data because 90% of the specific occupational batteries are included. The structure is limiting, however, from the standpoint of reference to all occupations in the economy. Reports from counselors using the new structure have been favorable.—*R. S. Albin*.

4175. Carroll, Archie B. (U Georgia, Coll of Business Administration) **Conceptual foundations of job enrichment.** *Public Personnel Management*, 1974(Jan), Vol 3(1), 35-38. —Presents a theoretical discussion of job enrichment methodology. The implementation of job enrichment strategies is considered as a special case of introducing change in an organization. A step by step procedure is outlined, consisting of experimentation, supervisory coaching, identification of jobs, implementation, and feedback and follow-up. Job enrichment provides the employee with opportunities for achievement, recognition, responsibility, and mental growth. It is concluded that successful application of this methodology requires continuous managerial commitment.—*S. E. Bowser*.

4176. Christensen, Kathleen C. & Sedlacek, William E. (U Maryland, Counseling Ctr) **Diagnostic use of Holland's Self-Directed Search.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 214-217. —Explored the use of the Self-Directed Search for Educational and Vocational Planning (SDS) as a diagnostic tool for identifying students who persist in college when they may be better suited to vocational training programs. The SDS was administered to all entering freshmen at the University of Maryland. One yr later it was administered to 37 freshmen from the same group who had lower than C averages and 37 controls from the original sample. One of the 6 scales ("realistic") differentiated the groups. It is noted that this scale reflects an interest in many occupations which do not require college training. Implications for counselors are discussed.—*R. S. Albin*.

4177. Clarke, Walter V. **Who gains when you cheat on a personality test?** *Personnel Journal*, 1974(Apr), Vol 53(4), 302-303. —Warns against attempts to cheat in taking personality tests for employment. Modern tests are so constructed that cheating is almost impossible. More important, cheating may result in employing the wrong individual in an important position; this is costly for the organization and even more disastrous for the individual. 2 case histories illustrate this kind of mistake.

4178. Dick, Arthur H. (Longines-Wittnauer, New Rochelle, NY) **Job evaluation's role in employee relations.** *Personnel Journal*, 1974(Mar), Vol 53(3), 176-179. —Discusses the importance of communicating the methods of job evaluation to affected members of the organization. 5 such methods are job ranking, grading or job classification, factor comparison, the point method, and direct pricing.

4179. Faverge, Jean M. (Free U Brussels, Belgium) **[L'examen du personnel et l'emploi des tests. (Examination of personnel and the use of tests.)]** (Fren) Paris, France: Presses Universitaires de France, 1972. 176 p.

4180. Fiedler, Fred E. (U Washington, Organizational Research) **Predicting the effects of leadership training and experience from the contingency model: A clarification.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2),

110-113.—Clarifies some points that the author's article (see PA, Vol 48:7994), which presented a new interpretation of leadership training and experience, did not make sufficiently clear, and corrects the various misinterpretations of the findings as well as of the underlying theory.—*Journal abstract.*

4181. Fisher, Allan H.; Harford, Margi R. & DiSario, Martha R. **Enrollment potential for college-based military officer training programs: A comparison of results conducted in May 1972 and May 1973.** Alexandria, VA: Air Force Human Resources Lab, Manpower Development Branch, MR 74-3, 1974. 102 p.—Survey results show that of the various military training programs the US Air Force and Navy Reserve Officers Training Corps scholarship programs were the most popular with youth and more popular with those from low-income families. Being able to attend the college of choice without financial cost and the term of obligated service were the reasons most often given for affiliating with the military.

4182. Hall, Kathleen M. (Northern Ireland Youth Employment Service Board, Belfast) **What we want from occupational psychology.** *Bulletin of the British Psychological Society*, 1972(Jul), Vol 25(88), 207-209.—Reprints a speech delineating 4 areas in which the occupational psychologist can help the careers officer: (a) in the process of training of personnel for the Youth Employment Service; (b) by greater involvement in career programs in schools, to develop awareness of a wider range of career possibilities and more flexible attitudes toward job status; (c) by helping to encourage young men and women, especially in areas of unemployment, to take advantage of training facilities; and (d) in the area of plans for developing realistic work ideals, job versatility, more knowledge of comparable vocational work in other countries, the use of computers, and helping young people to live with uncertainty.—R. S. Albin.

4183. Hansen, D. N. et al. (Florida State U) **Computer-based adaptive testing models for the Air Force Technical Training Environment Phase I: Development of a computerized measurement system for Air Force technical training.** *US AFHRL Technical Report*, 1974(Jul), No 74-48, 86 p.—Presents a review of the literature on adaptive testing emphasizing methods of test selection and entry, tailored presentations of test items, and sensitive procedures of scoring, diagnosis, interpretation, and reporting. The 2 testing techniques which showed the most promise were flexilevel testing and hierarchical testing. 3 proposed studies, based on previous work done in 2 Air Force technical courses, are described in a validation design for adaptive testing. These studies are a flexilevel test study, a hierarchical learning task adaptive test study, and a criterion zone decision study. It is concluded that adaptive testing offers the potential for time savings of up to 50% and that a very flexible computer system to drive the testing strategies can be easily developed. (7 p ref)—*Journal abstract.*

4184. Hopper, Robert & Williams, Frederick. (U Texas) **Speech characteristics and employability.** *Speech Monographs*, 1973(Nov), Vol 40(4), 296-302.—Conducted a 2-stage pilot study, constructing and testing

semantic differential (SD) scales for interviewers' judgments of employability from taped speech samples. Samples containing responses to interview-type questions were obtained from 4 different ethnic and dialectal speakers, and were played to 12 authentic employment interviewers for judgments on employability of the speakers. Adjectives supplied by the interviewers were incorporated into 40 SD scales of characteristics judged from speech, and a set of employability scales for 7 job categories was devised. 23 new interviewers then responded to the tapes using these test instruments. Factor analysis revealed 4 factors: Competence, Agreeableness, Self-assurance, and Anglo-likeness. Speech-based judgments predicted hiring best for leadership categories, and poorest for manual labor. Stage 2 replicated Stage 1, but with 2 black and 2 white speakers, and fewer scales. The same factors emerged, except for Anglo-likeness. Dialectal differences between speakers affected only executive employability.—C. A. Sherrard.

4185. Jolson, Marvin A. (U Maryland, Coll of Business & Management) **Marketing notes and communications: Employment barriers in marketing.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 67-69.—Prepared 3 résumés identical in educational background and experience, but showing religion/race as (a) white Protestant, (b) black Protestant, and (c) Jew. 300 firms that had advertised marketing positions in the *Wall Street Journal* or *Marketing News* received the 3 résumés. No statistically significant differences in response were found for nonselling marketing positions, but there was a significant tendency for employers to reject black applicants for sales positions. Only 6% of the black sales applicants triggered positive responses, in contrast to 26% of the Jewish and 24% of the white Protestant applicants.—D. W. Twedt.

4186. Kerr, Steven & Harlan, Anne. (Ohio State U) **Predicting the effects of leadership training and experience from the contingency model: Some remaining problems.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 114-117.—F. F. Fiedler's (see PA, Vol 52:Issue 2) clarifying remarks on using the contingency model to predict effects of leadership training and experience have resolved many of the original article's apparent inconsistencies. Some problems still remain, however, which could seriously impair the usefulness of Fiedler's recommendations. Some of these problems and some possible courses of action are discussed.—*Journal abstract.*

4187. Kramer, Howard C. & Barr, Donald J. (Cornell U) **In-service training for campus police.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 180-184.—Studied the possible expansion of contributions made by members of a campus security force to the university community. Possible contributions to organizational development provided by college or university security forces are discussed in terms of increasing communication channels; developing skill-building programs to facilitate competence in report writing, listening, or interviewing; and developing ongoing public relations programs to share information with the community. A model for campus security forces inservice training based on results from community involvement programs and



data from a survey of security forces training programs in 18 universities are presented.—*Journal abstract.*

4188. Kuehn, Jane. (Louisiana State U, Junior Div, Baton Rouge) **Group counseling with undecided college students.** *Vocational Guidance Quarterly*, 1974(Mar), Vol 22(3), 232-234.—18 undecided students participated in 2 counseling center groups on career development. The groups met for 3 2-hr sessions in the evening during the spring semester. The format is described together with student gains. It is concluded that a structured group counseling situation for undecided students is most helpful. This group should examine values and decision making, and give information about the world of work.—*R. S. Albin.*

4189. Lohnes, Paul R. (State U New York, Buffalo) **Implications of data-analysis models for careers guidance.** *British Journal of Guidance & Counseling*, 1974(Jul), Vol 2(2), 149-159.—Notes that data-analysis models for careers guidance have been mostly of the regression type, operating to transform trait assessments into predictions of career adjustments. It is suggested that if understanding of self and life-space is a prerequisite to decision-making and planning, models of the correlation type—which transform trait distributions of populations into knowledge of the antecedents of variance in careers phenomena—may need to take precedence in guidance programs. Models of the 2 types have some guidance implications in common, but each type of model also has some special implications, which are discussed. It is argued that studying correlation models for career development data in the context of a sequential, structured guidance curriculum can provide young people with scientific attitudes and skills which will make them ready for personal predictions, decisions, and planning.—*Journal abstract.*

4190. McGoff, R. M. & Harding, F. D. (International Training Consultants, Burbank, CA) **A report on literacy training programs in the armed forces.** Alexandria, VA: Air Force Human Resources Lab, Manpower Development Branch, MR 74-6, 1974. 52 p.—Questionnaire, interview, record search, and observation data indicate wide diversity in methods and effectiveness of the various military literacy training programs (Air Force, Army, and Navy). Procedures for follow-up evaluation are suggested, and it is recommended that literacy training should include job-related skills as well as a specified reading level as program objectives.

4191. Miller, Robert B. (American Inst for Research, Silver Spring, MD) **A method for determining task strategies.** *US AFHRL Technical Report*, 1974(May), No. 74-26, 50 p.—Examines the concept of strategic principles or task strategies implicit in the job activities of highly proficient performers. The goal is to identify or invent such strategies, as appropriate, and then train workers to use them. 25 information processing functions are described, with examples of strategic principles and training implications. Certain other strategic principles not readily interpretable in information processing terms are also presented. An analytic procedure for determining and/or devising strategies is provided and suggestions on the teaching and learning of strategies are summarized.—*Journal abstract.*

4192. Morley, Eileen. (Harvard U, Graduate School of Business Administration) **Human support services in complex manufacturing organizations: A special case of differentiation.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 295-318.—Studied the distribution of services provided by 8 large manufacturing companies to encourage individual success at work. Data were obtained from 25 senior executives in the firms. Organizational profile data reveal 4 types of employing organizations in the sample, each employing a different type of population, and supplying a different level of service. Findings show that the level of human support services provided is not related to employee characteristics but to certain system variables, suggesting that services occur in response to system characteristics rather than to worker needs. The existence of a "third world" effect in the socioeconomic distribution of industrial populations is suggested (i.e., people with the most acute problems work in organizations that provide the least service). (18 ref)—*Journal abstract.*

4193. Mullins, Cecil J. & Massey, Iris H. (Air Force Human Resources Lab, Selection Systems Section, Lackland Air Force Base, TX) **An evaluation of item-by-item test administration.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 188-189.—Administered a battery of 3 tests to 2 groups of 615 airmen in their 1st wk of basic training. One group was tested in the normal way, and the other was tested with an item-by-item form of administration. Results indicate that the item-by-item administration was in no way superior to the usual method.—*Journal abstract.*

4194. Parker, Randall. (U Texas, Austin) **Methodological pitfalls in predicting counseling success.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 31-39.—Compared prediction models employing multiple linear regression of raw scores, multiple linear regression of factor scores, the single best predictor, and a 9-point decision rule index, using data from 296 counseling clients. The least statistically sophisticated model, employing the single best predictor, was the most successful approach. Considerable shrinkage in power of prediction was demonstrated upon cross-validation.

4195. Rigney, Joseph W.; Morrison, D. Kirk & Williams, Louis A. (U Southern California) **A guide for the application of performance-structure oriented CAI in naval training: A working paper.** *NAVTRAEQUIP-CEN: USN Training Equipment Center Technical Report*, 1974(Jul), No 73-C-0065-1, 62 p.—Describes considerations and procedures for applying Performance-Structure Oriented computer-assisted instruction (CAI) in naval training in terms of a general diagram of the necessary elements in a CAI system. The developmental steps, from job task-structure analyses to computer programs, are described. (3½ p ref)

4196. Rigney, Joseph W.; Towne, Douglas M. & King, Carole A. (U Southern California, Behavioral Technology Lab, Los Angeles) **Interactive computer graphics for performance-structure-oriented CAI.** *Behavioral Technology Laboratories, U Southern California, Technical Report*, 1974(Jul), No 73, 30 p.—Describes 2 different uses of interactive graphics in computer-assisted instruction (CAI)—as substitutes for physical devices and operations (e.g., simulation of operating on man-ma-

chine interfaces by using the graphics for controls, indicators, and indications) and as explications of invisible processes (e.g., graphics which allow students to initiate animations of physical processes or functional organizations).

4197. Rust, Steven K.; Smith, James F. & Woodruff, Robert R. **Syllabus and syllabus development techniques used in evaluating the A/F37A/T-4G flight simulator.** *US AFHRL Technical Report*, 1974(Jun), No 74-44, 35 p.—Describes the simulator syllabus developed by the Flying Training Division of the US Air Force Human Resources Laboratory to demonstrate the effectiveness of a limited visual, limited motion flight simulator in T-37 undergraduate pilot training. This report (a) describes the syllabus development procedures employed; (b) clarifies the resulting syllabus content and format; and (c) provides a guide for development of future special purpose syllabi.—*Journal abstract*.

4198. Schneider, Craig E. (U Colorado, Coll of Business & Administration) **Training and development programs: What learning theory and research have to offer.** *Personnel Journal*, 1974(Apr), Vol 53(4), 288-293.—Summarizes learning principles and findings, potentially useful in all phases of training and development programs, which are grouped as follows: (a) learning environment, (b) the role of the teacher/trainer, (c) characteristics of the learner, (d) basic processes in human learning activity, (e) reinforcement and punishment, (f) retention and transfer of learning, and (g) effects of practice.—*P. L. Crawford*.

4199. Serednesky, George E.; Cahill, Lorine & Engelhart, Charles I. (Woodside Receiving Hosp, Youngstown, OH) **Effectiveness of the GATB and counseling combined: Reducing vocational training dropout rates.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 10-12.—Assigned 73 16-22 yr old male vocational trainees to 1 of 2 groups. The 36 Ss in Group 1 were assigned to a particular vocational course consistent with their General Aptitude Test Battery profiles and received 3 or more counseling sessions. The 37 Ss in Group 2 received neither prescreening nor counseling sessions but were assigned to their courses because of personal interest and in order to fill vacancies. A significant relationship ( $p < .01$ ) was found between the combination preparation procedures (prescreening and counseling) and graduation from the vocational course. Further analysis suggests that the combination of counseling and prescreening may reduce dropout rate to a greater extent than prescreening alone.—*Journal abstract*.

4200. Sinha, A. K. (Ministry of Defence, New Delhi, India) **Increasing effectiveness of human potentialities.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 53-58.—Discusses the social importance of vocational guidance, personnel selection, and occupational training for achieving effective symbiosis of man and machine in industry. It is concluded that in India, vocational guidance geared to industrial and social needs is very primitive, personnel selection procedures employing psychological assessment procedures are not far advanced, and occupational training programs based upon the resources and demands of technology are

almost nonexistent. There is need for increased research in specific aspects of all these areas.—*J. B. Francis*.

4201. Teasley, C. E. & Wright, Leonard. (U South Carolina, Bureau of Governmental Research & Service) **The effects of training on police recruit attitudes.** *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 241-248.—Tested 48 state patrol recruits at the beginning and end of their 8-wk training course to determine what attitudinal changes in conservatism and dogmatism the course might have caused. Conservatism was measured on a scale of 26 Likert-type items, and dogmatism was measured on Rokeach's E scale. Conservatism increased moderately during training, and dogmatism increased to a more marked degree. Of the 3 major functions of the police—law enforcement, peacekeeping, and the provision of services—the first is the most strongly emphasized in police training, yet in practice the police spend much less time in actual law enforcement than in peacekeeping activities and the provision of services, functions which call for less authoritarian behavior than law enforcement. The appropriateness of police academy training, as now carried out, is questioned.—*R. S. Albin*.

4202. Thomas, Charles A. (US Dept of the Army, Office of the Surgeon General, Washington, DC) **Human relations training in the army medical department.** *Military Medicine*, 1974(Sep), Vol 139(9), 731-733.—Describes the evolving integration of human relations training principles into the Army Medical Department's mental health and behavioral science programs. Particular emphasis is given to how these principles contribute to an emerging broader view of mental health that incorporates social and environmental factors as contributing variables. Present human relations training activities are described, and the future utilization and importance of this approach is discussed.—*Journal summary*.

4203. Thursby, Lynn L. **The WIN Program: Its success with female trainees.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 13-15.—Examined the effectiveness of the Work Incentives (WIN) Program with 28 female trainees in a medium-sized midwestern city. A questionnaire, which included the Michigan State University Work Beliefs Checklist, investigated 23 hypotheses, specifically focusing on the hypothesis that WIN enrollees successfully placed in jobs would not differ substantially from other enrollees in work history. This hypothesis was rejected: length of work history differed substantially between successful and less successful WIN trainees. Demographic variables of female WIN enrollees are analyzed, and ways in which WIN counselors might profit from a knowledge of these variables are discussed.—*B. McLean*.

4204. Varga, Lou. (California Dept of Human Resources Development, San Diego) **Counseling outcomes: Counselor characteristics and client results.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 2-9.—Studied 18 counselors in one of the administrative areas of the California Department of Human Resources and 697 of their closed cases in order to discover whether differences in employability outcomes did exist. The study attempted to discover (a) the number of clients who achieve employability during their relationships



with employment counselors, (b) the final disposition of cases that are closed other than employable, and (c) the degree to which counselors engage in placement activities and the influence which these activities have on employable closures. Results provide evidence that some counselors had significantly more clients achieve employable status than did other counselors.—*Journal abstract.*

4205. Wittmer, Joe; Jeffers, Martin S. & Persons, William E. (U Florida) **Parental behavior and vocational choice: A comparison of counselors and engineers.** *Journal of Employment Counseling*, 1974(Mar), Vol 11(1), 16-21.—Compared the perceived parental behavior characteristics of 41 counselors in training and 33 5th-yr engineering students in a test of a part of A. Roe's (see PA, Vol 33:1546) vocational choice theory. This theory suggests a dichotomous pattern of vocational choice: "toward persons" (e.g., counseling) or "toward nonpersons" (e.g., engineering) categories that will have been determined by the nature of the early childhood socialization process. In essence, a person who has experienced a warm loving home situation is more likely to enter a "toward persons" occupation, and an individual whose parent-child relationship was emotionally cold will most likely gravitate toward a "toward nonpersons" occupation. Both groups were administered the Parent-Child Relations Questionnaire developed by Roe and M. Siegelman (1963). The findings lend considerable support to Roe's theory.—*Journal abstract.*

#### Job Performance & Satisfaction

4206. Azen, Stanley P.; Snibbe, Homa M. & Montgomery, Hugh R. (U Southern California, School of Engineering) **A longitudinal predictive study of success and performance of law enforcement officers.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 190-192.—Describes a 20-yr longitudinal study of biographical, psychological, and aptitudinal variables predictive of successful police performance. Ss were 95 men appointed as deputy sheriffs in the Los Angeles County Sheriff's Department between 1947 and 1950. Among the significant predictors, stepwise-discriminant analysis yielded the following as "best" predictors of at least 1 criterion of success: age, height, the civil service written test score, the Hypomania scale of the MMPI, the Mechanical scale of the Kuder Vocational Preference Record, and the Activity scale of the Guilford-Zimmerman Temperament Survey.—*Journal abstract.*

4207. Bass, Alan R. & Turner, John N. (Wayne State U) **Ethnic group differences in relationships among criteria of job performance.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 101-109.—Investigated racial discrimination and differential bias in criterion measures for 75 black and 359 white tellers in a large bank. 6 supervisory ratings and 4 objective criteria (adjusted salary increase, percent of time worked, and number of shortages and averages) were obtained. Results indicate that mean differences between black and white employees on the criterion measures were generally small, and most statistically significant differences were reduced to nonsignificance when the effects of age and job tenure were removed. However, further analyses showed that the white supervisors based their evaluations of subordi-

nates on objective data for black employees considerably more than they did for white employees. (19 ref)—*Journal abstract.*

4208. Borman, Walter C. (Personnel Decisions, Minneapolis, MN) **The rating of individuals in organizations: An alternate approach.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 105-124.—Notes that in assessing validity of performance ratings, high agreement between raters may be an unduly severe and erroneous requirement. Instead of demanding convergent validity across organizational levels on performance dimensions common to the different levels, it is suggested that the raters be subgrouped by organizational level with each rater group providing performance evaluations using only dimensions appropriate to their level's position. To test this idea, scaled expectation behavior rating scales were developed separately by 41 secretaries and by university instructors for the job of secretary. The 4 job behavior dimensions (Job Knowledge, Organization, Cooperation with Co-workers, and Responsibility) developed by secretary raters showed only modest conceptual similarity with the 3 job behavior dimensions (Judgment, Technical Competence, and Conscientiousness) developed by instructors. Within-level interrater agreement for instructor rates was greater on their own dimensions than on the secretaries' dimensions ( $p < .005$ ), and for secretary raters interrater agreement was greater for their own dimensions ( $p < .10$ ). A hybrid multitrait-multirater analysis in which raters make evaluations on only those dimensions their level's members are in good position to rate is offered as a more reasonable method to judge the "goodness" of ratings in organizations. (16 ref)—*Journal abstract.*

4209. Bozza, Charles M. (California State U, Long Beach) **Motivations guiding policemen in the arrest process.** *Journal of Police Science & Administration*, 1973(Dec), Vol 1(4), 468-476.—Tested the widely held belief that younger police officers with higher educational levels and less experience will make a greater number of arrests. 24 officers were divided into high and low groups based on their arrest records. The high performance group was significantly younger and more educated, but they did not differ either in their tolerance level (measured by the Conventionalism subscale of the California F Scale), in their attitudes toward promotion (measured by the Job Descriptive Inventory), or in their length of service. Possible reasons why older officers with less education make fewer arrests are discussed.—R. J. Albers.

4210. Chatterjee, Amitava. (Indian Inst of Technology, Kharagpur, India) **The organizational variables of group cohesiveness.** *Indian Journal of Psychometry & Education*, 1972(Dec), Vol 3(2), 43-52.—Investigated the relationship between group cohesiveness and organizational factors. 200 workers organized in section units as primary work groups completed questionnaires dealing with attitudes toward those groups. An index of group cohesiveness (defined as satisfaction with one's work group) was calculated and compared with organizational factors (e.g., productivity, size of work group, length of service, satisfaction with supervision, and satisfaction with managers). Data indicate that group cohesiveness

was positively related to length of service in the organization, satisfaction with supervision, satisfaction with management, and productivity, but was negatively related to size of work group. Results suggest that group cohesiveness may be a significant factor in effective management.—J. B. Francis.

4211. de Leo, Philip J. & Pritchard, Robert D. (US Air Force Human Resources Lab, Lowry Air Force Base, CO) **An examination of some methodological problems in testing expectancy-valence models with survey techniques.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 143-148.—Examined the reliability and construct validity of various questionnaire measures of expectancy-valence components. Measures of valence, instrumentality, and expectancy were given to a sample of 171 male US Air Force trainees on 2 occasions. Results indicate that reliabilities of the 3 components of the model were fairly low and that different measures of the same component were not highly correlated. It is concluded that using questionnaire measures to test expectancy-valence models is inappropriate until better measures are developed.—*Journal abstract.*

4212. Helmreich, Robert; Bakeman, Roger & Radloff, Roland. (U Texas, Austin) **The Life History Questionnaire as a predictor of performance in Navy diver training.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 148-153.—Describes a new demographic instrument, the Life History Questionnaire (LHQ), which elicits demographic data longitudinally by providing a question-by-year matrix of responses. Variables derived from the LHQ were used to predict success in US Navy diver training. Validation and cross-validation data were obtained from 115 enlisted men in 5 diving classes. 2 criteria were developed for the samples—pass-fail indicator and a 4-point performance criterion. Correlational data for 12 predictors (e.g., social status, health, and educational performance) are presented. The LHQ appears to provide sufficient longitudinal data to enable detailed investigation of relationships among a variety of life settings and experiences and to relate these to subsequent behavior. (16 ref)—L. Gorsey.

4213. Herman, Jeanne B. & Hulin, Charles L. (U Illinois) **Managerial satisfactions and organizational roles: An investigation of Porter's Need Deficiency Scales.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 118-124.—Empirical research identifying a relationship between job satisfaction and level in the organizational hierarchy has utilized the Porter Need Satisfaction Questionnaire extensively. An attempt was made to replicate the previous findings and expand the domain of job satisfaction variables to determine the generality of the relationship. Ss were 174 supervisors in a large manufacturing firm. The hypothesis of different mean levels of satisfaction associated with different levels in the hierarchy was supported using the Job Descriptive Index (JDI), but was not supported using the Porter Need Deficiency Scales. The internal structure of the Porter Questionnaire and its convergence with the JDI were investigated to explore alternative explanations of the results. (18 ref)—*Journal abstract.*

4214. Hill, John W. & Eddowes, Edward E. **Further development of automated GAT-1 performance**

**measures.** *US AFHRL Technical Report*, 1974(May), No 73-72, 80 p.—Describes a search for automated flight measurements that correlate with pilot proficiency. 2 separate experiments were carried out in a GAT-1 trainer: a basic experiment with 326 measurements on each of 30 Ss in 3 experience groups, and an expanded experiment with 2,436 measurements on each of 30 new Ss from the same 3 experience groups. Exp I consisted of 4 different flight tasks, each about 10 min long, and Exp II consisted of these and 6 additional tasks. Results show that there was little difficulty in obtaining measurements that correlated with experience. More than 5% of the measurements of each experiment were statistically significant ( $p < .01$ ). Over 400 important measurements were tabulated with group means, standard deviations, and further cross-tabulations to show which tasks and families of measurements were best at discriminating among pilots. 3 statistical methods were used to select a set of measurements from Exp I and combine them into 2 new canonical variables, each a linear-weighted combination of the measurements in the set, to discriminate optimally among the 3 groups of Ss. Applying the canonical variables to the repeated measurements of Exp II allowed several deductions about the best selection procedure to be made.—*Journal abstract.*

4215. Kapor, Gojko; Vujošević, Krsto & Branković, Miodrag. (Military Medical Academy, Clinic for Mental Disease, Belgrade, Yugoslavia) **[Sociomedical factors influencing resignations from the army.]** (Srce) *Vojnosanitetski Pregled*, 1974(Mar), Vol 31(2), 79-83.—Compared 182 soldiers who resigned from the army and 100 control soldiers with respect to medical, social, and psychosocial variables. Those who resigned showed a greater incidence of psychoneurotic and psychopathic disorders, were less often employed or highly skilled, more often had parents with alcoholic, psychopathic, and marital problems, were more often firstborn or only children, and had committed a greater number of criminal offenses prior to military service than soldiers in the control group. (English, French & Russian summaries)—S. Slak.

4216. Knowles, Patrick & Peterson, Rolf. (US Coast Guard Recruit Training Ctr, Cape May, NJ) **Measurement of flexibility in state police officers.** *Journal of Police Science & Administration*, 1973(Jun), Vol 1(2), 219-223.—Analyzed 2-part questionnaires returned by 23 of the 60 members of a state police tollway battalion, to obtain data on the relation between personal and environmental variables and the flexibility of police in situations allowing or requiring discretionary action. Part 1 of the questionnaire elicited personal characteristics. Part 2 described 5 incidents with more than one solution, and respondents were asked to state in writing how they would handle the situation. 21-29 yr old officers were more flexible than those 30-50 yrs old, and those classified as extraverts were more flexible than introverts. The Social Distance variable, which measured the respondent's acceptance of "different" individuals, was also a good indicator of flexibility. A relationship between flexibility and higher education was not confirmed, perhaps because only 3 Ss had college degrees. It is felt that situational testing is superior to routine tests, and it is recommended that similar studies



of police recruits be carried out and the results compared with the recruits' later records to determine the predictive value of the questionnaire.—R. S. Albin.

4217. Lewis, Rodney W. **Toward an understanding of police anomie.** *Journal of Police Science & Administration*, 1973(Dec), Vol 1(4), 484-490.—Rejects the view that police anomie arises from professionalization in favor of a "danger-stress" view. Danger-stress produces the anomie which is in turn compounded by other outside factors, including professionalism.

4218. Muchinsky, Paul M. & Hoyt, Donald P. (Iowa State U) **Predicting vocational performance of engineers from selected vocational interest, personality, and scholastic aptitude variables.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 115-123.—Examined the validity of the American Council on Education Psychological Examination Quantitative score and of selected subscales of the Edwards Personal Preference Schedule and the Strong Vocational Interest Blank (SVIB) in predicting the vocational performance of 217 engineers. Multidimensional criteria of vocational performance assessed from both external and internal frames of reference were employed. 6 predictors were related to 17 vocational performance criteria; of the 102 tests that were made, 7 were statistically significant. Results indicate that vocational performance cannot be accurately predicted by vocational interest, personality, and scholastic aptitude variables. The only consistent finding was that subjective ratings of vocational performance were predicted by SVIB Group V scores. (17 ref)—*Journal abstract.*

4219. O'Reilly, Charles A.; Bretton, Gene E. & Roberts, Karlene H. (U California, Berkeley) **Professional employees' preference for upward mobility: An extension.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 139-145.—In a recent article D. Harlow (1973) provided some empirical data regarding the upward mobility aspirations of professional employees. In partial support of R. Presthus's accommodation theory (1962) Harlow found a positive correlation between preference for promotion (PP) and job satisfaction (JS). She also reported conflicting findings relating ambiguity tolerance (AT) and PP. The results reported here, from a study with 252 officers and enlisted military aviation personnel, test the 2 hypotheses Harlow investigated and a 3rd hypothesis, suggested by Presthus, relating organizational commitment (OC) and PP. The analyses confirmed Harlow's findings concerned with the relationship between PP and JS, failed to find any relationship between AT and PP, and showed a positive association between OC and PP.—*Journal abstract.*

4220. Ronan, W. W. et al. (Georgia Inst of Technology) **Occupational level and mental health: A note.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 157-160.—Administered A. Kornhauser's (1965) questionnaire to 75 military and 25 civilian personnel at 3 military installations. Analysis of the data showed the existence of at least 6 factors concerned with personal life adjustment. There was a failure to find any substantial relationship between mental health and job satisfaction, which confirms a finding by the Survey Research Center study (1970). It is hypothesized that the relationship between mental health and job satisfaction

exists only on the lower skill, routine work level. It is further suggested that these research results offer certain directions that might be pursued in the further understanding of the exact bases for both job and general life adjustment.—*Journal abstract.*

4221. Schwab, Donald P. (U Wisconsin, Madison) **Conflicting impacts of pay on employee motivation and satisfaction.** *Personnel Journal*, 1974(Mar), Vol 53(3), 196-200.—Studied responses of approximately 300 skilled and semiskilled male and female employees, drawn from a work force of 4,000 in plants in the US and Canada, who responded to the Minnesota Satisfaction Questionnaire and the Job Description Index. 3 pay systems were used: individual piece rates ( $n = 128$ ), group incentive rates ( $n = 84$ ), and hourly rates ( $n = 61$ ). Results indicate that persons paid by time were most satisfied with their pay while persons paid on output were more highly motivated to perform ( $p < .05$ ). Thus a personnel practice (in this instance, the type of pay system) may have a positive effect on motivation but a negative effect on satisfaction. The implications of this finding for the personnel manager's job are discussed. (28 ref)—P. L. Crawford.

4222. Shirom, Arie & Goldberg, Joel. (Tel-Aviv U, Israel) **Adjusting to work: Workplace mobility of young male workers in Israel.** *Journal of Vocational Behavior*, 1974(Aug), Vol 5(1), 67-77.—Examined the correlates of workplace mobility in 15-17 yr old male Israeli workers registered with the Youth Employment Bureau (YEB). Data regarding these correlates, and longitudinal data concerning the sequence of job movements, were obtained in an interview held with a sample of those youths who resided in Tel-Aviv ( $n = 146$ ) and from the YEB's forms filled out in connection with their registration and job placements. Several measures of sociodemographic background, past work experience, and present working conditions were included in the multiple correlation analysis. Controlling for longevity in the labor force, seniority in the 1st job emerged as the most efficient predictor of workplace mobility. Results suggest that the early stages of a young worker's process of occupational socialization are important in determining his future career decisions. (23 ref)—*Journal abstract.*

4223. von Grumbkow, J. & Wilke, H. (Inst of Social & Industrial Psychology, Groningen, Netherlands) **[Social exchange and equity: Testing and appraisal of the equity theory.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jun), Vol 29(4), 281-316.—Applies J. S. Adams's equity theory to employee performance. The theory interprets social behavior as an exchange process; it is based on classical learning concepts, and on the principles of frequency and reinforcement as conditioned by the law of effect. L. Festinger's dissonance theory is applied to indicate the reduction of tension as a source of motivation. In a simple direct exchange the equity formula is expressed as a ratio of income of an employee, A, divided by his expenses, compared to the same ratio for another employee, B, like him. The indirect exchange situation involves many more conditions which obscure the application of the Adams theory. Some of these conditions are the behaviors and goals of the employer, C. Many factors in the A-B-C triad are discussed, such as

the personal needs and conflicts of the employees, reactions to corrections by the employer, the wage system, communications among the workers, knowledge of the wages of others, and employees' future plans. Other competing and conflicting theoretical ideas are discussed. (English summary) (92 ref)—*A. J. Ter Keurst*.

4224. **Ward, Ernest H.** (Honeywell Information Systems, Los Angeles, CA) **Elements of an employee motivation program.** *Personnel Journal*, 1974(Mar), Vol 53(3), 205-208.—Discusses employee motivation in an industrial environment; i.e., what can be done, in practical terms, to bring about more widespread acceptance by employees of organizational goals, and a greater desire to work towards them.

### Management & Leadership

4225. **Epstein, Jack H.** (US Air Force Systems Command, Andrews Air Force Base, Washington, DC) **Career management programs.** *Personnel Journal*, 1974(Mar), Vol 53(3), 191-195.—Questions the validity of the development concept that all employees need to be developed in the same way. Evidence indicates that the programs are not producing the results claimed.

4226. **Guthrie, Thomas L.; Peterson, Robert N. & Leonard, Edwin C.** (Indiana U, Fort Wayne) **The remuneration riddle.** *Personnel Journal*, 1974(Apr), Vol 53(4), 253-257.—Discusses the question of how much to pay salaried employees and the various factors affecting the answer. It is suggested that computer resources using linear programming with an appropriate algorithm procedure can establish a compensation program that is objective, fair, and relatively easy to administer.

4227. **Haynes, Marion E.** (Shell Oil Co, Houston, TX) **Delegation: Key to involvement.** *Personnel Journal*, 1974(Jun), Vol 53(6), 454-456.—Discusses principles of delegation and offers suggestions for maximizing its effectiveness.

4228. **Hogenraad, Robert; Mertens, Charles; Goddin, Michel & Roland, Emile.** (U Louvain, Belgium) **[Affective and descriptive structures of management: Inter-cultural study.]** (Fren) *International Journal of Psychology*, 1973, Vol 8(4), 275-283.—Obtained responses to a semantic differential instrument, composed of 22 concepts and 30 bipolar adjective scales (9 pancultural and 21 from the management field) from 50 Canadian and 48 Belgian Ss, all French-speaking male managers and nonmanagers, who worked in 2 production enterprises in Quebec, Canada, and in Belgium. Factor analysis revealed Control as the 1 management-specific factor common to both samples, with Precision and Creativity also appearing, in a less striking manner, for both groups. Control as it dominates managerial thinking, rather than the usual semantic differential structure, may have important implications. (English summary)—*E. A. Gavin*.

4229. **Hrebiniak, Lawrence G.** (Pennsylvania State U, Coll of Business Administration) **Job technology, supervision, and work-group structure.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 395-410.—Based on data from 36 supervisors and 174 subordinates in a general hospital and measures of technological level, task predictability, interdependence, and manageability, job autonomy, participation, and supervision variables (e.g.,

unity and closeness of control), it is suggested that the relationship between technology and structure at the individual level is too weak to indicate a technological imperative, even when prior socialization and background of the respondents are controlled. At the group level of analysis, variables such as the perceived hierarchical independence and decisional participation of the supervisor were significantly related to structure, independent of job technology. With the effects of supervision taken into account, job technology and work-group structure showed significant relationships. Results of multivariate analysis indicate the importance of both technology and supervision for work-group structure. Data suggest that a number of variables account for structure in organizations where control is fragmented. (48 ref)—*Journal abstract*.

4230. **Kerr, Steven; Schriesheim, Chester A.; Murphy, Charles J. & Stogdill, Ralph M.** (Ohio State U) **Toward a contingency theory of leadership based upon the consideration and initiating structure literature.** *Organizational Behavior & Human Performance*, 1974(Aug), Vol 12(1), 62-82.—Reviews the published literature involving the leader behavior dimensions "consideration" and "initiating structure," to develop some situational propositions of leader effectiveness. Among the variables found by researchers to significantly moderate relationships between leader behavior predictors and satisfaction and performance criteria are the following: subordinate need for information, job level, subordinate expectations of leader behavior, perceived organizational independence, leader's similarity of attitudes and behavior to managerial style of higher management, leader upward influence, and characteristics of the task (including pressure and provision of intrinsic satisfaction). 10 situational propositions are presented, and these are linked to form 2 general postulates of leadership effectiveness. (4½ p ref)—*Journal abstract*.

4231. **McDonnell, John F.** (California State Coll, San Bernardino) **The human element in decision making.** *Personnel Journal*, 1974(Mar), Vol 53(3), 188-190.—Sees the decision maker as acting subjectively, on the basis of his own standards, his sense of obligation to his superiors, etc. It is suggested that each problem should be approached individually rather than by following set rules.

4232. **Mobley, William H.** (U South Carolina, Coll of Business Administration) **The link between MBO and merit compensation.** *Personnel Journal*, 1974(Jun), Vol 53(6), 423-427.—Notes the wide divergence of opinion on the value of linking Management by Objectives (MBO) and merit compensation activities. 625 middle- to top-level managers of a large corporation, who had been using the MBO process for an average of 2 yrs, were asked to indicate their perceptions of the relationship. Most respondents perceived a positive value in the relationship.—*P. L. Crawford*.

4233. **Ouchi, William G. & Dowling, John B.** (Stanford U) **Defining the span of control.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 357-365.—Considers that the concept span of control has been interpreted so widely over the past years that in its present form its use as a means of communicating information among scholars has become severely impaired. It is argued that



it is a useful concept for measuring the closeness of contact between a superior and his subordinates. Data from department managers and salespersons in 78 retail department stores are presented which demonstrate that different operational definitions of the term will produce not only greatly different mean values of the span of control, but also different correlation coefficients with other important structural variables (e.g., size, intradepartmental homogeneity, and store image). A new operational measure is proposed to develop a common language of measurement that will facilitate an understanding of organizational structure. (16 ref)—*Journal abstract*.

4234. Reid, Thomas J. (Grumman Aerospace Corp, Bethpage, NY) **The context of management development.** *Personnel Journal*, 1974(Apr), Vol 53(4), 280-287.—Discusses the function of management development in general conceptual terms as a component of some larger system which it attempts to serve. It is emphasized that the formulation of plans and implementation of programs to develop managers for a particular organization must be preceded by the development of an understanding of the organization as an entity and the organizational expectations concerning manager behavior and performance.—P. L. Crawford.

4235. Robertson, Dan H. (U Denver, Coll of Business Administration) **Sales force feedback on competitors' activities.** *Journal of Marketing*, 1974(Apr), Vol 38(2), 69-71.—Conducted a study to determine the extent of feedback from the sales force about the introduction of new products by competitors. It was found that even in a corporation where the importance of receiving competitive information is stressed, only rarely (less than 20% of the time) is this information transmitted back to management. Follow-up interviews revealed that many salesmen felt the information would not be used, and that because of the numerous other nonselling demands on a salesman's time (travel, other paper work, waiting to see customers, etc) management should not overemphasize time devoted to selling at the cost of activities such as sales force feedback.—D. W. Twedt.

4236. Scheil, Virginia E. (Metropolitan Life Insurance Co, Personnel Research, New York, NY) **The relationship between sex role stereotypes and requisite management characteristics.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 95-100.—300 24-64 yr old male middle managers rated either women in general, men in general, or successful middle managers on 92 descriptive terms. Results confirm the hypothesis that successful middle managers are perceived to possess characteristics, attitudes, and temperaments more commonly ascribed to men in general than to women in general. There was a significant resemblance between the mean ratings of men and managers, whereas there was no resemblance between women and managers. Examination of mean rating differences among women, men, and managers on each of the items disclosed some requisite management characteristics which were not synonymous with the masculine sex-role stereotype. Implications of the demonstrated relationship for organizational behaviors are discussed. (22 ref)—*Journal abstract*.

4237. Sheibar, Paul. (First National City Bank, New York, NY) **Personnel practices review: A personnel**

**audit activity.** *Personnel Journal*, 1974(Mar), Vol 53(3), 211-215, 217.—Describes a personnel audit system used in a large bank which includes securing information about (a) deviations from personnel policy and the need for corrective action at the operating level, (b) the need for changes in personnel policies, (c) the need for new policies, and (d) employee reaction to personnel policies and work environment. The focus is on the detailed method of analyzing the extent to which supervisors comply with personnel policies and practices, and to assist when necessary.—*Journal abstract*.

4238. Truskie, Stanley D. (U Pittsburgh) **A case study of a union-management learning encounter in industry.** *Personnel Journal*, 1974(Apr), Vol 53(4), 277-279.—Describes a program that has been successfully implemented and has been made part of a 3-yr union contract. It is concluded that union and management personnel can join in extensive learning experiences to discuss substantive, job-related issues to their mutual benefit.

4239. Turner, Ronald E. (Queen's U, Kingston, Ontario, Canada) **Product priorities within a multiple-product marketing organization.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 143-150.—Explored the problems experienced by management in allocating marketing funds in multiple-product companies using normative analysis. Data from this type of company during 1 yr of operations confirm the predicted directions of product-priority influence between product managers, salesmen, and other managerial roles and suggest that their perceptions change over time and as a result of exposure to different stimuli. (20 ref)

4240. Van Fleet, David D. (U Akron) **Toward identifying critical elements in a behavioral description of leadership.** *Public Personnel Management*, 1974(Jan), Vol 3(1), 70-82.—Considers a major problem in studies of leadership and managerial effectiveness; i.e., the lack of an operational definition. The critical incident technique was employed in an attempt to develop such a definition. The study involved nearly 50 Ss from more than 25 organizations, and consisted of collecting, condensing, testing for criticality, and categorizing a fairly large number of such incidents. A Behavioral Description of Leadership was developed from the data. While this does not represent the perfect definition of leadership that is being sought, it is felt to be one more step toward such a definition. (29 ref)—S. E. Bowser.

### Organizational Structure & Climate

4241. Hunt, Shelby D. & Nevin, John R. (U Wisconsin) **Power in a channel of distribution: Sources and consequences.** *Journal of Marketing Research*, 1974(May), Vol 11(2), 186-193.—Assessed the relationship between power and the sources of power in a channel of distribution that has a well-defined power source: the franchisor-franchisee channel. The consequences of franchisors using coercive vs noncoercive sources of power also were evaluated. Power was defined as the ability of the franchisor (perceived by the franchisee) to control the decision variables of the franchisee. 815 fast-food franchisees completed empirical measures of power, coercive sources (e.g., control of building and land and threat to revoke franchise), noncoercive sources (e.g., the degree and type of

assistance offered by the franchisor), and franchisee satisfaction with the relationship. Results show that (a) there is a significant relationship between the power of a channel member and the sources of power available to him—franchisors relied primarily on coercive sources of power to achieve power over franchisees, and (b) the results of exercising power depend on the sources of power used—franchisee satisfaction increased with the use of noncoercive sources of power. (19 ref)—*L. Gorsev.*

4242. **Jurkovich, Ray.** (Sociologisch Inst, Leiden, Holland) **A core typology of organizational environments.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 380-394.—Presents a core typology of organizational environments consisting of 64 types which can be expanded depending on the user's interest and problems. Different types of environments have consequences for the planning of strategies, operations, and tactics; coalition behavior; and decision making. 4 hypotheses are used to describe organizational reactions to 4 entirely different environmental situations (complexity, routineness of a problem-opportunity state, presence of organized sectors, and the relation of these sectors to the organization). Some of the concepts have been drawn from frequently cited works and from the author's analysis of case studies and management journals. These together with concepts from systems theory are defined and discussed. (30 ref)—*Journal abstract.*

4243. **Lynch, Beverly P.** **An empirical assessment of Perrow's technology construct.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 338-356.—Describes a comparative measure of technology based on C. Perrow's 1967 theory that the technology of an organization is a major determinant of its structure and other characteristics. A 7-item scale that provides a reliable and valid measure of the technology construct, which discriminated among the technologies of 15 functional departments in 3 academic libraries, is also described. (35 ref)

4244. **Paulson, Steven K.** (Virginia Polytechnic Inst & State U) **Causal analysis of interorganizational relations: An axiomatic theory revised.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 319-337.—Presents an empirical analysis and conceptual extension of M. Aiken and J. Hage's (see PA, Vol 44:5768) study of organizational interdependence and intraorganizational structure which found that organizations with many joint programs tend to be more innovative, complex, and have more decentralized decision-making structures. A causal theory of interorganizational relationships was developed and tested using partial correlational and multivariate path analysis of data from 135 health and welfare organizations. A revised model of 8 independent variables centering around formalization, effectiveness, and innovation is presented which accounts for 1/3 of the variance in interorganizational relations and calls into question several classical assumptions of organizational theory, including those which emphasize that formalization and centralization are responsible for efficient and effective bureaucracies; the present data suggest that formalization and decentralization are responsible for an effective but not necessarily efficient bureaucracy. (100 ref)—*L. Gorsev.*

4245. **Rotondi, Thomas.** (Marquette U) **The innovator and the ritualist: A study in conflict.** *Personnel Journal*, 1974(Jun), Vol 53(6), 439-444.—Describes and analyzes a hypothetical organizational incident, discussing several aspects associated with innovator-ritualist conflict. It is concluded that such conflict is related to the presence of internal competition and deficiencies in individual need fulfillment.

4246. **White, Paul E.** (Johns Hopkins U) **Resources as determinants of organizational behavior.** *Administrative Science Quarterly*, 1974(Sep), Vol 19(3), 366-379.—Attempts to explain organizational behavior (e.g., consensus, apparent organizational purposiveness, and cohesion) in terms of individual goals and constraints imposed by source utilization. A model of the relationship between resource availability, collective solution-making, and group cohesion is presented which is based on J. S. Coleman's theory of collective decisions (see PA, Vol 40:8737). The advantages of this model, which is not restricted to definitions of psychological conditions among members of the organization (e.g., common values or goals), are also discussed. It is suggested that defining the environment in terms of existing control over resources and of the decision maker's accessibility to these resources specifies the conditions that produce alternatives for the decision maker. (38 ref)—*L. Gorsev.*

#### Human Factors Engineering & Safety

4247. **Fogel, Lawrence J.; England, Carl E.; Mout, Michael L. & Hertz, Thomas D.** (Decision Science, San Diego, CA) **Principles of display and control design for strike RPVs: Final report.** San Diego, CA: Decision Science, 1974. x, 145 p.—In a series of 4 experiments it was determined that (a) the outside-in mode of attitude display was preferred in spite of the pilot's experience and training with the conventional inside-out display, (b) the position-mode control stick was superior to the conventional-rate control stick, and (c) sensor mounting resulted in different levels of performance with the heads-up attitude displays. (25 ref)

4248. **Kraft, Conrad L. & Anderson, Charles D.** (Boeing Aerospace Co, Seattle, WA) **Development of criteria for printing color reconnaissance stereo strip photography for interpretation under dynamic viewing conditions.** *USAF AMRL Technical Report*, 1973(Dec). No 73-104, 76 p.—Screened 63 Os for their visual acuity, stereopsis, and phorias and measured their target acquisition performance after brief training. The effects of camera convergence angle and film contrast were investigated. Analyses were completed on all targets and for those targets where target size and contrast did not preclude acquisition performance. A quantitative test for chromostereopsis was developed and given to all Os, and stereoscopic skill was measured with achromatic and chromatic transparencies of the Critical Limen Stereo Test. Stereoscopic skill was better with the achromatic tests than with the chromatic, and the difference was only partly predicted by chromostereopsis. Target acquisition performance with the chromatic imagery was not significantly altered by the main effects of camera convergence angle nor film contrast introduced in printing. For the targets wherein target size and/or target contrast did not result in extremely high or low



performance, camera convergence angle had a significant effect. (30 ref)—*Journal abstract*.

4249. Wedell, Jacelyn & Alden, David G. (U Oregon) **Color versus numeric coding in a keeping-track task: Performance under varying load conditions.** *Journal of Applied Psychology*, 1973(Apr), Vol 57(2), 154-159.—Investigated the effectiveness of a color vs a numeric code in a modified keeping-track task—air traffic control. Altitude state was the coded variable. Ss were 36 male undergraduates. It was hypothesized that (a) color coding would be superior to numeric coding, particularly with a greater number of total items displayed; and (b) color would be relatively more efficacious with a greater number of items in the interrogated state. Neither of these hypotheses were supported. Based on an error-type analysis, it is concluded that color can aid in retaining information concerning category size and item spatial

location; identity information was quickly lost.—*Journal abstract*.

4250. Williams, Allan R.; Siegel, Arthur I. & Burkett, James R. (Applied Psychological Services, Wayne, PA) **Readability of textual materials: A survey of the literature.** *US AFHRL Technical Report*, 1974(Jul), No 74-29, 70 p.—Presents a review of the literature relating to methods of measuring the readability/comprehensibility of textual materials. Various formulas for calculating readability are presented and placed in historical perspective, and the general status of research into the development of readability indices is discussed. An experimental evaluation of modified training materials presented with and without auditory supplementation is also outlined, and steps in the preparation of a training materials modification handbook are described. (8 p ref)—*Journal abstract*.

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Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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# PSYCHOLOGICAL ABSTRACTS

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## KEY TO THE TEXT

The examples of different types of *Psychological Abstracts* records presented here are number coded to provide definition of their elements.

### JOURNAL ARTICLE ABSTRACT

<sup>1</sup> 8327. <sup>2</sup> Howard, R. Lee.; Glendenning, Robert L. & Meyer, Donald R. <sup>3</sup> (Ohio State U) <sup>4</sup> Motivational control of retrograde amnesia: Further explorations and effects. <sup>5</sup> *Journal of Comparative & Physiological Psychology*, 1974 (Feb). Vol. 86(2), 187-192. <sup>6</sup> Reports 5 investigations of variables related to the motivational control of retrograde amnesia for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer<sup>7</sup> (see PA Vol. 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. (<sup>8</sup>) (<sup>9</sup>) (15 ref) <sup>10</sup> *Journal abstract*.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr., II, III, etc) are not given.
- 3 - Affiliation of first-named author/editor only.
- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
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- 6 - Text of abstract.
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- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

### BOOK ANNOTATION

<sup>1</sup> 8328. <sup>2</sup> Chase, William G. <sup>3</sup> (Ed). <sup>4</sup> (Carnegie-Mellon U) <sup>5</sup> Visual information processing. <sup>6</sup> New York, NY; <sup>7</sup> Academic, <sup>8</sup> 1973. <sup>9</sup> xiv, <sup>10</sup> 555 p. <sup>11</sup> \$17.50. <sup>12</sup> Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr., II, III, etc) are not given.
- 3 - Designation of editor.
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- 5 - Book title: If the book is in a foreign language, the original title is given followed by a translated title and the language of the book is indicated in parentheses.
- 6 - Place of publication.
- 7 - Publisher.
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

### BOOK CHAPTER CITATION

<sup>1</sup> 8329. <sup>2</sup> Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. <sup>3</sup> (Stanford U) <sup>4</sup> On the meeting of semantics and perception. <sup>5</sup> In W.G. Chase (Ed), *Visual information processing*, New York, NY: Academic, 1973. xiv, 555 p. \$17.50.

- 1 - Record number.
- 2 - Author(s) of cited chapter. As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr., II, III, etc) are not given.
- 3 - Affiliation of first named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

## ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH	= adrenocorticotrophic hormone	NREM	= nonrapid eye movement
DNA	= deoxyribonucleic acid	REM	= rapid eye movement
E	= experimenter	RNA	= ribonucleic acid
EEG	= electroencephalogram or -graph	S	= subject
ESP	= extrasensory perception	TV	= television
Exp	= experiment	US	= United States
IQ	= intelligence quotient	USSR	= Union of Soviet Socialist Republics
LSD	= lysergic acid diethylamide	WAIS	= Wechsler Adult Intelligence Scale
MMPI	= Minnesota Multiphasic Personality Inventory	WISC	= Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., ALGOL, COBOL, FORTRAN, IBM 360.

Language abbreviations used after translated titles are:

Afri	= Afrikaans	Geor	= Georgian	Port	= Portuguese
Alba	= Albanian	Germ	= German	Romn	= Romanian
Arab	= Arabic	Grek	= Greek	Russ	= Russian
Bulg	= Bulgarian	Hebr	= Hebrew	Slov	= Slovene
Chin	= Chinese	Hung	= Hungarian	Slok	= Slovak
Czec	= Czech	Iran	= Iranian	Span	= Spanish
Danh	= Danish	Ital	= Italian	Srccr	= Serbo-Croatian
Duth	= Dutch	Japn	= Japanese	Swed	= Swedish
Finn	= Finnish	Lith	= Lithuanian	Turk	= Turkish
Flem	= Flemish	Norg	= Norwegian	Ukrn	= Ukrainian
Fren	= French	Polh	= Polish	Yugo	= Yugoslavian

\*Consult Webster's New Collegiate Dictionary

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# PSYCHOLOGICAL ABSTRACTS

Volume 53

March 1975

Number 3

## GENERAL

4251. Altner, Günter (Ed.). *The human creature*. Garden City, NY: Anchor, 1974. viii, 467 p. \$3.50.

—Presents a collection of 12 papers which analyze the nature of man as a "creature," how he is controlled or influenced by biological laws, and how he has shaped his existence. Topics include the early cultural development of man, his use of tools, and social Darwinism as an example of the abuse of scientific knowledge. (17 p ref)

4252. Bem, Daryl J. & Allen, Andrea. (Stanford U) *On predicting some of the people some of the time: The search for cross-situational consistencies in behavior*. *Psychological Review*, 1974(Nov), Vol 81(6), 506-520.

—The historically recurring controversy over the existence of cross-situational consistencies in behavior is sustained by the discrepancy between intuitions, which affirm their existence, and the research literature, which does not. It is argued that the nomothetic assumptions of the traditional research paradigm are incorrect, and that by adopting some of the idiographic assumptions employed by intuitions, higher cross-situational correlation coefficients can be obtained. A study with 64 undergraduates is reported which shows that it is possible to identify on a priori grounds those individuals who will be cross-situationally consistent and those who will not. It is concluded that not only must personality assessment attend to situations—as has been recently urged—but to persons as well. (52 ref)—*Journal abstract*.

4253. Brechner, Kevin C.; Linder, Darwyn E.; Meyerson, Lee & Hays, Victor L. (Arizona State U) *A brief report on a device for unobtrusive visual recording*. *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 499-500.

—Describes a portable, inexpensive device for making film or videotape recordings of Ss in field or laboratory settings without arousing Ss' suspicion. A camera is enclosed in a box with the lens close to an aluminum shade screen (rather than a 1-way mirror). Tests with undergraduates show the device was effective in concealing the camera.

4254. Brown, Phil (Ed.). *Radical psychology*. New York, NY: Harper & Row, 1973. xxii, 548 p. \$2.95.

—Presents a collection of 28 papers on the theory and practice of radical psychology written by leaders of the radical movement in psychiatry and psychology. Topics include sociological approaches to psychology, antipsychiatry, the Marxist foundations of psychology, sex roles in psychiatry and psychotherapy, and methods of "fighting back" against the mental health and research establishment. (6½ p ref)

4255. Carella, Michael J. (San Diego State Coll) *Psychoanalysis and the mind-body problem*. *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 53-61.—Examines

Freud's topological model of conscious, preconscious, and unconscious, and his revised model of id, ego, and superego, within the historical context of mind-body dualism. In classical Cartesian mind-body dualism and in Kant's later parallelism, there is an isomorphism between physical events and events of consciousness. In both, mind is identified with consciousness. Classical physics was traditionally formulated within this dualism until the early 20th century, at the time when Freud was formulating his theories. Freud's assumption of unconscious mental states challenged the identification of mind with consciousness in classical dualism. Freud adhered rather to a methodological dualism involving separate but complementary levels of discourse, the descriptive and the explanatory. For Freud, the unconscious is on the explanatory level of discourse, so that mind is an explanatory construct rather than equated with consciousness as in classical dualism.—*B. Smith*.

4256. Chadwick-Jones, J. K. (University Coll Wales, Occupational Psychology Research Unit, Cardiff) *Logical reduction and social psychology*. *Journal for the Theory of Social Behaviour*, 1973(Apr), Vol 3(1), 3-21.

—Discusses the relationship between social explanations and psychological propositions. Attempts at integrating the concepts of these 2 approaches are described with reference to their theoretical position. The issue of reductionism is discussed. The question is raised whether there are autonomous social-psychological theories. The concept of reinforcement in behavior studies is compared to the concept of resonance in a social context. Additional research is considered necessary if social psychology is to have autonomy over its subject matter. (44 ref)—*R. S. Albin*.

4257. Dansart, Bernard R. (Loras Coll) *Existentialism in the thought of David V. Tiedeman*. *Character Potential*, 1974(Oct), Vol 7(1), 1-8.—Reviews and synthesizes the concepts of Tiedeman and existential psychologists. Tiedeman, the existentialist, sees the ultimate in decision-making as centering oneself in the decision process itself with awareness of self and situation.

4258. Ferster, C. B. (American U) *The difference between behavioral and conventional psychology*. *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 153-157.—Describes behavioral psychology as a complement rather than a substitute for clinical psychology. The contradictory aspects come from procedures using arbitrary rather than natural reinforcers. Behavioral language and concepts serve to make clinical procedures communicable and sharpen and define clinical practice. Clinical theory deals with the developmental aspects of life whereas behavioral theory provides the means for a fine-grain description. (20 ref)—*Journal abstract*.



4259. **Huck, Schuyler W. & Sutton, Cary O.** (U Tennessee) **The relationship between sample sizes and the power of  $X^2$  in  $2 \times 2$  contingency tables.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 53.—Briefly discusses the importance of using equal  $n$ 's in posttest-only control group experimental designs and how different interpretations of the same data can be drawn by the researcher when the number of Ss in the experimental group differs from that of the control group.
4260. **Kefalas, Asterios G. & Suojanen, Waino W.** (U Georgia) **Organizational behavior and the new biology.** *Academy of Management Journal*, 1974(Sep), Vol 17(3), 514-527.—Although management theorists and practitioners have accepted the model of man which assumes an almost infinite capacity for education and adjustment, recent evidence from ethology studies suggests that this assumption may be misleading and dangerous. It is proposed that there are constraints set by man's genetic endowments which determine his educability. (27 ref)
4261. **Kilian, C. J.** [Significance of space and time in pedagogic thinking.] (Afri) *Suid-Afrikaanse Tydskrif vir die Pedagogiek*, 1974(Jul), Vol 8(1), 9-21.—Contents that in analyzing the pedagogic significance of space and time, certain distinctions should be made between geometric and personal space and between chronometric and existential time. These concepts are discussed in relation to the educator's function of increasing awareness and the experience of "being in the world."
4262. **Lambrechtsen, Erik.** [Age-change or age differences? Concerning investigation strategies in developmental psychology.] (Danh) *Skolepsykologi*, 1974, Vol 11(5), 410-417.—Rejects the traditional cross-sectional and longitudinal strategies arguing for a combination in the form of sequential sampling of Ss. In the discussion of validity, the concept of cohort is central.
4263. **Magdol, Miriam S.** (Potsdam Child Development Ctr, NY) **Problems in attention: Clearing up the terminology.** *Academic Therapy*, 1972-1973(Win), Vol 8(2), 141-153.—Proposes that the behavioral terms "distractibility" and "short attention span" are oversimplified and used synonymously in the literature. A separation of the terms is proposed which distinguishes between interference from internal and external stimuli and educational strategies are suggested which correspondingly distinguish and isolate the 2 behavioral characteristics. (26 ref)—*M. E. Blankenship.*
4264. **Mall, R. A.** **On reflection and negation.** *Philosophy & Phenomenological Research*, 1974(Sep), Vol 35(1), 79-92.—Presents arguments to show that negation is conceptual (i.e., an iterative or reflective process of critical thought) rather than perceptual, operational, intentional, or metaphysical. Negation is described as "the imagined presence" of a perceptually absent object."
4265. **Mixon, Don.** (U Nevada) **Instead of deception.** *Journal for the Theory of Social Behaviour*, 1972(Oct), Vol 2(2), 145-177.—Discusses the deception often used by social psychologists in experiments with human subjects. It is suggested that this deception attempts to place the human subject in the position of a naively responding automatic mechanism. The moral and methodological problems are examined. Role-playing is presented as an alternative approach. 2 studies of active role-playing are reported and contrasted in detail with S. Milgram's 1963 obedience study. It is felt that active role-playing studies can permit the testing of theory-based, situationally specific predictions concerning performance. (33 ref)—*R. S. Albin.*
4266. **Morris, John L. & Diespecker, Don D.** (Wollongong U Coll, NSW, Australia) **Apparatus for studying bisensory learning rates in man/machine systems.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 85-88.—Describes an apparatus for studying learning rates in a simulated industrial or machine control environment. 4 channels of signals are produced which activate either a light source, dials (meters), a vibrotactile unit, or all of these displays in combination on each channel. Input to the displays is by tape-recorded signals of varying intensities. The occurrence of a stimulus signal and the response to it are recorded on a multiple channel event-recorder. The apparatus is intended to facilitate research into the bisensory presentation of signals.—*Journal abstract.*
4267. **Quereshi, M. Y.** (Marquette U) **Purposes and procedures of validation.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 77-89.—Defines validation as a general scientific procedure for investigating the nature of reality, encompassing all scientific disciplines, regardless of the utilitarian value of the information. When the process is employed in the context of a discipline such as psychology, certain subcategories emerge whose interrelations, if viewed in the light of possible or intended uses of the collected information, demonstrate the interdependence of a variety of validation procedures. Some of these have been viewed in the past as separate entities. A hierarchical representation of purposes and procedures is presented to facilitate an understanding of their interrelations and interdependence.—*Journal abstract.*
4268. **Rogo, D. Scott.** **Parapsychology: Is contributions to the study of death.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 99-113.—Considers that a major topic with which parapsychology has been historically associated is whether psychic phenomena indicate that man survives death and communicates with the living. The historical roots of the association between the study of death and parapsychology are reviewed, and several specific areas of parapsychology which bear on the phenomenon of death are discussed. (35 ref)
4269. **Rothgeb, Carrie L. (Ed.).** **Abstracts of the standard edition of the complete psychological works of Sigmund Freud.** New York, NY: International Universities Press, 1973. ix, 572 p.
4270. **Szafran, A. W.** (Free U, Brussels, Belgium) [Reflections on Lacanian philosophy and esoteric tradition.] (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 484-496.
4271. **Thorndike, Edward L.** **Human nature and the social order:** (Edited & abridged by G. J. Clifford). Cambridge, MA: MIT Press, 1969. xxv, 373 p.
4272. **Watanabe, Satoshi.** (U Hawaii) **Logic of the empirical world with reference to identity theory and reductionism.** *Annals of the Japan Association for Philosophy of Science*, 1974(Mar), Vol 4(4), 253-270.—Contents that since observation changes the system

being observed, neither physics, biology, nor psychology can be based on binary arguments, which are true or false. A logic intended to separate the inseparable is proposed to deal with continuous states by starting from a continuously-valued characteristic function. (23 ref)

## PSYCHOMETRICS AND STATISTICS

4273. Becker, Johannes & Pipahl, Werner. (U Dueseldorf, Psychologisches Inst II, W Germany) **The additive difference model and a metric and an ordering on sets.** *Psychometrika*, 1974(Sep), Vol 39(3), 361-362.—Demonstrates that, despite differences between the additive difference model and the set-theoretical model on the generation of similarity judgments, both models lead to the same conclusions on the characteristics of similarity judgments. As a consequence of empirical results, the possibility is considered that the nested structure assumption is a necessary condition for decomposability of similarity judgments.

4274. Dana, Richard H. & Leech, Shirley. (U Arkansas) **Existential assessment.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 428-435.—A review of the literature indicates that present day psychological assessment stems from a philosophy of science that values objectivity but fails to comprehend the existence of the person being evaluated. A humanistic-existential model shifts the focus from omnipotence to encounter and encourages client responsibility. The vehicle for this conceptualization is the nature and meaning of the encounter between clinician and client. New questions are posed for the assessor by altering the assessment goals, the stance toward interpretation, and the criterion for validation. (41 ref)—*Journal abstract*.

4275. Epps, Edgar G. (U Chicago) **Situational effects in testing.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Engelwood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

4276. Goldman, Bert A. & Saunders, John L. (U North Carolina, Greensboro) **Directory of unpublished experimental mental measures: I.** New York, NY: Behavioral Publications, 1974. xiv, 223 p.

4277. Green, Paul E. (U Pennsylvania, Wharton School) **On the design of choice experiments involving multifactor alternatives.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 61-68.—Empirical studies of multifactor choice making can easily generate thousands of combinations if full factorial designs are used. A set of procedures—orthogonal arrays and incomplete block designs—are proposed and illustrated as ways to reduce significantly the number of combinations while retaining other desirable features of balanced experimental designs. (20 ref)

4278. Krantz, David H.; Atkinson, Richard C.; Luce, R. Duncan & Suppes, Patrick (Eds.). (U Michigan) **Contemporary developments in mathematical psychology: II. Measurement, psychophysics, and neural information processing.** San Francisco, CA: W. H. Freeman, 1974. xv, 468 p. \$14.—Presents the 2nd volume in a symposium on recent progress in mathematical psychology research, methodology, and interpretation. Topics include the analysis of psychological data by structural

analysis of covariance matrices, models and methods of 3-way multidimensional scaling foundations of Fechnerian psychophysics, measurement theory and qualitative laws in psychophysics, and information integration theory.

4279. Krantz, David H.; Atkinson, Richard C.; Luce, R. Duncan & Suppes, Patrick (Eds.). (U Michigan) **Contemporary developments in mathematical psychology: I. Learning, memory and thinking.** San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.

4280. Lantermann, Ernst D. [A proposal for modifying the irrelevance criterion.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 115-125.—Discusses the objective criterion of irrelevance in attitude scales as defined by Thurstone's and by A. L. Edwards's different approaches to the problem. The deterministic decision models which underly both approaches are replaced by a stochastic model which facilitates interpretation in cases of deviation from the theoretical model. An example shows the practicability of the stochastic model. (English & French summaries)

## Test Construction & Validation

4281. Butcher, James N. & Gur, Raya. (U Minnesota) **A Hebrew translation of the MMPI: An assessment of translation adequacy and preliminary validation.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 220-227.—Translated the MMPI into Hebrew and verified its adequacy by administering both the English and Hebrew forms to 28 Hebrew-English bilingual students and professionals. Scale intercorrelations and item stability were quite high and compared favorably with English-English retest studies and other foreign-language translations. Comparability was further evaluated by examining endorsement differences between an Israeli sample of 65 normal female college students and US normals. The similarity of group mean profiles for the 2 normal groups suggests that this translation performs in Israel as it does in the US.—*Journal abstract*.

4282. Davis, Everett E. & Rowland, Terrence. (U Texas, El Paso) **A replacement for the venerable Stanford-Binet?** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 517-521.—Current interest in early childhood education has spurred efforts to produce tests of the general mental ability of young children that will be as productive as the Stanford-Binet and at the same time avoid some of its weaknesses, which have become evident over the years. Results of testing 1 black-American, 12 Mexican-American, and 20 Caucasian-American children with both the McCarthy Scales of Children's Abilities (MSCA) and the Stanford-Binet Intelligence Scale provide the basis for a discussion of the 2 tests. It is concluded that many workers probably will prefer the structure of the MSCA, and evidence is presented for the tentative judgment that the MSCA yields scores that parallel Binet IQs.—*Journal summary*.

4283. Farely, Frank H. & Cohen, Arie. (U Wisconsin, Madison) **Common-item effects and the smallest space analysis of structure.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 766-772.—Critically reviews procedures for the analysis of common-item effects on interscale structure. A study using smallest space analysis of such effects is described. It employed an original California



Psychological Inventory scale intercorrelation matrix (with both common and unique items included) and a matrix based only on common-elements correlations between scales. Results indicate strong effects on structure of item overlap and suggest the generalization to smallest space analysis and related multidimensional scaling procedures of J. P. Guilford's 1952 admonition to avoid the factor analysis of test scales containing overlapping items. A distinction between common-item effects on magnitude of correlations and structure of intercorrelations between scales is discussed. It is argued that this distinction, aligned with a proposed research design, would aid in deciding when to use techniques such as factor analysis and smallest space analysis, including which technique is to be preferred under what conditions. (22 ref)—*Journal abstract*.

4284. Gough, Harrison G. & Lazzari, Renato. (U California, Inst of Personality Assessment & Research, Berkeley) **A 15-item form of the F scale and a cross-cultural application.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 39-46.—Results of item analyses of the 30-item California F Scale (Fascism) in a sample of 355 Ss (mostly college students), and proportionate selection from the 9 inferential item clusters first specified for this measure, permitted development of a 15-item version that correlated .95 with the original scale. Application of the shortened version to 194 American and 311 Italian college students produced nearly equivalent means, but there was greater variance in the Italian sample. Reliability coefficients were .83 for the Americans and .90 for the Italians. 5 items revealed significant differences, interpretable in accordance with known cultural emphases and historical experiences. Testing time for the 15-item scale was approximately 5 min. Complaints about item content were less insistent than typically encountered with the 30-item scale.—*Journal abstract*.

4285. Gough, Harrison G. & Quintard, Georges. (U California, Berkeley) **A French application of the CPI social maturity index.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 247-252.—A social maturity index based on 6 subscales of the California Psychological Inventory was developed based on samples of 2,146 nondelinquent and 881 delinquent males. The index was cross-validated on 2,482 nondelinquent vs 409 delinquent American males, 659 nondelinquent vs 38 delinquent Italian males, and 113 Japanese male nondelinquents vs 36 delinquents. All mean differences were highly significant, and Ss in the 3 cross-validating samples were classified with percentage accuracies of 92.3 (American), 83.8 (Italian), and 83.2 (Japanese) by a cutting score of 45. New results for 1,270 males and 391 females tested with a French edition of the index gave similarly positive findings, with classificatory hit rates of 86.2% for males and 90.3% for females.—*Journal abstract*.

4286. Keats, J. A. (U Newcastle, England) **Applications of projective transformations to test theory.** *Psychometrika*, 1974(Sep), Vol 39(3), 359-360.—Extends the theory of projective transformations to G. Rasch's 1960 model for representing test performances and applies it further to allow for guessing behavior. It is suggested that the cross-ratio property of projective transformations has application in deciding whether or

not some form of projective transformation would be appropriate in converting proportions of correct responses to estimates of ability.

4287. Knudson, Roger M. & Golding, Stephen L. (U Illinois, Psychological Clinic) **Comparative validity of traditional versus S-R format inventories of interpersonal behavior.** *Journal of Research in Personality*, 1974 (Aug), Vol 8(2), 111-127.—Evaluated the comparative validity of 2 "stimulus-response (S-R)" inventories of interpersonal behavior—the Schedule of Interpersonal Response by J. F. Kinnane et al and a newly developed Rational S-R Inventory—and 2 "traditional" inventories—the Personality Research Form and the Interpersonal Check List—with respect to 14 self-report and peer rating criteria selected to tap broadly the interpersonal domain. 64 male and female high school seniors served as Ss. In spite of the situational specificity inherent in the S-R inventories, the traditional inventories substantially outperformed the S-R inventories and, in contrast to previous findings, also outperformed simple self-ratings. The relative advantages of various inventory construction strategies, the problem of criterion measurement, and theoretical and methodological issues in the assessment of situational parameters are discussed. (54 ref)—*Journal abstract*.

4288. Lord, Frederic M. (Education Testing Service, Princeton, NJ) **The relative efficiency of two tests as a function of ability level.** *Psychometrika*, 1974(Sep), Vol 39(3), 351-358.—Develops a new formula for the relative efficiency of 2 tests measuring the same trait. The formula expresses relative efficiency solely in terms of the standard errors of measurement and, surprisingly, the frequency distributions of true scores. Approximate methods for estimating relative efficiency may make this function routinely available. A numerical illustration compares new and old estimates of relative efficiency for subtests from the Scholastic Aptitude Test.—*Journal abstract*.

4289. Meurer, Klaus. (U Kiel, Inst of Psychology, W Germany) **[Development of a nonverbal analogy test based on set theory.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 126-131.—Constructed a series of 20 progressively difficult analogy problems which consisted of object sets of figures varying in form and color. The multiple-choice set of alternative answers contained, in addition to the correct and false alternatives, alternatives which were half correct, thus allowing conclusions to be made about the dominant stimulus dimension which had prompted the selection of a particular alternative. The validity of the analogy test was established by its high correlation with W. Horn's Performance Test. (English & French summaries)—*W. J. Koppitz*.

4290. Shah, J. H. (Saurashtra U, Bhavnagar, India) **Gujarati adaptation and standardization of the Stanford-Binet Intelligence Scale (1960 revision): Form L-M.** *Indian Journal of Psychometry & Education*, 1973(Dec), Vol 4(2), 67-82.—Adapted and standardized the 3rd revision of the Stanford-Binet Intelligence Scale (Form L-M) on Gujarati population. Tests were translated into the Gujarati language, reviewed by psychometricians, pretested on 220 Ss, revised, and finally standardized on 400 Gujarati-speaking persons stratified by age, sex,

socioeconomic status, and parents' occupation, to represent the population. The adapted scale was validated against the results of other psychological tests, school marks in academic subjects only, and teachers' judgments of an individual's intelligence. Coefficients ranged from a low of .55 to a high of .87, suggesting that the scale possesses a fairly high degree of validity.—J. B. Francis.

4291. Switras, Joseph E. (Iowa State U) **A comparison of the eye-roll test for hypnotizability and the Stanford Hypnotic Susceptibility Scale: Form A.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 54-55.—Compared the Eye-Roll Test for hypnotizability with the Stanford Hypnotic Susceptibility Scale (Form A). They were found to be uncorrelated.

4292. Trimmer, Harvey & Klein, Freda. (Nevada Employment Security Dept, Carson City) **Wooden vs plastic apparatus with the GATB: A restudy.** *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 123-126.—Attempted to replicate a study by J. T. Kapes and N. W. Sievert (see PA, Vol 52:9115) which found a mean difference of 11 points (1 standard error) between wooden and plastic peg boards for the General Aptitude Test Battery (GATB). Although the Kapes and Sievert study used 9th graders as Ss, the present study used 388 applicants (over 18 yrs of age) to a state employment office. Ss were tested in groups of 10 and were randomly assigned to each type of pegboard. Results support the previous finding that the use of a wooden or plastic pegboard is systematically related to performance on the GATB Manual Dexterity measure. There were no significant sex or race differences. It is recommended that wooden boards and pegs be used exclusively when testing with the GATB and that the Manual Dexterity factor be interpreted with caution by future users of the test battery.—L. Gorsey.

4293. Wagener, J. Mark. (Oregon State U) **An experimental scale of social competence for adult males.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 462-463.—Developed the 21-item Life Experience Scale (LES) as an expansion of the process-reactive distinction so that this concept could be applied to nonschizophrenics. Scores were unrelated to age or to socioeconomic status for 3 different samples of males. A comparable range of LES scores was found for schizophrenic, alcoholic, and normal groups.

#### Mathematical Models & Statistics

4294. Acock, Alan C. & Martin, J. David. (U Southern California) **The undermeasurement controversy: Should ordinal data be treated as interval?** *Sociology & Social Research*, 1974(Jul), Vol 58(4), 427-433.—Discusses the undermeasurement controversy which concerns treating ordinal data as interval when an underlying interval level variable is assumed to exist. The position of the "purists" who insist on limiting such data to ordinal analysis is contrasted to the "pragmatists" who treat the data as if it were interval.—*Journal abstract*.

4295. Anderson, Jonathan & Hansford, B. C. (Flinders U South Australia, Bedford Park) **An information processing procedure for scoring Flanders' interaction analysis categories.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 6-10.—Investigated the use of an

alternative method (J. McLeod and J. Anderson's Uncertainty Reduction Index) for scoring N. A. Flanders's Interaction Analysis categories when student competence in coding lesson transcripts is being assessed. Unlike scoring procedures for many behavior category systems, the Uncertainty Reduction Index (URI) weights S's responses in proportion to the degree of uncertainty exhibited by all Ss responding to a given segment of verbal behavior. A comparison was made between the responses of 222 undergraduates when scoring transcripts of verbal behavior with the Flanders system and with the URI. Results indicate the usefulness of the URI particularly in situations where there is confusion or disagreement about how a certain portion of a verbal transcript should be coded.—L. Gorsey.

4296. Bechtoldt, Harold P. (U Iowa) **A confirmatory analysis of the factor stability hypothesis.** *Psychometrika*, 1974(Sep), Vol 39(3), 319-326.—The procedures recently developed by K. G. Jöreskog for studying similarities and differences in factor structures between different groups are applied to data from a study designed by L. L. Thurstone to investigate the sampling stability of a hypothesized isolated configuration. The hypothesis of an isolated configuration is rejected but not by much. Results represent a restricted and unique simple structure solution with the factor loadings and uniqueness values invariant over the 2 samples. (22 ref) —*Journal abstract*.

4297. Bergman, Lars R. **Linear transformations and the study of change.** *Reports from the Psychological Laboratories, University of Stockholm*, 1972(May), No 352, 7 p.—Considers the situation with measurements from 2 points in time where the scores are linearly transformed separately at each time of measurement. Special attention is given to the case when the scores are transformed to yield equal means and variances. When studying mean changes between groups, and when studying the correlation between change and another variable, the apparent tendency of an individual's results may be reversed when the scores are transformed. In those cases, treated in the present paper, when the initial scores are controlled for, the results are invariant under linear transformations. It is suggested that for this and other reasons it appears important to control for the initial values.—*Journal abstract*.

4298. Birnbaum, Michael H. (U Illinois) **Reply to the devil's advocates: Don't confound model testing and measurement.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 854-859.—E. F. Alf and N. M. Abrahams (1974) and L. G. Rorer (1974) replied to the present author's 1973 criticism of correlational methods by defending the correlation-regression approach to model testing, contending that if a priori measurements are assumed to be proper psychological values and if the correct model is known, correlations can be higher for the better model. The present article argues that since psychologists cannot know in advance the correct scales and models, popular correlational techniques are inappropriate for investigating psychological processes. It is necessary to separate measurement from the evaluation of a model. A further attempt is made to clarify the relationships between different methods of analysis. (18 ref)—*Journal abstract*.



4299. **Bloxom, Bruce.** (Vanderbilt U) **An alternative method of fitting a model of individual differences in multidimensional scaling.** *Psychometrika*, 1974(Sep), Vol 39(3), 365-367.—Application of K. G. Jöreskog's 1970 procedure for analysis of covariance structures to a model for determining individual differences in multidimensional scaling suggests that Jöreskog's method is more rapid than J. D. Carroll and J. J. Chang's (see PA, Vol 47:5960) procedure.

4300. **Cattell, R. B.** (Inst for Research on Morality & Adjustment, Boulder, CO) **Radial parcel factoring-vs-item factoring in defining personality structure in questionnaires: Theory and experimental checks.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 103-119.—Allegations have been made that factoring by items is acceptable but by parcels is not. Theoretical reasons are given for expecting that factors should actually be the same in number and nature from items and parcels, and that, moreover, the latter will give more accurately determined unique simple structure resolution. From 184 items found in several researches to cover some 19-20 primary factors, 46 parcels of 4 in each were made by radial parcelling. Factorings using blind rotation, employing both items and parcels on each of 2 groups ( $N = 246$  and  $780$ ) independently, showed close agreement on number of factors and in obtaining significant matching indices for each factor (a) among the 4 solutions and (b) with the ideal criterion pattern. As hypothesized, the advantages in precision of rotation turn out to be with the parcelling method. (37 ref) —*Journal abstract.*

4301. **Cicchetti, Dominic V.** (VA Hosp, West Haven, CT) **Reply to Keselman concerning Cicchetti's interpretation of the findings of Petrionovich and Hardyck.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 896-897.—H. J. Keselman (see PA, Vol 51:8133) recently challenged a statement made by D. V. Cicchetti in 1972 that the Tukey and Scheffé tests control adequately for Type-I and Type-II errors. The present paper challenges Keselman's reasoning.

4302. **Deniau, C. & Oppenheim, G.** [Two linear methods in multidimensional statistics: II. Analysis of conditional frequency tables.] (Fren) *Mathématique et Sciences Humaines*, 1974, No 45, 5-28.—Analysis of conditional frequency tables is demonstrated on data derived from demographic surveys. Mathematics of euclidean distance and vector profiles are explained. Relationships between the 2 methods are pointed out.

4303. **Deniau, C.; Leroux, G. & Oppenheim, G.** (U René Descartes, Paris, France) [Two linear methods in multidimensional statistics: I. Analysis of principal components.] (Fren) *Mathématique et Sciences Humaines*, 1973, No 44, 5-34.—Demonstrates the principal components in factor analysis on an actual data matrix and discusses its mathematical bases in an algebraic framework. Graphical representation and the quality of cluster projections are considered in detail.

4304. **Ekehammar, Bo & Magnusson, David.** **A method to study stressful situations.** *Reports from the Psychological Laboratories, University of Stockholm*, 1972(Jan), No 343, 7 p.—Similarity ratings of 20 situations on a numerical scale were made by 10 14-15 yr old Ss. Some of the situations were regarded as being stressful for persons in general. A dimensionality

analysis of the mean similarity matrix was performed. The analysis indicated that the Ss separated stressful situations from neutral situations. 2 situational dimensions, interpreted as "ego threat" and "threat of pain," were obtained for stressful situations. A categorization analysis on the similarity matrix confirmed the outcome of the dimensional analysis. (23 ref)—*Journal abstract.*

4305. **Estes, W. K. & Suppes, Patrick.** (Rockefeller U, New York, NY) **Foundations of stimulus sampling theory.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Details the development of the axiomatic bases of stimulus sampling theory and illustrates the usefulness of the theory by proving the Markov theorem for stimulus sampling models. It is proposed that the application of Markov chains to complex reinforcement schedules whose contingencies extend over several trials will be suggestive of other experiments. (18 ref)

4306. **Fuller, Carol H.** (US Naval Personnel Research & Development Lab, Washington, DC) **Weighting to adjust for survey nonresponse.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 239-246.—Considers the assumptions underlying the use of statistical weighting to adjust for survey nonresponse in judgment and probability samples. Factors such as proportionate sampling, and weighting with and without follow-up procedures are discussed. (22 ref)

4307. **Gross, Alan L.; Faggen-Steckler, Jane & McCarthy, Karen.** (Graduate School & University Ctr, City U New York) **Statistical procedures for evaluating the practical utility of a moderator approach to prediction.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 578-582.—Describes 3 statistical procedures for evaluating the practical utility of a moderator approach. Each procedure gives tests of significance for the comparison of 3 prediction strategies: (a) using the moderator variable as a basis for subgrouping Ss and computing separate regression equations, (b) using the moderator variable as a predictor variable, or (c) excluding the moderator variable from the prediction model. It is concluded that when job performance is measured along a continuum, the average  $y$  score of the selected group (Procedure 1) should be considered. However, when 2 levels of job performance are measured, (e.g., pass-fail grades) then either the number of selection errors (Procedure 2) or the number of selection errors when a selection ratio constraint is present (Procedure 3) should be used.—*Journal abstract.*

4308. **Hubert, Lawrence J.** (U Wisconsin) **Some applications of graph theory to clustering.** *Psychometrika*, 1974(Sep), Vol 39(3), 283-309.—Reviews and expands upon the relationship between graph theory and the clustering of a set of objects. Several graph-theoretic criteria are proposed for use within a general clustering paradigm as a means of developing procedures "in between" the extremes of complete-link and single-link hierarchical partitioning; these same ideas are then extended to include the more general problem of constructing subsets of objects with overlap. A number of related topics are surveyed within the general context of reinterpreting and justifying methods of clustering either through standard concepts in graph theory or their

simple extensions. (4 p ref)—*Journal abstract.*

4309. Kohr, Richard L. & Games, Paul A. **Robustness of the analysis of variance, the Welch procedure and a box procedure to heterogeneous variances.** *Journal of Experimental Education*, 1974(Fall), Vol 43(1), 61-69. —Considers that numerous studies have documented the robustness of  $t$  and  $F$  to heterogeneous variances under the restricted condition of equal  $n$ 's. Likewise, the distortion of  $\alpha$  in the presence of unequal  $n$ 's and variances has been demonstrated in both mathematical and empirical studies. Several investigations, however, have shown the Welch technique to be robust to this situation in the 2 group case. The present study was addressed to the  $k$ -group analysis of variance (ANOVA) situation. Monte Carlo methods were employed to contrast several procedures with respect to control over Type I errors and power. Results indicate that the generalized Welch technique may be substituted for the ANOVA when variances are heterogeneous and  $n$ 's are unequal. (20 ref)—*Journal abstract.*

4310. Levi, A. M. (U Haifa, Israel) **Constructive, extensive measurement of preference to predict choice between sums of outcomes.** *Behavioral Science*, 1974(Sep), Vol 19(5), 326-335. —Examined a decision-making process in 3 studies which scaled preference toward preventing crimes. Study I found a power relationship between extensive measurement (EM), 11 university student respondents, and a magnitude estimation (ME) scale of another study. Study II, using EM, successfully predicted choice ( $p < .01$ ) between sums of 2 outcomes with 10 respondents and then replicated the finding with 1 teacher respondent. Study III scaled 10 adult respondents by EM, ME, and a Thurstonian method. Study I was replicated. EM was differentiated from the other methods; it predicted itself 80-83%, while predicting the others 37-63%. (18 ref)—*Journal abstract.*

4311. Levy, Kenneth J. (State U New York, Buffalo) **Testing that  $K$  independent random samples were drawn from  $K$  normal populations.** *Psychometrika*, 1974(Sep), Vol 39(3), 363. —Suggests a simple extension of R. B. D'Agostino and E. E. Cureton's (see PA, Vol 78:1508) test of normality against skewed alternatives (based upon the 3rd standardized sample moment) to the case of  $k$  independent random samples.

4312. Mandell, Lewis. (U Maine) **When to weight: Determining nonresponse bias in survey data.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 247-252. —Examines criteria that are important in determining how to weight for nonresponse in sample surveys. Mathematical procedures are provided to facilitate weighting procedures.

4313. Overall, John E. & Woodward, J. Arthur. (U Texas, Medical Branch, Galveston) **A simple test for heterogeneity of variance in complex factorial designs.** *Psychometrika*, 1974(Sep), Vol 39(3), 311-318. —Develops a simple procedure for testing heterogeneity of variance which generalizes readily to complex, multifactor experimental designs. Monte Carlo studies indicate that the  $Z$ -variance test statistic presented here yields results equivalent to other familiar tests for heterogeneity of variance in simple 1-way designs where comparisons are feasible. The primary advantage of the  $Z$ -variance test is in the analysis of factorial effects on sample variances in more complex designs. An example involv-

ing a 3-way factorial design is presented.—*Journal abstract.*

4314. Rowse, Glenwood L.; Gustafson, David H. & Ludke, Robert L. (U Wisconsin) **Comparison of roles for aggregating subjective likelihood ratios.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 274-285. —Investigated the goodness of 1 behavioral and 5 mathematical aggregation rules for combining likelihood ratio estimates given by a group of experts (96 firemen). Behavioral aggregation required only that all 4 members of the group agree to use a single estimate. All mathematical aggregation rules used the geometric mean of the estimates. However, 5 methods were used to weight the estimates of each "expert." The methods used were equal weights, peer-assigned weights, self-assigned weights, group-assigned weights (combined peer and self), and an average between self- and group-assigned weights. Statistical differences were found in favor of mathematical consensus for likelihood ratios from size 2 to 15. No differences were found for smaller or larger likelihood ratios, or between the various weighting methods. Equal weighting of experts was the simplest method to use. Estimates were obtained at a rate of 3.25 min/group/estimate.—*Journal abstract.*

4315. Singh, R. P. (Patna U, Faculty of Education, India) **A table for determining sample size from a given population.** *Indian Journal of Psychometry & Education*, 1973(Dec), Vol 4(2), 83-84. —Presents a reference table for determining sample size from a given population using 1960 National Education Association formula based on chi-square with one degree of freedom and population proportion assumed to be .50.

4316. Srivastava, A. B. (National Inst of Administration Health & Education, New Delhi, India) **Advances in multivariate methods, particularly some analogues of univariate tests: Application to educational research.** *Indian Journal of Psychometry & Education*, 1973(Dec), Vol 4(2), 45-53. —Discusses the application to educational research of the multivariate analogues of univariate statistical procedures, including comparison of 2 or more groups on any number of variables, analysis of covariance with multiple covariates, factorial analysis of variance, tests of homogeneity of regression, equality of covariance matrices, and correlations among sets of variables. It is suggested that multivariate procedures are eminently suitable for educational research, and are often the only appropriate ones.—*J. B. Francis.*

4317. Zinnes, Joseph L. & Griggs, Richard A. (Indiana U) **Probabilistic, multidimensional unfolding analysis.** *Psychometrika*, 1974(Sep), Vol 39(3), 327-350. —A probabilistic, multidimensional version of C. H. Coombs's unfolding model is obtained by assuming that the projections of each stimulus and each individual on each axis are normally distributed. Exact equations are developed for the single dimensional case and an approximate one for the multidimensional case. Both types of equations are expressed solely in terms of univariate normal distribution functions and are therefore easy to evaluate. A Monte Carlo experiment, involving 9 stimuli and 3 Ss in a 2-dimensional space, was run to determine the degree of accuracy of the multidimensional equation and the feasibility of using iterative methods to obtain maximum likelihood estimates of the stimulus and S coordinates. Results



reported here are gratifying in both respects. (25 ref)  
—*Journal abstract.*

## PERCEPTION AND MOTOR PERFORMANCE

### Perceptual Processes

4318. Bliss, James C. (Telesensory Systems, Palo Alto, CA) **Summary of three optacon-related cutaneous experiments.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Describes 3 experiments to evaluate 2-point discriminations, perception of alphabetic patterns, and tactile reading with the Optacon, a direct translation tactile reading system for the blind. Data indicate that spatial patterns formed on an array of vibratory stimulators were sensed within the limits of internal intensity and spatial noise sources. Cognitive mechanisms which also operate during scanning are described.

4319. Bornstein, Marc H. (Yale U) **Perceptual generalization: A note on the peak shift.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 804-808.—Contents that a recent review of the literature on peak shift by R. B. Purtle (see PA, Vol 51:8409) fails to attend to the influence of underlying perceptual categories. The argument for such an influence (e.g., in wavelength generalization) is presented, and examples from several animal species are reported. (33 ref)—*Journal abstract.*

4320. Craig, James C. (Indiana U) **Pictorial and abstract cutaneous displays.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Describes the Kinotact, an apparatus which converts optical images to a pattern of vibration transmitted to an O's skin, and reports an experiment to compare O's ability to identify block letters of the alphabet under pictorial (when the pictorial quality of the optical image was preserved) and abstract (when the pictorial quality was disturbed) conditions. No differences in O's ability to identify the letters, in the rates of acquisition of the letters, or in the confusion matrices generated by the pictorial and abstract conditions were found.

4321. Downs, Florence S. (New York U, Div of Nurse Education) **Bed rest and sensory disturbances.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 434-438.—Determined the effects of 3 sensory deprivation conditions upon the perceptions and motor behavior of bed rest Ss. The 3 conditions were ambient auditory input of room tone only, decoded auditory input of radio selections, and coded auditory input of 2-, 4-, 6-, and 8-min randomly assigned segments of taped radio selections. The dependent variable reported was the presence of S's indeterminate stimulus experiences (ISEs). Ss were 90 male and 90 female adults 18-25 yrs old, recruited from an urban university, who were randomly assigned to one of the experimental conditions for 2½ hrs of bed rest, remaining awake. Following the bed rest they were interviewed to determine the occurrence of ISEs. Ss in the decoded auditory input condition reported fewer ISEs than those in the coded and ambient conditions. The implications for nursing care of bed rest patients

and patients in recumbent positions are discussed.—R. G. Gibson.

4322. Fried, Peter A. (Carleton U, Ottawa, Ontario, Canada) **Readiness in perception: Principle and practice.** Lexington, MA: D. C. Heath, 1974. xii, 548 p.—Presents a collection of 52 empirical and discussion papers on different theoretical approaches to the question of relating perceptual input to output, perceptual learning and the underlying physiological mechanisms, and higher perceptual processes (e.g., attentional mechanisms, memory, and individual differences in perception).

4323. Fucci, Donald J.; Arnst, Dennis & Telage, Kal M. (Ohio U) **The effects of pulsed and continuous stimulation on vibrotactile thresholds obtained from the tongue.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 83-84.—Obtained vibrotactile thresholds from the anterior midline surface of the tongue on 2 groups of 52 normal-speaking 18-36 yr old adults by using ascending-pulsed, ascending-continuous, and descending-continuous stimulation. The *t*-test comparisons of the data showed no significant differences between ascending-pulsed and continuous thresholds; however, significant *t* tests were obtained when comparing ascending-continuous and descending-continuous data. Results suggest that descending-continuous vibrotactile thresholds are significantly poorer than either ascending-pulsed or continuous thresholds.—*Journal abstract.*

4324. Gescheider, George A. (Hamilton Coll) **Temporal relations in cutaneous stimulation.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Discusses cutaneous information processing in 3 situations: (a) when successive stimuli are separated by short time intervals so that a single sensation is perceived, (b) when time intervals between stimuli are long enough to just barely be perceived as successive, and (c) when the time intervals are long enough to reliably result in correct judgments of temporal order. The role of neural inhibitory systems in determining temporal sensitivity, and a cutaneous model of auditory sound localization are also examined. (20 ref)

4325. Gilson, Richard D. (Ohio State U) **Vibratory masking.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Discusses methodological issues in masking techniques and evaluation procedures (forced choice techniques and method of limits). These techniques are related to G. Békésy's description of funneling (1967), and the relative applicability of each technique to 2 purposes of masking—investigating neural interactions or studying the discriminability between various elements in a multiple pattern—is examined.

4326. Griffiths, Ian & McIntyre, Donald. (Electricity Council Research Ctr, Chester, England) **Subjective response to overhead thermal radiation.** *Human Factors*, 1974(Aug), Vol 16(4), 415-422.—8 bald and 36 nonbald male technicians and scientists in 2 experiments experienced conditions in which ceiling temperatures varied between 26.5 and 45°C. Air temperature, mean radiant temperature, air velocity, and humidity were held constant. Experimental variables consisted of 2 levels of seat height, S baldness, and environmental temperature.

Ss appraised the environmental conditions by use of a 34-item semantic differential questionnaire. Baldness and seat height were unimportant factors, but ceiling temperature significantly affected warmth assessment. Conditions of higher ceiling temperature were perceived as cooler than those with the same mean radiant temperature and lower ceiling temperatures. Results indicate that (a) there was greater sensitivity to radiant exchange with walls than with the ceiling and (b) European upper limits for ceiling temperature are unduly restrictive.—*Journal abstract.*

4327. Hahn, John F. (U Virginia) **Vibratory adaptation.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Reviews some recent human psychophysical data on vibratory adaptation and findings from electrophysiological recording of single nerve cells. Variations in the amplitude of the vibrotactile stimulus and its differential effects on subjective and absolute thresholds, the function of receptors, and the need for further research on vibratory adaptation are discussed.

4328. Hill, John W. (Stanford Research Inst, Menlo Park, CA) **Limited field of view in reading lettershapes with the fingers.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Reports a series of experiments on the effects on reading rate and ability of expanded field of view presentations on a computerized tactile text-presentation system. Data from 6 different display formats show that only a limited area of the fingers was used in tactile reading and that there was a high degree of transfer of learned ability between different display formats for experienced Ss.

4329. Keidel, Wolf D. (Erlangen U, Physiological Inst, W Germany) **The cochlear model in skin stimulation.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Describes the use of G. Békésy's 1961 model for information transfer to the skin of the human forearm and modification of the model into a system of on-line computer simulation of an electronic dispersion model of cochlear perception. The work of P. Finkenzerler in expanding the spatial and temporal pattern distributions of the Békésy model is also examined.

4330. Lechelt, Eugene C. (U Alberta, Edmonton, Canada) **Some stimulus parameters of tactile numerosness perception.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Studied the effects of stimulus presentation rate and number, spatio-temporal patterning, signal intensity, and irregular presentation rates on subjective impressions of the number of stimuli in trains of successive tactile pulses. Results indicate that if reliable transmission of tactile signal information is to be achieved, signals should be of high intensity, presented at slow and constant rates, and distributed spatially among several loci instead of confined to a single placement. (43 ref)

4331. O'Rand, Angela & Ellis, Robert A. (Florida Atlantic U) **Social class and social time perspective.** *Social Forces*, 1974(Sep), Vol 53(1), 53-62.—Describes a methodological procedure (the Social Time Perspective Scale) for determining class-linked differences in the way

persons anticipate the future and orient their behavior to it. Data were drawn from 80 male undergraduates from middle-class backgrounds and from 80 Job Corpsmen primarily from lower-class backgrounds. Findings reveal that: (a) lower-class youth in the Job Corps have a more circumscribed notion of future time than youth from the middle class and their outlook on the future is less systematically ordered; (b) upwardly mobile lower-class youth in college have succeeded in incorporating some features of the middle-class pattern of future orientation in their temporal outlook, but residues of their lower-class backgrounds are still present; and (c) in both the lower- and middle-class samples, the length of temporal perspectives is a factor mediating effective role performance. (42 ref)—*Journal abstract.*

4332. Orme, J. E. (Sheffield Area Psychological Service, England) **Precondition and time.** *Journal of the Society for Psychical Research*, 1974(Jun), Vol 47(760), 351-365.—Devises a theoretical framework to account for precognition and other paranormal experiences (e.g., telepathy and clairvoyance). The characteristics of precognitive experiences are discussed: the conditions in which they occur, their information value, their temporal properties, and associated factors of personality and psychopathology. The dream is the most common vehicle for precognitive experiences. Relaxed and passive people are the most prone to have such experiences. Relatively unimportant events are foreseen as frequently as deaths and accidents and the events tend to be in the near rather than the distant future. An hypothesis that time possesses extensive properties is developed.—G. J. Frankel.

4333. Parker, Adrian. (U Edinburgh, Scotland) **Some success at screening for high scoring ESP subjects.** *Journal of the Society for Psychical Research*, 1974(Jun), Vol 47(760), 366-370.—Reports 2 cases of extended ESP success from a sample of 25 volunteers screened on the Edinburgh Electronic ESP Tester (EET). The EET is a randomizer which selects 1 of 5 lamps to be subsequently illuminated on a display panel. The S has a similar display panel on which he presses the button that he thinks corresponds to the lamp illuminated on the agent's panel. A controlled card-guessing series followed the screening. The successful card-guessing results pose a fundamental problem in parapsychology: Why were 2 high-scoring subjects found in a sample of 25? The possible influence of such factors as expectancy, rapport, and changes in subjective state in producing high ESP scores is considered.—G. J. Frankel.

4334. Sherrick, Carl E. (Princeton U) **Current prospects for cutaneous communication.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Discusses the state of research on cutaneous communication including the areas of figure-ground relations in tactile displays, contour generation, and the acquisition of tactile skills. Technical and methodological developments in these areas are considered, and the need for further investigation of cutaneous perception, processing, and training is examined. (19 ref)

4335. Stevens, Joseph C. (Yale U) **Psychophysical invariances in proprioception.** In *Conference on cutaneous communication systems and devices*. Austin, TX:



Psychonomic Society, 1974. vi, 122 p.—Reviews experiments which attempted to establish exact quantitative relations between the degree of perceived effort and the level and duration of exertion. Data from a finger-squeeze experiment and a study of apparent effort as a function of muscle group suggest that apparent effort grows in proportion to the force level raised to the 1.7 power and that this exponent varies only slightly as a function of the psychophysical method used.

4336. Verrillo, Ronald T. (Syracuse U) **Vibrotactile intensity scaling at several body sites.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—A review of the background and recent research on the growth of subjective magnitude over different parts of the body indicates that this function changes when the site of stimulation is shifted from one location to another and that it does so in an orderly manner. The relationship between this perception of vibratory stimulus magnitude and the basic problem of how intensity is coded in the nervous system is also examined.

4337. Walker, James T. & Shea, Karen S. (U Missouri, St Louis) **A tactual size aftereffect contingent on hand position.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 668-674.—In 3 experiments with a total of 64 undergraduate Ss, a narrow inspection bar was located on S's left (or right) and a wide bar on the right (or left). During an inspection period of 2 min, S grasped the bars alternately, moving a single hand from one bar to the other. A test bar of intermediate width subsequently presented on the left (or right) then felt wider to the same hand than an intermediate bar presented in the other position. No intermanual transfer occurred; thus, the aftereffect was confined to a single hand. There are many analogies between the present contingent aftereffect in the tactual-kinesthetic modality and a number of contingent aftereffects in the visual modality, such as the McCollough effect. (15 ref) —*Journal abstract*.

4338. White, Benjamin W. (California State U, San Francisco) **What other senses can tell us about cutaneous communication.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Discusses 3 kinds of information (layout, identity, and language) that are gathered by the senses and how various perceptual systems handle each type of information. The prevalence of each sensory system in processing each type of information (e.g., when conflicting information about the environmental layout is received by 2 senses, the visual system will probably prevail) is examined, and data on temporal organization in the tactile modality are discussed. (29 ref)

4339. Wong, T. S.; Ho, R. & Ho, J. (U Waikato, Hamilton, New Zealand) **Influence of shape of receptor organ on the horizontal-vertical illusion in passive touch.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 414-419.—Conducted 4 experiments involving 156 17-26 yr olds in which stimulus templates were traced onto the volar surface of S's forearm. Exp I showed that rotation of a T figure over 180° resulted in an illusion function, with a reversal of the effect at 90°. A similar function was obtained in Exp II with an L

figure, indicating the absence of a bisection effect. The component line along the shorter lateral axis was judged longer than that aligned with the longitudinal axis of the forearm. Exps III and IV indicated that the effect was independent of the degree of stimulation on the skin and that an inscribed circle was similarly affected and perceived as a lateral ellipse. It is concluded that the horizontal-vertical illusion in passive touch is a function of the orientation of the figure with reference to the elongated frame of the receptor organ and is independent of the effect in vision and active touch. (20 ref) —*Journal abstract*.

### Auditory Preception

4340. Ainsworth, W. A. (U Keele, England) **The influence of precursive sequences on perception of synthesized vowels.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 103-109.—Tested the hypothesis that the durations of speech sounds are not perceived absolutely but, rather, relative to the durations of the sounds which precede them. It was found that the classification of vowel sounds is influenced by the rhythm of sounds in a precursive sequence, especially if the duration of these vowels lies in the region between the normal durations of "short" and "long" vowels.

4341. Caramazza, A.; Yeni-Komshian, G. & Zurif, E. B. (Johns Hopkins U) **Bilingual switching: The phonological level.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 310-318.—Investigated whether J. Macnamara's (1967) 2-switch model of bilingual functioning is applicable to the phonological level. 20 Canadian French-English bilingual high school seniors were tested for their perception and production of the phonological feature of voice onset time. Ss were tested twice, once in a French language set and once in an English language set. The perceptual functions obtained under the 2 language set conditions were virtually identical, whereas the production distributions were significantly different in the 2 conditions. Results suggest that the 2-switch model can be applied to the phonological level. (French summary) —*Journal abstract*.

4342. Fidell, Sanford; Pearsons, Karl S. & Bennett, Ricarda. (Bolt Beranek & Newman, Canoga Park, CA) **Prediction of aural detectability of noise signals.** *Human Factors*, 1974(Aug), Vol 16(4), 373-383.—Conducted 2 series of psychoacoustic tests with a total of 19 college student Os to determine the applicability of the psychophysical theory of signal detectability (TSD) to prediction of the aural detectability of noise signatures in differing noise backgrounds. The 1st series of tests produced data supporting development of a simplified graphical prediction method based on TSD. A 2nd series validated the precision and accuracy of the prediction method under quasi-realistic conditions. Predicted levels of performance were typically within 1 or 2 db of the data. —*Journal abstract*.

4343. Franzén, Ove; Nordmark, Jan & Sjöberg, Lennart. **A study of pitch.** *Göteborg Psychological Reports*, 1972, Vol 2(12), 31 p.—120 experienced psychology students made judgments of 10 sinusoids and pulses in the range 80-5,500 Hz. Judgment tasks were graded paired comparisons, estimation of magnitudes, ratios, similarities, and category membership and ratings. The

judgment continuum was unidimensional with no clear time-order error. Response bias in ratio estimation was similar to results in previous studies. The mel scales were unusually highly negatively accelerated and were similar for sinusoids and pulses. H. Eislser and G. Ekman's (see PA, Vol 34:2509) similarity equation was not supported. (24 ref)—*Journal abstract*.

4344. Fry, D. B. (University Coll London, England) **Right ear advantage for speech presented monaurally.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 142-151.

—In a series of choice reaction time experiments, members of minimal pairs of English words were presented monaurally to the right and left ears of 48 right-handed adult Ss who made a keypressing response indicating the word they had heard. The word pairs used were /pit:bit/, /bit:bet/, /lei:rei/, and /splei:sprei/; the stimuli were recorded natural utterances. Mean reaction time showed a highly significant right-ear advantage of 25 msec in the case of the word pair /splei:sprei/, a significant right-ear advantage of 15 msec for /lei:rei/, and no significant difference between the ears for /pit:bit/ or /bit:bet/. (23 ref)—*Journal abstract*.

4345. Hawkins, Harold L. et al. (U South Florida) **Precategorical selective attention and tonal specificity in auditory recognition.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 530-538.—Conducted 2

auditory recognition masking experiments to test D. E. Broadbent (1958) and A. M. Treisman's (1964) hypothesis that a mechanism of selective attention is located prior to the point of contact between acoustic input and memory (i.e., prior to stimulus categorization). Graduate and undergraduate psychology students ( $N = 12$ ), were tested under 3 conditions of test-tone-masker laterality: monaural masker presented ipsilateral to test tone, monaural masker presented contralateral to test tone, and binaural masker. In Exp I, where masker frequency was unpredictable, masking effects occurred under all laterality conditions. However, in Exp II, where masker frequency was predictable, masking effects appeared under ipsilateral but not contralateral or binaural conditions. These findings imply (a) the existence of a mechanism of selective attention located prior to the categorization of acoustic input, (b) that this mechanism operates subsequent to the fusion of binaurally presented information, and (c) that its effectiveness is contingent upon prespecification of the frequency characteristics of the input to be inhibited.—*Journal abstract*.

4346. Hedden, Steven K. (U Iowa) **Preferences for single tone stimuli.** *Journal of Research in Music Education*, 1974(Sum), Vol 22(2), 136-142.—Asked 30 music and 30 nonmusic majors at a university to rate relative liking for tones of differing complexity (pure tone, square-wave tone, complex tone), 2 levels of intensity (10 db, 30 db), and 3 frequencies (100 Hz, 350 Hz, 700 Hz). For music majors wave form was the major factor, pure tones being most preferred, but intensity and the interaction between intensity and wave form were also significant. Nonmusic majors preferred the softer of 2 levels, and the main effect for wave form was significant, as were interactions of wave form with intensity and frequency with intensity.—D. S. Higbee.

4347. Latorre, Ronald. (McGill U, Montreal, Quebec, Canada) **The directional effect of intensity change on**

**estimative differences in loudness.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 93-98.—Tested the hypothesis that there would be a greater perceived difference in intensity of 2 tones presented in an increasing order of intensity than the same tones presented in a decreasing order. In Exp I 41 undergraduates indicated which of a 2-tone set, in successive 3-tone trials, contained the greater intensity difference. In Exp II 18 Ss numerically estimated the intensity difference of 2 tones presented in both orders of intensity change. Results of both experiments support the hypothesis and are discussed in reference to orientation-response research.—*Journal abstract*.

4348. Lidén, G. et al. (U Göteborg, Sweden) **The stapedius reflex and motor reaction time: A parallel investigation of the effects of drugs.** *Scandinavian Audiology*, 1974, Vol 3(2), 73-80.—Studied the effect of pentymal, diazepam, and placebo on motor reaction time (RT), threshold latency, and rise time of the stapedius reflex in 18 normal hearing 18-31 yr old Ss. The effects of the soporific and tranquilizer were compared with the normal values for RT, threshold, latency, and rise time based on 2,160 measurements. In all of 10 different conditions pentymal caused significantly longer RTs, and in 9 of 10 conditions diazepam gave a similar effect. Placebo resulted in prolonged RT in 5 of 10 conditions. No significant effect could be demonstrated on the stapedius reflex. In Part 2 of the investigation the group difference between the measurements before and after drug ingestion was examined at every test session. Statistical tests revealed that in only 5 of 10 different conditions did pentymal give significant, prolonged RT. Diazepam gave corresponding results in only 4 of 10 conditions and placebo did not change RT. The stapedius reflex was not influenced. It is concluded that both pentymal and diazepam impair motor performance in some individuals and that the effect is variable and not obviously predictable. The stapedius reflex measure, however, appears insufficiently sensitive to evaluate the effects of these drugs in humans.—*Journal abstract*.

4349. Raslear, Thomas G. (Brown U, Hunter Lab of Psychology) **The use of the cochlear microphonic response as an indicant of auditory sensitivity: Review and evaluation.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 791-803.—The validity of the use of the cochlear microphonic (CM) isopotential function as an index of auditory sensitivity was assessed by (a) examining the characteristics of CM recordings to determine if there were any sources of bias inherent in the technique that might influence its representation of sensitivity, (b) qualitatively comparing the shapes of CM and behavioral "audiograms" of 16 animal species obtained in previous studies, and (c) making a quantitative estimate and statistical evaluation of the correspondence between the 16 pairs of audiograms. Potential high frequency bias was found in the CM recording technique, which would be expected to reduce the correspondence between CM isopotential functions and behavioral audiograms. Examination of the 16 pairs of audiograms showed that on the average, the use of a linear rule to predict behavioral audiograms from CM isopotential functions could account for more than 40% of the variance in the behavioral data. The lack of a well-defined region of



maximum sensitivity in the CM audiograms was the most consistent shape discrepancy between the 2 data sets. Moreover, the CM audiogram was only an indicator of relative, not absolute, sensitivity. Several possibilities for improving the correspondence between behavioral and CM audiograms are suggested. (58 ref)—*Journal abstract*.

4350. Richards, Alan M. & Dunn, Jan. (Herbert H. Lehman Coll, City U New York) **Threshold measurement procedures in brief-tone audiometry.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 446-454.—2 methods for determining brief-tone audiometric thresholds were investigated to assess the test-retest reliability and variability of each method. Results indicate that both methods (Bekesy-type tracking with either 1 or 2 db/sec attenuation rates or the method of adjustment) yielded equivalent thresholds, variability, and reliability data. However, practical considerations dictated that the 2 db/sec rate was best suited for future clinical application. Individual temporal integration functions for 20 normal-hearing college students are presented and discussed in relation to their variability and to functions produced by hearing-impaired listeners. (21 ref)—*Journal abstract*.

4351. Rindner, Richard J. (State University Coll New York, New Paltz) **Mechanism of input selection in selective perceptual processing of the accepted message in a dichotic auditory presentation.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 805-807.—Conducted an experiment on selective auditory perception in which 62 naive undergraduates had to shadow either a familiar or an unfamiliar passage presented dichotically and tap to tones randomly embedded within that passage. The group shadowing the familiar passage performed better on both tasks than the group shadowing the unfamiliar passage. Evidence is presented for interpreting these results as due to a perceptual deficit. A time-sharing schema is presented for explaining the results.—*Journal abstract*.

4352. Sharf, Donald J. & Beiter, Robert C. (U Michigan) **Identification of consonants from formant transitions presented forward and backward.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 110-118.—From results of a study of the effect of coarticulation on perception it is concluded that vowel-consonant (VC) transitions were more sufficient cues than CV transitions and that listeners derived more information from transitions when they were preconsontantal than when they were postconsontantal.

4353. Sonn, Martin & Rizy, Edward F. **The effect of display format on sonar detection and localization.** *Human Factors*, 1974(Aug), Vol 16(4), 368-372.—Operator detection-and-localization (DAL) performance was compared for nonrefreshed B-scan and Plan-Position Indicator (PPI) sonar displays under multiple successive transmission conditions. 4 male technicians with good vision were tested in the Raytheon Sonar Control Room Simulation Facility under low red ambient illumination. Simulated sonar targets masked in flat Gaussian noise were presented at various ranges, bearings, and signal-to-noise ratios. Ss were required to detect and localize the targets and to rate their confidence in the DAL. Performance using the B-scan was consistently 2-3 db

better than performance with the PPI. Detectability for both displays increased by about 3 db from the 1st to the 6th "ping."—*Journal abstract*.

4354. Treisman, Anne; Squire, Rosemary & Green, Joanne. (Oxford U, England) **Semantic processing in dichotic listening? A replication.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 641-646.—Explored semantic processing of 1 message while another was attended to and shadowed by 12 Ss in a clarification and replication of J. L. Lewis's (1970) findings. As in Lewis's study, it was found that mean shadowing latency was increased when a synonym of the shadowed word coincided with it on the unattended channel. However, this occurred only with synonyms in an early list position and appeared to affect only a small proportion of trials. The implications of this and other recent findings for theories of selective listening are discussed.—*Journal abstract*.

### Visual Perception

4355. Aiken, Leona S.; Fenker, Richard M. & Evans, Selby H. (Temple U) **Class structure in the biasing of perceived pattern similarity.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 489-501.—Current judgment models underlying multidimensional scaling assume that perceived interstimulus proximity is determined solely by intradimensional differences between stimuli, independent of context effects. Class structure represents a context effect, with class centroids constituting multidimensional anchors within a configuration. The dependence of proximity judgments on class structure was examined in 3 experiments to test the appropriateness of the multidimensional scaling (MDS) judgment model for configurations containing element clusters. A total of 76 undergraduates served as Ss. Stimuli were multidimensional patterns generated to form 2 classes. Feature usage in judgments of intraclass similarity differed markedly from that in interclass similarity judgments. Moreover, the perceived similarities of 90 between-class pairs were in part determined by the distances of the pair members from class centroids, as well as by intradimensional differences. The partial context dependence of subjective proximity estimates suggests a source of incompleteness of the current MDS judgment model as applied to class structured events. (24 ref)—*Journal abstract*.

4356. Attneave, Fred. (U Oregon) **Apparent movement and the what-where connection.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 108-120.—Suggests that the systems for object identification and spatial localization must be closely interconnected, although possibly using different brain areas. Object identity is related to apparent movement when 1 shape changes into another. It is important to know when the apparent movement occurs. A conceptual schema is presented which proposes that "what-structure" is elaborated and strengthened as stimulus duration is increased. Apparent movement of several objects at once poses extraordinary theoretical problems. Apparent movement calls into operation one aspect of the brain's ability to keep track of where things are.—*R. D. Nance*.

4357. Brown, D. R.; Schmidt, M. J.; Cosgrove, M. P. & Zuber, J. J. (Purdue U) **Stabilized images: Further**

evidence for central pattern processing. *Psychonomic Science*, 1972(Oct), Vol 29(2), 106-108.—Combined selective adaptation conditions with stabilized retinal images in a test of the hypothesis that whole pattern fading of images reflects the operation of suprarretinal pattern processing units. Ss were 1 24-yr-old and 1 25-yr-old male. Pattern preadaptation was shown to enhance or suppress complete image fading when compared to light adaptation. The effects were demonstrated both when a single eye was adapted and tested and when one eye was adapted and the other was tested. This was taken as strong support for the notion that whole fades reflect pattern processing beyond the retina.—*Journal abstract*.

4358. Erlebacher, Albert & Sekuler, Robert. (Northwestern U) **Perceived length depends on exposure duration: Straight lines and Müller-Lyer stimuli.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 724-728.—In 2 experiments with a total of 53 undergraduates, brief exposure reduced the apparent length of a straight line. Thereafter, apparent length increased linearly with log exposure duration. The perceived length of 2 parts of the Müller-Lyer illusion was also measured. The apparent length of the tails-inward Müller-Lyer figure increased with duration; the apparent length of the tails-outward figure was unaffected by duration. This is further evidence that the Müller-Lyer illusion consists of 2 functionally different component illusions.—*Journal abstract*.

4359. Finlay, David. (U Newcastle, NSW, Australia) **Spatio-temporal interaction and brightness judgments.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 99-102.—Used the method of magnitude estimation with 4 paid, normally seeing Ss to determine the brightness of areas presented adjacent to a doubly stimulated overlap region. 2 variables were examined, the stimulus-onset-asynchrony (SOA) between the 2 stimuli forming the doubly stimulated region, and the luminance of these stimuli. Where a decrease in luminance summation was expected in this overlap region the adjacent flank increased in brightness with increasing SOA.—*Journal abstract*.

4360. Gill, Kathleen M. & McKeever, Walter F. (Bowling Green State U) **Word length and exposure time effects on the recognition of bilaterally presented words.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 173-175.—Word length (2, 3, 4, and 5 letters) and exposure time (25, 50, and 100 msec) effects on visual half-field recognition performances were studied in a bilateral word presentation paradigm with 144 right-handed undergraduates. Significant right-field recognition superiority (RFRS) obtained for all length-exposure time conditions except that for 2-letter words exposed for 100 msec. RFRS was significantly greater for each of the 100 msec word lengths than for the 2 shorter lengths and 2 longer word exposures than for the 50- or 100-msec exposures. The magnitude of RFRS was substantially correlated with a "perceptual difficulty" measure (the ratio of the number of milliseconds available for viewing to the number of letters to be viewed). Results are compatible with a hemispheric asymmetry hypothesis and a differential half-fields masking susceptibility mechanism.—*Journal abstract*.

4361. Griggs, Richard. (U Florida) **Constancy scaling theory and the Mueller-Lyer illusion: More disconfirming evidence.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 168-170.—Length and width judgments were made for modified Müller-Lyer figures (the center shaft of each of the 2 figures was replaced by a rectangle) by 40 undergraduates. The rectangle with outgoing fins was judged longer and wider than a control rectangle of equal size with no fins, but longer and narrower than the rectangle with ingoing fins. The rectangle with ingoing fins was judged shorter and wider than the control rectangle. Results did not support R. L. Gregory's inappropriate constancy scaling explanation of the Müller-Lyer illusion. (19 ref)—*Journal abstract*.

4362. Gummerman, Kent; Hill, George A. & Chastain, Garvin. (U Texas, Austin) **The unimportance of figural characteristics of visual noise masks.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 820-822.—It has been proposed that the ability of a visual noise mask to stop processing of a target stimulus under backward-masking conditions be gauged by its ability to obscure the target when both stimuli are viewed simultaneously. To assess the usefulness of this proposal, 3 noise masks which varied greatly in effectiveness under conditions of simultaneity were also used as backward masks with 30 female undergraduate Ss. The resulting backward-masking functions were identical for all masks, indicating that the suggestion was not practical for the conditions of this experiment. The findings are interpreted as favoring a process-stopping theory of masking over an integration theory.—*Journal abstract*.

4363. Harcum, E. Rae & Shaw, Mary R. (Coll of William & Mary) **Cognitive and sensory lateral masking of tachistoscopic patterns.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 663-667.—Investigated detrimental perceptual effects of adding extraneous stimuli to a tachistoscopic pattern. In 2 experiments with a total of 40 adult students with normal vision, a general inhibitory effect on reproduction accuracy was found, along with a local effect on elements spatially close to the extraneous stimuli. This lateral masking was reduced by addition of stimuli that aided in differentiation of target from extrinsic stimuli. Simple reference lines were more effective in this than black rectangles that covered a larger retinal area. Therefore, cognitive masking due to confusion of relevant and extraneous stimuli was more effective than sensory masking by a larger stimulus. The former is attributed to interference in reading out iconic information and the latter to degradation of the icon.—*Journal abstract*.

4364. Hershberger, Wayne A. & Starzec, James J. (Northern Illinois U) **Motion-parallax cues in one-dimensional polar and parallel projections: Differential velocity and acceleration/displacement change.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 717-723.—24 undergraduate Ss viewed what appeared to be a rigid dotted line rotating in depth about its center and judged the direction of apparent rotation. Differential retinal velocities for corresponding dots on opposite ends of the line were effected by hinging the dotted line at its center and rotating the 2 ends (near and far) through different-sized sectors. 3 matched pairs of motion projections, 1 polar and 1 parallel, were generat-



ed, in which the projected (retinal) velocity of dots on the near end of the line was either less than, equal to, or greater than that of corresponding far dots. This differential velocity proved to be an equally effective mimic of motion parallax (and mediator of perceived orientation in depth) when presented in the context of either type of projection. Further, the polar projection alone incorporated an additional cue to orientation in depth mediating veridical perception of rotation direction.—*Journal abstract.*

4365. Holzworth, R. James & Doherty, Michael E. (Bowling Green State U) **Visual masking by light offset: An experiment in reply to Hogben and DiLollo.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 815-816.—In an experiment with 6 normally seeing undergraduates, a lighted background field was shut off (MS) at varying intervals either before, during, or after presentation of a grapheme (TS). A forced-choice procedure was used. A performance decrement was observed when MS occurred at TS onset, as well as during and immediately after TS. J. Hogben and V. DiLollo's (see PA, Vol 49:8292) contention that light onset is responsible for masking in this paradigm is discussed.—*Journal abstract.*

4366. Kennedy, John M. (Harvard U) **Perceived lines are not always the sums of their contours.** *Journal of Structural Learning*, 1972, Vol 3(4), 7-10.—Describes a line as a thin deposit of pigment which has 2 boundaries called contours. The 2 contours may have different shapes, and an object depicted by the shape of the line may not be depicted by either contour alone. Perceivers may detect the structure of the line figure without recognizing structures formed by the contours that border and make up the line figure. An illustration is provided by glove and mitten figures, examples of a type of figure which emphasizes the contrast between line structure and contour structure.—*R. S. Albin.*

4367. Kinney, Jo Ann S. & McKay, Christine L. **The visual evoked cortical potential as a measure of stress in naval environments: III. The response to pattern and color.** *US Naval Submarine Medical Research Laboratory Report*, 1974(Mar), No 778, 19 p.—Previous research has shown that it is possible to isolate a response to pattern from the visual evoked cortical potential. This study investigated the optimum conditions for yielding a pattern response and then applied the pattern response to a test of color vision in a total of 24 color-normal, 8 protanope, 1 tritanope, and 8 deutanope Ss. Results show that Ss with normal color vision gave a response to pattern when the pattern was formed of either hue or luminance differences. Color defective Ss responded only to luminance differences and not to hue differences that they could not discriminate. The technique thus can be used as an objective measure of color vision. (22 ref)—*Journal abstract.*

4368. Kinney, Jo Ann S. & Miller, James W. **Judgments of the visibility of colors made from an underwater habitat.** *US Naval Submarine Medical Research Laboratory Report*, 1974(Mar), No 777, 12 p.—Aquanauts made judgments of the relative visibility of colors during the "La Chalupa" dive from the habitat located in 100 ft of Caribbean water. Judgments made with colored targets viewed against the water back-

ground were in agreement with previous studies: bright colors were the easiest to see and dark colors disappeared the most readily. However, when the colors were viewed against a light gray background, dark colors were the most visible. It appears that negative contrast under water is superior to positive contrast of the same amount. Small diurnal changes were found, with green increasing in visibility and orange decreasing as the day wore on.—*Journal abstract.*

4369. Klatzky, Roberta L. & Stoy, Ann M. (U California, Santa Barbara) **Using visual codes for comparisons of pictures.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 727-736.—In 2 experiments, a total of 16 university students indicated for a series of trials whether or not 2 pictures of common objects had the same name. The pictures were separated by 1 of 3 interstimulus intervals (ISIs), and reaction time (RT) was recorded. In Exp I positive trials involved pictures that were identical, mirror images, or physically different but had the same name. The stimuli came from either an S set, in which name-match pairs were physically similar, or a D set, in which name-match pairs were physically dissimilar. The mean RTs for mirror and identity matches were virtually the same but faster than name-match RTs, an advantage that decreased with increasing ISI. It was expected that name-match RT for the S set would be less than for the D set, indicating a facilitative effect of physical similarity; however, the identity-match RTs showed the expected difference. Results were extended in Exp II, which involved only the identity and name matches, in pure sessions (which included positive trials of just 1 type) or mixed sessions (which included both types of positive trials). For mixed sessions, name- as well as identity-match RTs differed between the S and D sets. (32 ref)—*Journal abstract.*

4370. Lichtenstein, Jacob H. & Saucer, Rayford T. (NASA Langley Research Ctr, Hampton, VA) **Visual dependency in the erect and supine positions.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 529-531.—Examined the field dependency-independency of 37 Ss under supine and erect body position. Females were more field dependent than males. No significant differences were found between male pilots and nonpilots. Males exhibited greater field dependency in the supine position. Results suggest the need to consider 3 separate measures of field dependency—slope, breakpoint, and variability.

4371. Matheny, Adam P. (U Louisville, Health Sciences Ctr, Child Development Unit) **Cognitive factors associated with the Ponzo illusion: A study using the co-twin method.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 91-93.—13 male and 21 female pairs of 9-11 yr old monozygotic twins who were discordant on the magnitude of their susceptibility to the Ponzo illusion were studied for differences on WISC subtests. The purpose was to test R. H. Pollack's 1969 hypothesis that children more susceptible to the illusion would perform better on tasks involving numerical sequencing and analogical reasoning. The hypothesis was confirmed for females in that the female twins who had higher magnitudes of the illusion had significantly higher scores on WISC Digit Span and Similarities subtests than did their co-twins.

Male twins showed no differences. (15 ref)—*Journal abstract*.

4372. McIntyre, Curtis W. & Pick, Herbert L. (U Virginia) **Transfer of adaptation to rotation of the visual field.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 782-791.—Conducted 5 experiments on the adaptation to rotation of the visual field of a total of 352 undergraduate Ss. All were similar in that they restricted movement during exposure to the visual rotation to one direction and subsequently tested for adaptation with movements in other directions. Positive transfer of adaptation to the new directions was found in all experiments. The amount of adaptation varied in a curvilinear pattern as a function of the difference between the exposure direction and the new directions. Moreover, this curvilinear pattern reflected the predominant contribution of a motor or proprioceptive component to visual-motor adaptation. The implications of these results for integrated perceptual-motor coordination systems are discussed.—*Journal abstract*.

4373. Milner, Peter M. (McGill U, Montreal, Quebec, Canada) **A model for visual shape recognition.** *Psychological Review*, 1974(Nov), Vol 81(6), 521-535.—Suggests that many examples of stimulus equivalence may be explained by angle and length-ratio feature detectors whose outputs are generalized over the visual field. Problems of interference between a number of figures simultaneously present, and of localizing the figure that is being recognized, require a mechanism of selective attention. This could involve the temporal segregation of signals from different figures as they pass through the recognition circuits. The figure to which attention is directed feeds a signal back to an earlier stage to enhance the corresponding input before the generalization process deprives it of its spatial information. (22 ref)—*Journal abstract*.

4374. Newman, Colin V. (U Birmingham, England) **Detection of differences between visual textures with varying number of dots.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 201-202.—Tested 64 undergraduates with normal vision on a judgmental task involving discrimination between textures with variable numbers of elements. Results show that the threshold for detecting percentage differences in numbers of dots in adjacent patterns decreased monotonically with the total number of dots in the standard. Implications of this finding for the perceptual processing of textures are discussed.—*Journal abstract*.

4375. Peterson, M. J. & Graham, S. E. (Indiana U) **Visual detection and visual imagery.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 509-514.—Suggests that if visual perception and visual imagery involve similar mechanisms, then instructing Ss to imagine scenes compatible with a visual signal should facilitate detection of the signal, while instructing Ss to imagine scenes incompatible with the visual signal should hinder detection of the signal. S. J. Segal's (1971) assimilative theory of imagery predicts superior detection when the image and the external target signal differ; hence, this theory expects more accurate detection of the signal when the images are incompatible than when they are compatible with the signal. 60 undergraduate Ss performed a visual detection task under compatibly cued,

incompatibly cued, and noncued conditions. The imagery group was instructed to imagine the referents of the verbal cues, while the control group simply listened to the cues. The imagery group showed facilitation with compatible cuing and interference with incompatible cuing. The control group also showed facilitation under compatible cuing, but incompatible cuing had no effect.—*Journal abstract*.

4376. Robinson, J. O. (U Coll Cardiff, Wales) **The psychology of visual illusion.** London, England: Hutchinson University Library, 1972. 288 p. \$9.

4377. Roufs, J. A. (Inst voor Perceptie Onderzoek, Eindhoven, Netherlands) **Dynamic properties of vision: VI. Stochastic threshold fluctuations and their effect on flash-to-flicker sensitivity ratio.** *Vision Research*, 1974(Sep), Vol 14(9), 871-888.—Analyzes measurements of psychometric functions at thresholds of single flashes, flash trains, and gated sinusoids obtained from 3 Ss. The stimuli are foveal and have a diameter of 1° and a dark surround. In single flashes the deviation of the probability density function divided by the 50% threshold increment is constant over a background intensity of 5 decades and a flash duration of 3 decades. In flash trains with large flash intervals, the 50% threshold drops as a function of the number of flashes per train due to increase in the chance of detection. Gated sinusoids show the same course as a function of the number of peaks. On the basis of a deterministic model used in preceding parts of this study, the invariance of the Crozier quotient can be resolved into 1 simple stochastic system property. Incorporation into an existing psychophysical model leads to a simple and comprehensive formula for the spread in the 50% thresholds. The threshold course with flash trains and gated sinusoids can be forecast from the stochastic parameters of single flashes. An estimate of the effect on the ratio of flash to flicker sensitivity based on the actual data is in agreement with earlier experimental data. (French, German, & Russian summaries) (25 ref)—*Journal abstract*.

4378. Saenz, Norman E. & Riche, Charles V. (Georgia Inst of Technology) **Shape and color as dimensions of visual redundant code.** *Human Factors*, 1974(Jun), Vol 16(3), 308-313.—Examined the hypothesis that redundant coding is effective in facilitating the locating of a target among other objects. All possible combinations of 4 shapes and 4 colors were used as targets for 24 male undergraduate volunteer Ss. The times to locate 6 each of the targets among 36 background objects for 16 displays in each of 3 coding conditions were determined. The targets could be differentiated from the background objects on the basis of color only, shape only, and redundant color-shape. Results indicate a difference among the coding conditions, the colors, and the shapes, and in the Code  $\times$  Shape and Code  $\times$  Color interactions. An important finding is that the redundant code and the color code conditions did not differ. (15 ref)—*Journal abstract*.

4379. Sivik, Lars. **Color meaning and perceptual color dimensions: A study of exterior colors.** *Göteborg Psychological Reports*, 1974, Vol 4(11), 41 p.—Evaluated 67 different colors, individually considered and photographically simulated as if they were applied to each of 2



different types of buildings. Relationships are presented both in the form of linear correlations and also as isosemantic mapping of the color space. Results obtained were compared, first, as between the 2 types of buildings and second, as between the ratings of exterior colors and ratings of isolated colors. Variables were grouped by means of factor analyses and were further investigated with respect to their results in the color space and the extent to which they varied in different contexts or modes of appearance. A theory is suggested concerning ways in which the connotative patterns derived from the condition of isolated color differ from those derived from other modes of color appearance.—*Journal abstract.*

4380. Stewart, Alan L. & Purcell, Dean G. (New York U, Deafness Research & Training Ctr) **Visual backward masking by a flash of light: A study of U-shaped detection functions.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 553-566.—Obtained U-shaped backward masking functions, using a homogeneously illuminated field as the masking stimulus. 5 highly trained Ss were given feedback immediately after each stimulus presentation. Each S gave U-shaped masking functions, and performance decrements at intermediate values of temporal separation represented a decrease in sensitivity for some Ss. Both recognition and detection tasks resulted in a family of masking functions. When mask luminance was low relative to target luminance, the functions were U-shaped. As masking luminance increased, the functions became monotonic. Under forward masking, when target and mask energy were equal, S performance was high, although performance decreased monotonically as the onset of the target approached the onset of the mask. Performance then decreased more rapidly until the backward masking U minimum was reached. The result was an asymmetrical masking function about zero stimulus onset asynchrony, with backward masking proving more extensive than forward masking. (24 ref)—*Journal abstract.*

4381. Teichner, Warren H. (New Mexico State U) **The detection of a simple visual signal as a function of time of watch.** *Human Factors*, 1974(Aug), Vol 16(4), 339-353.—Analyses of 37 studies of vigilance showed that the percentage of detection using simple signals depended primarily on the initial or pretest detection level, the nature of the signal (i.e., whether it was a dynamic signal or static), and the duration of the watch. Using the data of these studies, a watchkeeping decremental function was developed. It is shown that the function can be used to estimate a tradeoff between time of watch and the initial percentage of detection. The loss of detection associated with static signals was relatively small. It is suggested that it is this small loss which represents a vigilance process. The greater decrements associated with dynamic stimuli are assumed to be due to an additional ocular demand. (46 ref)—*Journal abstract.*

4382. Uttal, William R. (U Michigan) **A minor perturbing effect of retinal locus on dot pattern recognition: Rejection of a possible artifact.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 100-102.—Conducted an empirical test of the influence of retinal locus in a dot-masking experiment with 7 undergraduates with normal or corrected vision. Results show that the retinal locus

had a minor perturbing effect about one-tenth of the magnitude of the organizational effects under the worst conditions.—*Journal abstract.*

4383. Welch, Robert B.; Choe, Chong Sook & Heinrich, Daniel R. (U Kansas) **Evidence for a three-component model of prism adaptation.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 700-705.—104 Ss were measured on 42 personality traits and adapted in 2 separate sessions to 11.3° prismatic displacement of the visual field. The prism-adaptive measures were negative aftereffect, proprioceptive shift, and visual shift. None of the personality traits correlated highly with prism adaptability. Furthermore, contrary to the 2-component model of prism adaptation, negative aftereffect exceeded and was not highly correlated with the algebraic sum of the proprioceptive and visual shifts. A secondary finding was that situational cues induced a small adaptive shift (for negative aftereffect and visual shift) in the 2nd session, prior to actual exposure to the prism. It is concluded that prism exposure of the type provided in the present experiment induces a 3rd component that adds to the proprioceptive and visual changes to produce the negative aftereffect. This "new" component is hypothesized to be an assimilated corrective response contingent on error correction during prism exposure. (27 ref)—*Journal abstract.*

4384. Wiener, Earl L. (U Miami) **An adaptive vigilance task with knowledge of results.** *Human Factors*, 1974(Aug), Vol 16(4), 333-338.—Groups of undergraduates performed a 48-min, computer-controlled, visual watch-keeping task. 2 groups of 14 Ss each were run under fixed, nonadaptive conditions, one with immediate knowledge of results (KR) and the other without (NKR). The KR group showed the usual superiority in detection rate over the NKR group and made fewer commissive errors (false alarms). 2 groups of 18 Ss each, also KR and NKR, ran under adaptive conditions wherein the size of the signals they watched for was adjusted during the vigil according to past performance, so as to maintain a preset detection rate. Resulting curves for the adaptive variable closely resemble the traditional performance measure, detection rate. Various adaptive strategies are discussed.—*Journal abstract.*

### Motor Processes & Performance

4385. Amelang, Manfred & Lasogga, Frank. (U Hamburg, Psychological Inst, W Germany) **[Does advance notice about the required reaction affect reaction times?]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 1-24.—Investigated the hypothesis that reaction time (RT) can be reduced by informational signals indicating the required reaction in disjunctive RT experiments. Simple RT and disjunctive RT experiments without information signals served as controls. Results from 11 student Ss were evaluated with analysis of variance. Results show that interstimulus intervals up to .64 sec between informational signal and signal to react did reduce RTs; longer interstimulus intervals had no further improving effect. Disjunctive RTs never reached simple RT values regardless of the length of the interstimulus interval. (English & French summaries)—*W. J. Koppitz.*

4386. Corser, T. (St John's Coll, York, England) **Temporal discrepancies in the electromyographic study of rapid movement.** *Ergonomics*, 1974(May), Vol 17(3), 389-400.—The contention that proper temporal interpretation of rapid movement electromyograms (EMGs) is impossible without prior evaluation of the delays specific to the S and muscles involved was supported by applying such evaluations to explain anomalies in rapid elbow movement EMGs of 11 Ss. It is shown that apparent cocontraction of antagonist muscles may be an artifact explicable by these delay differences. (German summary)

4387. Paulus, Paul B.; Shannon, John C.; Wilson, Dexter L. & Boone, Thomas D. (U Texas, Arlington) **The effect of spectator presence on gymnastic performance in a field situation.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 88-90.—Examined the effect of spectator presence on gymnastic performance in 3 experiments with a total of 64 undergraduates in introductory and advanced gymnastic classes. It was found that spectator presence led to a significant decrement in quality of gymnastic performance when Ss were given a forewarning about the presence of the spectators but had no overall effect when Ss were not forewarned. This finding provides support for the anticipated evaluation modification of R. B. Zajonc's 1965 hypothesis of audience effects. The relationship between the initial level of skill of the Ss and the change in their performance during spectator presence suggests the need for additional modification of Zajonc's position.—*Journal abstract*.

## COGNITIVE PROCESSES AND MOTIVATION

4388. Bart, William M. & Smith, Michael B. (U Minnesota) **An interpretive framework of cognitive structures.** *Human Development*, 1974, Vol 17(3), 161-175.—Provides a precise formulation of both cognitive structure and its related theory, using the mathematical theory of categories. Weaknesses and imprecision in cognitive theory are identified. Using category theory, cognitive structure and related Piagetian theoretic terms are precisely defined and some interrelationships are discussed. Applications to intelligence, learning, and developmental sequence theory are provided. This logico-theoretical framework is an example of the logico-algebraic approach to developmental cognitive psychology, which is intended to produce theoretical integration of concepts and new directions for empirical studies in the cognitive developmental field. (27 ref)—*Journal abstract*.

4389. Bart, William M. (U Minnesota) **An algebraic representation of concepts.** *Journal of Structural Learning*, 1972, Vol 3(4), 27-35.—Attempts to represent algebraically the definition of a concept. This transformational approach is seen as providing an alternative framework for the study of concepts. From this approach, new questions may be asked about the structural properties of the irrelevant transformation sets. Heretofore, this had not been elucidated. It is suggested that these theories will contribute to the development of work on conceptual memory and will be a stimulus to the

determination of other algebraic laws of conception.—R. S. Albin.

4390. Batson, C. Daniel. (Princeton U) **Linguistic analysis and psychological explanations of the mental.** *Journal for the Theory of Social Behavior*, 1972(Apr), Vol 2(1), 37-59.—Discusses linguistic analysis of the way we speak of mental processes and the implications of such analyses for psychological explanations. The discipline of analytic philosophy is briefly described. The issue of consciousness is addressed, i.e., how do we know that other minds exist? The definitions of social traits usually employed are discussed. Motivation in relation to these concepts seems to gloss over important distinctions in the way behavior is explained in ordinary language. (24 ref)—R. S. Albin.

4391. Geller, E. Scott. (Virginia Polytechnic Inst & State U) **Prediction outcome of a response-irrelevant stimulus as a determinant of choice reaction time.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 546-552.—60 undergraduates predicted the alternatives of separable binary color and shape dimensions; following each 2-dimensional presentation Ss identified only the shape alternative by pulling a right-hand or left-hand trigger. The probability that S correctly predicted the response-irrelevant color alternative was controlled at .50 for 400 trials (20 Ss), was controlled at .50 for an initial 200 trials and then increased to .90 (20 Ss), or decreased to .10 (20 Ss) for 200 trials. Increasing Ss' success at correctly predicting colors diminished the effect of shape probability on choice reaction time (RT). The effects of prediction outcome on RT increased as a direct function of the probability of a correct color prediction. Results imply that Ss' expectancy for a response-relevant stimulus varied concomitantly with Ss' manipulated expectancy for a response-irrelevant stimulus. (20 ref)—*Journal abstract*.

4392. Geller, E. Scott. (Virginia Polytechnic Inst & State U) **Preceding prediction outcome and prediction outcome probability: Interacting determinants of choice reaction time.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 426-430.—In a 2-choice reaction time (RT) task in which 60 undergraduates made a stimulus prediction prior to each stimulus presentation the probability of a correct stimulus prediction was manipulated between Ss. As the probability of a correct prediction increased, RT to correctly predicted stimuli decreased, while RT to incorrectly predicted stimuli remained unchanged. A significant 2nd-order effect of prediction outcome on RT to correctly predicted stimuli was a decreasing function of the probability of a correct prediction. Results are interpreted within the framework of a continuous expectancy theory.—*Journal abstract*.

4393. Gerwin, Donald. (U Wisconsin, Milwaukee) **Information processing, data inferences, and scientific generalization.** *Behavioral Science*, 1974(Sep), Vol 19(5), 314-325.—Investigated the philosophical view that scientific hypotheses come out of data. 15 faculty members and graduate students were asked to find the function from which a plot of 10 coordinate values affected by random error was derived. Their protocols serve as the basis for an information-processing computer model of performance on the task. The model has a perceptual phase in which a pattern is found in the data, the



selection of a class of hypothesized functions, a problem solving phase to find a specific function, and the ability to recycle if necessary. Tests of the model revealed that it does a good job of getting the same answers as Ss and explained some, not most, of the process leading up to the answers. Due to the contrived nature of the task the model is most appropriate for understanding routine scientific inference. (18 ref)—*Journal abstract*.

4394. Graesser, Cheryl C. & Anderson, Norman H. (U California, San Diego) **Cognitive algebra of the equation: Gift size = generosity = income.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 692-699.—In 2 experiments, a total of 48 undergraduate Ss judged a stimulus person on 3 dimensions: Generosity, Gift Size, and Income. Judgments on each dimension were based on information about the remaining 2 dimensions presented in a  $4 \times 4$  design. The information about Generosity and Income combined multiplicatively to yield the judged Gift Size, as was hypothesized. Judgments of Generosity and Income, however, did not exhibit the proposed multiplying form. Instead, these judgments followed a predominately additive integration rule. This pattern of results agrees with a collateral report by N. H. Anderson and C. A. Butzin (1974). The 2 studies indicate (a) a simple multiplying rule is easier for Ss than a comparative or ratio rule and (b) even when the integrative task is complex, judgment follows some simple algebraic model.—*Journal abstract*.

4395. Hogarth, Robin M. (INSEAD, The European Inst of Business Administration, Fontainebleau, France) **Process tracing in clinical judgment.** *Behavioral Science*, 1974(Sep), Vol 19(5), 298-313.—Reconciles the process-trace and mathematical-model approaches to judgmental processes of human organisms by combining the methodological objectivity of the latter with the theoretical orientation of the former. A theoretical model is constructed as a function of situational demands and the limits of human information-processing abilities. Suitable to situations where a choice has to be made between several ordinally related alternatives, the model depicts the cognitive process as a multistage discrimination procedure. A methodology is developed to test the theoretical notions by depicting the cognitive process in the form of a decision tree with separate sets of rules applicable to the various nodes. The predictive test of cross-validation indicates that the better models developed here perform at a level similar to conventional statistical models of judgment. Results show promise for investigating those substantive issues which mathematical models have failed to illuminate. (24 ref)—*Journal abstract*.

4396. Hornby, Peter A. (State University Coll New York, Plattsburgh) **Surface structure and presupposition.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 530-538.—Measured frequency of perceptual errors as a function of differential presupposition in descriptive sentences. In Exp I, 64 undergraduates heard a cleft or pseudocleft sentence prior to tachistoscopic presentation of a picture in which the presupposed proposition or the focused proposition was misrepresented. The task was to decide if the sentence correctly described the picture. Results indicate that more errors occurred when the misrepresentation in-

volved the presupposition than when it involved the focused proposition. Exp II, with 30 Ss, was conducted to determine if the frequency of errors was a function of the type of surface structure employed to mark the presupposition. Results indicate that several different surface structure features of English, employed in combination, increased the presuppositional strength of the sentence. (24 ref)—*Journal abstract*.

4397. Kubicek, Lorraine F. & Erdelyi, Matthew H. (Rutgers State U, Douglass Coll) **Effects of priority instructions on processing hypercapacity sequential inputs of pictures and words.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 729-731.—Assessed the ability of 102 undergraduates to process selectively pictures or words presented in very rapid succession. Ss viewed a series of 36 verbal or pictorial slides for 225 msec each, with 775 msec between the items. Half of the Ss received priority instructions to attend selectively to animal items in the stimulus series. Another group, the nonpriority Ss, were merely told to attend to the series in general. Priority instructions enhanced recognition memory for both pictorial and verbal target items relative to nontarget items.—*Journal abstract*.

4398. Mueller, Edward; Kennedy, John M. & Tanimoto, Stephen. (Boston U) **Inherent perceptual motivation and the discovery of structure.** *Journal of Structural Learning*, 1972, Vol 3(4), 1-6.—Studied adults' observation of sequences of cards that began with random forms and terminated with recognizable letters or vice versa. Other Ss saw only the endpoints of such sequences. 2 hypotheses were tested: (a) That Ss will prefer to see a transformational sequence arriving at a recognizable structure than the reverse; (b) That Ss' preference judgments are based on endpoints rather than transformation. 8 undergraduates took part in each of 2 experiments in which both hypotheses were supported. It is concluded that the emergence of structure is the determinant of the preference for one kind of sequence.—*R. S. Albin*.

4399. Shanteau, James. (Kansas State U) **Component processes in risky decision making.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 680-691.—Conducted 2 experiments with 12 paid female undergraduates and 26 undergraduates receiving course credit, respectively. The Ss judged the subjective worth of bets defined entirely by verbal phrases such as "somewhat unlikely to win sandals." A theory of information integration predicts that the subjective values of probability and payoff should combine by multiplying. Procedures from functional measurement were applied to test the model and to scale the subjective values of verbal probabilities and payoffs. Data from both experiments support the model. The Ss also judged 2-part bets such as "highly probable to win watch" and "toss-up to win bicycle." The theory predicts that the worths of the 2 parts should combine by adding. In both experiments, however, the judged worth of 2-part bets was less than the sum of the worths of the parts. This subadditivity effect was also found in reanalyses of earlier studies on commodity bundles. This raises serious questions about the traditional additive utility approach to risky decision making. (23 ref)—*Journal abstract*.

4400. Wearing, Alexander J. (U Melbourne, Vic, Australia) **Task differences and word class effects in sentence processing.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 131-138.—Conducted an experiment with 52 undergraduate volunteers to resolve an apparent disagreement in the literature concerning the importance of the role of the verb in sentence processing. Previous results were confirmed in that the verb was found to be important in judgments of sentence meaning but less significant in sentence storage. However, form class differences in storage held only for high potency terms. (28 ref)—*Journal abstract*.

4401. Well, Arnold D. & Green, Joanne. (U Massachusetts, Amherst) **Effects of color differences in a letter matching task.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 109-110.—A total of 26 undergraduates judged whether pairs of letters were identical with respect to name (Exp I) or form (Exp II). Results replicate M. I. Posner and R. F. Mitchell's 1967 finding that physically identical letters could be matched more quickly than those only sharing the same name. When members of a letter pair differed in color, Ss showed a small but reliable tendency to respond more slowly when making "same" judgments, even when the letters only shared the same name. "Different" judgments were unaffected by color differences. To account for the effects of color variation, it seems necessary to consider both distraction and response competition factors.—*Journal abstract*.

#### Learning & Thinking & Conditioning

4402. Baird, Raymond. (Wright State U) **Congruence and negative information as determinants of answers to questions of entailment.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 545-550.—21 undergraduate volunteer Ss attempted to answer questions based on premise information which was congruent or noncongruent with the form of the question. 3 types of congruence were varied as well as whether the premise was based on positive or negative information. Attribute congruence facilitated answering questions, but thematic congruence did not. Subject nominal congruence interacted with positive-negative premise. Subject nominal congruence facilitated performance only following negative premise information.—*Journal abstract*.

4403. Biederman, Irving; Rabinowitz, Jan C.; Glass, Arnold L. & Stacy, E. Webb. (State U New York, Buffalo) **On the information extracted from a glance at a scene.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 597-600.—Presented jumbled and coherent scenes for 20-300 msec. Ss selected from a pair of labels the one they considered a better description. In Exp II, a cue designated one object. Jumbling reduced both the accuracy of identification of cued objects and of descriptor choice.

4404. Brown, Alan S. (Southern Methodist U) **Examination of hypothesis-sampling theory.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 773-790.—Recent work on human concept identification behavior has stressed the role of hypotheses in guiding Ss' responses. The present article deals with the empirical validity of the assumptions made by the various models of hypothesis behavior. 5 general classes of assumptions are

examined: basic (exclusion of hypothesis learning, hypothesis as the unit of behavior, and response generation); learning (all-or-none vs strength); transition (hypothesis switch after positive, negative, and no feedback); sampling of single hypotheses (assuming no memory, perfect memory, and partial memory); and sampling of groups of hypotheses (subset and dimensional sampling). Other methodological and interpretive problems in the literature are noted. (62 ref)—*Journal abstract*.

4405. Buchwald, Alexander M. & Meagher, Robert B. (Indiana U) **Immediate and delayed outcomes: Learning and the recall of responses.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 758-767.—In earlier Thorndikian experiments, Ss have performed better on Trial 2 when they were told whether Trial 1 responses were right or wrong on Trial 2 than when given this information immediately after each response on Trial 1. In the 1st experiment reported here, 96 undergraduate Ss given 23 learning trials failed to show a similar effect. It was hypothesized that this discrepancy was due to the difficulty that Ss with delayed information had in recalling responses made on trial  $n$  when they had recalled the response made on trial  $n-1$  but had been told on trial  $n$  that it was wrong. In Exps II and III an additional 196 Ss were asked to recall their previous responses after 2 trials with either immediate or delayed information. Results tend to support the hypothesis.—*Journal abstract*.

4406. Calef, Richard S.; Calef, Ruth A.; Bone, Ronald N. & Buttermore, Grant. (West Virginia Wesleyan Coll) **A human analogue of discrimination contrast: S-contrast as a function of magnitude of S+.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 118-119.—In a study with 24 undergraduates, 2 groups of Ss received differential reward conditioning for accurately tracing red or blue star patterns. A control group received only small reward in both discriminanda. Results replicate the findings of previous animal and human studies in that a significant negative discriminandum contrast effect was found. This effect increased as a function of the magnitude of reward in the positive discriminandum. The latter finding has been obtained previously with infrahuman Ss but evidently not with human Ss; hence, it is concluded that the generality of negative discriminative contrast effects has been extended significantly.—*Journal abstract*.

4407. Deffenbacher, Kenneth A.; Platt, Gary J. & Williams, Mark A. (U Nebraska, Omaha) **Differential recall as a function of socially induced arousal and retention interval.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 809-811.—32 male undergraduates were given a paired-associate list and then tested for recall either 2 or 45 min later. Arousal level at time of learning was manipulated by E observing some Ss. Precisely the same form of Arousal  $\times$  Retention Interval interaction found by R. Geen (see PA, Vol 51:10442) was obtained; observed Ss recalled fewer items at 2 min than did unobserved Ss, while this relationship was reversed at 45 min ( $p < .01$ ). However, Geen's self-report measures of socially induced arousal did not appear to be sensitive to possible differential amounts of arousal in these male Ss.—*Journal abstract*.



4408. Dempster, Frank N. & Rohwer, William D. (U California, Inst of Human Learning, Berkeley) **Component analysis of the elaborative encoding effect in paired-associate learning.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 400-408.—Conducted 3 experiments to investigate the effect of elaborative encoding instructions on 3 components of paired-associate performance: stimulus recognition, response learning, and associative learning. 96 6th graders were given noun-pair lists to learn using 1 of 2 kinds of elaboration instructions (interactive imagery or sentence) or using separate imagery, standard, or repetition instructions. Results show that the major effect of elaboration instructions occurred on the associative measures. Contrary to a previous report, however, stimulus recognition was also enhanced by elaboration instructions. The effect appears to be more compatible with an encoding interpretation than with one that emphasizes the role of associative cues at the time of recognition testing. Response learning as measured by equating response availability and by free response recall was little affected, and only by interactive imagery instructions. (19 ref)—*Journal abstract*.

4409. Detterman, Douglas K. & Brown, Jane. (Case Western Reserve U) **Order information in short-term memory.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 740-750.—A total of 280 undergraduates participated in 3 experiments concerned with ordinal recall. Ss recalled the serial position of an item by writing it in the appropriate space on a numbered answer sheet with no constraint on the order in which items were recalled. Exps I and II compared ordinal recall to free recall with both within- and between-Ss designs and with method of recall specified before and after list presentation. Results indicate that (a) retention of item information was unaffected by retention of order information as reflected by nearly equivalent item retention for both methods of recall, (b) not knowing which method of recall would be used before list presentation had little influence on retention of item information but had substantial effects on the shape of the serial position curve, and (c) order information was retained at high levels in both experiments. In Exp III, the effects of presentation rate, list length, and total time on ordinal recall were investigated. Increases in item retention were mainly attributable to longer total study times, while increases in order retention were solely a function of study time per item. (17 ref)—*Journal abstract*.

4410. Einhorn, Hillel J. (U Chicago, Graduate School of Business) **Expert judgment: Some necessary conditions and an example.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 562-571.—Studied characteristics of expertise in situations where judges deal with multidimensional information. Psychometric criteria were advocated as being indicative of expert judgment: (a) Experts should tend to cluster variables in the same way when identifying and organizing cues; (b) expert judgment should be highly reliable (intrajudge reliability), show both convergent and discriminant validity, and be relatively free of judgmental bias when measuring cues; and (c) experts should weight and combine information in similar ways. These criteria were applied to data obtained when 3 medical pathologists rated the

amount of histological signs in biopsy slides. Results show that these experts generally met the criteria, although they did not seem to weigh information similarly. (20 ref)—*Journal abstract*.

4411. Einstein, Gilles O.; Pellegrino, James W.; Mondani, Michele S. & Battig, William F. (U Colorado) **Free-recall performance as a function of overt rehearsal frequency.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 440-449.—Examined overt and silent rehearsal conditions under simultaneous and successive free-recall list presentation, using unrelated words on a varied-order multitrial list and on another list with 1 isolated item. Ss were 20 undergraduates in each of 5 conditions. Simultaneous presentation produced better recall and increased rehearsals which were more consistent both with input and recall output orders than under successive presentation, but neither showed substantial relationships of rehearsal to recall organization. Item rehearsal-recall correspondences were minimal on later trials, reflecting maximal rehearsal of newly recalled items. Isolated-item recall was markedly facilitated despite the fact that there was no increase in rehearsals, contrary to D. Rundus's 1971 findings. Thus, notable exceptions exist to any causal dependence of free-recall performance upon rehearsal activity. Possible explanations are discussed. (17 ref)—*Journal abstract*.

4412. Engel, G. R. (U Waterloo, Ontario, Canada) **On the functional relationship between word identification and letter probability.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 300-309.—Investigated whether words made up of probable letters and probable letter combinations are more accurately recognized than words made up of improbable letters and improbable letter combinations. The experimental method corrected shortcomings in previous research which has shown accuracy of word recognition to be affected only by word probability and not by letter probability. The shortcomings were the confounding of different letter probability dimensions within one another. In the present investigation with 40 19-43 yr old adults, 100 words were assessed with respect to the probabilities of their letters and, independently, the conditional probabilities of their letters. Subsequent tests of recognition accuracy in a brief presentation showed accuracy to be greatest for words made up of letters having either high simple probabilities or high conditional probabilities. It is concluded that word recognition is an active, perhaps serial, process which makes liberal use of individual letter statistics to facilitate accurate recognition. (French summary)—*Journal abstract*.

4413. Epstein, Michael L. (Rider Coll) **Sex differences in incidental learning and recall of related and unrelated word pairs.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 3-8.—Used a  $2 \times 2 \times 2 \times 2$  design to examine the effects of sex differences, grade, and processing levels in incidental learning and recall of paired associates. 72 college and 42 high school students processed 30 related and 30 unrelated word pairs by finding similarities or differences between paired items. Males showed better retention than females on a cued recall test, but only at the high school level. Recall of Ss at each grade level was significantly influenced by both pair relationship and processing task. Although recall

differences due to sex were thought to be caused by self-selection of Ss at the high school level, the Pair Relationship  $\times$  Processing Task interaction was explained within the framework of a "continuum" model of memory.—*Journal abstract.*

4414. Fritzen, James. (Virginia Polytechnic Inst & State U) **Partial repetition of digit strings with increased degree of learning.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 391-393.—Conducted 2 experiments, each using 72 undergraduates as Ss, in which the initial portions of digit strings were varied from trial to trial, while the remaining digits were constant. In both experiments, the individual strings were presented more than once to enhance the degree of learning. Delayed recall (Exp I) and the degree of learning (Exp II) favored a repetition effect. These results call into question the notion that the 1st few digits in each string are used to address the strings in memory.—*Journal abstract.*

4415. Gavurin, Edward L. & Murgatroyd, Dorothy. (Herbert H. Lehman Coll, City U New York) **Personality correlates of anagram problem solving.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 97-101.—Studied the relationship between personality and problem-solving by correlating anagram-solving performance with the 15 motivational traits measured by the Edwards Personal Preference Schedule (EPPS). Ss were 246 college students. Results reveal a clear-cut pattern of relationships in which significant positive correlations were obtained between the EPPS socially oriented needs of Affiliation, Succorance, Nurturance, and Heterosexuality, while significant negative correlations were obtained for Deference, Intraception, and Endurance. The findings suggest that anagram-solving is more sensitive to the socially oriented rather than the nonsocial needs of the solver and that Endurance shows promise as a measure of problem-solving rigidity.—*Journal abstract.*

4416. Greene, William A. & Wirth, Harry G. (Eastern Washington State Coll) **Operant conditioning of the skin resistance response with different intensities of light flashes.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 177-179.—Conducted an experiment with 72 undergraduates which used a dim flash of white light as the reinforcing stimulus. Results confirm earlier reports using similar procedures from another laboratory, show no differential effect of the illuminance of a reinforcing light, and contrast sharply with a study which failed to replicate previous studies using light flashes as the reinforcer. Assessment by postsession questionnaire yielded little evidence for awareness of the contingency relationship.—*Journal abstract.*

4417. Greeno, James G. (U Michigan) **Representation of learning as discrete transition in a finite state space.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Describes the application of finite Markov chains to the psychology of learning, and develops mathematical models using discrete-state systems to analyze theories of memorizing and conditioning. Experimental results and measurements are used to infer the kind of psychological process involved in each stage of learning; the process is analyzed into components operating on different levels,

and relationships between the components are clarified. (4 p ref)

4418. Grice, G. Robert; Hunt, Reed L.; Kushner, Bruce A. & Morrow, Charles. (U New Mexico) **Stimulus intensity, catch trial effects, and the speed-accuracy tradeoff in reaction time: A variable criterion theory interpretation.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 758-770.—5 paid, young adult Ss responded to a 1,000-Hz tone of 50, 80, or 100 db. Catch trial conditions were none, blank trials, a red light, a noise, and an 1,800-Hz tone. Auditory catch signals were of the same intensities. RT distributions in the 1st 3 conditions are well described by a family of exponential growth functions dependent upon stimulus intensity and by the parameters of normal criterion distributions dependent upon catch trial conditions and between-session variability. Performance in the auditory catch trial conditions was not dependent upon the same set of sensory growth functions. Performance in these conditions is described by a 2-dimensional analysis of information transmitted as a function of time and interpreted in terms of variable criterion theory. The speed-accuracy tradeoff in this situation appears to depend upon differential rates of growth of intensity and associative information and the criterion used in responding to this information. (15 ref) —*Journal abstract.*

4419. Grings, William W.; Carey, Cheryl A. & Schell, Anne M. (U Southern California) **Comparison of two methods for producing response inhibition in electrodermal conditioning.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 658-662.—Employed 24 paid graduate and undergraduate students to make a within-S comparison of 2 related procedures for negatively correlating a signal, or conditioned stimulus (CS), with a shock unconditioned stimulus (UCS) in differential conditioning of electrodermal responses (EDRs). One operation presented a nonreinforced stimulus (CS-) during reinforced trials for a 2nd stimulus (CS+). The other reinforced a stimulus (CS+) whenever it occurred alone but never reinforced a compound composed of that stimulus and a 2nd (inhibitory) stimulus (CSA). The conclusion that the CS- and CSA developed inhibitory properties was based on 3 classes of results: (a) during acquisition, there was clear differential responding to stimuli positively and negatively associated with the UCS; (b) on transfer trials, smaller responses were given to compounds of excitatory and inhibitory stimuli than to the excitatory stimuli alone; and (c) subjective judgments of expectation of shock paralleled the EDRs.—*Journal abstract.*

4420. Hall, Geoffrey. (U Sussex, Lab of Experimental Psychology, Brighton, England) **Transfer effects produced by overtraining in the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 938-944.—In each of 2 experiments, 2 groups of 12 male hooded rats were trained on an orientation discrimination in the jumping stand, one group (CT) being trained to criterion and the other being given 150 trials of overtraining (OT). In Exp I the 2 groups did not differ when shifted to a black-white discrimination, but the OT group was superior in learning the reversal of the black-white problem. This result suggests that the beneficial transfer resulting from overtraining does not derive from an



increased tendency for the OT Ss to attend to the overtrained dimension. Exp II tested the hypothesis that overtraining produces positive transfer by reducing the Ss' tendency to take up position habits. The OT and CT groups were presented with a choice between oblique stimuli with neither alternative being rewarded. Both groups took up position habits, the OT slightly more rapidly than the CT, and thus the hypothesis was not confirmed. (15 ref)—*Journal abstract*.

4421. Haviland, Susan E. & Clark, Herbert H. (U California, Irvine) **What's new? Acquiring new information as a process in comprehension.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 512-521.—Linguistically, sentences contain both Given information (what the listener is expected to know already) and New information (what the listener is not expected to know already). According to a proposed Given-New Strategy, the listener, in comprehending a sentence, first searches memory for antecedent information that matches the sentence's Given information; he then revises memory by attaching the New information to that antecedent. To provide evidence for this strategy, a total of 53 university students were presented pairs of sentences, where the 1st (the context sentence) provided a context for the 2nd (the target sentence). Ss were required to press a button when they felt they understood the target sentences. Exp I showed that a target sentence with a definite noun phrase presupposing existence took less time to comprehend when its Given information had a and Exp III antecedent in the context sentence than when it did not. Exp II ruled out a repetition explanation for Exp I, and Exp III demonstrated the same phenomenon for target sentences containing the adverbs *istill*, *again*, *too*, and *either*. (18 ref)—*Journal abstract*.

4422. Hellige, Joseph B. & Grant, David A. (U Wisconsin, Madison) **Response rate and development of response topography in eyelid conditioning under different conditions of reinforcement.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 574-582.—In 2 experiments, a total of 92 undergraduates were classified as voluntary (V) and conditioned (C) responders based on their predominant eyelid response topography. Response rate and development of an unconditioned stimulus (UCS) attenuating eyelid response topography were then examined during continuous classical reinforcement, instrumental avoidance reinforcement, and yoked intermittent classical reinforcement. In general, the Vs showed a better UCS-attenuating response topography than the Cs. The Vs developed the UCS-attenuating response topography over trial blocks during classical conditioning with both continuous and intermittent airpuff reinforcement, but not during instrumental avoidance conditioning. While the instrumental avoidance Cs gave more responses than their yoked counterparts who received intermittent classical reinforcement, the Vs showed exactly the reverse ordering. Results are discussed in terms of response learning processes during different modes of reinforcement, response learning differences in Vs and Cs, and possible differences between Vs and Cs in their classical conditioning parameters. (17 ref)—*Journal abstract*.

4423. Hersh, Harry M. (Johns Hopkins U) **The effects of irrelevant relations on the processing of sequential patterns.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 771-774.—Letter series completion problems varying along location of irrelevant relations (beginning, end, or none) were presented to 24 paid university students. A repeated-measures analysis of solution times and errors revealed that irrelevant relations at the beginning of series produced the longest latencies and the most errors. Using a pattern-induction-sequence-production model of serial processing, an error analysis showed production error rate remained constant across treatments, while pattern induction errors varied with confusion location. Results indicate that the difficulty of sequential processing varies with irrelevant relations only during the pattern-induction phase. Findings also support a left-right generate-and-test model of pattern induction for the task.—*Journal abstract*.

4424. Hunt, R. Reed; Parente, Frederick J. & Ellis, Henry C. (U New Mexico) **Transfer of coding strategies in free recall with constant and varied input.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 619-624.—Examined the effects of differing degrees of grouping structure or variation on recall of 180 undergraduate Ss for letter sequences. 3 levels of input variability (high, moderate, and zero) were employed, defined in terms of the number of different spatial grouping rules imposed upon the letter sequences. Degree of variation was manipulated both as a between- and a within-S variable during training and as a between-Ss variable in a subsequent transfer task. Recall was directly related to degree of input variability when treated as a between-Ss variable, indicating that S tended to ignore the E-imposed grouping and encode the sequence in a more unitary fashion when the input was more variable. In contrast, when input variability was treated as a within-S variable, recall was high and approximated that of the high-variability between-Ss condition. Recall in the transfer task was largely dependent upon the coding strategy developed during training and was unaffected by differing degrees of variation in the transfer task.—*Journal abstract*.

4425. Inagaki, Kayoko & Hatano, Giyoo. (Izumi Junior Coll, Japan) **Correlates of induced question-asking behavior.** *Japanese Psychological Research*, 1974(May), Vol 16(1), 50-57.—143 5th graders were encouraged to write 2 questions for each of 8 stories involving incongruity (novelty, surprise, contradiction, or perplexity). Questions were scored 1-5 according to use of information in the story, and to relating it to prior knowledge. Combined scores of 2 questions were positively correlated with each other among stories. Only 1 significant factor, explaining 27% of variance, was extracted from the correlation matrix. The sum of combined scores was significantly correlated with school grade and achievement-test score in language, intelligence, performance in science and in social studies, sensitivity to mismatch, verbal report of felt incongruity, and plot comprehension.—*Journal abstract*.

4426. Jarvella, Robert J. & Snodgrass, Joan G. (Rockefeller U, New York, NY) **Seeing ring in rang and retain in retention: On recognizing stem morphemes in printed words.** *Journal of Verbal Learning & Verbal*

*Behavior*, 1974(Oct), Vol 13(5), 590-598.—A total of 34 right-handed undergraduate Ss in 2 experiments judged whether pairs of words viewed simultaneously contained the same stem morpheme. Reaction times of same-different judgments were obtained for verb stems paired with inflected forms of the verbs (Exp I) and for verb stems paired with derived adjectives and nouns (Exp II). Same judgments were faster than different judgments in both studies and were faster when the stem was spelled in the same way in both words, regardless of pronunciation, than when it was spelled and pronounced differently. (16 ref)—*Journal abstract*.

4427. Just, Marcel A. & Brownell, Hiram H. (Carnegie-Mellon U) **Retrieval of concrete and abstract prose descriptions from memory.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 339-350.—Examined how 24 undergraduates retrieved information from previously learned concrete or abstract prose descriptions to determine whether concreteness facilitates memory retrieval in some way aside from organizing the material. Ss read thematically organized paragraphs that described either concrete or abstract referents. The concrete paragraphs described physical features of a person, while the abstract paragraphs described personality features. Ss were then timed while they decided whether subsequent test sentences were true or false of the description. Responses were faster for concrete paragraphs. Since both types of paragraphs had an equivalent degree of thematic organization, results indicate that concreteness provides mnemonic power above that provided by an alternative organizational factor like thematic structure. (French summary) (25 ref)—*Journal abstract*.

4428. Katz, Stuart & Gruenewald, Paul. (U Georgia) **The abstraction of linguistic ideas in "meaningless" sentences.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 737-741.—Proposed that J. D. Bransford and J. J. Franks's (see PA, Vol 48:4191 and 50:8220) linear effect is unrelated to semantic processes and will, therefore, occur even when meaningless sentences (i.e., sentences containing nonsense instead of meaningful content words) are employed. Within the Bransford and Franks format, 32 undergraduates were given either the meaningless sentences or control sentences. Results show a significant linear effect for the meaningless sentences. Furthermore, although the slope of the effect for meaningless sentences was flatter than that of the control, other data rule out a semantic integration explanation based on the availability of semantic information contained in sentence structure. A simple guessing strategy hypothesis is offered to account for the linear effect.—*Journal abstract*.

4429. Katz, Stuart, Atkeson, Beverly & Lee, Joanne. (U Georgia) **The Bransford-Franks linear effect: Integration or artifact?** *Memory & Cognition*, 1974(Oct), Vol 2(4), 709-713.—Hypothesized that J. D. Bransford and J. J. Franks's (see PA, Vol 48:4191 and 50:8220) linear effect is an artifact of the method of presentation of stimulus sentences and is unrelated to semantic processes. 48 undergraduate volunteers were given sentences containing the same information in 1 of 2 ways. In a control condition, which was identical to the procedure used in earlier research, overlapping combinations of ideas were presented during learning and recognition; in

an experimental condition, ideas were presented one at a time. Results demonstrate that one-idea sentences received significantly higher recognition confidence ratings in the experimental condition, thus supporting the artifact interpretation. It is proposed that Ss assign recognition confidence ratings based on the probability that a sentence containing a certain number of ideas could have occurred in acquisition.—*Journal abstract*.

4430. King, David J. (State University Coll New York, Oswego) **Total presentation time and total learning time in connected discourse learning.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 586-589.—Manipulated total presentation time by variations in exposure interval, interitem interval, and rate of presentation. Regardless of how constructed, a given total presentation time resulted in a similar total learning time for 120 Ss. Except for the briefest of total presentation times, variations in total presentation time had but a minor effect, if any, on total learning time.

4431. Kirsner, Kim & Smith, Marilyn C. (U Western Australia, Nedlands) **Modality effects in word identification.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 637-640.—Investigated the locus of persistence of information about presentation modality for verbal stimuli. 24 paid undergraduates were presented with a continuous series of 672 letter sequences for word-nonword categorization. The sequences were divided equally between words and nonwords, and each item was presented twice in the series either in the same or in a different modality. Repetition facilitation, the advantage resulting from a 2nd presentation, was greatest in the intramodality conditions for both words and nonwords. Facilitation was reduced in the cross-modality condition for words and was absent from the cross-modality condition for nonwords. The modality-specific component of the repetition effect found in the word-nonword categorization paradigm may be attributed to persistence in the nonlexical, as distinct from lexical, component of the word categorization process.—*Journal abstract*.

4432. Koriat, Asher & Lieblich, Israel. (Hebrew U Jerusalem, Israel) **What does a person in a "TOT" state know that a person in a "don't know" state doesn't know?** *Memory & Cognition*, 1974(Oct), Vol 2(4), 647-655.—Examined the significance of R. Brown and D. McNeill's (see PA, Vol 40:12901) findings regarding the "tip of the tongue" (TOT) phenomenon. A modified version of their procedure was used with 56 university students. Although Brown and McNeill's findings that Ss in a TOT state can detect parts and properties of the missing word were generally replicated, a division of the TOT state into a variety of substates showed correct detection rate to vary greatly, depending on the substate involved. In addition, correct detection of partial information was demonstrated even when S declared he had no knowledge of the selected word. It is suggested that a distinction be made between information detection based on knowledge of the characteristics common to the class of items of which the target is a member and detection based on knowledge of characteristics specific to the target in question.—*Journal abstract*.

4433. Kozielicki, Jozef. (Warsaw U, Inst of Psychology, Poland) **A model for solving diagnostic problems.** (Poln) *Przegląd Psychologiczny*, 1972, Vol 15(4), 3-15.



—The diagnostic process begins with a set of hypotheses with different probabilities. Relative probabilities change with accumulation of information which originates partly in the environment, and partly in the memory. The hypothesis which first reaches threshold is diagnosed as correct. The model contains 4 blocks. The 1st 2 are operative, (a) "goals" and (b) "operation," and have properties of recent memory. "Goals" decide on the hierarchy of diagnostic subgoals, and "operation" uses information from the last 2 blocks, (c) "memory" and (d) "environment," to change the probabilities of the hypotheses. The operative blocks can adopt different strategies, e.g., the catch-all strategy found in situations with many hypotheses and uncertain information, or the dichotomy strategy in simple situations. Some properties of the hypothesis-formation and information-utilization processes are described. (English & Russian summaries) (15 ref)—*I. Divac.*

4434. Krause, Merton S. (Inst for Juvenile Research, Chicago, IL) **What it is to learn a fact.** *Journal for the Theory of Social Behaviour*, 1973(Apr), Vol 3(1), 92-99. —Attempts to elucidate the process of learning a fact and to distinguish it from learning a statement. The epistemology of the process is described. Several patterns of events that constitute such learning are cited. Various theories of this kind of process are suggested: that of first-person psychology, of second-person psychology, and of third-person psychology. How cognitive learning operates in each of these 3 psychologies is discussed in detail. These ideas and concepts are considered in terms of their application to current educational systems. (20 ref)—*R. S. Albin.*

4435. Levine, Marvin. (State U New York, Stony Brook) **Interpreting inconsistent response patterns: A reaction to William's estimate of "true hypothesis behavior."** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 369-371.—Discusses B. R. Williams's (see PA, Vol 53:Issue 3) model that attempts to estimate true hypothesis behavior from inconsistent response patterns during sets of blank trials. Several kinds of data suggest that inconsistent response patterns are produced by systematic processes. These patterns, therefore, may not contribute to a simple estimate of true hypothesis behavior.

4436. Louviere, Jordan J. (Florida State U) **Predicting the evaluation of real stimulus objects from abstract evaluation of their attributes: The case of trout streams.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 572-577.—Studied human judgment behavior in 10 employees of Iowa trout hatcheries. In Phase 1 Ss judged hypothetical trout streams varying in quantity of trout and driving time to stream. In Phase 2 Ss judged real Iowa trout streams and estimated the quantity of trout and the driving time for each stream. These estimates were used in multiple regression equations, derived from the data in Phase 1, to predict the ratings of the real streams in Phase 2. Correlations between predicted and observed judgments ranged from .37 (individual S level) to .85 (group level). Results are consistent with empirical work in the number processing and nonexperimental work in geography and other spatially oriented sciences. (17 ref)—*Journal abstract.*

4437. Marcel, Tony & Forrin, Bert. (MRC Applied Psychology Unit, Cambridge, England) **Naming latency and the repetition of stimulus categories.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 450-460. —Conducted 4 experiments with undergraduate and graduate students to investigate sequential facilitation effects in the naming of alpha-numeric characters. With a stimulus set of 4 letters and 4 digits, repetition of an item or a category facilitated reaction time (RT). The advantage of category and item repetitions over category alternations decreased (a) as the response-signal interval increased and (b) if advance information respecting the stimulus category was presented 1 sec (but not .5 sec) prior to stimulus onset. False advance information did not disturb the original latency differences between the 3 transition types. With a stimulus set of the digits 2-9, RT varied systematically with the digit's ordinal distance from the preceding one in the sequence. Results are interpreted as favoring an "associative priming" model for facilitation in character identification that is responsible for both item and category repetition effects. (28 ref)—*Journal abstract.*

4438. Mazurk, Gregory F. (U Toronto, Ontario, Canada) **Positive recency in final free recall.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 812-814. —Recent studies suggest that the negative recency effect in final free recall is a function of the type rather than the amount of rehearsal given to terminal list items. From such findings it was predicted in the present experiment that by varying the type of rehearsal, positive recency in final free recall could be obtained. 24 Ss were presented with 14-item lists, and in all cases the 1st 10 items of each list were silently learned. During the presentation of the 10th item, Ss were given 1 of 3 cues to indicate the method by which the last 4 items were to be studied. These methods were overt rehearsal, silent study, and generating verbal associations for each of the 4 terminal list items. In agreement with earlier studies, results indicate a positive recency in final free recall for associated items.—*Journal abstract.*

4439. McKee, J. David. (Rutgers State U, Douglass Coll, New Brunswick) **The effect of problem difficulty on hypothesis testing and an extension of Levine's theory.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 188-190.—Examined working hypothesis (Hs) and majority rules under 4 conditions of problem difficulty achieved through combination of exposure or nonexposure of problem cards and informative feedback with 2 or 3 values per stimulus dimension. Memory aids facilitated solutions by 48 paid undergraduate Ss; intradimensional variability had no effect. Working Hs occurred more often in exposed conditions; majority rules were equally distributed throughout conditions. Ss demonstrated H behavior on 91.6% of all opportunities; working Hs were more prevalent than majority rules; and the size of the H pool supports M. Levine's (see PA, Vol 49:216) subset sampling assumption. However, some Ss changed Hs before and after "right" feedback. Analysis of such discrepant findings suggests an extension of Levine's model.—*Journal abstract.*

4440. Merikle, Philip M. (U Waterloo, Ontario, Canada) **Selective backward masking with an unpredictable mask.** *Journal of Experimental Psychology*,

1974(Sep), Vol 103(3), 589-591.—Presented rows of 7 random letters for 100 msec, followed by either a patterned mask or a blank white field. Ss could not anticipate whether or not a row would be followed by the mask. Since results show greater masking of center than end letters, selective masking cannot be attributed to different processing strategies under mask and no-mask conditions.

4441. Millward, Richard B. & Wickens, Thomas D. (Brown U) **Concept-identification models.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Briefly reviews the definition of a concept and the basic paradigms that have been used in analyzing how concepts are learned. An organized set of axioms for hypothesis-testing models of concept identification is constructed, and representative models are analyzed in detail. (39 ref)

4442. Murdock, Bennet B.; Anderson, Rita E. & Ho, Elaine. (U Toronto, Ontario, Canada) **Effects of presentation order on learning in multitrial free recall.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 522-529.—By an organization view, the formation of clusters and consequently the progress of interactive free-recall learning should be affected the order in which items are presented. Exp I with 12 undergraduate Ss failed to support an accretion hypothesis, which predicted that presenting the learned items in each cluster before the unlearned items should expedite learning relative to the reverse order. Exp II with 16 Ss showed that even scrambling some clusters while preserving others had relatively little effect, and the effects that were obtained were directly contrary to what had been expected. These results plus other recent related findings suggest that the characteristics of list presentation may have surprisingly little effect on the progress of multitrial free-recall learning. (19 ref)—*Journal abstract.*

4443. Murphy, Michael D. & Wallace, William P. (U Nevada, Reno) **Encoding specificity: Semantic change between storage and retrieval cues.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 768-774.—In 3 experiments with a total of 240 undergraduate Ss, cue words were presented with to-be-remembered (TBR) words in an effort to influence specific encoding formats. Recall was tested in the presence of cues that were identical, semantically similar, or semantically dissimilar to the input cues. In all 3 cases the recall cues and the input cues were semantically similar to the TBR words. The only evidence for cuing facilitation (relative to free recall) occurred when the same cues appeared at both input and output. Changing cues from input to output produced recall decrements relative to free recall, although there was evidence for encoding specificity as the presentation of recall cues semantically similar to input cues was associated with higher levels of recall than the presentation of recall cues semantically dissimilar to input cues.—*Journal abstract.*

4444. Murray, Harry G. & Carruthers, Benjamin C. (U Western Ontario, London, Canada) **Human eyelid conditioning with airpuff vs infraorbital shock as the UCS.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 269-287.—In each of 3 experiments, a total of 188

college students received classical eyelid conditioning with either a corneal airpuff or a subjectively matched infraorbital shock as the unconditioned stimulus (UCS). It was expected that conditioning levels would be higher for the presumably more "modifiable" airpuff UCS. Contrary to expectation, infraorbital shock produced superior conditioning in all 3 experiments. However, Ss' ratings of airpuff and shock aversiveness in Exps II and III were negatively correlated with anticipatory conditioned responses, indicating that an instrumental reinforcement mechanism operates for both UCS modalities. Results are discussed in terms of contiguity and effect models of classical conditioning. (French summary) (15 ref)—*Journal abstract.*

4445. Murray, Harry G. & Ure, Gail. (U Western Ontario, London, Canada) **Role of temporal contiguity in intentional and incidental paired-associate learning.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 816-820.—Consonant-vowel-consonant (CVC) trigram pairs were presented as "distracting stimuli" to 180 university students in the context of a probability-learning orienting task, with an interstimulus interval (ISI) of .8, 3.0, or 6.0 sec between the 1st and 2nd stimulus of each pair. Intentional Ss were told to learn the CVC pairs, whereas incidental Ss were given no instructions to learn. Performance on subsequent test trials was a decreasing function of the ISI for incidental Ss and an increasing function of the ISI for intentional Ss. Results suggest that, at least under certain orienting conditions, incidental and intentional paired-associate learning may involve different underlying processes.—*Journal abstract.*

4446. Neisser, Ulric. (Cornell U) **Practiced card sorting for multiple targets.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 781-785.—8 paid university students were given extended practice in card sorting. Each card was inscribed with 9 letters; on half the cards 1 letter was a "target." With practice, the Ss could sort as fast for 8 targets at once as for a single difficult target, while maintaining the same overall error rates. However, they did miss the difficult target itself more often when it occurred in the multiple-target condition than when they were searching for it alone.—*Journal abstract.*

4447. Neumann, Paul G. (U Colorado) **Effects of directional and neutral category labels in bidimensional rule-learning problems.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 695-699.—In bidimensional concept problems, the distinction between primary and complementary rule forms is, in some sense, a function of the directional nature of the sorting category labels. Primary rules are those rules which assign the true-true class to the "positive" category. Complementary rule forms are obtained by reversing these category assignments. Instead of directional labels, neutral labels can be used. Reversing these labels creates no fundamental change in the solution of the problem. An experiment with 150 undergraduate psychology students investigated the effect of directional and neutral category labels in a design which incorporated all 12 problems defined by the combination of directional and neutral labels. Significant effects of labels on performance were obtained. Implications of these effects for hypotheses advanced by J. L. Seggie (1969), K. G. Peters and J. P.



Denny (1971), and L. E. Bourne and D. E. Guy (1968) are discussed.—*Journal abstract.*

4448. Nosal, Czeslaw. (Wroclaw Technical U, Poland) **[Mental abilities underlying effective thinking.]** (Polh) *Przegląd Psychologiczny*, 1972, Vol 15(4), 33-48.—Reviews the literature on the thought process in problem solving. Based on this review, the process is schematically conceived as a chain of action blocks: analysis of the problem situation (APS), generation of solution possibilities (GSP), evaluation of these (ESP), and realization of the adopted solution (RAS). Each action-block feeds both forward and backward. The outcome of a thought process depends on more than one ability, and given ability may play a role in more than one outcome. APS depends on efficient orientation in the problem situation, elimination of uncertainties, and reduction of information. GSP is based on fluency, flexibility, originality of thinking, and ability to grasp diverse relations simultaneously. ESP is related to the capacity for logical and experimental evaluation, judgment, and other factors. RAS involves planning action, realization of plans, and control and correction of action. Each of these abilities is discussed and analyzed. (40 ref)—*I. Divac.*

4449. Pate, James L.; Ward, Patricia & Harlan, Katherine B. (Georgia State U) **Effects of word order and imagery on learning verbs and adverbs as paired associates.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 792-795.—In 4 paired-associate studies with verbs and adverbs, more correct responses by a total of 248 undergraduate Ss occurred with the verb-adverb order than with the adverb-verb order. Results are similar for the anticipation method and for the study-test procedure. In 1 study, stimulus imagery and response imagery were combined factorially with word order. While both stimulus imagery and response imagery had significant effects, word order was an even more potent factor.—*Journal abstract.*

4450. Penney, Catherine G. (Memorial U Newfoundland, St John's, Canada) **Order of report and interference effects in four-channel bisensory memory.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 371-382.—Used a 4-channel bisensory-dichotic presentation with a total of 6 graduate and undergraduate students who were postcued to recall only the auditory words, only the visual words, or all words. On total recall trials, words were recalled separately by modality. On auditory recall trials, a sequential recall order predominated. The modality of the postlist cue interacted with presentation modality of the memory words such that an auditory cue interfered with recall of auditory words and the visual cue with recall of visual words. Implications for theories of short-term memory are discussed. (French summary) (28 ref)—*Journal abstract.*

4451. Pezdek, Kathy & Royer, James M. (U Massachusetts, Amherst) **The role of comprehension in learning concrete and abstract sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 551-558.—Conducted 2 experiments with a total of 140 undergraduate Ss to assess the effect of comprehension on the recognition of meaning and wording changes with concrete and abstract sentences. One group of Ss was presented the sentences embedded in a context paragraph designed to increase comprehension. Recognition

for meaning changes in abstract sentences was significantly higher for the paragraph-embedded group than for a group presented the sentences without the paragraphs. There was no appreciable differences between the groups in recognition for wording changes in abstract sentences, nor in recognition for both meaning changes and wording changes in concrete sentences. Results are discussed in light of recent models which propose different storage mechanisms for concrete and abstract sentences.—*Journal abstract.*

4452. Polich, John M. & Schwartz, Steven H. (Wayne State U) **The effect of problem size on representation in deductive problem solving.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 683-686.—180 undergraduates attempted to solve logical deductive reasoning problems that varied systematically in amount of information presented. Methods which Ss employed in representing the problem were classified into 5 main types or modes. The proportion of Ss using a matrix mode of problem representation increased moderately with problems containing large amounts of information. The performance of Ss using a matrix mode of representation suggests that this advantage is related to ease of applying and/or storing the results of logical operations in such a problem space rather than to any facilitative effects of encoding processes. Specific limits to normal processing are hypothesized.—*Journal abstract.*

4453. Reich, Carol M. (Board of Education for the City of Toronto, Ontario, Canada) **The generalization of assertions throughout a cognitive network.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 288-299.—30 undergraduates gave answers to sentence pairs of the following form: "Martians hate robins. Do Martians hate birds?" Objects of the sentence pairs were related as 1st- and 2nd-level superordinate and subordinate, and similar and dissimilar coordinate. Generalization between levels was consistent with a model based on judgment of set-subset relations among the object sets to which concepts refer. Coordinate generalization was described by a 2nd model based on judgments of the proportion of properties shared by 2 concepts. Implications of these findings for research on the syllogism are discussed. (French summary) (15 ref)—*Journal abstract.*

4454. Reid, J. Raymond. (U Victoria, British Columbia, Canada) **Sentence-type variables as aural concept formation dimensions.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 233-245.—An aural conjunctive concept formation experiment with 64 undergraduates used as stimuli sentences varying systematically in voice (active or passive), mood (declarative or interrogative), modality (affirmative or negative), tense, and lexical content. Target classes were the 8 sentence types defined by all combinations of the 1st 3 syntactic variables. Aural processing was found to be more difficult than visual, but higher education level facilitated concept acquisition for males and females equally. Ss tended to avoid syntactic analysis in depth, classifying sentences on as cursory a basis as the task allowed. The simple, unequivocal syntactic signals of mood and modality meaning were readily apparent, but the discrimination of voice was complicated by ambiguous syntactosemantic associations and lack of discourse context. It is suggested that voice is not a determinant of

utterance type, but a context- and content-dependent realization of agent or object focus in transitive messages. (24 ref)—*Journal abstract*.

4455. Resick, Patricia A.; Forehand, Rex & Peed, Steve. (U Georgia) **Prestatement of contingencies: The effects on acquisition and maintenance of behavior.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 642-647.—Examined the effects of prestatement contingencies, tangible plus verbal rewards, and tangible reinforcement alone on behavior acquisition. 32 4-6 yr old Ss were divided into 4 groups according to prestatement vs no prestatement of contingencies and tangible reinforcers vs tangible plus verbal reinforcers. Results indicate that nonprestatement of contingencies facilitated maintenance of behavior. Furthermore, Ss exposed to prestatement contingencies discriminated between reinforced and nonreinforced trials by the presence vs absence of contingency prestatement.—*Journal abstract*.

4456. Ritterman, Stuart I. & Freeman, Nancy C. (U South Florida) **Distinctive phonetic features as relevant and irrelevant stimulus dimensions in speech-sound discrimination learning.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 417-425.—Required 32 college students to learn the relevant dimension in each of two randomized lists of auditorily presented stimuli. The stimuli consisted of 7 pairs of consonant-vowel nonsense syllables differing by 2 relevant dimension units and from 0 to 7 irrelevant dimension units. Stimulus dimensions were determined according to S. Saporta's units of difference. No significant differences in performance as a function of number of the irrelevant dimensions nor characteristics of the relevant dimension were observed. (20 ref)—*Journal abstract*.

4457. Ross, Leonard E.; Ferreira, M. Cecilia & Ross, Susan M. (U Wisconsin, Madison) **Backward masking of conditioned stimuli: Effects on differential and single-cue classical conditioning performance.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 603-613.—In 3 experiments a total of 88 undergraduates who demonstrated good differential eyelid conditioning performance received an additional session during which a backward masking stimulus was presented during the conditioned stimulus (CS)-unconditioned stimulus (UCS) interval on half of the trials. In a group for which the interval between CS onset and masking stimulus onset (SOA) was selected to produce masking, differential responding was largely eliminated on masking trials. Such was not the case for a longer SOA control condition. Similar masking effects were obtained with visual and auditory differential conditioning, but backward masking did not occur in single-cue conditioning. The similarities of these effects to those obtained in the usual masking studies are discussed with respect to the recognition processes involved and their role in differential and single-cue conditioning.—*Journal abstract*.

4458. Runquist, Willard N. (U Alberta, Edmonton, Canada) **Structural effects of identical elements among stimuli with meaningful units.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 592-593.—In 2 paired-associate experiments, one using word triads and the other symbol triads as stimuli, the complexity of the pattern of identical elements strongly influenced undergraduates' performances. This shows that the failure of

structure to have an effect with single words is not due to meaning. The critical variable is whether the elements of the stimuli are processed separately or not.

4459. Sanford, A. J. & Seymour, P. H. (U Dundee, Scotland) **Semantic distance effects in naming superordinates.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 714-720.—Conducted 3 experiments in which a total of 32 university students and staff and 16 high school students served as Ss. Results show that the time to select a superordinate label in response to a target word was a function of the normative likelihood of the target being produced as an exemplar of the superordinate. This extends the scope of semantic distance effects to a new task situation. The effect declined with practice (repetition) and was also reduced by other preceding tasks. 2 alternative accounts of the processing underlying selection are discussed.—*Journal abstract*.

4460. Schultz, Randall L. (Purdue U) **System simulation: The use of simulation for decision making.** *Behavioral Science*, 1974(Sep), Vol 19(5), 344-350.—Suggests that, when simulation is intended as an aid to decision making by individuals or organizations, special problems arise in connection with designing and using the model. The use of policy simulation and factors related to its application are explored, and implications for model development are presented. (37 ref)

4461. Schulster, Jerome R.; McLaughlin, John P. & Crouse, James H. (U Delaware) **Separation of storage and retrieval processes in recall of prose.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 583-586.—Studied the primacy effect in prose free recall with 192 students. Results imply that proactive interference may affect the nature of retrieval cues in memory, and that output interference generated during the recall task may hinder recall. This interference seemed to affect recall of later input stories.

4462. Seybert, Jeffrey A.; Wrather, Dan M.; Kanak, N. Jack & Eckert, Ed. (U Oklahoma) **Interaction of drive level and task complexity in verbal discrimination learning.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 795-798.—Performed an experiment to test predictions based on a combination of the frequency theory of verbal discrimination learning and Taylor-Spence drive theory, the latter of which postulates a Drive Level  $\times$  Task Complexity interaction. 36 high-drive and 36 low-drive undergraduates, as determined by scores on the Taylor Manifest Anxiety Scale, were Ss. 3 list conditions derived from the frequency theory of B. R. Ekstrand et al (see PA, Vol 41:212) were used: an associate-both (AB) list which is relatively difficult or complex, a same-right (SR) list which is relatively easy or simple, and a control (C) list of moderate difficulty. An interaction of Drive  $\times$  Task Complexity was observed, both in terms of trials to criterion and total errors. High-drive Ss performed better than low-drive Ss on the SR list, while the reverse was true for the AB list.—*Journal abstract*.

4463. Shaughnessy, John J.; Zimmerman, Joel & Underwood, Benton J. (Northwestern U) **The spacing effect in the learning of word pairs and the components of word pairs.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 742-748.—Following the presentation of a single list of word pairs consisting of a 3-letter word on the left and a



5-letter word on the right. 5 groups of 64 undergraduates each were asked to recall the (a) 3-letter words, (b) 5-letter words, (c) intact pairs, or (d) 5-letter words with the 3-letter words provided. 2 types of repeated pairs were presented, one in which the same 3- and 5-letter words were repeated together (same pairs) and one in which the same 5-letter word was repeated with different 3-letter words (different pairs). For half of the Ss in each recall group, the repetitions of a pair containing a given 5-letter word were massed (MP); for the other half, the repetitions were distributed (DP). Recall of MP same pairs and the components of these pairs was consistently poorer than that of DP same pairs. Recall of the repeated component of the different pairs was also poorer under MP than under DP. Results support an attenuation-of-attention explanation of the spacing effect.—*Journal abstract.*

4464. Simon, Herbert A. & Newell, Allen. (Carnegie-Mellon U) **Thinking processes.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Examines formal theories of human thinking, specifically those that are formulated in information-processing language. Application of information-processing theory to human problem solving, to verbal learning and related conceptual processes, and to human discovery of serial patterns is detailed. (36 ref)

4465. Smith, Kendon. (U North Carolina, Greensboro) **A note on the possibility of a reinforcement theory of cognitive learning.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 161-163.—Reviews recent studies which support an essentially neo-Tolmanian view of motivation and learning. However, it is suggested that, although this approach has a certain phenomenal validity, cognitive linkages are formed not by contiguity alone, but by contiguity plus a species of secondary reinforcement. It is also proposed that such linkages, when activated by the environment, result in a surrogate learning experience, the latter being responsible for the overt behavior which then occurs. (18 ref)—*Journal abstract*

4466. Tests, Thomas J. (U Illinois) **Causal relationships and the acquisition of avoidance responses.** *Psychological Review*, 1974(Nov), Vol 81(6), 491-505.—Discusses 2 explanations of belongingness. One explanation postulates the evolution of event-specific associative mechanisms which associate events related in the environment. Another explanation suggests that certain events covary in a manner which improves associability. 2 forms of event-covariance are considered: similarity in the location and in temporal intensity patterns of the to-be-associated events. Published data are reviewed and new data are presented which indicate that these factors facilitate associability. Distinctions are drawn between event-specific associative mechanisms (activated by the to-be-associated events) and nonspecific associative mechanisms (activated by forms of event covariance). It is suggested that nonspecific mechanisms evolved to handle learning about real-world causal relationships which are variable with respect to the events involved. The explanatory power of this approach

is applied to the acquisition of avoidance responses. (46 ref)—*Journal abstract.*

4467. Thomas, David R.; Strub, Harry & Dickson, James F. (U Colorado) **Adaptation level and the central tendency effect in stimulus generalization.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 466-474.—Conducted 2 experiments with 220 undergraduates divided into 11 groups of 10 males and 10 females each. In Exp I, 7 groups were presented a dim light and then tested for recognition (generalization) with test stimuli including the original and several brighter values. The groups differed in the range and number of test values employed (from 3 to 9). On each trial, S judged the test stimulus as same as or different from the original and also rated it on a 9-point brightness scale. This provided generalization and adaptation level (AL) measures. Both AL and maximal generalized responding shifted to higher stimulus values with longer test series (i.e., with greater test asymmetry). In Exp II, 4 groups of Ss were tested with a long or short range of stimuli, with few or many stimuli within each range. Only range affected both AL and the location of maximal responding. These results strongly support an AL interpretation of the "central tendency effect" in stimulus generalization.—*Journal abstract.*

4468. Ullrich, James R. & Balogh, Bela A. (U Montana) **Imagery and meaningfulness of right and wrong items in verbal discrimination learning.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 68-70.—In a study with 144 Ss, the effects of variations in the rated imagery and the meaningfulness of the right word and the wrong word on a verbal discrimination task were examined by factorial manipulations of the imagery and meaningfulness values of the right and wrong words within verbal discrimination pairs. Results indicate that imagery was a more potent variable than meaningfulness in the verbal discrimination task.—*Journal abstract.*

4469. Wade, Edward A. & Biler, Michael J. (U Maine, Orono) **Learning and retention of verbal lists: Serial anticipation and serial discrimination.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 732-739.—Compared serial anticipation and serial discrimination learning in 3 experiments with a total of 232 undergraduates. The Ss mastered consonant-vowel-consonant (CVC) lists when each item appeared in a triad with either task relevant or task irrelevant distractors, the former being items from other list positions and the latter CVCs from outside the list. Recognition or serial recall immediately followed list mastery. Knowledge of results was manipulated for discrimination groups. Trials, errors, total learning times, serial position errors, and retention were examined. The distractor variable was a potent determiner of performance, and knowledge of results variations had little, if any, effect. Learning and serial recall for anticipation groups were unaffected by type of distractor used in triads, but distractor type did affect the performance of discrimination groups.—*Journal abstract.*

4470. Williams, Brian R. (Oregon State U) **Comment on Levine's blank trial method: A procedure for estimating true hypothesis behavior.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 362-368.—When M. Levine's 1966 method of blank trial probes

is used to study hypothesis behavior the probability that a probe results in a cue-defined choice combination usually lies between .70 and .90, depending upon the age group and the treatment conditions. It may not be safe to assume that each such combination signifies an hypothesis. A procedure for estimating the probability of true hypothesis behavior is presented, including a validity test for the resulting estimate.

4471. Włodarski, Ziemowit. (U Warsaw, Inst of Psychology, Poland) **Degree of material organization and learning effects.** *Polish Psychological Bulletin*, 1974, Vol 5(2), 67-71.—Investigated the causal relationship between the learning process and degree of material organization. 16 words referring to objects of 4 categories (fruits, animals, furniture, and vehicles) were exposed in 3 patterns with different numbers of transitions from 1 category to another (15 in the case of totally unorganized material, 9 for partially organized, and 3 for totally organized material). Ss were 120 Polish 5th and 6th graders. Results show that learning effects depended clearly on degree of material organization. Rapidity of learning rose commensurately with degree of organization. Contributing to the latter were 2 kinds of organization, that independent of the learner and that acquired as a result of the learner's own activity.—*Journal abstract*.

4472. Wright, Peter. (Stanford U, Graduate School of Business) **The harassed decision maker: Time pressures, distractions, and the use of evidence.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 555-561.—Investigated dominant simplifying strategies people use in adapting to different information processing environments. It was hypothesized that judges operating under either time pressure or distraction would systematically place greater weight on negative evidence than would their counterparts under less strainful conditions. 6 groups of male undergraduates ( $N = 210$ ) were presented 5 pieces of information to assimilate in evaluating cars as purchase options. 3 groups operated under varying time pressure conditions, while 3 groups operated under varying levels of distraction. Data usage models assuming disproportionately heavy weighting of negative evidence provided best fits to a significantly higher number of Ss in the high time pressure and moderate distraction conditions. Ss attended to fewer data dimensions in these conditions.—*Journal abstract*.

#### Attention & Memory

4473. Arik, Judith P. & Siegel, Alexander W. (U Pittsburgh) **Facilitation of sequential short-term memory with pictorial stimuli.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 567-573.—Conducted 3 experiments which tested undergraduates ( $N = 48$ ) in a serial position recall task. Exp I found that pictures produced better performance than did spoken words; recall for pictures showed only a primacy effect, whereas recall for spoken words showed both a primacy and recency effect. In Exp II, visual words were the stimuli. Although words produced poorer overall performance than pictures, the shapes of the serial position curves were nearly identical (primacy but no recency). In Exp III, Ss were tested with visual and auditory words and were instructed to form images of the stimuli. Imagery instructions facilitated performance with auditory words

and inhibited performance with visual words. Results support a dual-encoding notion for visual stimuli (18 ref)—*Journal abstract*.

4474. Atkinson, Richard C. & Juola, Jaume F. (Stanford U) **Search and decision processes in recognition memory.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology. I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974, xiii, 299 p. \$9.—Reviews the general theory of memory as a dynamic and interactive system, develops and evaluates a mathematical model for recognition memory, and applies the model to relevant experiments: memory for items in short-term store, memory involving both long- and short-term target sets, and effects of target-list length and tests repetitions. (3 p ref)

4475. Bach, Mary J. (Northwestern U, Medical School, Chicago) **Implicit response frequency and recognition memory over time.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 675-679.—Presented 150 words to 128 university students for study, followed by a 2-choice recognition test. The list was constructed so that implicit associative responses (IARs) to the words during study might both facilitate recognition (by increasing the frequency of the correct word in a test pair) and inhibit recognition performance (by increasing the frequency of the incorrect word in a test pair). The experiment was designed as a direct test of the hypothesis that the word frequency effect in recognition is due to such positive and negative effects. 4 retention intervals (0, 5, 10, and 15 min) were used to determine whether passage of time influenced the presumed IAR-frequency relationship. Results support the theoretical expectations after all retention intervals. Recognition performance showed no consistent change over 15 min.—*Journal abstract*.

4476. Banks, William P. & Atkinson, Richard C. (Pomona Coll) **Accuracy and speed strategies in scanning active memory.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 629-636.—Used 2 conditions of familiarity of material and 2 conditions of payoff in a short-term memory scanning task with 20 paid undergraduates. Memory sets and probes were either drawn from a small, well-learned pool of words (the familiar set) or were sampled without replacement from a very large pool of words (the infinite set). Under both payoffs the infinite memory sets were searched at a faster rate than the familiar sets. The speed payoff reduced the constant component of latencies and, contrary to previous findings, increased the rate of memory search for both sets. Errors increased from about 1% with accuracy payoff to 19% with speed payoff. Under speed payoff most of the errors were false positives for the familiar set and false negatives for the infinite set. Several models of the task are considered, but none prove entirely satisfactory. (15 ref)—*Journal abstract*.

4477. Bennett, Raymond W. & Bennett, Inge F. (U Illinois, Chicago Circle) **PI release as a function of the number of pre-release trials.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 573-584.—In Exp I the magnitude of proactive interference (PI) was examined as a function of the number of trials prior to a category shift employed with 768 undergraduates. Using



the sense-impression dimensions of "round" and "white," the magnitude of release increased from about 6% after 1 prior trial to about 60% after 4 trials. A possible explanation of this effect is discussed. Exp II with 96 Ss explored some implications of the proposed model. The nature of the relationship between the magnitude of PI release and the contents of the memory trace is discussed, and it is argued that until more is known about the operation of the memory system, it will not be possible to use PI-release data as a source of evidence for the manner in which words are encoded. (24 ref)—*Journal abstract*.

4478. Bird, Charles P. & Goodwin, C. James. (Florida State U) **Form class as an effective encoding dimension in short-term memory.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 625-628.—Conducted 2 experiments with a total of 144 undergraduate Ss using D. D. Wickens's (1972) procedure for the study of relevant encoding dimensions in short-term memory. In Exp I reliable release from proactive inhibition was obtained by changing the content of word triads on Trial 4 from nouns to verbs or vice versa. This effect was most clearly apparent when salience of the form class dimension was increased by informing Ss as to the content of each triad prior to its presentation. Exp II demonstrated that the results of Exp I were most likely due to differential encoding on the part of Ss, rather than to perceptual alerting caused by the introduction of the cue regarding change in form class.—*Journal abstract*.

4479. Bower, Gordon H. & Karlin, Martin B. (Stanford U) **Depth of processing pictures of faces and recognition memory.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 751-757.—Conducted 3 experiments, with 12 undergraduate Ss in each, to determine whether S remembers a picture better the greater the "depth of processing" he allots to it. In Exps I and II depth of processing pictures of faces was varied according to judgments of sex (superficial) or judgments of likableness or honesty of the person pictured. Performance on a later recognition memory test was high for pictures judged for likableness or honesty and low for pictures judged for sex. This ordering held as true for intentional learners as for incidental learners. Exp III showed that face recognition memory was not materially affected by a context manipulation: an old test picture was remembered at a level determined by its original depth of processing and independently of how it was tested—either alone, along side an old picture it had been studied with, or with a new picture.—*Journal abstract*.

4480. Briggs, Raymond. (Oakland U) **Auditory and visual confusions: Evidence against simple modality encoding hypotheses.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 607-612.—Using both recognition and recall responses, confusion and intrusion errors were obtained for briefly exposed 11-letter strings. The patterns of errors were sharply dependent upon experimental variables. In Exp I 47 college students made auditory and visual intrusions with recall, but neither with recognition. In Exp II increasing exposure time and eliminating a poststimulus cue presented to 26 Ss primarily increased auditory confusions. This suggests that auditory and visual confusions reflect strategy-contingent recoding

rather than modality-specific encoding.—*Journal abstract*.

4481. Cheng, Chao-Ming. (National Taiwan U, Taipei, Republic of China) **Different roles of acoustic and articulatory information in short-term memory.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 614-618.—32 undergraduates attempted ordered recall of strings of 7 consonants: F, G, K, M, R, V, and Y. Each consonant is intrinsically correlated with a distinctive vowel phoneme when named as a letter. The experiment investigated whether suppressing these correlated vowel phonemes of the consonants by pairing each consonant with the redundant vowel /a/ would have the same effect on recall in the 2 input modes—auditory and articulatory. It was found that suppressing the vowel phonemes through the auditory mode had a selective interference effect on the recall of late items, whereas that through articulation had a nonselective effect across the whole list. A 3-component model of short-term memory is discussed based on these findings.—*Journal abstract*.

4482. Feeney, Dennis M.; Pittman, James C. & Wagner, H. Ryan. (U New Mexico) **Lateral inhibition and attention: Comments on the neuropsychological theory of Walley and Weiden.** *Psychological Review*, 1974(Nov), Vol 81(6), 536-539.—Criticizes the physiological assumptions of the recent theory of attention proposed by R. E. Walley and T. D. Weiden (see PA, Vol 51:6479). Their position, a pyramid of feature detectors with perception at the apex in association cortex, cannot account for much old and new data on brain function. The role they propose for lateral inhibition in attention is "cognitive masking"—the prevention of simultaneous encoding of perceptual events. Even given their assumptions, lateral inhibition cannot account for selective responding but rather is a consequence of selective processes. An alternative hypothesis for the role of lateral inhibition in attention is outlined. (25 ref)—*Journal abstract*.

4483. Fessler, Paul K.; Lenorovitz, David R. & Yoblick, Darryl A. (State U New York, Buffalo) **Time delay and similarity effects in facial recognition.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 490-496.—Conducted 4 experiments to investigate the ability to 232 undergraduates to recognize a target person, whom they had previously seen in slides or a film, in a test series of pictures. Exp I, which manipulated time delay between seeing the target and starting the test series (from 4 min to 1 wk), demonstrated that delay had no effect on recognition performance. The other 3 studies manipulated similarity between the target person and the decoy pictures preceding the target in the search series. The greater the target-decoy similarity, the poorer the recognition performance. A significant Target Position  $\times$  Similarity interaction indicated the presence of a larger performance decrement due to position when similarity level was high.—*Journal abstract*.

4484. Flexser, Arthur J. & Bower, Gordon H. (Stanford U) **How frequency affects recency judgments: A model for recency discrimination.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 706-716.—Previous evidence that repetition of an item in a list enhances that item's recency relative to other items has

been interpreted as favoring a memory strength theory of recency discrimination. However, serious doubt has been cast upon the validity of the strength theory by experiments such as that of D. L. Hintzman and R. A. Block (see PA, Vol 46:6136) which instead favor a multitrace representation for repetitions of an item. The present 2 experiments, with a total of 80 16-31 yr old Ss, tested 2 plausible interpretations of the effect of frequency on relative recency judgments. The 1st, that low frequencies result in poor recognition memory, hence poorer recency discrimination, was discounted in Exp I, which still found sizable frequency effects on relative recency judgments even when considering only recognized items. A multiple-trace theory of contextual time tagging was then proposed to account for the effects of event frequency on subjective recency. Exp II, which collected event frequency as well as relative recency judgments, yielded data which were fit quantitatively by the multiple-trace time tagging theory. It was found that relative "distance" judgments were not psychologically symmetric to relative recency judgments—a result not predicted by the time tagging model.—*Journal abstract.*

4485. Friedrich, Douglas. (Central Michigan U) **Comparison of intrusion errors and serial position curves on monaural and dichotic listening tasks: A developmental analysis.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 721-726.—Based on a repeated measurement study of 7-, 10-, 14-, and 17-yr-old students ( $n = 20$  in each group) with monaural and dichotic presentations of word lists varying in associative structure and presentation rate, intrusion and serial position dependent variables were analyzed. Intrusion analyses supported previous reports on word list recall; 7- and 10-yr-olds recalled fewer words from monaural and dichotic lists and had more intrusive errors than adolescents. Based on similar orders of report (strategies) for monaural and dichotic word presentations, serial position curves for the 2 types of presentation were compared. Within-age comparisons were strikingly similar. Between-age comparisons of monaural and dichotic presentation serial position curves support the notion that there are ontogenetic limitations in memory structure and control processes.—*Journal abstract.*

4486. Fritzen, James. (Virginia Polytechnic Inst & State U) **Unitization of related words in short-term store.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 638-645.—Conducted 4 experiments with a total of 353 undergraduate Ss to assess the extent to which Ss unitize related words in short-term storage (STS). Categorized words were inserted either at the end (Exps I, II, and IV) or toward the middle (Exp III) of lists of unrelated words. The unitization of the related words in STS was expected to facilitate the recall of other words in the list. No facilitation was found in Exp I in which Ss were free to recall the words in any order. When recall was constrained, there was facilitation of other words either prior (Exps II and IV) or subsequent to (Exp III) the related words. Results are taken as evidence that unitization does take place in STS.—*Journal abstract.*

4487. Fuchs, Alfred H. & Melton, Arthur W. (Bowdoin Coll) **Effects of frequency of presentation and stimulus length on retention in the Brown-Peterson paradigm.** *Journal of Experimental Psychology*, 1974(Oct), Vol

103(4), 629-637.—In an experiment with 48 female university students, percent recall from word units decreased in the Brown-Peterson short-term memory paradigm as a function of unit length (3 vs 5 words) and retention interval (0, 4, 8, or 16 sec) and increased as a function of the frequency of massed presentations (1, 2, 3, or 4). The absolute recall of words was less from 5-word than from 3-word units at the longer retention intervals following 1 or 2 presentations. Results confirm the presence of intraunit interference in recall after 4 or more sec under conditions of high intraexperimental proactive interference, even though there is other evidence that intraunit interference in recall over intervals up to 4 sec may be attributable to probability of displacement from a limited-capacity primary memory or rehearsal system. (15 ref)—*Journal abstract.*

4488. Geiselman, Ralph E. (Ohio U) **Positive forgetting of sentence material.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 677-682.—Presented sets of sentences to 120 undergraduates with each sentence being cued "remember" or "forget" immediately following its presentation. Results show that to-be-remembered (TBR) sentences were more accessible than to-be-forgotten (TBF) sentences and uncued control sentences. Sentence connectedness was an important determiner of the magnitude of the observed recall phenomenon. Using a multiple-choice recognition test, key words or phrases from the to-be-forgotten sentences were equally available as key words or phrases from the to-be-remembered sentences. Results extend the selective-rehearsal and differential-grouping interpretation of the positive-forgetting phenomenon to encompass sentence material. (17 ref)—*Journal abstract.*

4489. Griggs, Richard A. (U Florida) **The recall of linguistic ideas.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 807-809.—Used J. D. Bransford and J. J. Franks's (see PA, Vol 48:4191) procedure for studying the abstraction of linguistic ideas in a sentence memory task but with a recall test substituted for the usual recognition test. Following the recall test, the 10 undergraduate Ss were asked to produce the complex ideas that could be created from the sets of related acquisition sentences. Results of both tests support Bransford and Franks's argument for the construction of more "wholistic semantic structures."—*Journal abstract.*

4490. Harris, Richard J. (U Kansas) **Memory for presuppositions and implications: A case study of 12 verbs of motion and inception-termination.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 594-597.—Gave 48 university undergraduates 12 sentences, in each of which the verb carried presuppositions or implications about what happened before or after the action of the sentence (e.g., "At 6:00 the bullfighter entered the arena."). Ss were then tested on their ability to comprehend or remember related information (e.g., where the bullfighter was just before or after 6:00). Although linguistic predictions were confirmed for sentences with affirmative verbs, such sentences with negative verbs were apparently presuppositionally and implicationally ambiguous. There was no difference between presuppositions and implications in either comprehension or memory.—*Journal abstract.*



4491. **Hollan, James D.** (Clarkson Coll of Technology) **Some effects of epistemological structure on memory.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 670-676.—Tested graph theoretical models of the epistemological structure imposed upon a set of mathematical concepts by 10 graduate mathematics students and faculty in 3 recall experiments. Exp I showed that recall and confidence of recall were highest for concept pairs connected by short paths, next highest for those connected by long paths, and lowest for those not connected by paths. Exp II replicated the result of Exp I that recall and confidence of recall were greater for concept pairs connected by paths than for those not connected by paths and revealed no differences in recall between concept pairs connected by many paths and those connected by a few paths. Exp III found no differences in recall of abstract and concrete concepts. The abstractness of a concept was quantified by the mean path length from the concept to primitive (undefined) concepts. The approach of building a model of each S's epistemological structure is supported by the finding that, while a given S's definitions of the concepts remained relatively constant, there were considerable differences in definitions of the concepts between Ss.—*Journal abstract.*

4492. **Hudson, Robert L. & Davis, Jerry L.** (Mississippi State U) **The effects of intralist cues, extralist cues, and category names on categorized recall.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 71-75.—Reports 2 experiments which attempted to clarify a procedural problem in a previous study by R. L. Hudson and J. B. Austin (see PA, Vol 45:3478) and to provide support for the hypothesis that context words as recall cues serve to mediate category names. Ss were a total of 148 undergraduates. The results regarding the procedural problem of Hudson and Austin indicate that exposure to context words during recall trials did not artifactually increase recall for context groups. The hypothesis that context cues serve to mediate the category name was supported in Exp II but not in Exp I.—*Journal abstract.*

4493. **Jacoby, Larry L.** (Iowa State U) **The role of mental contiguity in memory: Registration and retrieval effects.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 483-496.—Implicit contiguity of related items whose list presentations are physically disparate results from the S looking back through memory so as to bring the items together in mental experience. Effects of implicit contiguity were examined in 3 experiments with a total of 170 undergraduate Ss by controlling looking-back behavior during list presentation and varying the separation of target items and related items that were later provided as recall cues. The effectiveness of semantic cues was enhanced by their implicit contiguity with target items during study. However, Exp III showed that the effectiveness of acoustically related cues was uninfluenced by either physical or implicit contiguity. Exp III also revealed that finding faster "decay" of acoustic than semantic information is dependent upon retention test arrangements. (19 ref)—*Journal abstract.*

4494. **Johansson, Bo S.; Lindberg, Leif G. & Svensson, Margareta L.** (Uppsala, Sweden) **Effects of encoding strategy, presentation modality, and scoring method on**

**STM performance with the Peterson and Peterson technique.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 656-662.—Replicated L. R. Peterson and M. J. Peterson's (see PA, Vol 34:5499) experiment, using a variation of presentation modality and encoding strategy in 2 experiments with a total of 96 psychology students. The recall data showed that a Peterson and Peterson type forgetting curve was obtained using auditory presentation and instructions to rehearse vocally the trigrams when scoring only completely correct recall within the 1st 3 sec of the recall interval. With visual presentation and instructions to find meaningful trigram interpretations, the forgetting curve was higher and much more flat, especially when scoring position-correct recall within the total 0-10-sec recall interval. No buildup of proactive inhibition could be detected when visual presentation was used together with instructions to find meaningful trigram interpretations. The importance of the different encoding activities for recall performance is discussed. (23 ref)—*Journal abstract.*

4495. **Jones, Sheila.** (University Coll London, England) **Imagery in a short-term memory task.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 76-78.—Instructions for 2 short-term memory spatial tasks involving paired-associate (PA) learning were presented to 48 undergraduates under conditions which either suppressed or permitted the use of imagery mediation. Differential performance of the tasks for the 2 presentation conditions was found to be related to the imagery concreteness of the response members of the PAs when high-imagery stimulus members were used as nonverbal cues in recall. The prediction that imagery would be used spontaneously and effectively when conditions favored its use was confirmed. Results also indicate that the mode of presentation of an instruction sentence (written vs spoken) may be an important variable in subsequent performance of a short-term memory task.—*Journal abstract.*

4496. **Kantowitz, Barry H.** (Purdue U) **Modality effects in recognition short-term motor memory.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 522-529.—Evaluated short-term motor memory (STMM) in a same-different recognition task with male undergraduates. Such a recognition measure offers methodological advantages over production measures of retention. In Exp I, with 8 Ss, an immediate recognition task was used to validate an index of recognition difficulty. In Exp II, with 48 Ss, delays of 0 sec, 20 sec unfilled, and 20 sec filled with paced tapping were used. A complex interaction among type of different trial, delay condition, and modality suggests that systematic changes in visual STMM are produced by activity, while changes in kinesthetic STMM are produced by delay and not by activity. However, an interaction between type of recognition trial and modality was independent of delay condition, suggesting that modality effects in the STMM paradigm cannot be attributed entirely to memory decrements. (15 ref)—*Journal abstract.*

4497. **Lefton, Lester A. & Spragins, Anne B.** (U South Carolina) **Orthographic structure and reading experience affect the transfer from iconic to short-term memory.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 775-781.—A total of 42 undergraduates and



126 1st, 3rd, and 5th graders were shown 8-item pseudowords of either 1st- or 4th-order approximation to English. Processing time was controlled with a visual noise mask, and either the entire array was masked or just the left- or the right-hand side. Results show that (a) processing of letter strings proceeded sequentially from left to right, (b) it proceeded more rapidly for orthographically constrained strings of letters than random strings of letters, and (c) it developed during the early school years with changes in processing strategy essentially complete by about the 3rd or 4th grade.—*Journal abstract*.

4498. Loftus, Elizabeth F. & Palmer, John C. (U Washington) **Reconstruction of automobile destruction: An example of the interaction between language and memory.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 585-589.—Conducted 2 experiments in which a total of 195 students viewed films of automobile accidents and then answered questions about events occurring in the films. The question, "About how fast were the cars going when they smashed into each other?" elicited higher estimates of speed than questions which used the verbs *collided*, *bumped*, *contacted*, or *hit* in place of *smashed*. On a retest 1 wk later, those Ss who received the verb *smashed* were more likely to say "yes" to the question, "Did you see any broken glass?", even though broken glass was not present in the film. Results are consistent with the view that the questions asked subsequent to an event can cause a reconstruction in one's memory of that event.—*Journal abstract*.

4499. Madigan, Stephen. (U Southern California) **Cue-dependent effects in recall of categorized lists.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 700-702.—Similarities between cued and noncued recall suggest that both measure the same underlying processes. Differences suggest the utility of cueing procedures in identifying the origin of characteristics of recall—any feature of noncued recall that is altered by provision of cues must originate in the retrieval process; features resistant to such modification represent encoding or storage effects.

4500. Mandler, George & Boeck, Wayne J. (U California, San Diego) **Retrieval processes in recognition.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 613-615.—Retrieval processes in the long-term recognition of well organized material showed the expected organizational effects on "slow" recognition responses. 21 Ss sorted 100 words into 2-7 categories until a stable organization was achieved. Data show the usual correlations between organization (number of categories used) and recall and recognition. Recognition tests a week after the sorting task revealed no differences between Ss using many or few categories for the "fast" recognition responses, defined as the faster 50% of each S's latency distribution. The organizational effect was clearly evident for the "slow" 50% of the responses. Data support the retrieval-check hypothesis in recognition under the assumption that retrieval operations take additional time during the recognition process.—*Journal abstract*.

4501. Mewhort, D. J. (Queen's U, Kingston, Ontario, Canada) **Accuracy and order of report in tachistoscopic identification.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 383-398.—Presents a 2-process

model which considers both encoding and rehearsal processes in a free-recall tachistoscopic identification task. It is suggested that the transfer of material from iconic storage to verbal short-term memory involves a rapid left-to-right operation (scanning) which proceeds more rapidly when dealing with familiar letter patterns. The scan loads short-term memory by converting the parallel spatial array held in the icon to a sequential one in preparation for response organization within short-term memory. Organization within short-term memory involves a relatively slow and iterative rehearsal loop established in terms of the temporal organization resulting from the scan. An experiment with 32 undergraduates is reported which illustrates some implications of the model. In particular, the experiment shows the separate contribution of scanning and rehearsal to the organization of a sequential response. It also shows that although both mechanisms exploit the structure of familiar letter patterns, they do so independently. (French summary) (27 ref)—*Journal abstract*.

4502. Monty, Richard A.; Karsh, Robert & Taub, Harvey A. (US Army Human Engineering Lab, Behavioral Research Directorate, Aberdeen Proving Ground, MD) **The effect of set on encoding and rehearsal processes in memory.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 691-694.—Determined the effect of manipulating each of 120 college student S's preparation for what he will see on a given trial on his ability to mentally keep track of the number of occurrences of each of several different stimuli in a sequence. It was found that, when the same stimuli were used from trial to trial, performance was significantly better than when different stimuli were used. Foreknowledge of the specific stimuli to be used on a given trial did little to improve performance per se, but it did reduce labeling errors. Results are discussed in terms of the "spatial window" model of keeping-track performance.—*Journal abstract*.

4503. Murdock, Bennet B. & Wells, J. Elisabeth. (U Toronto, Ontario, Canada) **Parameter invariance in short-term associative memory.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 475-488.—Used a confidence-judgment recognition procedure, a forced-choice recognition procedure, and a cued-recall procedure to test 3 different models of short-term associative memory. Each of 8 undergraduates was given 640 tests on each procedure; presentation rate was also a within-Ss variable. The models tested were a cross-reference model based on independent forward and backward associations, an access-time model, and strength theory. The cross-reference model underpredicted recall, but was adequate for the recognition data. The access-time model could predict either type of recognition data separately but not together. Strength theory fared quite poorly. (28 ref)—*Journal abstract*.

4504. Nelson, Thomas O. & MacLeod, Colin M. (U Washington) **Fluctuations in recall across successive test trials.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 687-690.—Investigated whether item fluctuation (inter-trial forgetting and spontaneous recovery) depends upon the time allowed for recall and/or the demand characteristics of the experimental situation (manipulated via instructions to S). 144 undergraduates studied a 36-item list and then had 2 successive recall trials which were 9,



36, or 144 sec in duration. On the 2nd recall trial, Ss were instructed to recall previously recalled items only ("old"), previously nonrecalled items only ("new"), or both previously recalled items and previously nonrecalled items ("both"). Results suggest that (a) although recall trial duration affected the overall amount of recall, it did not affect the amount of item fluctuation and (b) instruction to recall only "old" items or to recall only "new" items resulted in suppression of the nonrequested items without a corresponding facilitation for the requested items.—*Journal abstract.*

4505. **Ninio, Anat & Kahneman, Daniel.** (Hebrew U, Jerusalem, Israel) **Reaction time in focused and in divided attention.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 394-399.—Undergraduates listened to dichotic lists of words and responded to animal names by pressing a key. Group 1 (36 Ss) performed in a condition of focused attention to one of the messages and in a condition of divided attention, where both messages were relevant. Group 2 (8 Ss) performed in focused attention and in a single-message condition. It was found that there were many more omissions in divided than in focused attention, and mean reaction time (RT) was prolonged. There was no difference in RT between focused attention and the single-message condition. The occurrence of an animal name in the irrelevant message occasionally caused errors. Results are consistent with an effort theory of attention. (18 ref) —*Journal abstract.*

4506. **Norman, M. Frank.** (U Pennsylvania) **Effects of overtraining, problem shifts, and probabilistic reinforcement in discrimination learning: Predictions of an attentional model.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Develops a model for discrimination learning which was proposed by D. Zeaman and B. J. House (1963) and by E. Lovejoy (1968). Called the ZHL model, the formulations incorporate interacting perceptual- and response-learning processes and are illustrated within the context of several experiments. (16 ref)

4507. **Paivio, Allan.** (U Western Ontario, London, Canada) **Spacing of repetitions in the incidental and intentional free recall of pictures and words.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 497-511.—Lists containing repeated pictures (PP), repeated words (WW), pictures repeated as words or vice versa (PW), and unpeated items were recalled following incidental, intentional control, or standard free recall instructions presented to a total of 378 undergraduates in 2 experiments. Theoretical interest centered on the effects of spacing of repetitions and the degree to which the repeated events are additive (statistically independent) under different conditions. Results show that (a) spacing enhanced recall for all types of repetitions under standard instructions, but only PP repetitions benefitted from spacing under incidental conditions; (b) under standard conditions, PP and WW repetitions were less than additive when massed but became additive when spaced, whereas PW repetitions were at least additive whether massed or spaced; and (c) most repeated events displayed independence under incidental conditions.

Results indicate differential encoding and attentional processes in the lag effect, and dual coding in picture-word memory. (20 ref)—*Journal abstract.*

4508. **Pellegrino, James W. & Battig, William F.** (U Colorado, Inst for the Study of Intellectual Behavior) **Effects of semantic list structure differences in free recall.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 65-67.—Results of a study with 37 undergraduates show that free-recall learning of a mixed list of 20 related and 20 unrelated words was enhanced more if the related words belonged to common taxonomic categories than if they were hierarchically ordered as a single branch of a "semantic tree" (e.g., *animal, mammal, dog, terrier*). The same difference obtained in 1-wk delayed recall. No significant taxonomic-hierarchic differences were found in clustering. More detailed analyses indicated the hierarchical recall decrement to reflect fewer recalled items per set during learning, but fewer sets represented in delayed recall. These results are interpreted on the basis of a 2-stage retrieval process, distinguishing access to a semantic set from subsequent access to items within the set.—*Journal abstract.*

4509. **Pick, Anne D.; Pick, Herbert L. & Hales, Jacqueline J.** (U Minnesota) **Selective attention to words and colors.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 85-87.—27 undergraduates made same-different judgments for pairs of words that were either color names or object names. The words of a pair were printed in either matching or different color print. Responses were directed to the print color, to the words, or to both. Both print color and color names lengthened response time in several experimental conditions. It is hypothesized that only the information necessary for judgments is processed initially; the words are read, and interference is produced only after color and/or letter-shape differences have been detected.—*Journal abstract.*

4510. **Postman, Leo & Burns, Sheila.** (U California, Berkeley) **Long-term retention as a function of word concreteness under conditions of free recall.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 703-708.—Acquisition and long-term retention of concrete (C) and abstract (A) words by 128 university students were investigated under conditions of multiple-trial free recall. Both unmixed and mixed lists were used in original learning. Retention was tested either 1 min or 1 wk after attainment of the learning criterion. Acquisition was faster and retention was higher for C than for A words. These differences were more pronounced for mixed than for unmixed lists. (17 ref)—*Journal abstract.*

4511. **Raeburn, Vicki P.** (Vassar Coll) **Priorities in item recognition.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 663-669.—Used S. Sternberg's (see PA, Vol 40:10810) paradigm to examine item recognition in 2 experiments with a total of 18 university students. Functions relating reaction time to positive set size and relating reaction time to the serial position of positive targets are discussed within the context of Sternberg's (1969) recognition model. It was hypothesized that (a) certain members of the positive set receive preferential processing and (b) some members of the negative set are compared to the target in memory. Results of both experiments support the 1st hypothesis, and results of Exp I support the 2nd hypothesis.—*Journal abstract.*

4512. Robbins, Donald & Bray, James F. (Emory U) **The spacing effect and the A-B, A-C paradigm: Evidence for retroactive facilitation.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 420-425.—Varied (a) the retention interval in a continuous paired-associate task after 1 or 2 presentations of a pair of words, and (b) the lag between the 2 presentations. Half of the twice-presented items represented an A-B, A-C negative transfer design, while the other half were A-B, A-B items. 3 groups of undergraduate Ss ( $N = 60$ ) were instructed, with regard to the A-B, A-C items, to recall on test trials either Response B, C, or both B and C. The results from the A-B, A-C items revealed that Ss asked to recall both B and C performed at the same level as Ss required to recall only B or only C. In addition, under some conditions evidence of retroactive facilitation was found. Specifically, under these conditions the presentation of A-C was as effective as a 2nd presentation of A-B for the recall of B for a relatively long retention interval. It is concluded that current memory models must be modified to account for retroactive facilitation.—*Journal abstract.*

4513. Runquist, Willard N. (U Alberta, Edmonton, Canada) **Formal and semantic similarity of stimuli and recall time.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 79-80.—Gave to 144 undergraduates 7 study-test trials on paired-associate lists varying in intralist stimulus similarity. Stimuli rhymed, were from the same conceptual category, or were dissimilar. Study time was constant at 2 sec/item, but time allowed for recall on paced test trials was either 1 or 3 sec. At the faster rate, the formally similar stimuli produced more interference than did the semantically similar stimuli. There was also some evidence that semantic similarity did not produce much interference early in learning. At the slower rates, the 2 high-similarity conditions produced substantial but equal amounts of interference. Results are consistent with a sequential coding hypothesis.—*Journal abstract.*

4514. Salthouse, Timothy A. (U Michigan, Human Performance Ctr) **Using selective interference to investigate spatial memory representations.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 749-757.—Conducted 2 experiments with 36 undergraduates and 48 paid Ss, respectively, in which a selective interference procedure was used to determine whether nonverbal visual stimuli were represented in memory in a verbal or spatial format. In both experiments, Ss were required to remember either the positions or the identities of 7 target items in a 25-item array. During the retention interval for that information, Ss attempted to recognize schematic face or airplane photograph stimuli in a same-different memory task. Memory performance on one or both tasks was greatly impaired when the recall task involved position or spatial information, but was either much less or not at all affected by an identity or verbal information recall task. Because of the selective nature of the interference and on the basis of certain correlational evidence, results are interpreted as providing support for the notion that verbal and spatial information are stored and processed in separate information-processing systems. (16 ref)—*Journal abstract.*

4515. Shiffrin, Richard M. & Schneider, Walter. (Indiana U) **An expectancy model for memory search.**

*Memory & Cognition*, 1974(Oct), Vol 2(4), 616-628.—Proposes a model for memory search in which S first forms an "expectancy" regarding the item to be tested on the next trial, then carries out a memory search. It is proposed that an expected item is encoded faster (or perhaps responded to more quickly), but the memory scanning process for expected and unexpected items is otherwise identical. Assuming a serial exhaustive scanning process, it was possible to fit much of the data in the literature. In addition, the model was tested by having each of 5 paid university students give his expectancy aloud before each trial. Data show about a 100-msec advantage for expected items that did not interact with memory load. The model fits this data reasonably well. (36 ref)—*Journal abstract.*

4516. Sullivan, Edith V. & Turvey, M. T. (U Connecticut) **On the short-term retention of serial, tactile stimuli.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 600-606.—In 3 experiments using the short-term memory distractor paradigm, a total of 96 female undergraduates attempted to remember which 3 or 4 phalanges of the left hand had been stimulated and in what order. The experiments showed that forgetting increased as a function of trials, that such proactive effects could be eliminated by separating the successive trials by several minutes, that both verbal and nonverbal distractor tasks impaired retention, and that forgetting reached a maximum in approximately 6 sec. Results concur with those generally obtained for the short-term retention of verbal material. Tactile recall was significantly poorer after an arithmetic distractor task presented visually than after the same task presented aurally. This result suggests an overlap between the mechanisms of tactile retention and the mechanisms of vision. (22 ref)—*Journal abstract.*

4517. Timmins, W. K. (Australian National U, Canberra, ACT) **Varying processing time in directed forgetting.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 539-544.—Presented 21 undergraduate Ss with trials consisting of 3 sets of 5 words each. Some of these trials included an instruction to forget one of the sets of words. Both recall of the to-be-remembered words and recognition of the to-be-forgotten words was directly related to the time during which the S had to maintain the words in memory. Results are seen as consistent with a view that, to be effective, a cue to forget must be presented before a certain minimal amount of processing has taken place.—*Journal abstract.*

4518. Walley, Roc E. & Weiden, Theodore D. (U Alberta, Edmonton, Canada) **Giving flesh to a "straw man": A reply to Feeney, Pittman, and Wagner.** *Psychological Review*, 1974(Nov), Vol 81(6), 540-542.—Replies to the recent attack by D. M. Feeney et al (see PA, Vol 53:Issue 3) on R. E. Walley and T. D. Weiden's 1973 neuropsychological theory of attention. It is argued that Feeney et al used "straw man" arguments based on misinterpretations of the theory. An attempt is made to show that the Walley and Weiden theory can account for the data discussed by Feeney et al, as well as additional data not cited by these authors.—*Journal abstract.*

4519. Weaver, George E. (Florida State U) **Effects of poststimulus study time on recognition of pictures.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 799-801.—Complex color photographs served as



stimuli to 108 paid undergraduates in an investigation of visual recognition memory. Increases in both stimulus duration (1 or 3 sec) and in the unfilled (dark) interstimulus interval (2 or 6 sec) led to improved performance in a 2-alternative forced-choice recognition test. The superiority of recognition associated with increases in interstimulus interval duration suggests that, even for complex visual stimuli, poststimulus processing is important for subsequent retention.—*Journal abstract.*

4520. Wickelgren, Wayne A. (U Oregon) **Single-trace fragility theory of memory dynamics.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 775-780.—Considers that, in single-trace fragility theory, forgetting is produced by 2 factors, time and interference. Memory traces are assumed to have 2 partially coupled dynamic properties, strength and fragility. Strength determines the probability of correct recall and recognition, while fragility determines the susceptibility of the trace to the time-decay process but not to the interference process. Consolidation is assumed to be a continual reduction in the fragility of the memory trace rather than any change in strength or availability. Decreasing fragility accounts for the continually decreasing forgetting rate, the temporal character of retrograde amnesia and recovery therefrom, and the type of internal clock necessary for nonassociative recency judgments. Data are presented to indicate that interference is independent of the interval between original and interpolated learning, that nonassociative recency discriminability approaches a limit at about 30 min, and that the decay rate of long-term retention in amnesic patients is the same as in normal Ss. (18 ref)—*Journal abstract.*

4521. Wickelgren, Wayne A. (U Oregon) **Strength/resistance theory of the dynamics of memory storage.** In D. H. Krantz, R. C. Atkinson, R. D. Luce & P. Suppes (Eds), *Contemporary developments in mathematical psychology: I. Learning, memory and thinking*. San Francisco, CA: W. H. Freeman, 1974. xiii, 299 p. \$9.—Attempts to characterize the dynamics of storage in memory from the end of the learning period to the time of retrieval. Assumptions relevant to the retrieval of memory traces in "yes-no" recognition, multiple-choice recognition, recall, and recency memory tasks are discussed, and phenomena in the dynamics of short- and long-term memory traces (e.g., exponential power decay, storage interference, and retrograde amnesia) are detailed. (48 ref)

4522. Wicker, Frank W. & Holley, Freda M. (U Texas, Austin) **Recognition ratings and imagery mediation with pictures and words.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 120-122.—The effect of stimulus recognition ratings on immediately subsequent response recall in the test-trial of paired-associate learning was evaluated with picture and word stimuli in conjunction with 2 visual distracting tasks. Ss were 60 undergraduates. Recall was reduced by the recognition ratings, but this effect appeared independent of stimulus modality and of visual distraction. It is suggested that the recognition task may disrupt use of imagery mediation but that this disruption does not differ for pictures and words.—*Journal abstract.*

4523. Wolford, George & Hollingsworth, Samuel. (Dartmouth Coll) **Evidence that short-term memory is not the limiting factor in the tachistoscopic full-report**

**procedure.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 796-800.—Conducted an experiment with 5 paid, normally seeing adult Ss to determine whether acoustic short-term memory is the factor which limits performance in the tachistoscopic full-report paradigm. Many Ss have demonstrated the existence of phonemic encoding in short-term memory. The confusion errors from a tachistoscopic full-report task were, therefore, analyzed for the presence of acoustic confusions. Absolutely no evidence for acoustic confusions was found; visual confusions, however, were abundant. It is concluded that acoustic short-term memory is not the limiting factor in the full-report paradigm. (16 ref)—*Journal abstract.*

4524. Yarmey, A. Daniel. (U Guelph, Ontario, Canada) **Proactive interference in short-term retention of human faces.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 333-338.—Tested whether release from proactive interference occurs in short-term recognition memory following a shift in the learning of male faces to the learning of female faces, and vice versa. Ss were 52 female and 52 male college students. Proactive interference was found to increase over 4 successive study-test trials and a significant release effect was obtained on Trial 5. Female faces were more difficult to recognize than male faces after a build-up of proactive interference, suggesting that differential interference for sex attributes had occurred. No differences were found between male and female Ss in the release effect, but female Ss were superior to males on Trials 1-4. Results are discussed in terms of the influence of motivation on memory for faces as well as supporting a theory of visual short-term memory. (French summary) (18 ref)—*Journal abstract.*

4525. Yulle, John C. & Holyoak, Keith. (U British Columbia, Vancouver, Canada) **Verb imagery and noun phrase concreteness in the recognition and recall of sentences.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 359-370.—Examined the role of verb imagery and noun phrase concreteness in determining sentence imagery and memory in 2 experiments with a total of 111 male and 17 female university students. Semantic changes in sentences were recognized more often if the noun phrases were concrete rather than abstract. Free recall of sentences was affected similarly by phrase concreteness. Verb imagery, however, had no effect on either recognition or recall performance. Analysis of recall by type of word indicated that organization of recall centered upon the nouns. Implications of these results for the hypothesis of imaginal coding of concrete sentence meaning are discussed. (French summary) (15 ref)—*Journal abstract.*

### Motivation & Emotion

4526. Boden, Margaret A. (U Sussex, England) **The structure of intentions.** *Journal for the Theory of Social Behaviour*, 1973(Apr), Vol 3(1), 23-46.—Describes the psychological nature of intentions. Each intention is viewed as having a motivational, a procedural, and a bodily operational aspect each of which has its own particular structure. Reasons for psychology's refusal to accept "intention" and other terms of everyday phenomenology as items proper to a scientific psychology are discussed. It is concluded that any satisfactory theory

concerning intentions must recognize and explain their inner structure, showing how it relates to the controlling function of intentions in thought and overt behavior. (28 ref)—R. S. Albin.

4527. Brame, John M. & Blick, Kenneth A. (U Richmond) **Absolute and relative bidirectional transfer in verbal conflict resolution tasks.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 113-119.—In a study with a total of 82 undergraduates, 1 group of Ss resolved 10 double approach-avoidance (DAP-AV) verbal conflicts followed by 10 approach-approach (AP-AP) conflicts, and another group transferred from AP-AP to DAP-AV. 2 additional groups, which resolved 20 conflicts of the same type (AP-AP or DAP-AV), were used in assessing relative transfer effects. Results indicate longer resolution times associated with DAP-AV conflicts ( $p < .05$ ), but no absolute or relative transfer in either direction. Failure to demonstrate transfer effects may have resulted from interference in the production of a response set or from the failure of a specific response set to generalize to a new task.—*Journal abstract*.

4528. González de Chávez, Manuel. ("Francisco Franco" Provincial Sanitarium, Psychiatric Clinic, Madrid, Spain) [History of research on jealousy.] (Span) *Archivos de Neurobiología*, 1972(May), Vol 35(3), 205-224.—Discusses 3 stages in research on jealousy: (a) the study of jealousy as a normal or pathological emotion, (b) study of the jealous person, and (c) study of the social context of jealousy, i.e., the social factors which influence jealousy in the individual. (English & French summaries)

4529. Levine, Jerrold M.; Samet, Michael G. & Brahmek, Rae E. (American Inst for Research, Washington, DC) **Information seeking with input pacing and multiple decision opportunities.** *Human Factors*, 1974(Aug), Vol 16(4), 384-394.—48 paid male undergraduates performed a task in which they had to request updated enemy position reports from 3 information sources to determine which of 8 locations was the target of a gradual enemy advance. 8 different problems, presented twice each, were arranged into 2 factorial designs. In Design FP, the effects of pacing rate, pacing variability, and the number of decision modification opportunities were evaluated. In Design SP, information requests were self-paced rather than forced-paced; the effects of the number of decision modification opportunities and basis of payoff were studied. Results indicate that (a) self pacing and fast forced pacing resulted in more information seeking and greater accuracy than did slow forced pacing and (b) increased opportunities for decision modification generally decreased the accuracy of, and confidence in, 1st decisions. The rate at which information was presented was more important than whether it was provided automatically or upon request.—*Journal abstract*.

4530. May, Richard B. & Hutt, Corinne. (U Victoria, British Columbia, Canada) **Response to stimulus uncertainty in four-, six-, and eight-year-old children.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 127-133.—Allowed 48 school children to play with a button-press light-display apparatus. 4-, 6-, and 8-yr-old groups all pressed more for high uncertainty (8 lights) than for low uncertainty (1 light), but the effect was most pronounced

for the youngest age group. 2 min of pretest sensory restriction for half the Ss had no reliable effect upon their button-pressing behavior. In addition, most Ss stated that they "liked best" the high uncertainty stimulus display. However, even those who verbalized other preferences still pressed more for the high uncertainty display, emphasizing the difficulty of comparing overt choices with verbally stated preferences.—*Journal abstract*.

4531. Zillman, Dolf; Hoyt, James L. & Day, Kenneth D. (Indiana U) **Strength and duration of the effect of aggressive, violent, and erotic communications on subsequent aggressive behavior.** *Communication Research*, 1974(Jul), Vol 1(3), 286-306.—Investigated the aggression-modifying, immediate effect on provoked individuals of exposure to a neutral, an aggressive, a violent, or an erotic communication. Ss were 60 male undergraduates. All communications were followed by a common, noninvolving, nonaggressive communication. Under these conditions, neither the effect of the aggressive or the violent communication differed from the effect of the neutral communication. In contrast, the effect of the erotic communication significantly exceeded the effects of all other communications, yielding more intense aggressiveness. Measures of excitatory changes were also obtained. The differentiation of these measures coincided with the differentiation of measured aggressiveness, thus lending support for the excitation-transfer paradigm. (18 ref)—*Journal abstract*.

4532. Zillmann, Dolf; Johnson, Rolland C. & Day, Kenneth D. (Indiana U, Inst for Communication Research) **Attribution of apparent arousal and proficiency of recovery from sympathetic activation affecting excitation transfer to aggressive behavior.** *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 503-515.—In a pretest, 60 male undergraduates' proficiency to recover from sympathetic arousal induced by strenuous exercise was assessed. Results were used to determine conditions of high, intermediate, and low recovery proficiency (fitness). After an assessment of 48 Ss' unprovoked aggressiveness, Ss were aggressively provoked. Within proficiency blocks, they were then given 1 of 2 treatments: (a) sitting followed by exercising (no decay) or (b) exercising followed by sitting (partial decay). Ss were then provided with an opportunity to retaliate against their tormentor. Findings show that under conditions in which apparent extero- and/or interoceptive cues of prior arousal were present, provocation did not increase aggressiveness. However, under conditions in which cues of prior arousal were not present, and excitatory residues still prevailed, aggressiveness did increase. Overall data indicate that provoked aggressiveness is not proportional to the magnitude of arousal active at the time retaliatory opportunities are provided.—*Journal abstract*.

## NEUROLOGY AND PHYSIOLOGY

4533. Bergström, R. M. (U Helsinki, Inst of Physiology, Finland) **Entropy and information in fetal behavior.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.*



New York, NY: Academic Press, 1974. xv, 287 p.—Discusses research on the development of order in fetal behavior and presents a quantitative entropy model of the fetal brain. This model, tested on the guinea pig fetus, indicates that the information content of fetal behavior depends not only on the size of the maturing central nervous system but also on the level of excitation of the central nervous system effected by the afferent input. (38 ref)

4534. Berry, Martin. (U Birmingham, Medical School, England) **Development of the cerebral neocortex of the rat.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.* New York, NY: Academic Press, 1974. xv, 287 p.—Reviews investigations from the literature, tracing the characterizations of the cerebral cortex during pre- and neonatal periods. The evolution of the neocortex—from the primitive pyriform type through archicortex to neocortex by a genetic-environmental change which prolongs mitosis in the ventricular zone and permits the guidance system to persist—is described, and the late ontogeny of microneurons as an inhibitory mechanism in the insulation of the central nervous system is postulated. (13 p ref)

4535. Crain, Stanley M. (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr for Research in Mental Retardation & Human Development, Yeshiva U) **Tissue culture models of developing brain functions.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.* New York, NY: Academic Press, 1974. xv, 287 p.—Summarizes the major evidence in support of model systems of brain cellular tissue culture and points out the limitations involved in extrapolating data from minute, neuronally isolated bits of central nervous system tissues in culture back to problems of central nervous system development in the intact organism. (7 p ref)

4536. Galin, David. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Implications for psychiatry of left and right cerebral specialization: A neurophysiological context for unconscious processes.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 572-583.—Presents a brief review of hemispheric specialization for different cognitive modes and of the symptoms that follow disconnection of the 2 hemispheres by commissurotomy. Parallels are noted between some aspects of the mental processes of the disconnected right hemisphere and some aspects of primary process thinking and repression. The hypothesis is proposed that in normal intact people mental events in the right hemisphere can become disconnected functionally from the left hemisphere (by inhibition of neuronal transmission across the cerebral commissures) and can continue a life of their own. This hypothesis suggests a neurophysiological mechanism for at least some instances of repression and an anatomical locus for the unconscious mental contents. (129 ref)—*Journal abstract.*

4537. Goldstein, Murray. (NIH, National Inst of Neurological Diseases & Stroke, Bethesda, MD) **Brain research and violent behavior.** *Archives of Neurology*, 1974(Jan), Vol 30(1), 1-35.—Summarizes 4 workshop reports on investigations of the brain and aggressive behavior. Topics include neuroanatomical and neuro-

physiological studies; neurochemical, endocrine, pharmacological, and genetic studies; behavioral studies; and clinical studies.

4538. Gottlieb, Gilbert (Ed). **Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.** New York, NY: Academic Press, 1974. xv, 287 p.

4539. Hughes, A. F. (Case Western Reserve U) **Endocrines, neural development, and behavior.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.* New York, NY: Academic Press, 1974. xv, 287 p.—Suggests that endocrine control of nervous development and the neural basis of the ontogeny of behavior should be considered together and discusses the problems of structure and function with respect to 3 classes of vertebrates: the anura, the urodeles, and mammals. (5 p ref)

4540. Jacobson, Marcus. (Johns Hopkins U) **A plentitude of neurons.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.* New York, NY: Academic Press, 1974. xv, 287 p.—Notes the morphological and functional diversity of the very large number of nerve cells in the nervous system of vertebrates and discusses the selection process in which the competitive interactions between neurons of diverse functional capabilities results in the survival of those with functional and structural congruence. The development of Class I and Class II neurons is traced. (36 ref)

4541. Riddell, William; Corl, Kenneth; Bennett, Van D. & Reimers, Richard O. (State University Coll New York, Brockport) **Discrimination learning differences and similarities as a function of brain index.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 401-405.—Tested 7 tree shrews, 10 squirrel monkeys, and 12 college students on a series of extradimensional shifts involving position and brightness dimensions. While the number of errors each species made per problem differed and conformed to an index of central nervous system development, there were no consistent differences between species in terms of the percentage of total errors per problem. Results indicate the lack of functional differences between those species tested. (18 ref)—*Journal abstract.*

4542. Székely, George. (U Pécs, Medical School, Hungary) **Problems of neuronal specificity in the development of some behavioral patterns in amphibia.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis.* New York, NY: Academic Press, 1974. xv, 287 p.—Surveys the results and proposes alternative interpretations of 3 basic experiments on which the theory of neuronal specificity has been based: corneal specificity, cutaneous local sign specificity, and myotypic specificity. (3 p ref)

#### Neuroanatomy & Electrophysiology

4543. Batini, C. & Buisseret, P. (U Paris VI, Lab of Sensory Psychophysiology, France) **Sensory peripheral pathway from extrinsic eye muscles.** *Archives Italiennes de Biologie*, 1974(Jan), Vol 112(1), 18-32.—Recorded the response of cerebellar Purkinje cells to stimulation of nerves to the extrinsic eye muscles in anesthetized cats in

order to determine the peripheral pathway for proprioceptive fibers from the muscles. The effects of cutting the muscle nerves or the ophthalmic division of the trigeminal nerve led to the general conclusion that the proprioceptive fibers are in the muscle nerve for the intraorbital part but then cross to the ophthalmic nerve for the intracranial passage to the brain stem. This applies to all branches of nerve III and to nerve IV, but some of the proprioceptive fibers from the lateral rectus muscle appear to remain with nerve VI.—W. A. Wilson.

4544. Borges, Salvador & Butler, Stuart. (Medical School, Birmingham, England) Use of a commercial photographic flashgun as an optical stimulator. *Physiology & Behavior*, 1974(Nov), Vol 13(5), 719-720.

4545. Everhart, J. D.; China, C. L. & Auger, R. A. (VA Hosp, Salisbury, NC) Measures of EEG and verbal intelligence: An inverse relationship. *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 374-378.—An inverse relationship existed between WAIS verbal IQ scores and measures obtained from a commercial EEG device, the neural efficiency analyzer, administered to a total of 73 18-63 yr old adult volunteers representing a variety of occupations and educational ranges. It is concluded that the relationship was one between psychometric verbal intelligence and spontaneous ongoing EEG frequency. The amount of variance accounted for by the correlation was too small, however, to warrant use of the instrument as a predictor of psychometric intelligence. (23 ref) —Journal abstract.

4546. Flanigan, W. F. (US Naval Undersea Ctr, Biomedical Div, San Diego, CA) Sleep and wakefulness in chelonian reptiles: II. The red-footed tortoise, *Geochelone carbonaria*. *Archives Italiennes de Biologie*, 1974(Jul), Vol 112(3), 253-277.—Made electrographic recordings from the forebrain, midbrain, orbital cavity, nuchal muscles, and dorsal shell of 5 tortoises for 7-10 days. Spontaneous behavior and response to stimuli were also noted. 4 postures were identified, 2 of which were thought to denote behavioral sleep. EEGs were slightly lower in frequency and amplitude during sleep. Slow waves and paradoxical sleep were not seen, but arrhythmic spikes and sharp waves (which characterize tortoise EEGs) were most common during sleep. These wave forms increased in frequency during recovery from 48 hrs of enforced wakefulness. It is suggested that the generators of reptilian spikes and slow waves may be analogous to the generators of slow waves in higher vertebrates.—W. A. Wilson.

4547. Flanigan, W. F.; Knight, C. P.; Hartse, K. M. & Rechtschaffen, A. (US Naval Undersea Ctr, Biomedical Div, San Diego, CA) Sleep and wakefulness in chelonian reptiles: I. The box turtle, *Terrapene carolina*. *Archives Italiennes de Biologie*, 1974(Jul), Vol 112(3), 227-252.—Made electrographic recordings from the forebrain, midbrain, orbital cavity, extraocular and nuchal muscles, and dorsal shell of 10 turtles for 7-9 days. Spontaneous behavior and response to stimuli were also noted. 4 postures were identified, 2 of which were thought to denote behavioral sleep. Unlike mammals and birds, there were long periods which could not be easily classified as either sleep or wakefulness. EEGs were slightly lower in frequency and amplitude during sleep. Slow waves and paradoxical sleep were not seen,

but arrhythmic spikes and sharp waves (which characterize turtle EEGs) were most common during sleep. These wave forms increased in frequency during recovery from 48 hrs of enforced wakefulness. It is suggested that sleep evolved at least 300 million yrs ago, before the separation of the reptilian, avian, and mammalian lineages.—W. A. Wilson.

4548. Gondeck, Allan R. & Smith, Jack R. (U Florida) Dynamics of human sleep sigma spindles. *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 293-297.—Describes a computerized study of between Ss, night-to-night, and epoch-to-epoch variations in the frequency of activity of human sleep sigma spindles. Frequency was defined in terms of the time between alternate zero crosses of the filtered EEG. Data collection was performed using a nest structure: 20 spindles from each of 3 epochs of Stage 2 sleep from each of 2 nights' sleep from each of 5 Ss. Average frequencies for 3 groups of Ss (10-15, 20-40, and over 65 yrs of age) were 12.90, 13.57, and 13.60 c/sec, respectively; significant differences ( $p < .10$ ) were obtained between the frequencies of the youngest Ss and the other 2 groups, but not between the middle and oldest groups. Average frequencies within the individual sigma spindles were remarkably stable (i.e., the night-to-night variations were quite small). The average frequency tended to be less in the middle of the night. (French summary) —Journal summary.

4549. Heath, Robert G. & Harper, Jon W. (Tulane U, Medical School) Ascending projections of the cerebellar fastigial nucleus to the hippocampus, amygdala, and other temporal lobe sights: Evoked potential and histological studies in monkeys and cats. *Experimental Neurology*, 1974(Nov), Vol 45(2), 268-287.—Evoked potential findings in 10 adult male rhesus monkeys and 3 histological findings in 18 adult male cats and 3 additional monkeys suggest that the cerebellar fastigial nuclei, through direct connections to the temporal neocortex and deep temporal lobe sites, can profoundly affect the function of the higher nervous system and behavior. (45 ref)

4550. Heppner, Thomas J. (Rush-Presbyterian—St Luke's Medical Ctr, Chicago, IL) Stimulus-analyzing mechanisms in the cat visual cortex. *Experimental Neurology*, 1974(Nov), Vol 45(2), 257-267.—Observed 56 individual neurons in the visual cortex of 31 cats while the orientation and intensity of illumination of a preferred visual stimulus was varied. In addition to showing the typical sensitivity to stimulus orientation the units were also sensitive to intensity. 52 units increased firing rate with increased intensity. Thus, even at higher levels of the visual pathway where neurons are noted for their ability to abstract elements of form from the total visual input, intensity continues to exert a major influence. For a given neuron various combinations of intensity and orientation produced the same response. Results do not support a "place" theory of pattern recognition. (20 ref)—Journal abstract.

4551. Ishiko, Nobusada. (Medical Coll Miyazaki, Japan) Local gustatory functions associated with segmental organization of the anterior portion of cat's tongue. *Experimental Neurology*, 1974(Nov), Vol 45(2), 341-354.—Electrophysiological studies of the tongues of



26 cats show that the anterior branch field of the lingual nerve responded poorly to all taste qualities but responded strongly to cooling of the tongue. The medial branch field was highly responsive to NaCl, water, and warmed saline, whereas the responsiveness of the posterior branch field to HCl was stronger than other areas. Findings show localization of specific sensory properties over different tongue regions.

4552. Iwahara, Shinkuro; Noguchi, Setsuko; Yang, Kuo-Man & Oishi, Hiroshi. (Tokyo U of Education, Japan) **Frequency specific and nonspecific effects of flickering lights upon electrical activity of the human occiput.** *Japanese Psychological Research*, 1974(May), Vol 16(1), 1-7.—Observed the occipital EEG under rhythmic photic stimulation (F) and under nonflicker (NF) stimulation for 11 healthy human adults. Data were frequency-analyzed, and the obtained values in 10-sec units for 7 frequency bands were used as cortical responses. The spontaneous or NF activity was blocked by eye opening (EO) for all bands, particularly for the alpha band in which the S's spontaneous alpha activity was included. The same blocking effect (I) was observed by flicker both with eyes closed and opened, and this effect was relatively independent of flicker frequency. The nonspecific I effect was estimated per band, and the frequency-specific effect (FE) was computed by adding the absolute value of I to the difference in the cortical response between F and NF. The FE spectrum in relation to the NF spectrum was little affected by EO, was only slightly different in dominant-alpha and poor-alpha Ss, and had a wider distribution with a higher mode.—*Journal abstract.*

4553. Kutas, Marta & Donchin, Emanuel. (U Illinois) **Studies of squeezing: Handedness, responding hand, response force, and asymmetry of readiness potential.** *Science*, 1974(Nov), Vol 186(4163), 545-548.—7 right-handed and 4 left-handed male university students squeezed an electronic dynamometer at each of 3 force levels with both their right and left hands. In right-handed Ss the premovement readiness potentials were larger over the hemisphere contralateral to the responding hand. Left-handed Ss showed contralateral dominance when responding with the right hand but not when responding with the left hand. Data suggest that in the potentials studied there is a component associated with the preparation to perform a specific movement, rather than with generalized preparatory processes. (19 ref) —*Journal abstract.*

4554. Lazarus, Gary M. **The visual evoked potential: A discussion of its morphology, function, as well as recording and averaging techniques: III.** *Journal of the American Optometric Association*, 1974(Aug), Vol 45(8), 946-951.—Reviews the literature, tracing the development of research into the human visual evoked potential (VEP) from 1950 when the VEP was transcranially recorded using superimposition and averaging techniques. Differentiation of a primary complex formed by the 1st 3 waves from a secondary complex formed by waves with greater latency is noted as a breakthrough in VEP morphology. Among the empirical data discussed are identification of a photic evoked response using a monopolar electrode technique; spatiotemporal mapping of the VEP; modification of VEP waves in relation to

photopic and scotopic receptors of the retina; correspondence of the electrical field of the VEP to the alpha activity of the occipital region; relation of VEP variability to the intensity, frequency, and shape of the stimulus; and development of the VEP as a function of age.—B. McLean.

4555. Meyerson, B. A. & Persson, H. E. (Karolinska Sjukhuset, Stockholm, Sweden) **Early epigenesis of recipient functions in the neocortex.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis*. New York, NY: Academic Press, 1974. xv, 287 p.—Examines 3 types of cortical evoked responses—somesthetic interhemispheric, and visual—and describes experiments performed on sheep fetuses, externalized and kept in contact with the placenta. The gross morphology of evoked surface of intra- and subcortical responses and the concomitant extracellular unitary activity are described. (4 p ref)

4556. Persson, Jan. (Sahlgren Hosp, Göteborg, Sweden) **Comments on estimations and tests of EEG amplitude distributions.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 309-313.—Considers that in calculating errors connected with estimations of EEG amplitude distributions and in testing the normality of the signal, it is necessary that the signal be stationary and that the samples derived from the signal are mutually independent. A series of tests, including Kolmogorov-Smirnov tests, applied to an EEG sequence demonstrate that an experimental design giving a mutual dependence of less than .5 between adjacent samples may be allowed. (French summary) (20 ref)

4557. Powell, Ervin W. & Hines, Garth. (U Arkansas, Medical School, Little Rock) **The limbic system: An interface.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 149-164.—Much research has related limbic structure with hypothalamic function rather than with higher nervous system function. Most studies have dealt with single limbic structures rather than with several as interrelated functional systems. Consideration of the total limbic-structure complex indicates that the septum-hippocampus-amygdala form an interface between the isocortex and the thalamus. The author's work relating to projections of the limbic system, especially the septal area, has directed attention to the thalamus as a particularly important target of limbic system projections. Work on projections of the cingulate gyrus reveals that this cortical area projects strongly to other cortical regions as well as to thalamic nuclei. The orbital frontal cortex, cingulate gyrus, and hippocampal gyrus are isocortical areas which then link the limbic system with other corticothalamic systems. This feature, plus strong thalamic connections from the hippocampus, septum, and amygdala, provide a basis for considering the limbic system as an interface between the overlying cerebral isocortex and thalamic structures. This interface may be a key integrating system related to selective modulation of emotion and sensory mechanisms of the brain via a number of feedback circuits wherein recycling could be effected through the temporal and/or the frontal cortex. (5 p ref)—*Journal abstract.*

4558. Rollman, Gary B. (U Western Ontario, London, Canada) **Electrocutaneous stimulation.** In *Conference on*

cutaneous communication systems and devices. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Reviews the literature on the influence of intensity and time on the response of the somatosensory system to percutaneous electrical stimulation. Studies of pain associated with electrical stimulation are also discussed, and different mechanisms underlying the neural transduction of electrical and mechanical forms of cutaneous activation are suggested. Technical and methodological issues in experimental design and equipment are considered. (79 ref)

4559. Rosenfeld, J. Peter; Hetzler, Bruce E. & Kosnik, William. (Northwestern U, Cresap Neuroscience Lab) **Operant photic evoked potential control, unmediated by selective orientation.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 479-482.—Operantly conditioned 4 rats to increase late negative components of photic evoked potentials. The expected positive relation between component size and light intensity, assuming trivial mediation via selective orientation, was not found.

4560. Schlag, J.; Lehtinen, I. & Schlag-Rey, M. (U California, Los Angeles) **Neuronal activity before and during eye movements in thalamic internal medullary lamina of the cat.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 982-995.—Recorded single-unit activity in the thalamic internal medullary lamina in 10 cats while they made spontaneous exploring saccades evoked by partial reinforcement. Results show that 106 units showed patterns of firing consistently associated with eye movements and indicate that the intralaminar thalamic region, which has widespread connections with other parts of the brain, is involved in the central control of the gaze. (47 ref)

4561. Schneider, Anne S. & Davis, Joel L. (Northern Illinois U) **Interactions of the evoked responses to visual, somatic, and auditory stimuli in polysensory areas of the cat cortex.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 365-372.—Recordings of evoked potentials in the middle suprasylvian gyrus of 14 cats were obtained to pairings of visual, auditory, and somatic stimuli, and 2 response measures were compared. It was found that amplitude recovery of the response to the 2nd stimulus was delayed for pairings of like stimuli as compared to unlike pairings, an effect not altered by varying the intensity of the 1st stimulus. (15 ref)—*Journal abstract*.

4562. Sedláček, Jiriš. (Charles U, Inst of Physiology, Prague, Czechoslovakia) **The significance of the perinatal period in the neural development of precocial mammals.** In G. Gottlieb (Ed), *Studies on the development of behavior and the nervous system: II. Aspects of neurogenesis*. New York, NY: Academic Press, 1974. xv, 287 p.—Discusses results of investigations of electrophysiological parameters of the cerebral cortex as well as behavioral reactions in developing fetal and neonatal guinea pigs. Attention is given to perinatal changes after umbilical arrest and the onset of lung respiration, with respect to the cortical steady potential and primary evoked responses in the cortex. The importance of oxygen supply and vagal input to brain function is stressed. (4 p ref)

4563. Siegel, Jerome M. (VA Hosp, Neuropsychology Research, Sepulveda, CA) **A stereotaxic map of the bony**

tentorium of the cat. *Physiology & Behavior*, 1974(Nov), Vol 13(5), 715-717.

4564. Steriade, M. & Deschênes, M. (U Laval, Lab de Neurophysiologie, Québec, Canada) **Inhibitory processes and interneuronal apparatus in motor cortex during sleep and waking: II. Recurrent and afferent inhibition of pyramidal tract neurons.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 1093-1113.—Studied changes in inhibition of pyramidal tract neurons recorded from the motor cortex during EEG patterns of light sleep and waking in 42 encéphale isolé cats, and during behavioral drowsiness, slow sleep, arousal, and steady wakefulness in 11 chronically implanted rhesus monkeys. Recurrent inhibition was elicited by stimulating the pes pedunculi, and afferent inhibition was obtained by stimulating the specific thalamus. Results show that the period of suppressed spontaneous firing and associated focal slow waves following antidromic or afferent stimuli was 2-3 times shorter during arousal and steady waking than during slow sleep. The increased excitatory drive limiting the duration of the inhibitory period during steady waking and the inhibition of interneuronal activities on arousal are discussed. Deep but short inhibition during waking is viewed as a mechanism leading to sharpening and accuracy in the analysis of incoming messages and the ability to follow rapidly recurring activity. (18 ref)—*Journal summary*.

4565. Steriade, M. (U Laval, Laboratoire de Neurophysiologie, Québec, Canada) **Interneuronal epileptic discharges related to spike-and-wave cortical seizures in behaving monkeys.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 247-263.—Micro-electrode recordings of unit firing and local slow waves from the precentral motor cortex of chronically implanted, sitting rhesus monkeys demonstrated the occurrence, during drowsiness, of focal epileptic events with typical 3-sec spike-and-wave discharges, lasting 5-17 sec and associated with tonic eye movements. The seizures appeared either spontaneously or as discharges following protracted single-shock stimulation or repetitive shocks to the specific thalamic nuclei. (French summary) (31 ref)

4566. Steriade, M.; Deschênes, M. & Oakson, G. (U Laval, Lab de Neurophysiologie, Québec, Canada) **Inhibitory processes and interneuronal apparatus in motor cortex during sleep and waking: I. Background firing and responsiveness of pyramidal tract neurons and interneurons.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 1065-1092.—Conducted a series of experiments on 11 chronically implanted rhesus monkeys in which extracellular recordings were made from the arm area of the precentral gyrus during slow sleep, arousal, and excited and quiet wakefulness. The short period of arousal from sleep and excited wakefulness were the only behavioral states during which the change in mean rate firing of fast-conducting pyramidal tract (PT) neurons contrasted with that of slow-conducting PT units. Additional findings suggest that powerful interneuronal activities exist during steady states of both slow sleep and wakefulness and that their inhibition is confined to the short period of arousal. The finding of increased spontaneous firing in both fast and slow PT cells during steady waking is attributed to both strong excitation



during the state along the specific thalamocortical pathway and shorter periods of recurrent and afferent inhibition during waking. (46 ref)—*Journal summary*.

4567. Updyke, Bruce V. (U Oregon) **Characteristics of unit responses in superior colliculus of the Cebus monkey.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 896-909.—Studied the response characteristics of 229 neurons in the superior colliculus in 6 chronically prepared Cebus monkeys. Most units moved to stationary stimuli, but units selective for directions of movement were rare. Most superficial-layer units were selective for stimulus size, and occasional units were selective for stimulus orientation. A small number of neurons responded selectively to real objects. Neurons in the deeper layers had very large visual response fields. Half of all deep neurons responded selectively to objects, and some responded only to objects close to or approaching S's head; 39% of the deep units exhibited auditory or somesthetic response fields. Findings suggest that the primate colliculus integrates information about the behavioral importance of a stimuli and that this activity is compatible with a role in mediating visual attention and in facilitating visual orienting. (36 ref)—*Journal summary*.

4568. Vignaendra, Velupillay. (U Malaya, Kuala Lumpur, Malaysia) **Positive occipital sharp transients of sleep: Relationships to nocturnal sleep cycle in man.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 239-246.—Obtained overnight polygraphic recordings from 6 20-33 yr old Ss with normal diurnal waking and sleep EEGs and no significant neurological findings. Ss displayed prominent physiologic "positive occipital sharp transients of sleep" (POSTS) which were related to the nocturnal sleep cycle. POSTS occurred frequently during all stages of NREM sleep and more often during Stages 2 and 3 than 1 and 4. POSTS were absent or very infrequent during REM sleep. Similarities were observed between these potentials and the lambda waves found in awake Ss who visually explored an illuminated patterned field. It is suggested that POSTS of human Ss may indicate that some form of "playback" of information takes place during NREM sleep in cortical areas related to vision and that this playback may be to examine visual material collected during the day and compress relevant data for long-term memory storage. (French summary) (41 ref)—*Journal summary*.

4569. Walters, James K. & Hatton, Glenn I. (Michigan State U) **Supraoptic neuronal activity in rats during five days of water deprivation.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 661-667.—Recorded the maintained single cell activity from 55 male Holtzman albino rats deprived of water for 0, 1, 2, 3, 4, or 5 days; blood samples were obtained following recording. Mean supraoptic (Soa) cell firing rates were significantly elevated above Day 0 at Days 1, 3, and 4; rates of surrounding anterior hypothalamic (Haa) cells did not change with deprivation. Both plasma specific gravity and mean Soa cell firing rates showed increases on deprivation Day 1 and decreasing trends by Day 5, possibly suggesting a functional relationship. Significantly more Soa units (67%) than Haa units (15%) fired in a phasic pattern. The rate within bursts for Soa phasic

neurons continued to rise with prolonged deprivation, much like plasma osmotic pressure, and may be more closely related to antidiuretic hormone depletion than overall mean rates. (28 ref)—*Journal abstract*.

4570. Wolfe, James W. (USAF School of Aerospace Medicine, Clinical Sciences Div, Brooks Air Force Base, TX) **Technique for chronic head restraint and electrophysiologic recording in the awake rhesus monkey.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 461-464.—Describes a method for attaching a restraint pedestal to the skull of rhesus monkeys. This device can be used for recording electrophysiologic data in almost any experiment that requires the animal to be awake but unable to move its head. Animals have been maintained with pedestals for periods of 12-14 mo.

4571. Wolff, P. H. et al. **The effect of white noise on the somatosensory evoked response in sleeping newborn infants.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 269-274.—Studied the effects of continuous white noise on the somatosensory evoked response (SER) of 21 newborn infants during both REM and NREM sleep. White noise enhanced the amplitude and increased the latency of the late components of the SER in both sleep states. Results are discussed in terms of the interaction between a continuous monotonous stimulus and a discrete repetitive stimulus, and the sleep-inducing effects of monotonous stimulation. (French summary) (32 ref)—*Journal summary*.

#### Physiological Processes

4572. Bakhuis, W. L. (Netherlands Central Inst for Brain Research, Amsterdam) **Observations of hatching movements in the chick, Gallus domesticus.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 997-1003.—Made a film analysis of the hatching movements of White Leghorn chicks placed in transparent glass "eggshells." During every hatching burst, each of the limbs first extended, then flexed beyond the original resting point, and finally extended again to the original resting point (as seen from the body). This suggests that all 4 limbs helped to hold the body of the embryo tightly in place inside the egg during a cracking phase, enabling the beak to perform the actual cracking of the shell. Subsequently during a turning phase, the limbs contributed to rotation of the embryo in the eggshell, bringing the animal in the right position for further breaking the shell during the next burst. The effective forces against the shell, leading to rotation of the animal in the egg, were probably performed by (a) the right leg during its flexion, (b) the right wing during its flexion, and (c) the left wing during its re-extension. (17 ref)—*Journal abstract*.

4573. Beauchamp, Gary K. (U Pennsylvania, Monell Chemical Senses Ctr) **The perineal scent gland and social dominance in the male guinea pig.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 669-673.—Examined the relationship between sebum production of the perineal glands of male guinea pigs and social dominance. Exp I with 12 males indicated that, while sebum production before social grouping did not predict subsequent position in a dominance hierarchy, sebum production after 6 wks of group living did reflect relative dominance

status with more dominant Ss producing larger quantities. Further, social grouping resulted in increased sebum production in all Ss. The frequency of the perineal drag, a scent-marking behavior, was positively related to social status and hence sebum production. In Exp II with 9 male and 8 female Ss it was found that changes in dominance status were usually followed by changes in the same direction in sebum production. (19 ref)  
—*Journal abstract.*

4574. Belmaker, Robert H.; Murphy, Dennis L.; Wyatt, Richard J. & Loiaux, D. Lynn. (NIMH, Section on Twin & Sibling Studies, Bethesda, MD) **Human platelet monoamine oxidase changes during the menstrual cycle.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 553-556.—Obtained blood samples for platelet monoamine oxidase (MAO) assay and plasma estradiol and progesterone levels twice weekly from 13 women. Peak MAO activity occurred during the ovulatory interval, and a nadir occurred 5-11 days later. The mean effect of the menstrual cycle-related variation was 23%. (22 ref)

4575. Bradley, C. & Meddis, R. (U Nottingham, England) **Arousal threshold in dreaming sleep.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 109-110.—Latency to arousal from dreaming sleep by a gradually increasing white noise stimulus was measured in 8 human volunteer Ss. Dream reports were collected immediately after arousal. Reports which included the stimulus in the dream narrative were found to be associated with higher arousal thresholds. This finding supports the hypothesis that environmental stimuli, when incorporated into a dream, help to preserve sleep.  
—*Journal abstract.*

4576. Di Giusto, Janice A.; Di Giusto, Eros L. & King, Maurice G. (Macquarie U, North Ryde, NSW, Australia) **Heart rate and muscle tension correlates of conditioned suppression in humans.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 515-521.—Conducted a 2-phase experiment with 55 undergraduate Ss. In Phase 1, Ss in the experimental group received 5 classical aversive conditioning trials with tone conditioned stimulus (CS) and shock unconditioned stimulus (UCS). 2 control groups received tone only or shock only. In Phase 2 the CS alone was superimposed 4 times on a button-pressing task in which the reinforcer was visual stimulation, and suppression of button-pressing, muscle tension, and heart rate were measured. In the experimental group, conditioned suppression to the CS was obtained on each of the 4 test trials, conditioned cardiac acceleration was not evident on Trials 1 and 2 only, and there was no evidence of muscle tension conditioning. The patterns of extinction of suppression and cardiac acceleration across the 4 test trials were not equivalent. It is concluded that (a) previous failures to obtain conditioned suppression in humans were probably due to ineffective procedures rather than to species differences between humans and other vertebrates, (b) autonomic nervous system and skeletal respondents are not necessary for the mediation of conditioned suppression, and (c) aversively conditioned autonomic and behavioral responses are not equally valid indices of emotional response. (27 ref)  
—*Journal abstract.*

4577. Dow, Bruce M. (NIH, National Eye Inst, Lab of Vision Research, Bethesda, MD) **Functional classes of cells and their laminar distribution in monkey visual cortex.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 927-946.—Describes recordings obtained from single color and noncolor cells in the foveal projection region of the striate cortex in anesthetized rhesus monkeys. 6 classes of cells are identified, and it is concluded that the striate cortex performs several parallel functions and that within D. H. Hubel and T. N. Wiesel's class of complex cells are 3 distinct subgroups with different receptive field properties and laminar distributions; there may also be a 4th cell system for color processing. (49 ref)

4578. Engstrom, Robert & Deaux, Edward. (Antioch Coll) **Stomach distention as a regulation of fluid intake.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 337-340.—12 male Holtzman albino rats kept on a 23.5 hrs/day water-deprivation schedule were given 30 min access to 4 solutions, each on a separate test day, which were comprised of the factorial combination of 2 temperatures (12 and 37°C) and 2 NaCl concentrations (150 and 450 mOsm/kg). Food, which was available ad lib, and solution consumption measures were taken. More 37°C 150-mOsm/kg solution, which has the fastest stomach clearance rate of the 4, was consumed than of the other 3; short- and long-term food consumption measures were differentially affected by the solution's temperature and concentration. The hypothesis that cues of preabsorptive satiety originate from stomach distention was supported.  
—*Journal abstract.*

4579. Feldman, Herman. (Indiana U) **Salivary buffer capacity, pH and stress.** *Journal of the American Society of Psychosomatic Dentistry & Medicine*, 1974, Vol 21(1), 25-30.—Tested the hypothesis that there is no significant difference in human salivary pH and buffer capacity as a function of stress. Buffer capacity was significantly depressed as stress increased.

4580. Fluor, E. (Karolinska Sjukhuset, Stockholm, Sweden) **Positional and positioning nystagmus as a result of utriculocupular integration.** *Acta Oto-Laryngologica*, 1974(Jul-Aug), Vol 78(1-2), 19-27.—Reviews results of animal and human experiments on positional and positioning nystagmus. Normal and pathological results which are to be expected from the labyrinth during the most suitable positions for nystagmus are presented. A method is described of studying positioning horizontal nystagmus resulting from integrated utriculocupular activity. (German summary) (42 ref)

4581. Gatchel, Robert J. & Lang, Peter J. (U Texas, Arlington) **Effects of interstimulus interval length and variability on habituation of autonomic components of the orienting response.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 802-804.—The effects of interstimulus interval (ISI) length and variability on habituation of heart-rate and electrodermal components of the orienting response were investigated in an experiment employing 56 male undergraduates. Results indicate that shorter ISI lengths were associated with greater habituation of heart-rate and skin-conductance responses. The ISI variability did not significantly affect habituation. In the statistical analysis of these data, 2 commonly used skin conductance transformation meas-



ures were compared and yielded comparable results.—*Journal abstract.*

4582. Greenberg, Ramon & Pearlman, Chester. **Cutting the REM nerve: An approach to the adaptive role of REM sleep.** *Perspectives in Biology & Medicine*, 1974(Sum), Vol 17(4), 513-521.—Reviews studies of the effects of REM-sleep deprivation on the retention of learned habits. The suggestion is made that apparent contradictions in the overall pattern of results can be resolved by distinguishing "prepared" and "unprepared" types of learning; the former may be roughly equated with learning for which the animal has an instinctive tendency to perform the necessary response. It is concluded that "prepared" learning is not blocked by REM-deprivation, whereas "unprepared" learning is blocked and, therefore, is termed "REM-dependent." (51 ref)—*J. Crabbe.*

4583. Heyes, Anthony D. (U Nottingham, Blind Mobility Research Unit, England) **A frequency sensitive tri-state switch suitable for cardiac monitoring.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 707-709.

4584. Inglis, I. R. (U Bristol, England) **Heart rate responses of the hooded rat to low intensity white noise onset and offset.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 310-312.—The heart-rate (HR) responses of 10 male Lister hooded rats to the novel offsets or onsets of a low-intensity white noise were measured. Basal resistance levels of the Ss were monitored concurrently with HR to assess whether the intensity of stimulus used was stressful to the Ss. No change in the basal resistance levels was found over the trial, suggesting that the noise level was not stressful. A brief deceleration of HR was found as a response to both types of test stimulus. Findings are consistent with the view that HR acceleration in response to a novel auditory stimulus reported by some earlier workers was probably produced by a defense reflex, which in turn was triggered by the higher intensity of stimulus used in these experiments.—*Journal abstract.*

4585. Kiely, William F. (U Southern California, Medical School, Los Angeles) **Critique of mystical states: A reply.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 196-197.—Responds to the criticisms of G. K. Mills (see PA, Vol 53:Issue 2) which argued that E. Gellhorn and W. F. Kiely's neurophysiological theory of the states produced during Zen and Yoga meditation is inadequate and in need of revision. The lack of evidence for significant differences between Zen and Yoga meditations is discussed.

4586. Landreth, Janet E. & Landreth, Hobart F. (U Oklahoma) **Effects of music on physiological response.** *Journal of Research in Music Education*, 1974(Spr), Vol 22(1), 4-12.—Data on 22 college students in a music appreciation class indicate significant heart rate changes related to tempo changes in 8 sections of the 1st movement of Beethoven's 5th Symphony and suggest that heart rate response is linked with learning factors and repetitive exposure to music.

4587. Lavie, Peretz. (U Florida) **Differential effects of REM and non-REM awakenings on the spiral aftereffect.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 107-108.—Tested 14 human Ss for spiral aftereffect following REM and NREM awakenings. The Ss were awakened 2

min after the beginning of an REM period and 5 min after the end of an REM period. The duration of a spiral aftereffect was found to be longer for the tests made following REM periods than for the tests made following NREM periods. Results are interpreted to indicate penetration of a cortical arousal during the REM period into wakefulness. The carry-over effect from the sleep stages into the waking state lends support to the theory that the REM state may be superimposed as an ultradian cycle on the 24-hr cycle.—*Journal abstract.*

4588. Leconte, Pierre; Hennevin, Elizabeth & Bloch, Vincent. (CNRS, Gif-sur-Yvette, France) **Duration of paradoxical sleep necessary for the acquisition of conditioned avoidance in the rat.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 675-681.—Studied the useful duration of the increase of paradoxical sleep (PS) following an avoidance conditioning in 34 male Wistar rats. It was observed that a period of 90-min free sleep immediately consecutive to each conditioning session (15 trials) was sufficient for good retention to occur. A period of 30-min free sleep during which an increase in PS was not observed, did not allow conditioning to be established; 60 min of free sleep, with PS increase, only slightly disturbed the learning curve. Therefore, the time period immediately consecutive to conditioning, during which the integrity of sleep is necessary, is concluded to be between 60 and 90 min. Throughout the course of this period, the duration of PS was augmented during the initial days of conditioning.—*Journal abstract.*

4589. Leon, Michael. (McMaster U, Hamilton, Ontario, Canada) **Maternal pheromone.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 441-453.—In 7 experiments, it was found that Wistar rat pups ( $N = 1,320$ ) stimulated prolactin secretion in their mothers, inducing the increased food intake necessary to support the metabolic demands of lactation. The great quantity of food that was eaten was subsequently defecated as excess cecotrophe, a substance rich in bacteria emanating from the cecum. The microbial organisms in this anal excreta produced an odor that attracted the pups to the mother, to littermates, and to the cecotrophe itself. It is suggested that this odor may assist in the synchronization of the mother-young relationship. (72 ref)—*Journal abstract.*

4590. Linde, Shirley M. & Savary, Louis M. **The sleep book.** New York, NY: Harper & Row, 1974. 223 p.—Presents a general guide to recent research on sleep states and processes, dreams, waking, and the effects of sleep on the mind and body. Suggestions and information for achieving rest and relaxation, treating insomnia and nightmares, programing dreams, solving problems, and performing memory tasks during sleep are also presented.

4591. Mills, Gary K. & Campbell, Ken. **A critique of Gellhorn and Kiely's mystical states of consciousness: Neurophysiological and clinical aspects.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 191-195.—Criticizes E. Gellhorn and W. F. Kiely's (see PA, Vol 49:290) attempt to generate a neurophysiological theory which accounts for the psychophysiological states produced during Zen and Yoga meditation because the theory (a) ignores fundamental differences within and between the various meditations, (b) fails to consider certain important published evidence on Yoga



meditation, and (c) provides an ambiguous interpretation of trophotropic and ergotropic effects on the orienting reflex. (19 ref)

4592. **Mittler, Merrill M.; Boysen, Byron G.; Campbell, Lewis & Dement, William C.** (Stanford U, Medical School) **Narcolepsy-cataplexy in a female dog.** *Experimental Neurology*, 1974(Nov), Vol 45(2), 332-340.—Summarizes data on a female toy poodle with a canine form of narcolepsy-cataplexy and for whose atonic episodes no systematic factors were found. Pathological manifestations are analogous to characteristic human narcolepsy. The diagnosis was further confirmed by 2 negative trials with neostigmine (ruling out myasthenia) and 2 positive trials with imipramine. (18 ref)

4593. **Powell, D. A. & Joseph, J. A.** (VA Hosp, Neuroscience Lab, Columbia, SC) **Autonomic-somatic interaction and hippocampal theta activity.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 978-986.—In 2 experiments, a total of 16 New Zealand rabbits were given extended differential classical conditioning training in which tones served as conditioned stimuli (CS) and shock to the eye served as the unconditioned stimulus (UCS). Corneo-retinal potential (CRP), heart rate (HR), and hippocampal EEG conditioned responses were measured. Changes in general somatic activity were also assessed. HR decelerations were associated with early stages of CRP discrimination, whereas HR accelerations and relatively more somatomotor activity were associated with later acquisition. These findings suggest that HR accelerations, associated with asymptotic CRP responding, are mediated via somatomotor changes. Although relatively more hippocampal theta activity was associated with later stages of conditioning, when somatomotor increases occurred theta was also prominent throughout acquisition. This finding suggests that either arousal properties of the CR are instrumental in producing theta or it is correlated with the associative properties of CS-UCS contingencies. (15 ref)—*Journal abstract.*

4594. **Sharma, V. M.; Baskaran, A. S. & Malhotra, M. S.** (Defence Inst of Physiology & Allied Sciences, Delhi, India) **Emotional composure under altitude stress.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 103-107.—Studied alterations in emotional composure of young adults after they had lived at 13,200 ft for varying lengths of time. Ss were 25 healthy plain-dwellers 21-30 yrs old, 16 unmarried and 9 married. All were from rural communities and none had previously been exposed to high altitudes. Tests used were the Manifest Anxiety Scale, Eysenck's Ranking Rorschach test, the MMPI Depression scale, and Crown's Word Connection list. Ss were tested twice at a low altitude and after 1, 10, 13, 18, and 24 mo at the high altitude. There were no effects on emotional stability or neurotic tendencies but a rise in depression and anxiety was noticed at 10 and 18 mo.—*R. D. Nance.*

4595. **Soumireu-Mourat, Bernard; Destrade, Claude & Cardo, Bernard.** (U Bordeaux, France) **Deep hypothermia in mice: Effect of the interval between learning and treatment.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 471-473.—77 male BALB/c mice received deep hypothermia at different intervals after partial acquisition in a Skinner box and were tested 24 hrs later. The deficit of

performances was related to the time interval between acquisition and minimum temperature, and no deficit was found when this interval reached 3 hrs. Consolidation duration and memory processes are discussed.

—*Journal abstract.*

4596. **Stanley, Walter C.** (NIMH, Lab of Brain Evolution & Behavior, Bethesda, MD) **Motor abnormalities in infant dogs induced by intermittent oral stimulation.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium.* Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4597. **Stevens, John K. & Worrall, Norman.** (Pennsylvania State U) **External recording of gastric activity: The electrogastrogram.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 175-180.—Reports in the American and Russian literature have suggested that recording of electrical activity from electrodes on the surface of the abdomen (electrogastrogram, or EGG) might be used as a means of measuring gastric motility for psychophysiological research and for clinical purposes. However, the complexity of the recordings has presented problems in specifying relations between the EGG and other measures of gastric activity. In this study, 4 female cats were used to demonstrate the validity of the EGG as a measure of gastric activity by taking recordings from a strain gauge on the stomach wall simultaneously with electrical recordings from the surface of the abdomen. Results also suggest that autocorrelation and Fourier analysis may be used to reduce record complexity and to provide information unattainable by conventional methods. (15 ref)—*Journal abstract.*

4598. **Volo, Alfred & Strouthes, Andrew.** (State U New York, Binghamton) **Saccharin ingestion, weight loss, and mortality in rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 323-325.—52 male Sprague-Dawley albino rats maintained on 10 g of food and saccharin solutions suffered weight loss and mortality compared with controls maintained on 10 g food and water. Frequency of death was related to amount and concentration of the ingested solution, while weight loss was related only to concentration and absolute amount of saccharin intake. (17 ref)—*Journal abstract.*

4599. **Wu, Su-Yu Chang.** **Effects of enriched environment and visual deprivation on development of brain in rat.** *Acta Psychologica Taiwanica*, 1973, Vol 15, 154-160.—Reports results of experiments with a total of 45 littermate pairs of Berkeley S1 rat pups. When newborn rats were exposed to an enriched (E) or impoverished (I) environment for 30 days, the E rats developed greater cortical weight, lower acetylcholinesterase (AChE) activity per unit weight, and higher ratio of butyrylcholinesterase (BChE) to AChE than their restricted littermates. Typical E-I differences in weight and in enzymatic activity were also found in rats kept in complete darkness, indicating that visual experience was not a necessary component of the E condition that induced changes in occipital and other cortical regions. Visual deprivation affected chiefly the occipital cortex and the superior colliculi. The occipital cortex of dark-raised rats showed lower weight, a lower BChE-AChE ratio, and higher specific AChE activity. However, the



superior colliculi of the dark-raised rats showed a greater BChE-AChE ratio and lower specific AChE activity. (15 ref)—*Journal abstract*.

4600. Zwicker, E. & Terhardt, E. (Eds.). **Facts and models in hearing: Proceedings of the Symposium on Psychophysical Models and Physiological Facts in Hearing held at Tutzing, Oberbayern, Federal Republic of Germany, April 22-26, 1974.** New York, NY: Springer-Verlag, 1974. xi, 360 p.—Presents a collection of 33 symposium papers on structure and neurobiology of the inner ear, cochlear mechanisms, auditory frequency analysis, auditory time analysis, and nonlinear effects in cochlear activity.

# Genetics

4601. Anderson, V. Elving. (U Minnesota, Dight Inst for Human Genetics) **Genetics and intelligence.** In J. Wortis (Ed), *Mental retardation and developmental disabilities: An annual review: VI.* New York, NY: Bruner/Mazel, 1974. xiv, 305 p.—Presents a review of the literature on genetic factors in intelligence, emphasizing statistical approaches to this issue and the interaction of development, behavior, genes, and biochemistry. It is concluded that there is overwhelming evidence that a substantial proportion of variation in IQ scores within groups can be attributed to genetic factors, although the heritability of differences between groups cannot even be crudely estimated at this time. (117 ref)

4602. Buchsbaum, Monte S. (NIMH, Lab of Psychology, Bethesda, MD) **Average evoked response and stimulus intensity in identical and fraternal twins.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 365-370.—A group of 30 monozygotic (MZ) and 30 dizygotic (DZ) 18-57 yr old adult twins were studied, using visual and auditory average evoked response (AER) techniques. Vertex evoked responses showed very great similarity in MZ twin pairs and little similarity in DZ twin pairs. Greater heritability of positive than of negative components and a heritability of AER parameters of change with stimulus intensity suggest a functional neurophysiological rather than a simple anatomic source of the AER twin similarities. (34 ref)—*Journal abstract*.

## PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

4603. Gaito, John & Gaito, Stephen T. (York U, Downsview, Ontario, Canada) **Interanimal negative transfer of the kindling effect.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 379-382.—5 experiments were conducted in which male Wistar donor rats were kindled to the clonic-convulsion stage, sacrificed, and their brains removed. The brain was homogenized, and the supernatant fraction was injected intraperitoneally into recipient experimental Ss which then were subjected to the kindling procedure. Control donors which received no stimulation were included. When the injection involved 2 or more brain amounts, a retarding effect tended to occur with the experimentals. If only 1 brain amount was used for the injection, no change resulted in the kindling rate of these recipients. This interanimal

negative-transfer effect appears to be similar to the intraanimal negative-transfer effect reported by D. C. McIntyre and G. V. Goddard (see PA, Vol 51:6551).—*Journal abstract*.

4604. Kramer, M. S. & Adler, M. W. (Temple U, Medical School) **Intermodal interaction: Effect of sensory stimulation on flurothyl seizure threshold in normal and brain-damaged rats.** *Life Sciences*, 1974(Sep), Vol 15(6), 1153-1160.—Experiments with male Sprague-Dawley albino rats, in which flurothyl-induced seizures were decreased by intermittent photic or tonic stimulation or by bilateral lesions of the cerebral cortex, suggest that seizurogenicity is influenced by the interplay of environmental multimodal inputs as well as by the intermodal interaction of sensory inputs and focal brain damage. (24 ref)

4605. Levy, Carolyn J. & McCutcheon, Bruce. (Florida State U) **Importance of postgestational factors in the satiation of sodium appetite in rats.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 621-625.—Conducted 2 experiments with a total of 38 sodium-deficient, male Long-Evans hooded rats. The technique of intragastric infusion of isotonic saline was used to examine the role of postgestational factors in the regulation of sodium intake. Exp I demonstrated that the sodium appetite of a Formalin-injected S was satiated by intragastric infusion of sufficient NaCl to restore the S's sodium balance. Exp II demonstrated that a sodium-deficient S's barpressing for NaCl was influenced by the amount of NaCl previously intragastrically infused. As the amount of saline delivered intragastrically to the Ss increased, the amount of saline they worked for decreased. In addition, the infused sodium apparently was as effective as sodium taken orally in satiating the Ss' sodium appetites. (15 ref)—*Journal abstract*.

4606. Morris, Charles J. (Denison U) **The effects of early malnutrition on one-way and two-way avoidance behavior.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 148-150.—Tested the effects of early malnutrition on performance of 1-way and 2-way avoidance tasks by 12 male and 12 female albino rats. Ss malnourished early in life were found to perform better than normal Ss on the 2-way task, but no significant differences were found between groups on the 1-way task. Results are interpreted as indicating that early malnutrition produces a deficit in the ability to inhibit irrelevant or nonreinforced responses.—*Journal abstract*.

4607. Ogihara, Toshio & Nugent, Charles A. (U Arizona, Coll of Medicine) **Serum DBH in three forms of acute stress.** *Life Sciences*, 1974(Sep), Vol 15(5), 923-930.—Examined the changes in serum dopamine- $\beta$ -hydroxylase (DBH) activity in 5 25-56 yr old normal males subjected to 3 forms of acute stress: cold pressor, sustained hand grip, and insulin-induced hypoglycemia. The responses to all 3 of these stresses have been reported to be mediated by the sympathetic nervous system. In spite of striking increases in blood pressure induced by the cold pressor and sustained hand grip tests and the clinical and chemical evidence of hypoglycemia following insulin there was little alteration in serum DBH activity. It is concluded that a change in serum DBH level is not a good measure of acute alterations in

sympathetic nervous system activity in men. (23 ref)  
—*Journal abstract.*

4608. Sara, Susan J. (U Louvain, Ctr for Experimental & Comparative Psychology, Pellenberg, Belgium) **Delayed development of amnesic behavior after hypoxia.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 693-696.—Trained, in 1 trial, a total of 145 male Wistar rats in 2 experiments to avoid a small dark compartment after which they were submitted to a 10-min hypoxia or sham hypoxia. Different groups were tested at 1, 3, 6, or 24 hrs after treatment. All sham hypoxia groups avoided at all testing times. Hypoxia groups avoided at 1 and 3 hrs but not at 6 or 24 hrs. Results are interpreted as evidence that hypoxia interferes with memory retrieval and not with memory storage. It is suggested that hypoxia produces a behavioral deficit by triggering an abnormal metabolic sequence of the biochemical substrates which are necessary for the retrieval function. (27 ref)—*Journal abstract.*

4609. Sieck, Michael H. & Baumbach, H. Dale. (U California, Riverside) **Differential effects of peripheral and central anosmia producing techniques on spontaneous behavior patterns.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 407-425.—Describes 2 experiments with a total of 94 male hooded rats. In Exp I, the spontaneous behavior patterns of 4 matched groups were compared to sham-operated or sham-injected Ss following different anosmia producing techniques. One group was peripherally blocked with lidocaine (XYL), and another with zinc sulphate (ZN). 2 operated groups were either centrally deafferented (LB) or sustained olfactory bulb and peduncle destruction (DB). The lesioned and particularly the DB Ss were hyperactive and reared more than the other groups. XYLs were similar to Ss on most measures but many developed unusual locomotor patterns. ZNs were hypoactive, reared less, and groomed and froze more than all other groups. Food deprivation increased activity and rearing and decreased freezing and grooming in all groups, but most intergroup differences were maintained. A technique to distinguish lesion-induced anosmia from lesion side effects was also investigated. Lesions tended to increase activity, rearing frequency, and possibly sniffing frequency somewhat independently of anosmia, whereas grooming and possibly freezing changes were more closely related to olfactory cue changes. Exp II revealed that most of the zinc sulphate effects were due to systemic poisoning. Consequently, the common practice of comparing central and peripheral anosmia producing techniques to demonstrate olfactory deficits aside from lesion effects may be misleading. (30 ref)—*Journal abstract.*

4610. Thomas, J. R. & Bachrach, A. J. (US Naval Medical Research Inst, Bethesda, MD) **Modification of operant performance in pigeons by increased pressures of nitrogen and helium.** *Undersea Biomedical Research*, 1974(Jun), Vol 1(2), 181-188.—Used a multiple fixed ratio-fixed interval schedule as an ongoing baseline to measure differential gas and depth effects on operant behavior of 2 White Carneaux pigeons. Measurements were taken at depths of 66, 99, 200, and 300 fsw. An 80% helium-20% oxygen mixture had less disruptive effects than air on responding on the 2 different reinforcement schedules particularly at 200 and 300 fsw. Repeated

exposure to pressure, independent of gas mixture or depth, resulted in a gradual behavioral adaptation measured by a reduction in the disruption of behavior. (20 ref)—*Journal abstract.*

4611. Young, Robert C. et al. (New York Hosp, Edward W. Bourne Behavioral Research Lab, White Plains) **Absence of satiety during sham feeding in the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 795-800.—In 2 experiments, a total of 9 Sprague-Dawley rats with chronic gastric fistulas were trained to eat a liquid diet. Results indicate that when the fistulas were opened for the first time, Ss sham-fed eagerly and did not become satiated during test periods of 2 or 7.5 hrs. This sustained hyperphagia occurred after long (17 hrs) or short (10-30 min) intermeal intervals. The experience of sustained hyperphagia when gastric fistulas were open did not affect intake of the same diet on the next day when gastric fistulas were closed. When taste and other oropharyngeal stimuli acted alone during sham feeding, they did not elicit satiety. It is concluded that the occurrence of satiety in rats is critically dependent on an inhibitory reflex elicited by ingested food accumulating in the stomach and moving through the small intestine. —*Journal abstract.*

#### Brain & Electrical Stimulation & Lesions

4612. Balagura, S. & Harrell, L. E. (State U New York, Downstate Medical Ctr, Brooklyn) **Lateral hypothalamic syndrome: Its modification by obesity and leanness.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 345-347.—Found that lesions of the lateral hypothalamus in 30 Charles River female rats, made experimentally obese or lean, were followed by a lengthening or shortening of the aphagic period. Results confirm previous experimental findings and extend the observations to both sexes. Results contradict the theory of a downward shift in body weight set-point following lateral hypothalamic lesions. —*Journal abstract.*

4613. Bauer, Richard H. (U California, Medical School, Los Angeles) **Brightness discrimination of pretrained and nonpretrained hippocampal rats reinforced for choosing brighter or dimmer alternatives.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 987-996.—A total of 96 experimentally naive and pretrained hippocampectomized, cortical control, and nonoperated male Wistar rats were trained to choose either the brighter or dimmer arm of a Y-maze for water reinforcement. Nonpretrained hippocampectomized Ss and to a lesser extent cortical control Ss initially preferred the dimmer arms of the maze. Nonpretrained hippocampectomized, cortical control, and nonoperated Ss reinforced for entering the brighter arm did not differ, but when reinforced for entering the dimmer arm nonoperated Ss were superior to hippocampectomized Ss. Pretrained Ss acquired the discrimination more slowly than nonpretrained Ss, but this deficit was greater for hippocampectomized Ss. (29 ref)—*Journal abstract.*

4614. Butter, Charles M. (U Michigan, Neuroscience Lab) **Visual discrimination impairments in rhesus monkeys with combined lesions of superior colliculus**



and striate cortex. *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 918-929.—To test the hypothesis that posterior inferotemporal cortex and the adjoining foveal prestriate cortex contribute to vision by combining inputs from striate cortex and superior colliculus, a total of 18 rhesus monkeys with combined collicular and partial striate lesions, foveal prestriate-posterior inferotemporal lesions, or subcortical lesions (controls) were tested in a series of visual discrimination tasks. Prestriate-inferotemporal lesions, unlike striate-collicular lesions, consistently impaired retention of a pattern discrimination and produced partial impairments in a size discrimination test. However, prestriate-inferotemporal and striate-collicular lesions produced similar deficits in pattern discrimination learning and no deficits in brightness discrimination learning. The deficits of the striate-collicular monkeys are discussed with regard to the "input-combining" hypothesis and alternative views. (39 ref)—*Journal abstract*.

4615. Butter, Charles M. (U Michigan, Neuroscience Lab) **Effect of superior colliculus, striate, and prestriate lesions on visual sampling in rhesus monkeys.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 905-917.—27 male rhesus monkeys were tested for pattern discrimination retention and for color discrimination learning, with and without stimulus-response (S-R) separation, following superior colliculus lesions, partial striate cortex lesions, foveal prestriate lesions, or control lesions involving cortical or subcortical structures. Only the prestriate Ss were reliably impaired in pattern retention and in color discrimination tasks without S-R separation. In color discriminations involving S-R separation, collicular Ss were deficient compared either with the controls or with those with striate lesions. These findings suggest that the primate superior colliculus, like prestriate cortex, is involved in visual sampling behavior required by S-R separation, and thus participates in orientation to visual stimuli. (36 ref)—*Journal abstract*.

4616. Chen, Jeannette J. & Bliss, David K. (New York U, Medical Ctr) **Effects of sequential preoptic and mammillary lesions on male rat sexual behavior.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 841-847.—Observed the sexual behavior of 52 male Sprague-Dawley rats prior to and following bilateral medial preoptic, unilateral medial preoptic, bilateral posterior preoptic, bilateral mammillary, and sham lesions. Bilateral medial preoptic lesions and mammillary lesions were made either simultaneously or sequentially within the same Ss in separate groups. Mammillary lesions had no effect on sexual behavior. Complete destruction of the medial preoptic area made prior to, simultaneous with, and following mammillary lesions completely abolished mating behavior. Partial destruction of the medial preoptic area increased mount and intromission latencies and slightly increased ejaculation latency. Results suggest that since there was no change in the postejaculatory-refractory interval, the medial preoptic area mediates sexual arousal but apparently is not involved in a copulatory-ejaculatory mechanism. (32 ref)—*Journal abstract*.

4617. Cole, Sherwood O. (Rutgers State U, Camden) **Changes in the feedback behavior of rats after amygdala**

**la lesions.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 265-270.—The feeding behavior of 12 amygdala-lesioned male Charles-River rats was compared to that of 12 normal controls and 12 amygdala sham controls after 0 or 24 hrs of food deprivation and after 24 hrs of food and water deprivation. Results demonstrate that food deprivation was essential for a significant reduction in 1-hr feeding after dorsomedial amygdala damage and that combined food and water deprivation exaggerated such differences in feeding without producing a significant concomitant reduction in drinking. Findings are discussed in terms of the possible role of the dorsomedial amygdala in the central regulation of deprivation-induced feeding.—*Journal abstract*.

4618. Cools, Alexander R. & Janssen, Hendrik-Jan. (U Nijmegen, Netherlands) **The nucleus linearis intermedius raphe and behaviour evoked by direct and indirect stimulation of dopamine-sensitive sites within the caudate nucleus of cats.** *European Journal of Pharmacology*, 1974(Oct), Vol 28(2), 266-275.—Investigated whether behavioral effects in 16 adult cats elicited by unilateral, reversible lesions in the nucleus linearis intermedius raphe modulate behavioral effects elicited by local application of dopamine into the caput nuclei caudati rostromedialis or by systemic injections of apomorphine. Experimental results suggest that the nucleus linearis is an indispensable link in the chain of intracaudate events triggered by direct or indirect activation of dopamine-sensitive sites within the caudate nucleus and strengthen the hypothesis that there exists a trans-synaptic relationship between nigro-caudate, dopaminergic, and raphe-caudate serotonergic fibres. The implication of these data is discussed with reference to the usefulness of a number of presently accepted test models in psychopharmacological research. (37 ref)—*Journal abstract*.

4619. Coover, Gary; Ursin, Holger & Levine, Seymour. (Northern Illinois U) **Corticosterone levels during avoidance learning in rats with cingulate lesions suggest an instrumental reinforcement deficit.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 970-977.—Studied changes in fear or arousal during 2-way avoidance learning in male Möll-Wistar rats with cingulate lesions. The 12 Ss with lesions restricted to the cingulum bundle and rostral one-third to one-half of the cingulate cortex exhibited no deficit compared with the 15 operated control Ss in the acquisition of 2-way active avoidance. However, the cingulate-lesioned Ss did not exhibit the increase in intertrial sniffing and grooming or the decline in plasma corticosterone levels to the degree observed in control Ss in the course of acquisition and stabilization of the avoidance response. The primary effect of this lesion may therefore be less effective reinforcement of the instrumental response. (24 ref)—*Journal abstract*.

4620. Coulter, Joe D. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Sensory transmission through lemniscal pathway during voluntary movement in the cat.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 831-845.—Analyzed the amplitude of the mass potential discharge recorded in the left medial lemniscus in response to contralateral forelimb nerve stimulation during spontaneous voluntary forelimb movement in 8 unrestricted, unanesthetized cats. During and just before

electromyographic activity in the right forelimb, evoked lemniscal potentials were decreased compared to adjoining control responses evoked in the absence of movement. Neither muscular activity in the opposite forelimb nor passive forelimb movements in other anesthetized Ss produced similar effects on lemniscal potentials. Potentials were also reduced in amplitude after presentation of an auditory stimulus (tone burst); however, this effect was small and showed a progressive diminution with repeated tone presentations. Results suggest that active movements are accompanied by changes in the transmission of sensory information which may be due to central descending influences on the relay of afferent input through the dorsal column nuclei. (57 ref)—*Journal summary*.

4621. Crews, David. (U California, Berkeley) **Castration and androgen replacement of male facilitation of ovarian activity in the lizard, *Anolis carolinensis*.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 963-969.—Found that castration abolished male courtship behavior in the lizard, and consequently prevented male courtship facilitation of environmentally induced ovarian recrudescence in winter-dormant females. Castrated males given androgen replacement therapy exhibited the normal pattern of male courtship behavior as well as facilitating environmentally induced ovarian activity. (39 ref)—*Journal abstract*.

4622. Divac, Ivan. (U Copenhagen, Inst of Neurophysiology, Denmark) **Caudate nucleus and relearning of delayed alternations in cats.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 104-106.—Refers to earlier studies which demonstrated that lesions in the anterior part of the caudate nucleus impair delayed-response type behavior when made in intact cats, but not if made in cats which learned delayed responses after ablation of the prefrontal cortex. The present experiment tested the hypothesis that the anterior part of the caudate nucleus, if not necessary once the task has been relearned, may be involved in the process of relearning of delayed alternation. 4 cats with lesions in both the prefrontal cortex and the caudate nucleus were able to relearn the task and were not more impaired than 4 cats with ablations of the prefrontal cortex alone. Thus, the anterior part of the caudate nucleus in cats seems to subserve delayed-response type tasks only as long as the prefrontal cortex and mediodorsal thalamic nucleus are preserved. (18 ref)—*Journal abstract*.

4623. Drucker-Colin, R. R. (U Nacional Autónoma de México, Mexico City) **Seizure inhibition and REM sleep: A possible neurohumoral relationship.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 199-209.—Examined the relationship between certain aspects of seizures and REM sleep in 2 experiments with a total of 25 cats that were randomly assigned to being donors or recipients. Donors had a bilateral push-pull chemitrode system implanted in the ventral hippocampus, while recipients had push-pull cannulae implanted in the midbrain reticular formation (MRF). Threshold afterdischarges were obtained from the hippocampus of donor cats, and perfusates were obtained from the contralateral hippocampus during the post-ictal depression period. Such perfusates were then reperfused into the MRF of

recipient cats and slow-wave sleep and REM latencies were obtained and compared to controls. In addition, norepinephrine, 5-hydroxytryptamine (5-HT), acetylcholine, and  $\gamma$ -aminobutyric acid (GABA) were perfused in the hippocampus while the contralateral hippocampus was stimulated to induce afterdischarges. These same substances were then perfused into the MRF in order to determine their effects on sleep latencies. Results show that the post-ictal perfusate significantly reduced REM latencies when compared to all other perfusion tests, while only 5-HT and GABA inhibited afterdischarges. Results are discussed in terms of the relationship between seizures and REM and some aspects of their ontogeny and phylogeny. (30 ref)—*Journal abstract*.

4624. Edmonds, Don E. & Gallistel, C. R. (U Pennsylvania) **Parametric analysis of brain stimulation reward in the rat: III. Effect of performance variables on the reward summation function.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 876-883.—Defines the reward summation function as the empirical function relating running speed in a runway and waiting-box paradigm to the number of electrical pulses a rat receives for running. 5 experiments with male white rats are described in which repeated determination of this function was made, with other performance variables—priming, task difficulty, degree of training, health, and pharmacological state of the rat—varied between determinations. Results show that these other performance factors affected the height (asymptotic speed) of the function but not the location of the sharp rise in the function. It is concluded that since manipulation of stimulation parameters that affect the amount of reward excitation substantially alters the location of the sharp rise, the reward summation function provides a suitable basis for a neuropharmacological investigation of the reward effect in self-stimulation.—*Journal abstract*.

4625. Edmonds, Don E.; Stellar, James R. & Gallistel, C. R. (U Pennsylvania) **Parametric analysis of brain stimulation reward in the rat: II. Temporal summation in the reward system.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 860-869.—Defines reward summation functions as the empirical functions relating running speed in a runway and waiting-box paradigm to the number or current intensity of the electrical pulses a rat receives for running. In an experiment with male white rats, repeated determination of such functions, with another parameter of stimulation varied between determinations, yielded parameter trade-off functions. These functions describe the amount of change required in 1 parameter to compensate for a change in another parameter. These functions place quantitative constraints on the neurophysiological events underlying the reward effect. Results suggest that such constraints mediate the identification of the neurophysiological substrate for the reward effect in self-stimulation.—*Journal abstract*.

4626. Freeman, Frederick G. & Kramarcy, Neal R. (Old Dominion U) **Stimulus control of behavior and limbic lesions in rats.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 609-615.—20 male Long-Evans rats with hippocampal lesions or sham operations learned a tone discrimination significantly faster than 5 Ss with amygy-



dala lesions. Relative tone generalization gradients were significantly steeper for the Ss with hippocampal lesions than for the other 2 groups. Performance on a light discrimination by the Ss with hippocampal lesions was impaired, compared to the sham-operated Ss, when the tone was present but irrelevant. The behavior of the amygdala Ss is interpreted as due to an inability to inhibit responding. The behavior of the Ss with hippocampal lesions is interpreted as due to an inability to shift attention from one stimulus to another. (18 ref) —*Journal abstract.*

4627. Freeman, Frederick G.; Mikulka, Peter J. & d'Auteuil, Peter. (Old Dominion U) **Conditioned suppression of a licking response in rats with hippocampal lesions.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 257-263.—40 male Long-Evans hooded rats with dorsal hippocampal lesions or sham operations (controls) were trained for 14 days to lick for 1 of 2 sucrose solutions (4 or 32%). They were then given 4 conditioned emotional response training trials to a 4,800-Hz tone and tested for conditioned suppression of licking. Ss with hippocampal lesions licking for the 32% solution showed significantly less suppression than all other groups. It is suggested that behavioral deficits found in animals with hippocampal lesions may be partly due to differences in the motivational levels of the organism. (18 ref)—*Journal abstract.*

4628. Gallistel, C. R. (U Pennsylvania) **Note on temporal summation in the reward system.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 870-875.—Presents a further analysis of data from a study of rats by D. E. Edmonds et al (see PA, Vol 53:Issue 2). This analysis shows that when train duration is fixed, the rewarding effect of a train of cathodal stimulating pulses is determined by the product of the number of pulses (N) and the current intensity (C). If this product remains constant, reward remains constant, despite manyfold changes in the values of N and C. This suggests that there is little facilitation or accommodation in the substrate and that the number of functionally relevant neurons excited by a cathodal pulse increases linearly with current intensity. Beyond train durations of about 250 msec, the required product (NC) increases approximately as a power function of train duration, with an exponent of about .75. Below 250 msec, the required product is approximately constant.—*Journal abstract.*

4629. Gallistel, C. R.; Stellar, James R. & Bubis, E. (U Pennsylvania) **Parametric analysis of brain stimulation reward in the rat: I. The transient process and the memory-containing process.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 848-859.—6 male albino rats ran an alley and pressed a lever for brain stimulation reward. At the end of the 10-min intertrial interval, they received pretrial priming stimulation. Varying the amount (number of trains and number of pulses) of stimulation showed that both the lever-produced stimulation and the pretrial stimulation affected running speed. The 2 effects, however, had different parametric characteristics. An analysis of the transitional responses following changes in the amounts of stimulation further showed that one effect involved a memory for stimulation received on earlier trials, whereas the other effect did not. The experiment provided a

paradigm for independently analyzing the 2 effects. A 2nd experiment showed how this paradigm may be modified to permit automation of the entire procedure.—*Journal abstract.*

4630. Goldman, Patricia S. et al. (NIMH, Lab of Psychology, Bethesda, MD) **Sex-dependent behavioral effects of cerebral cortical lesions in the developing rhesus monkey.** *Science*, 1974(Nov), Vol 186(4163), 540-542.—55 male rhesus monkeys with orbital prefrontal lesions were impaired on behavioral tests at 2½ mo of age, whereas similar deficits were not detected in 49 females with comparable lesions until 15-18 mo of age. Results suggest that the maturation of a cortical region in the primate brain proceeds at different tempos in males and females. (20 ref)—*Journal abstract.*

4631. Goldstein, Melvin L. (Indiana U, Kokomo) **The effect of septal and amygdaloid lesions on the duration of emotionality in the white rat.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 163-165.—Investigated the duration of the septal syndrome and the reciprocal relationship of the septal and amygdaloid nuclei in their effect on emotional behavior. Gross lesions were placed in the septal nuclei or amygdaloid complex and minute lesions were placed in the medial or lateral septal nuclei in groups of male Holtzman albino rats ( $N = 15$ ). The effects on emotional behavior were measured over a period of 12 days by means of a rating scale. Septal lesions increased emotionality, but amygdaloid lesions did not decrease emotionality. The locus for the rage syndrome was found in the lateral septal nucleus.—*Journal abstract.*

4632. Gonzalez, Manuel F. & Novin, Donald. (U California, Brain Research Inst, Los Angeles) **Feeding induced by intracranial and intravenously administered 2-deoxy-D-glucose.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 326-330.—Intracranial injections (Exp I) of 2-deoxy-D-glucose (2DG) given to 20 female free-feeding New Zealand rabbits induced eating when injected in sites located within the lateral hypothalamic area but not within the ventromedial nucleus. However, greater increases were obtained by the administration of systemic injections of the same agent in greater amounts in Exp II (32 Ss). Electrolytic lesions of the lateral hypothalamic area did not suppress the facilitatory effects of systemic injections of 2DG on eating in these Ss. Results suggest that peripheral glucose receptors may be more important than central glucoreceptors in controlling hunger.—*Journal abstract.*

4633. Goodwin, Guy M. & Luschei, Erich S. (U Washington, Regional Primate Research Ctr) **Effects of destroying spindle afferents from jaw muscles on mastication in monkeys.** *Journal of Neurophysiology*, 1974(Sep), Vol 37(5), 967-981.—Recorded jaw movements and associated electromyographic activity in jaw closing muscles before and after trigeminal mesencephalic tract lesions in 5 rhesus monkeys. Data suggest that the traditional emphasis on the function of muscle spindle afferents in the control of muscle contraction may be misleading and that the removal of muscle afferent input results primarily in a sensory loss. (34 ref)

4634. Greenwood, M. R. et al. (Rockefeller U, New York, NY) **Food motivated behavior in genetically obese and hypothalamic-hyperphagic rats and mice.**

*Physiology & Behavior*, 1974(Nov), Vol 13(5), 687-692.—Studied the food-associated behavior of 4 genetically obese Zucker rats (fa/fa) and 4 yellow obese mice (aAy) using classic operant procedures. When obese Zucker rats and yellow mice were compared to their lean littermates ( $n = 8$ ) and lean littermates made obese by electrolytic lesions and chemical lesions ( $n = 8$ ), respectively, the naturally obese animals did not display the behavioral patterns associated with rodents made obese by hypothalamic damage. These experiments point out the necessity for careful selection of animal models in studying behaviors associated with regulatory disturbances of normal food intake. (15 ref)—*Journal abstract*.

4635. Hammond, Geoffrey R. (U Western Australia, Nedlands) **Frontal cortical lesions and prestimulus inhibition of the rat's acoustic startle reaction.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 151-156.—Tested the effects of lesions of the frontal cortex on the amplitude of the acoustic startle reaction in 6 albino rats and 5 normals, both under control (unstimulated) conditions and under conditions where the response was inhibited by delivery of a visual or auditory stimulus just prior to response elicitation. While in no case was brain damage observed to lead to any derangement of the prestimulus inhibition of the response, some Ss showed exaggerated levels of reactivity on control trials postoperatively. Correlations between location of brain damage and postoperative responsivity indicate that damage to the medial sector of the frontal cortex was critical in obtaining augmented levels of startle. (16 ref)—*Journal abstract*.

4636. Hara, Kazuo; Cornwell, P. R.; Warren, J. M. & Webster, Ikuko H. (International Christian U, Tokyo, Japan) **Posterior extramarginal cortex and visual learning by cats.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 884-904.—Reports results of 3 experiments with a total of 59 mongrel and 11 Siamese cats. Extensive ablations of posterior cortex which spared the primary visual areas severely impaired visual pattern discrimination, detour learning, and spatial reversal performance. Lesions in the posterior ecto- and suprasylvian gyri (EP) produced significant deficits in learning multiple object discrimination problems, repeated reversals on spatial or visual cues, and successive visual discriminations. Ss with cortical ablations that did not invade the EP region but did cause damage to the optic radiations were not impaired in reversal learning and were deficient in successive discriminations only when tested with nonsalient cues. Thus, some of the defects shown by EP cats are qualitatively different from the losses in cats with damage to the geniculostriate system. (39 ref)—*Journal abstract*.

4637. Henke, Peter G. (St Francis Xavier U, Antigonish, Nova Scotia, Canada) **Lesions in the ventromedial hypothalamus and response to frustrative nonreward.** *Physiology & Behavior*, 1974(Jul), Vol 13(1), 143-146.—Bilateral lesions in the ventromedial hypothalamus of 16 female Wistar albino rats increased the frustration effect in a double runway. Following the omission of reward in the 1st goal box, Ss with lesions ran faster than 16 controls in the 2nd alley. (20 ref)

4638. Herz, Michael J.; Marshall, Keats E. & Peeke, Harman V. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Brain stimulation and behavior: Controls and consequences.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 184-186.—Compared groups of hooded rats, ranging from unimplanted controls to caudate-putamen (CPU) stimulated experimental animals, in terms of the number of trials required to acquire a brightness discrimination habit. Results indicate that the degree of deficit produced was a function of the magnitude of experimental intervention imposed. Ss with headplugs and cables, but without electrodes, required significantly more trials to learn than unimplanted controls. The addition of electrodes without a headcable produced no greater deficit, while electrodes with attached cable resulted in significantly greater disruption than plug and cable alone. Stimulation of the CPU with 1 or 3 bilateral pulses following each discrimination produced significantly greater interference than did the electrode lesion and headcable. Results are discussed in terms of the control conditions required for studies of the effects of brain stimulation on behavior.—*Journal abstract*.

4639. Hodos, W. & Karten, H. J. (U Maryland) **Visual intensity and pattern discrimination deficits after lesions of the optic lobe in pigeons.** *Brain, Behavior & Evolution*, 1974, Vol 19(3), 165-194.—Trained 13 White Carneaux pigeons to discriminate stimuli that differed in luminance or geometric pattern. Following discrimination training, bilateral stereotaxic lesions were made in the optic tectum and in the associated nuclei isthmi, located within the depth of optic lobe. After recovery from surgery, Ss' discrimination performance was again tested. Cases with massive destruction of the optic tectum and either direct or indirect damage to the nuclei isthmi showed extremely severe postoperative deficits in visual discrimination performance. Some cases were unable to reliably discriminate gross stimulus differences even after extensive postoperative retraining. Others eventually were able to perform the simpler discrimination tasks, but failed to recover their preoperative performance capabilities on the more difficult discrimination tasks. Cases with injury confined principally to the nuclei isthmi had less impairment of performance than the ones with injury to the tectum and the isthmic nuclei. Results suggest that lesions of the optic tectum produced more severe and intractable deficits of visual discrimination performance than did lesions of structures more rostral in the tectofugal pathway. Data further suggest a separate role of the nuclei isthmi in the processing of visual information. (44 ref)—*Journal abstract*.

4640. Irwin, Don A.; Criswell, Hugh E. & Kakolewski, Jan W. (Ohio State U, Medical Ctr) **Prolonged slow potential variation associated with cortical spreading depression.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 377-380.—3 methods of inducing cortical spreading depression in male Long-Evans rats resulted in spreading depression and a prolonged negative slow potential change from subcortical and cortical areas of the brain. This prolonged potential has not been previously considered as a concomitant of cortical spreading depression.



4641. Jarvis, Charlene D. (U Maryland) **Visual discrimination and spatial localization deficits after lesions of the tectofugal pathway in pigeons.** *Brain, Behavior & Evolution*, 1974, Vol 19(3), 195-228.—21 White Carneaux pigeons were trained on 2 identification tasks (intensity and pattern discriminations) and on 2 location tasks (right-left and 4-key discriminations). Following training, lesions were placed in the optic tectum, or in nucleus rotundus or the nuclei isthmi, ascending and descending projections of the tectum, respectively. Large tectal lesions produced severe impairments on all tasks. Ss were unable to relearn the identification tasks and, although able to relearn the location tasks, had great difficulty in locating the keys. The severity of deficits produced among Ss with lesions of nucleus rotundus depended on both lesion size and the extent to which the lesion infringed on the principal optic nucleus of the thalamus (OPT). Small rotundus lesions produced almost no impairment on any task. Larger lesions without OPT involvement produced impairment on identification tasks and differentially affected performance on location tasks. Large lesions of rotundus and OPT produced impairments on all tasks. The size of deficits produced among Ss with lesions of the nuclei isthmi were a function of the completeness of the lesion and did not depend on the extent of damage to other structures in the tectal core. (52 ref)—*Journal abstract*.

4642. Johnson, David A.; Poplawsky, Alex; Lancaster, Josh & Jackson, Richard. (Ohio U) **Techniques and problems in the stereotaxic placement of subcortical lesions in infant rats.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 465-470.—Outlines techniques used in the stereotaxic placement of subcortical lesions in Long-Evans infant rat pups. Coordinates and lesion parameters for septal, hippocampal, caudate, and amygdaloid lesions at 7 days of age are presented. Housing and handling procedures which increase survival rates are discussed.

4643. Kakolewski, Jan W. & Rowe, Thomas C. (U South Dakota, Medical School) **Elicitation and the dominant character of stimulation-bound escape behavior.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 331-332.—2 groups of 6 Holtzman rats each were implanted with bipolar electrodes in the medial forebrain bundle (MFB). Intracranial stimulation (ICS) was set to a minimal level, inducing continuous locomotion. When Ss in Group I were mechanically restrained and ICS continued, all Ss displayed a stimulation-bound escape behavior. Group II, prior to restraint, was exposed to ICS, eliciting continuous locomotion until stimulation-bound eating, drinking, or gnawing was established. When restrained, again, all Ss displayed a consistent stimulation-bound escape behavior but not stimulation-bound eating, drinking, or gnawing. Data indicate that the combination of an internal with an environmental stimulus triggers a potent and highly consistent response dominating all previously established responses to ICS.—*Journal abstract*.

4644. Kearley, Richard C.; Van Hartesveldt, Carol & Woodruff, Michael L. (U Florida) **Behavioral and hormonal effects of hippocampal lesions on male and female rats.** *Physiological Psychology*, 1974(Jun), Vol

2(2), 187-196.—Compared 7 male and 7 female hooded rats having hippocampal lesions with 28 controls as to activity, body weight, performance on a differential enforcement of low rates (DRL) schedule, and extinction. Normal females acquired the DRL schedule faster than normal males. For both sexes, hippocampal lesions resulted in poor DRL performance and more responses during extinction. Male Ss with hippocampal lesions were further below their target-deprived weight each day than their controls. Sex-lesion interactions were found for activity in the operant chamber during DRL performance and extinction: females with hippocampal lesions were more active and made more responses during extinction than males with hippocampal lesions. Corticosterone levels were manipulated prior to DRL sessions, and resting and stress levels of corticosterone were measured at the end of the experiment. While females had higher corticosterone levels than males, brain lesions did not affect corticosterone levels, nor did hormone manipulations affect DRL performance for either sex. (49 ref)—*Journal abstract*.

4645. Kelley, Diana L. & Mountford, Damon. (U Kansas) **The motivational consequences of cholinergic stimulation of the medial septal area.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 101-103.—Tested the hypothesis that cholinergic thirst demonstrates motivational properties of normal thirst. 12 albino rats served as Ss. Direct application of carbachol to the medial septal area of satiated rats produced large significant increases in drinking. Histamine produced a small and inconsistent increase in drinking, and isoproterenol produced an inconsistent decrease in eating. Carbachol-stimulated Ss performed significantly better on a brightness discrimination task than satiated controls, as measured by running and starting speeds, but did not differ from controls in number of correct choices.—*Journal abstract*.

4646. Kemble, Ernest D. (U Minnesota, Morris) **Drive discrimination in rats following amygdaloid lesions.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 320-322.—7 amygdaloid-lesioned and 8 control, male Holtzman albino rats were compared on their ability to utilize hunger- and thirst-related cues to guide positional responses in a T maze. Amygdaloid Ss performed quite accurately when responding to hunger-related cues but were deficient when responding to thirst-related cues. This difficulty was mirrored by increased amygdaloid vicarious trial-and-error behavior on water-deprivation, but not food-deprivation, trials. It is suggested that the amygdaloid lesions either reduced the effectiveness of the water reward or reduced S's ability to employ thirst-related stimuli to guide positional responses.—*Journal abstract*.

4647. Kesner, Raymond P. & Conner, Hubert S. (U Utah) **Cue-dependent recovery from ECS-induced amnesia: Evidence for time dependence.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 123-125.—Tested the differential effectiveness of reminder cues, introduced at staggered times after footshock (FS), in reinstating memory after electroconvulsive shock (ECS). 24 hrs after the administration of FS followed 4 or 256 sec later by ECS, 45 hooded rats exhibited amnesia for the aversive experience. They were then given a reminder cue (tone), which was earlier paired as a conditioned stimulus with



FS. Presentation of the tone resulted in attenuation of the amnesic effect in FS-ECS 256-sec delay group but failed to alter the amnesic effect in FS-ECS 4-sec delay group. Results are interpreted as supporting a memory consolidation hypothesis which states that ECS does not destroy critical traces; rather, it blocks further processing.—*Journal abstract.*

4648. Kirkby, Robert J. & Polgar, Stephen. (Coll of Paramedical Studies, Glebe, NSW, Australia) **Active avoidance in the laboratory rat following lesions of the dorsal or ventral caudate nucleus.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 301-306.—Active avoidance learning in a total of 67 male Wistar rats with lesions of the ventral or dorsal caudate nucleus was investigated in 1-way (Exps I and II) and 2-way (Exp III) avoidance situations. Performance was measured under various levels of shock and conditions of food deprivation. G. Winocur and J. A. Mills (see PA, Vol 43:13802) hypothesized that the learning of active avoidance problems was disrupted by lesions of the ventral aspect of the caudate nucleus but not by dorsal lesions. In the present study, Ss with lesions of the ventral caudate were not more deficient than Ss with lesions of the dorsal caudate in learning to avoid. Under some conditions, dorsal-lesion Ss were significantly more impaired than ventral lesion Ss. Findings suggest that the Winocur and Mills hypothesis should be rejected. (26 ref)—*Journal abstract.*

4649. Kolb, Bryan & Nonneman, Arthur J. (Pennsylvania State U) **Frontolimbic lesions and social behavior in the rat.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 637-643.—The social behavior of 40 male Wistar albino rats with chronic lesions to the medial frontal cortex, orbital frontal cortex, hippocampus, septum, or amygdala was studied in 4 different situations: large open field, small open field, shock-induced aggression, and muricide. All lesions altered social behavior, but the effects of the different lesions could be dissociated from one another and from the behavior of the 16 controls. Lesions to the hippocampus dramatically reduced contact in open field tests and almost totally eliminated shock-induced aggression. Lesions to the amygdala and septum also reduced the level of shock-induced aggression, but whereas amygdala lesions significantly decreased contact, septal lesions did not. Ss with lesions to the medial or orbital aspects of the prefrontal cortex differed from one another; Ss with orbital lesions exhibited consistently low contact scores and Ss with medial lesions did not, while both groups showed increased levels of shock-induced aggression. None of the lesions significantly altered muricide. (21 ref)—*Journal abstract.*

4650. Kovács, Gábor L.; Gajári, Irene; Telegdy, Gyula & Lissák, Kálmán. (U Medical School, Inst of Physiology, Pécs, Hungary) **Effect of melatonin and pinealectomy on avoidance and exploratory activity in the rat.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 349-355.—In a study with R-Amsterdam albino rats, it was found that a daily dose of 50 µg of melatonin facilitated the extinction of active avoidance reflex and decreased the intertrial activity during extinction. However, it had no effect on learning and intertrial activity during acquisition. Pinealectomy was ineffective on acquisition, extinction,

and intertrial activity. Melatonin (100 µg) given on 2 consecutive days facilitated the passive avoidance behavior in water-deprived Ss in 2 different experimental situations. 50 µg of melatonin or pinealectomy was without effect on passive avoidance behavior. Neither melatonin nor pinealectomy had any influence on water intake or on exploratory activity.—*Journal abstract.*

4651. Kraly, F. Scott & Blass, Elliott M. (Johns Hopkins U) **Motivated feeding in the absence of glucoprivic control of feeding in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 801-807.—Feeding to decreased intracellular glucose utilization was assessed in 13 Sherman female albino rats with bilateral damage to the medial forebrain bundle and in 7 normal rats. Brain-damaged Ss that did not feed to glucoprivation, those that ate normally to glucoprivation, and normal Ss were tested on 3 traditional indices of food-motivated behavior: quinine adulteration of diet, barpressing on a variable-interval schedule of 30 sec, and barpressing on a schedule with a progressive ratio of 2.4 of the 7 brain-damaged Ss that did not eat to glucoprivation performed like normal Ss on all 3 motivational indices, while all 7 performed normally on at least 2 of the 3. Results support the conclusion that the glucoprivic mechanisms is not necessary for the occurrence of normal food-motivated behavior. (16 ref)—*Journal abstract.*

4652. Leshner, Alan I. & Johnson, Allan E. (Bucknell U) **Effects of adrenalectomy on the aggressiveness of neonatally androgenized female mice.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 703-705.

4653. Lincoln, D. W. (U Walk, Medical School, Bristol, England) **Suckling: A time-constant in the nursing behaviour of the rabbit.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 711-714.

4654. Mah, C. J. & Albert, D. J. (U British Columbia, Vancouver, Canada) **The attenuation of ECS-induced amnesia by reestablishing continuity with the training environment: A further examination.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 357-359.—47 male black-hooded rats were given a footshock immediately following a step-through response in a 1-trial passive avoidance task. An electroconvulsive shock (ECS) or a sham treatment was then administered 1 sec after the footshock. A retention test 24 hrs later showed that ECS produced substantial amnesia. However, if the Ss were allowed to recover for 15 min in the training apparatus immediately following the ECS instead of being returned to their home cages, the retention interference produced by ECS was largely reversed. This reversal of ECS-induced amnesia was time-dependent, as Ss placed back into the apparatus after 15 min instead of immediately following ECS did not show an attenuation of amnesia. When recovery from ECS was in the apparatus, the retention of avoidance response was still significantly less than that of controls not given ECS. Results are interpreted in terms of a reactivation of consolidation by an interaction of short-term memory and the cues of the training environment.—*Journal abstract.*

4655. Marshall, John F.; Richardson, J. Steven & Teitelbaum, Philip. (U Pittsburg, Psychobiology Program) **Nigrostriatal bundle damage and the lateral hypothalamic syndrome.** *Journal of Comparative &*



*Physiological Psychology*, 1974(Nov), Vol 87(5), 808-830. —Compared the deficits following nigrostriatal bundle damage with the impairments seen after lateral hypothalamic electrocoagulation in 83 Sprague-Dawley or Carworth rats. Results show that bilateral 6-hydroxydopamine injections into the nigrostriatal bundle, at the level of the substantia nigra or globus pallidus, produced a syndrome of feeding impairments similar to that seen after lateral hypothalamic electrocoagulation. Ss became aphagic and adipsic, progressed through the same stages as in the lateral hypothalamic syndrome, and showed the same persistent deficits in response to regulatory challenges. However, these Ss were somewhat less finicky to the taste of their diet than lateral hypothalamic Ss. Sensorimotor impairments—akinesia, limb dysfunction and rigidity, and impairments in orientation to sensory stimuli—seemed to contribute to several aspects of the feeding deficits. Like lateral hypothalamic Ss, these animals had persistent motivational and regulatory deficits in feeding and drinking which could not be attributed to their sensorimotor disturbances. (53 ref) —*Journal abstract*.

4656. Maser, Jack D.; Dienst, F. T. & O'Neal, Edgar C. (Tulane U) **The acquisition of a Pavlovian conditioned response in septally damaged rabbits: Role of a competing response.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 133-136.—Enhanced acquisition of a classically conditioned eyelid-closure response (to tone and shock) was found following septal injury in 6 rabbits. Eye-opening behavior was 4 times more frequent in 6 control Ss. This suggests that faster acquisition is a function of fewer competing responses which might interfere with elaboration of the conditioned response. (22 ref)

4657. Max, David M.; Cohen, Edna & Lieblch, Israel. (Hebrew U, Jerusalem, Israel) **Effects of capture procedures on emotionality scores in rats with septal lesions.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 617-620.—18 septal-lesioned albino rats, when approached from below (anterior-ventral capture) rather than from above, displayed a remarkably reduced emotionality score as measured by standard scales, compared with 6 sham-operated controls. Vocalization and biting were almost completely absent, resistance to capture and handling were considerably reduced, and head jerk and vibrissae stiffening were only slightly affected. It is suggested that the septum might be involved in higher order processing of information and that the increased emotionality observed after septal lesioning results from a distorted evaluation of the threat value of sensory input. (15 ref)—*Journal abstract*.

4658. Misantone, Louis J. & Stelzner, Dennis J. (State U New York, Upstate Medical Ctr, Syracuse) **Behavioral manifestations of competition of retinal endings for sites in doubly innervated frog optic tectum.** *Experimental Neurology*, 1974(Nov), Vol 45(2), 364-376.—In 3 groups of frogs ( $N = 33$ ) the optic nerve was induced to innervate the ipsilateral optic tectum with or without the original innervation present. Visual striking responses to mealworms in the inferior visual field were observed postoperatively. Ss in all 3 groups eventually evidenced striking appropriate to the point of the visual field stimulated, but misdirected to the opposite field. These

mirror-image responses were first elicited in nasal field positions and spread over time to temporal field positions. The 1st indications of mirror-image responding in Ss with doubly innervated tecta were seen at later postoperative times than in Ss with only ipsilateral connections. This delayed onset of mirror-image behavior is taken as evidence of competition for synaptic sites. (27 ref)—*Journal abstract*.

4659. Miyata, T. et al. (Kumamoto U, Faculty of Pharmaceutical Sciences, Japan) **Effects of intracerebral administration of piperidine on EEG and behavior.** *Life Sciences*, 1974(Sep), Vol 15(6), 1135-1152.—Effects of intracerebral administration of piperidine, a normal constituent of the mammalian brain, on EEG and behavior were examined in more than 50 freely moving adult cats. Results show that (a) administration into hippocampus or amygdalae caused resting and calmness in small doses and seizure discharge accompanied by hyperemotionality in large doses, (b) administration into pontine reticular formation induced slow-wave and fast-wave sleep, and (c) administration into cerebellum caused remarkable changes in the extrapyramidal function. Findings seem to support the suggestion that piperidine affects neural mechanisms serving regulation of emotional behavior, sleeping, and extrapyramidal function. (29 ref)—*Journal abstract*.

4660. Munson, John B. **Dissociation of slow potentials and phasic multiple unit activity.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 314-316.—Reports that optic neurotomy in 3 cats with chronically implanted electrodes had the following effects during REM sleep: (a) eye movement-correlated slow potentials in the lateral geniculate nuclei (LGN) were diminished while those in visual cortex were augmented in amplitude, (b) eye movement-correlated phasic peaks of integrated multiple unit activity in LGN and visual cortex were unchanged, and (c) background levels of integrated multiple unit activity in these sites were diminished. This dissociation of these normally concurrent electrophysiological events provides evidence concerning the electrophysiological basis of these activities and dictates that although the 2 activities co-occur in normal animals, they may not be treated as equivalent. (French summary)—*Journal summary*.

4661. Nakahama, Hiroshi; Yamamoto, Mitsuaki; Sakurada, Shinobu & Shima, Keisetsu. (Tohoku U, Medical School, Inst of Brain Diseases, Japan) **Effects of cytidine diphosphate choline on the nervous system in cats.** *Experimental Neurology*, 1974(Nov), Vol 45(2), 220-227.—Used 30 adult cats to study the effect of cytidine diphosphate choline (CDP-choline) on the nervous system. Almost immediately after intraventricular administration of not less than .2 mg/kg of CDP-choline, Ss exhibited EEG and behavioral arousal; .8 mg/kg induced arousal and continuous crying. Administration of 10 mg/kg resulted in continuous intense crying and pronounced tachypnea; these effects lasted for 1-2 hrs. Immediately after lumbar intrathecal administration of not less than 2.0-4.0 mg/kg CDP-choline, EEG and behavioral arousal occurred and lasted over 8 min. Administration of 10-20 mg/kg caused hyperreflexia, and Ss bit the caudal region of the body. Applied



superficially on the cerebral somatic sensory area I, CDP-choline potentiated the postsynaptic component of the potential evoked by ventrobasal thalamic stimulation; the presynaptic component remained unchanged. Direct application of CDP-choline to nerve fibers produced spontaneous impulse activity. Results suggest that CDP-choline exhibits marked excitatory effects on the nervous system and that it acts directly upon synapses as well as upon nerve fibers.—*Journal abstract.*

4662. O'Hara, Michael P. & Dyer, Robert S. (U Georgia) **Locomotor exploratory activity in blind and normal guinea pigs.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 701-702.

4663. Overmier, J. Bruce & Gross, Douglas. (U Minnesota) **Effects of telencephalic ablation upon nest-building and avoidance behaviors in East African mouthbreeding fish, *Tilapia mossambica*.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 211-222.—The nest-digging activity of 7 decerebrated and 6 sham-operated male fish was compared pre- and postoperatively. It was found that ablation markedly reduced the nest-digging activity. These results, together with earlier research on *Tilapia macrocephala*, indicate that extensive forebrain ablation depresses all reproductive-cycle behaviors regardless of their closeness to spawning. The same fish were also compared in their postoperative acquisition of an instrumental avoidance response. Ablation again markedly impaired avoidance-learning ability, increasing the observed species generality of this ablation-produced deficit. Comparisons from both experiments failed to show any high degree of concordance among extent of ablation, reduction in nest-digging, and impairment of avoidance learning. (21 ref)—*Journal abstract.*

4664. Peters, Ronald H. & Sensenig, Larry D. (Iowa State U) **Temporal analysis of appetitive behavior following VMH lesions in conscious rats.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 181-183.—Describes a technique for making stereotaxic lesions in the conscious rat in order to study the time course of lesion effects. The ventromedial hypothalamus (VMH) was electrolytically destroyed in 18 conscious, sated female hooded rats. Operant responding for food reward on an FR-5 (fixed ratio) reinforcement schedule increased 2 hrs after the lesions were produced. Performance during the hour immediately following the lesions was not affected.—*Journal abstract.*

4665. Petit, Ted L. & Thompson, Robert. (U Florida) **Nucleus cuneiformis lesions: Amnesic effects on visual pattern discrimination in the rat.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 126-132.—Trained 38 rats with shock avoidance on brightness and pattern discriminations following removal of the left posterior half of the neocortex. Electrolytic lesions of the rostral and basolateral portions of the nucleus cuneiformis of the mesencephalic reticular formation on the right side caused serious retention losses of the pattern problem, while lesions of similar magnitude to other brain stem areas on the right side did not lead to significant impairments in retention. Ss subjected to transverse lateral midbrain knife-cuts showed a slight but significant loss in retention. Results are interpreted as supporting the view that an occipitoreticular pathway is

necessary for the performance of pattern discrimination problems in the albino rat. (16 ref)—*Journal abstract.*

4666. Porter, Joseph H.; Allen, Joseph D. & Arazie, Rachele. (U Georgia) **Reinforcement frequency and body weight as determinants of motivated performance in hypothalamic hyperphagic rats.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 627-632.—8 obese and 8 nonobese, ventromedial hypothalamus (VMH) lesioned, female Charles River albino rats were tested on a series of increasing variable-interval schedules (.25-4.0 min). Response rates decreased as a function of increases in interreinforcement interval for all groups, and the functions did not differ in form or in slope between the groups. Response rates for the nonobese VMH, 9 lesion control, and 11 normal control Ss were similar, while response rates for the obese VMH Ss were significantly less than those of the others. This reduction in work output by the obese VMH Ss was attributed solely to their increased weight at the time of testing. (23 ref)—*Journal abstract.*

4667. Rausch, Lyle J. & Long, Charles J. (U California, Medical School, Los Angeles) **Habenular lesions and avoidance learning deficits in albino rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 352-356.—34 Holtzman albino rats were given either habenular lesions or control operations and were evaluated post-surgically during 1-way active avoidance and passive avoidance training. Ss with habenular lesions, particularly those with damage in the posterior aspects of the habenular complex, were significantly impaired during acquisition of the active avoidance task. No significant differences existed between the 2 groups on either of 2 passive avoidance measures. Results are discussed in conjunction with the findings of other research, and hypotheses of either reduced fearfulness or impairment in motor inhibition mechanisms are suggested as frameworks for future research. (21 ref)—*Journal abstract.*

4668. Rausch, Lyle J. & Long, Charles J. (U California, Medical School, Los Angeles) **Habenular lesions and discrimination responding to olfactory and visual stimuli.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 357-364.—20 male albino Sprague-Dawley rats with either bilateral habenular lesions or sham operations were trained to discriminate on the basis of olfactory cues between 2 compartments of a Grice apparatus modified for odor presentation. The discriminative stimulus consisted of different relative concentrations of the odor substance Linal ranging from .1% to 10% air-diluted concentrations. Ss were initially trained using a 10% relative odor stimulus and subsequently tested with a descending series of odorant concentrations. All except 1 S acquired the initial discrimination, but successive lowering of the odor concentration disrupted the performance of the experimental group while all controls successfully reached criterion at the lowest concentration used. The S failing to make the initial odor discrimination was able to discriminate between the 2 compartments when a visual cue was substituted for the olfactory stimulus. It is concluded that the habenular area serves as an important link between olfactory sensory input and motor systems in the rat. It appears that the behavioral changes observed



are related more to threshold elevation or an impairment in olfactory integration than to generalized disruption of response inhibition mechanisms. (23 ref)—*Journal abstract*.

4669. Sadowski, Bogdan. (Polish Academy of Sciences Medical Research Ctr, Lab of Applied Physiology, Warsaw) **Negativism to food during self-stimulation in the anterior part of the basal forebrain in dogs.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 645-651. —A negative response to food was found in 7 electrode-implanted dogs self-stimulating in 8 loci within the nucleus entopeduncularis, nuclear commissurae anterioris, the preoptic area, and the lateral hypothalamus. In 6 Ss this appeared simultaneously in 3 forms: (a) ignoring food (FI) during self-stimulation; (b) food rejection (FR, i.e., interruption of the animal's attempt to reach meat upon experimenter-exerted stimulation of the rewarding site), and (c) food ejection (FE) consisting of throwing a piece of meat out of the mouth when the current was switched on at the beginning of the consummatory act. The 7th S displayed an approach-avoidance behavior, and only FI and FR were observed. None of the 3 forms of negativism to food was seen in 2 other dogs self-stimulating in 3 sites. Negative response to food, particularly when it appears as FE, may indicate that the rewarding value of the stimulus depends on excitation of the neural system controlling satiety. (17 ref)—*Journal abstract*.

4670. Sembello, W. J. & Gladfelter, W. E. (West Virginia U, Medical Ctr) **Effect of hypothalamic lesions on the treadmill performance of rats.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 603-607. —Performed experiments to determine whether 28 male Sprague-Dawley rats whose spontaneous locomotor activity had been decreased by the placement of bilateral electrolytic lesions in the tuber cinereum of the hypothalamus could be forced to run on a treadmill. All Ss with small medial lesions, some Ss with large medial lesions, and most Ss with lateral lesions needed no more prodding to run on the treadmill than they needed before receiving their lesions. While some Ss with large medial lesions and some with lateral lesions usually needed more prodding to keep them running, they, nevertheless, were able to run on the treadmill; in fact, most of these Ss occasionally ran as well as did the 21 controls. Only 1 S, an S with large medial lesions, refused to run. Data suggest that a lack of ability to run cannot explain the hypoactivity observed in these Ss.—*Journal abstract*.

4671. Sleck, Michael H.; Baumbach, H. Dale; Gordon, Barry L. & Turner, Jeffrey F. (U California, Riverside) **Changes in spontaneous, odor modulated and shock induced behavior patterns following discrete olfactory system lesions.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 427-439. —Preoperatively matched 3 groups of male hooded rats ( $N = 39$ ). Ss received sham operations, bilaterally lateral olfactory tract lesions or anterior olfactory nucleus-anterior commissure lesions. In 1 experiment, spontaneous behavior patterns emitted in an exploration field containing different odors were quantified during satiated and food-deprived conditions. In other experiments, flinch and jump thresholds to electric shock and running patterns in an appetitively motivated straight alley experiment were measured. All lesioned Ss

were hyperactive and typically froze and groomed less than shams, while sniffing and rearing patterns differentiated the lesioned and sham groups in several ways. All Ss had similar flinch and jump thresholds and also emitted similar types of responses to electric shock. In the straight alley, odors from normal and stressed Ss had little effect on the running time of the experimental Ss, while a faint cat odor strongly inhibited sham running behavior. Responses to a novel chemical odor (trimethylpentane) and to changes in the alley floor or electric shock applied to the floor were minimal in all Ss. Results are discussed in terms of other olfactory system lesions and some evidence separating the effects of olfactory cues from nonolfactory lesion effects is presented. Problems associated with tests for olfactory discrimination are discussed. A need for more rigorous and specific discrimination tests in behavioral studies involving anosmia is emphasized. (29 ref)—*Journal abstract*.

4672. Silva, M. Teresa. (Escola Paulista de Medicina, São Paulo, Brazil) **Effects of adrenal demedullation and adrenalectomy on an active avoidance response of rats.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 171-174. —Studied extinction of a 1-way avoidance response in adrenalectomized, adrenal demedullated, and operated control albino male rats. The response was acquired under .3-, .6-, or 1.0-mA shock stimulation. In general, adrenalectomized Ss were slower to extinguish than either the demedullated or the operated control Ss. In the most stressful acquisition condition (1.0 mA), demedullated Ss were as resistant to extinction as adrenalectomized Ss. The relationship of these results to the possible involvement of the pituitary-adrenal system in fear-motivated behavior is discussed. (28 ref)—*Journal abstract*.

4673. Singh, H. K.; Ott, T. & Matthies, H. (Medizinischen Akademie Magdeburg, Inst für Pharmakologie und Toxikologie, E Germany) **Effect of intrahippocampal injection of atropine on different phases of a learning experiment.** *Psychopharmacologia*, 1974, Vol 38(3), 247-258. —Observed the effect of an intrahippocampal injection of the muscarinolytic atropine on acquisition, consolidation, and extinction in 42 male Wistar rats. Ss were trained for a shock-motivated brightness discrimination in a semiautomatic Y maze. The training was nonstop and continued till the Ss reached the training criterion of performing 10 consecutive runs correctly. Pretraining application of atropine impaired learning ability significantly but produced a considerable improvement of retention as compared to the controls. The posttraining application of the same dose also produced a considerable improvement of retention. When atropine was given 1 min before the 1st extinction test, no significant effect was observed. It is assumed that atropine has 2 distinct effects: an aversive effect on short-term memory-related processes and a positive effect on consolidation. It is concluded that atropine's effects on learning may be due to changes occurring in cholinergic neuronal activity of the hippocampus during training. (49 ref)—*Journal abstract*.

4674. Sterman, M. B.; McGinty, D. J. & Iwamura, Y. (VA Hosp, Sepulveda, CA) **Modulation of trigeminal reflexes during the REM state in brain transected cats.** *Archives Italiennes de Biologie*, 1974(Jul), Vol 112(3),

278-297.—Studied the monosynaptic masseteric reflex and the polysynaptic digastric reflex during the REM state, as a function of different levels of transection of the brain stem in 16 cats. After transection at or below the midmesencephalon, or after forebrain aspiration above the basal forebrain, reflex depression was seen as in intact adult animals. With transection between midmesencephalon and midhypothalamus, masseteric reflex facilitation was seen, while digastric reflex depression remained. Reflex depression in REM depends on structures in the rostral pons; mesodiencephalic systems may produce an overriding facilitation, unless checked by basal forebrain influences. Young kittens exhibit reflex facilitation in REM and thus may possess a motor organization similar to that of transected animals that show a similar facilitation.—*W. A. Wilson.*

4675. **Sturgeon, R. David & Levitt, Robert A.** (Tennessee A&I State U) **Angiotensin-induced drinking in the cat: A neuroanatomical analysis.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 197-200.—Drinking was elicited by microinjection of angiotensin-II throughout the medial regions of the brains of 20 cats. At many of these same sites, a hypertonic sodium chloride solution also elicited drinking, as did a 5-ion solution and serotonin, on occasion. However, these other solutions were almost invariably effective only at angiotensin-drinking sites. Diffusion via the ventricular or circulatory system may account for some of these data. (18 ref)—*Journal abstract.*

4676. **Thor, Donald H.; Ghiselli, William B. & Lambelet, David C.** (Edward R. Johnstone Training & Research Ctr, Bordentown, NJ) **Sensory control of shock-elicited fighting in rats.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 683-686.—Results of 2 experiments with a total of 112 male Long-Evans rats implicate intact vibrissal organs as requisite for normal shock-elicited fighting in paired males and may convey the principal sensory information contributing to conspecific intermale aggression. Anesthesia of the vibrissal pad prior to each paired footshock exposure completely blocked the attack behavior of experimentally naive Ss. Suppression of fighting was effective in all pairs tested over 14 daily sessions. Devibrissated pairs also fought less than controls but gradually attained normal levels of fighting in spite of repeated clipping of all vibrissae to prevent significant regrowth. Findings demonstrate an evident behavioral distinction between anesthesia of the vibrissal pad and removal of the vibrissae. General epidermal sensation from the snout appears to be necessary for initiating social fighting between paired males exposed to irritable shock. (18 ref)—*Journal abstract.*

4677. **Thorne, Michael B.; Aaron, Michael & Latham, Edward E.** (Mississippi State U) **Olfactory system damage in rats and emotional, muricidal, and rat pup killing behavior.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 157-163.—Subjected hooded female rats to a variety of olfactory-system lesions and compared them with septally damaged and operated-control Ss in terms of handling characteristics, muricidal behavior, and behavior toward rat pups. Damage to the olfactory bulb rostral to the frontal poles resulted in increased mouse killing without changes in E-directed behavior. Addition-

al damage under the frontal lobes increased both emotional behavior and mouse killing. Olfactory tubercle damage unaccompanied by olfactory bulb removal failed to produce either increased emotionality or mouse killing. A trend toward an increase in rat pup killing was noted in rats sustaining olfactory bulb damage. Rats with septal damage, although extremely difficult to handle, did not display increased muricidal behavior. (17 ref)—*Journal abstract.*

4678. **Vrtunski, Predrag & Gluck, Henry.** (Cleveland Psychiatric Inst, Research Div, OH) **Duration variability of the intracranially reinforced barpressing response in the rat.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 137-142.—Examined the intracranially reinforced (ICR) response duration in the albino rat. 22 Ss were implanted with hypothalamic stimulating electrodes; 4 others had electrodes in the septal rewarding area, and 6 in the cortex. Ss were divided into 6 groups. Each group was trained to barpress with a different reinforcement schedule. Results indicate that the response was highly sensitive to various stimulus conditions. The variability and scope of response duration suggested a role of centrally generated feedback in the emission of the barpress. An attempt is made to interpret the data according to a model of information processing, without reference to so-called motivational and reinforcing properties of the ICR stimulus. (24 ref)—*Journal abstract.*

4679. **Wampler, Richard S. & Gier, Herschel T.** (Purdue U, Ft Wayne) **Continuing gonadal function in rats with ventromedial hypothalamic area lesions.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 831-840.—Gonads of 24 female and 20 male rats with ventromedial hypothalamic (VMH) or sham lesions were examined after 67 days in constant light. Results show that VMH- and sham-lesioned males had normal testes. Sham-lesioned females had small ovaries and no corpora lutea (CL). 7 VMH females had larger ovaries with CL and numerous follicles, 4 had larger ovaries with no CL but numerous follicles, and 4 had ovaries resembling those of sham-lesioned females. Damage was confined to the VMH in females with CL, but it included less or more of the anterior hypothalamus in females lacking CL. Results suggest that since VMH damage permits estrous cycling to continue, the intact VMH acts to inhibit cycling in constant light. (30 ref)—*Journal abstract.*

4680. **Whishaw, Ian Q.** (U Lethbridge, Alberta, Canada) **Light avoidance in normal rats and rats with primary visual system lesions.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 143-147.—Examined the light-avoidance behavior of 100 normal hooded rats and rats with primary visual system lesions in a differentially illuminated 2-choice chamber for 28-58 days. Normal Ss ate in the dark compartment, hoarded food to the dark, but defecated in the lighted compartment. Enucleation abolished light avoidance and the other behaviors. Neither small nor large posterior neocortex lesions affected light avoidance or other behaviors. Avoidance was also unchanged following superior colliculus lesions and pretectal lesions, but was increased by lateral geniculate lesions, posterior thalamus lesions, combined posterior neocortex and hippocampal lesions, and



posterior neocortex and superior colliculus lesions. Results do not support previous suggestions that primary optic-center lesions decrease light avoidance in the rat. (25 ref)—*Journal abstract*.

4681. Wolfarth, S.; Dulski, E. & Lacki, M. (Polish Academy of Sciences, Kraków) Comparison of the effects of the intranigral injections of cholinomimetics with systemic injections of the dopamine receptor stimulating and blocking agents in the rabbit. *Neuropharmacology*, 1974(Sep), Vol 13(9), 867-875.—The cholinergic stimulation of the substantia nigra of 25 White Danish rabbits, induced by intranigral injections of acetylcholine, methacholine, or neostigmine, produced behavioral and EEG alerting, various forms of stereotyped behavior, and autonomic symptoms, followed by a pre-epileptic EEG pattern and an epileptic EEG pattern accompanied in most of the cases by clonico-tonic convulsions. The EEG and behavioral effects were similar to those observed after systemic injections of amantadine or apomorphine, although they produced more intensive stereotypy and no convulsions. The effects of cholinomimetics were abolished by intranigral injections of atropine or by subcutaneous injections of spiroperidol. The catalepsy produced by spiroperidol was abolished by intranigral neostigmine injections. The relationship between the cholinergic stimulation of the nigra and dopaminergic stimulation of the striatum is discussed. (30 ref)—*Journal abstract*.

#### Drug Effects

4682. ———. **Ibogaine**. *PharmChem Newsletter*, 1972, Vol 1(2), 3-4.—Presents results of a 1972 analysis of street samples of 40 drugs, including 2 which contained ibogaine. The history, pharmacology, and psychological effects of ibogaine are described.

4683. ———. **Phencyclidine (PCP)**. *PharmChem Newsletter*, 1972, Vol 1(1), 2-3.—Presents the results of an analysis of 30 street samples of drugs originating in the San Francisco area during 1972. A report on the pharmacology, history, effects, and metabolism of phencyclidine (PCP) which apparently is increasing in the illicit drug market is presented.

4684. Adler, R. & Lomazzi, F. (U Berne, Switzerland) Mild analgesics evaluated with the "submaximum effort tourniquet technique": I. The influence of psychological factors on their effect. *Psychopharmacologia*, 1974, Vol 38(4), 351-356.—Assessed the effects of placebo, C-44'328-Ba (3-dimethylaminoethyl 1,2-diphenyl-buten 2-ol), and dextropropoxyphen using the submaximum effort tourniquet test by G. M. Smith et al (1966) as a test of experimental pain in 30 normal male volunteers. No significant differences among drug treatments were observed, although when psychological factors (i.e., level of anxiety, use of coping behavior to become distracted by pain, and style of relating to E) were taken into account, Ss with low levels of anxiety, low use of coping behaviors, and relaxed manners of relating showed trends toward better discrimination between placebo and analgesics than did their counterparts. In the most calm and most anxious groups, the response to 4 individual trials was significantly different; in the most calm Ss, discrimination occurred between analgesics and placebo, while in the most aroused Ss, discrimination occurred

only between C-44'328-Ba and all other treatments.—*Journal abstract*.

4685. Adler, R.; Gervasi, A.; Holzer, B. & Hemmeler, W. (U Berne, Switzerland) Mild analgesics evaluated with the "submaximum effort tourniquet technique": II. The influence of a tranquillizer on their effect. *Psychopharmacologia*, 1974, Vol 38(4), 357-362.—Conducted a 2nd study to determine if benzocadiene, administered to induce relaxation, would enhance 48 male volunteers ability to discriminate the effects of 2 analgesics (100 mg C-44'328-Ba and 1g acetaminophen) from placebo. In the 1st study by R. Adler and F. Lomazzi (see PA, Vol 53:Issue 3), Ss who demonstrated a calm behavior in the experimentally induced pain situation (using the submaximum effort tourniquet technique) discriminated between 2 mild analgesics better than Ss who exhibited prominent arousal reactions. Results of the present study show that on none of the 4 pain-intensity levels was benzocadiene discriminated from placebo, indicating that it had no analgesic effects. In Ss who did not receive benzocadiene, the 2 analgesics were not discriminated from placebo. The combination of C-44'328-Ba with benzocadiene was more effective than C-44'328-Ba alone on 3 pain levels. Acetaminophen and benzocadiene together were more effective than acetaminophen alone on the highest pain level. The analgesics given alone were significantly more effective in reducing pain on 2 levels than placebo.—*Journal abstract*.

4686. Ahlenius, S. (U Göteborg, Sweden) Effects of L-dopa on conditioned avoidance responding after behavioural suppression by  $\alpha$ -methyltyrosine or reserpine in mice. *Neuropharmacology*, 1974(Aug), Vol 13(8), 729-739.—The effects of levodopa on a conditioned avoidance response (CAR) suppressed by  $\alpha$ -methyltyrosine methylester hydrochloride ( $\alpha$ -MT), an inhibitor of the catecholamine synthesis, or by the granular uptake-storage blocking agent, reserpine, were investigated in female NMRI albino mice. It was found that 10 mg/kg of levodopa in conjunction with inhibition of peripheral levodopa decarboxylase could restore the suppression of a CAR induced by  $\alpha$ -MT. A partial antagonism of the suppression induced by reserpine was obtained by levodopa 3-4 hrs after intraperitoneal injection and 2 hrs after 400 mg/kg. In order to test the specificity of response, the performance on a 2-choice CAR was investigated. It was found that the reversal by levodopa after reserpine but not after  $\alpha$ -MT resulted in significant number of false CARs. It may be that a restoration of behavior to predrug level of performance is dependent on an intact granular function ensuring release of catecholamines by nerve impulses on administration of levodopa. (26 ref)—*Journal abstract*.

4687. Alexander, Michael. (Dept of Health, Education & Welfare, Ctr for Disease Control, Atlanta, GA) Surveillance of heroin-related deaths in Atlanta, 1971 to 1973. *JAMA: Journal of the American Medical Association*, 1974(Aug), Vol 229(6), 677-678.—Surveillance of heroin overdose deaths and of the heroin content of glassine bags available at the "street level" in Atlanta in 1971-1973 disclosed a significant correlation between the occurrence of such deaths and the amount of heroin contained in the bags ( $p < .001$ ). Case histories of 1 cluster of deaths suggest that novice users



with a low level of opiate tolerance could have died from intake of amounts of heroin in excess of their tolerance; however, data are also consistent with causes other than pharmacologic overdose.

4688. Anderson, Rebecca J. & Raines, A. (Georgetown U, Medical & Dental School) **Selective diphenylhydantoin suppression of auditory evoked potentials in the cat cerebellar cortex.** *Neuropharmacology*, 1974(Aug), Vol 13(8), 749-754.—Evoked potentials were recorded in Larsell's lobules VI, VIIb, and the left paramedian lobule of the cerebellum in 20 anesthetized adult cats. Diphenylhydantoin reduced auditory responses produced by a 2,800 Hz 60 db tone in all 3 cerebellar areas, 5 mg/kg being below thresholds, and doses of 20 mg/kg or more completely abolishing the response. In addition, cerebellar responses produced by dropping a 10-g weight on the forepaw or stimulation of the ipsilateral superficial radial nerve were resistant to diphenylhydantoin doses as great as 40 mg/kg. Diphenylhydantoin seemed to have no effect on spontaneous cerebellar activity. It is concluded that the selective depression of auditory-evoked cerebellar activity was due to diphenylhydantoin. —*Journal abstract.*

4689. Aporti, Ferrante; Pensato, Anna & Toffano, Gino. [The effect associated with hypothalamic phospholipids and a psychotropic drug used in testing for ulcers due to stress.] (Ital) *Rivista di Psichiatria*, 1973(Nov-Dec), Vol 8(6), 650-659.—Indicates that the administration of phospholipids may regulate efferent sympathetic impulses and normalize the nerve structures altered by hyperstimulation. (25 ref)

4690. Barker, Lewis M.; Suarez, E. Martin & Gray, Don. (Baylor U) **Backward conditioning of taste aversions in rats using cyclophosphamide as the US.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 117-119.—Demonstrated that conditioned taste aversion resulted from an unconditioned stimulus-conditioned stimulus (US-CS)—backward—conditioning procedure using a 75 mg/kg cyclophosphamide injection as the US. 55 female albino rats served as Ss. The magnitude and resistance to extinction of the conditioned taste aversion was found to decrease monotonically when the US-CS interstimulus interval was varied from 1 min to 4 hrs. In this respect, and in the inconclusive nature of the signs of sickness following US administration, cyclophosphamide appears to act like ionizing radiation in conditioning taste aversions. It is argued that these results reflect associative, not pseudoconditioned, avoidance responses. (18 ref)—*Journal abstract.*

4691. Beaton, John M.; Pegram, G. Vernon; Bradley, Ronald J. & Smythies, John R. (U Alabama, Neurosciences Program, Birmingham) **An investigation of the effects of L-methionine and related metabolites on rat behavior.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 249-256.—Tested levomethionine, levoserine, levomethionine plus levoserine, levocysteine, and betaine on a modified discriminated Sidman avoidance schedule with 20 male hooded rats. Daily injections of 250 mg/kg of these compounds were administered to experimental Ss for at least 28 consecutive days. Schedule performance was monitored during this period and compared to that of preinjection saline controls. Results indicate that only methionine had significant behavior-disrupting effects.

The disruption was removed by the addition of serine, suggesting that the methionine-disrupting effect may have been due to one of the metabolites of methionine—homocysteine.—*Journal abstract.*

4692. Bigler, Erin D.; Fleming, Donovan E. & Shearer, Donald E. (Brigham Young U) **Pharmacological modulation of photically evoked afterdischarge patterns in hooded Long-Evans rats.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 179-181.—Examined photically evoked afterdischarge (AD) patterns within a short-term habituation paradigm in 10 rats. Pharmacological arousal by amphetamine, pilocarpine, and physostigmine or induced thalamic suppression by trimethadione attenuated AD development. AD development was unaffected by saline, methyl atropine, and atropine. Pentylentetrazol was used as an AD potentiator and, as such, enhanced AD development following all drug conditions except within the physostigmine and methyl atropine sessions. All drugs were administered subcutaneously. It was determined that in the hooded rat AD varies only as a function of drug injected; time was not a factor. The role of the reticulocortical projection system and the limbic system is incorporated in the explanation of the results. Significant differences were also noted between the pharmacology of AD parameters in hooded vs albino rats. (18 ref)—*Journal abstract.*

4693. Booth, D. A. & Simson, P. C. (U Birmingham, England) **Taste aversion induced by an histidine-free amino acid load.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 349-351.—Protein-free diet flavored with saccharin or salt was presented to 16 male Sprague-Dawley albino rats following a single intragastric administration of a histidine-devoid, but otherwise balanced, amino acid mixture. A control load was paired with the alternate flavor on another day. When Ss were subsequently given a choice of flavors, they preferred the control flavor to the one paired with the deficient load. —*Journal abstract.*

4694. Booth, D. A. (U Birmingham, England) **Acquired sensory preference for protein in diabetic and normal rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 344-348.—In Exp I male Sprague-Dawley rats made diabetic by injection of streptozotocin, either after adaptation to a cafeteria or some weeks beforehand, increased their intake of protein relative to that of other macronutrients. Preference for an arbitrary odor added to the protein was increased. In Exp II, 8 normal Ss were repeatedly given brief access to either protein-free or protein-containing diet while maintenance chow was withheld for 10 hrs. Ss came to prefer the odor-taste combination included in the protein diet to the flavor included in the protein-free diet. It is suggested that, not only in diabetic and protein-deprived rats, but also in normal rats not long since the end of amino acid absorption, the supply of amino acids establishes a relative conditioned attraction for associated food flavors. (17 ref)—*Journal abstract.*

4695. Boyatzis, Richard E. (McBer & Co, Boston, MA) **The effect of alcohol consumption on the aggressive behavior of men.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 959-972.—Studied the interpersonal aggressive behavior of 149 25-50 yr old male social drinkers during 4-hr sessions with 6-8 Ss



each in which distilled spirits (D), beer (B), or nonalcoholic beverages (N) were consumed. Ss completed an activities questionnaire and participated in competitive activities which were videotaped. D and B Ss were more aggressive than the N Ss throughout the session, and D Ss were more aggressive than either B or N Ss late in the session. At blood alcohol concentrations (BACs) greater than .10%, Ss tended to demonstrate more aggressive behavior than at lower BACs. The aggressive behavior of the drinking Ss correlated well with self-reported frequency of trouble due to drinking and physical fights. (23 ref)—*Journal abstract*.

4696. Braden, William; Stillman, Richard C. & Wyatt, Richard J. (St Elizabeths Hosp, Lab of Clinical Psychopharmacology, Washington, DC) **Effects of marihuana on contingent negative variation and reaction time.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 537-541.—Measured contingent negative variation (CNV) and reaction time in 12 21-26 yr old experienced marihuana users after they smoked placebo and marihuana cigarettes. Change in CNV amplitude after smoking marihuana (9.9 mg of  $\Delta^9$ -tetrahydrocannabinol) was negatively correlated ( $r = -.83$ ) with Ss' ratings of their "high" and not significantly correlated with change in reaction time. Results suggest that the relationship of CNV amplitude to marihuana dose is probably in the form of an inverted U. The CNV amplitude may reflect attentional effort or level of interest rather than efficiency of attentional performance, as measured by reaction time. (27 ref)—*Journal abstract*.

4697. Brown, John L. (U Rochester) **Drug effects on vision: Strategies for study and selected results.** *Human Factors*, 1974(Aug), Vol 16(4), 354-367.—Outlines, from the literature, some of the difficulties associated with the problem of determining drug effects on the visual sensory system. Specific consideration is given to the selection of human and animal Ss for study, the use of electrophysiological techniques, and a variety of experimental procedures which may be employed. Problems associated with the attention and motivation of Ss, the use of anesthesia, and the need for investigation of a wide range of drug dosages are discussed. Experiments which reveal fairly specific effects on visual function are described. (73 ref)—*Journal abstract*.

4698. Carlson, Kristin R. & Pavsek, Marianna. (U Pittsburgh, Medical School) **Effects of oral methadone consumption on visual discrimination of the rhesus monkey.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 383-386.—In Exp I 3 male rhesus monkeys which drank small doses, once daily, of methadone mixed with Tang orange drink were trained to perform a series of 2-object visual discrimination problems. Their average number of trials to criterion was the same as that of 5 normal controls, and they made the same number of errors on test trials in which the orientation of the stimulus objects was changed. Ss' average choice latencies, however, were significantly longer than those shown by the normal group. In Exp II the same Ss were given a decision interval to observe the stimulus objects. Latencies, as measured from the end of the interval, were the same for control and methadone-consuming Ss. Data suggest that the previously elevated latencies were not due to motor or motivational lethargy but to a drug-induced prolonga-

tion of the time necessary to decide which was the correct object.—*Journal abstract*.

4699. Cox, T. (U Nottingham, England) **Effects of physostigmine on the accuracy and activity of discrimination behaviour in rats.** *Neuropharmacology*, 1974(Aug), Vol 13(8), 701-705.—The effects of physostigmine on the maintenance of a position discrimination and of a visual discrimination were studied in 2 experiments with 6 male Sprague-Dawley rats in each. Small intraperitoneal doses of the drug improved the accuracy of performance but reduced the Ss' level of activity. Larger doses (above .08 mg/kg) brought about a general disruption of behavior, impairing accuracy of performance as well as markedly reducing level of activity. The dose-response curve for the accuracy measure was significantly different from that for the activity measure, and the increase in difficulty across the 2 discriminations was associated with a shift in the dose-response curves for the 1st but not the 2nd measure. Results support suggestions that the behavioral effects of physostigmine can be explained through its action on 2 separate cholinergic mechanisms of response inhibition. (16 ref)—*Journal abstract*.

4700. Díaz-Flores, L.; Munuera, L.; Rico, J. R. & Vila-Coro, A. (Facultad de Medicina, Madrid, Spain) **[Degeneration of nerve fibre caused by compression of the sciatic nerve in rats treated with parotid extract.]** (Span) *Archivos de Neurobiología*, 1972(May), Vol 35(3), 263-278.—Administered a solution of parotid extract to 25 rats, 21 others serving as controls. The effects on nerve tissue were studied, and significant differences between the 2 groups were found, especially in the connective distal tissue. (23 ref)

4701. Dorus, Elizabeth; Pandey, Ghanshayam N.; Frazer, Alan & Mendels, Joe. (Illinois State Psychiatric Inst, Chicago) **Genetic determinant of lithium ion distribution: I. An in vitro monozygotic-dizygotic twin study.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 463-465.—Assessed red blood cell (RBC) lithium ion concentrations in 10 monozygotic and 7 dizygotic twin pairs after a 24-hr incubation in vitro. A heritability index of .85, calculated as a function of intrapair difference scores, indicated that a substantial genetic factor is operative in RBC intake of lithium ion. (19 ref)

4702. Dowd, Patrick J. **Influence of alcoholic beverages on the vestibulo-ocular responses to coriolis stimulation.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 943-952.—Tested positional nystagmus and vestibulo-ocular response to Coriolis stimulation in 6 experienced airplane pilots (mean age 29.7) before and 8-10 and 34-36 hrs after drinking 1.7 ml of ethanol/kg of body weight as bourbon or vodka. Each S received 6 tilts (Coriolis test) during each test period. In the 8-10 hr period positional alcohol nystagmus (PAN) I was found 4 times and PAN II 8 times; in the 34-36 hr period, 2 and 6 times, respectively. In the left-right tilt, recovery rates were lower and sensitivity and frequency of nystagmus higher 10 hrs after drinking bourbon than before; in the right-left tilt, recovery rates were lower and sensitivity and duration of nystagmus higher. After vodka the recovery rate was lower in the left-right tilt, and in the right-left tilt, frequency and sensitivity were higher. The differences between the effects of bourbon and vodka were not significant. It is

concluded that alcohol weakens the suppression of nystagmic responses to Coriolis acceleration developed by experienced pilots. (19 ref)—*Journal abstract*.

4703. Ehrenwald, Jan. (Roosevelt Hosp, New York, NY) **Placebo: Ploy, psi effect, research tool or psychoactive agent?** *Parapsychology Review*, 1974(Sep-Oct), Vol 5(5), 1-4.—Briefly reviews the history of placebos in medicine and notes that even in modern, tightly controlled triple-blind drug tests, medicinal substances often seem to work for a time and then become ineffective. These results seem to parallel the course of ESP experiments where attitudes of hope and high expectations also produce initial results which eventually decline and become difficult to replicate. It is suggested that a psi factor may be contaminating drug research, and only those remedies which stand the test of time may be free of it. A placebo should not be derided, however, for with authentic motivation a doctor may find it a powerful therapeutic tool.—P. F. Grim.

4704. Elkins, Ralph L. (VA Hosp, Augusta, GA) **Balt-shyness acquisition and resistance to extinction as functions of US exposure prior to conditioning.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 341-343.—Cyclophosphamide-induced aversions to saccharin-flavored tap water were observed in 10 normal control Sprague-Dawley rats, in 15 Ss subjected to varying numbers of cyclophosphamide injections prior to conditioning, and in 5 Ss similarly subjected to preconditioning saline injections. Both initial magnitude and resistance to extinction of a conditioned flavor aversion were inverse functions of preconditioning familiarity with drug-induced illness. 6 preconditioning cyclophosphamide injections markedly reduced both initial aversion magnitude and resistance to extinction. In contrast, 3 such injections failed to affect initial aversion magnitude and resulted in a small acceleration of extinction rate, while 1 preconditioning cyclophosphamide injection produced no observable effects. Findings depict preconditioning familiarity with illness as an important variable modulating the strength of conditioned flavor aversions and emphasize the importance of viewing resistance to extinction as an indicator of aversion strength. (17 ref)—*Journal abstract*.

4705. Fernandes, Mario; Schabarek, Ahmed; Coper, Helmut & Hill, Regina. (Freie U Berlin, Inst für Neuropsychopharmakologie, W Germany) **Modification of  $\Delta^1$ -THC-actions by cannabinal and cannabidiol in the rat.** *Psychopharmacologia*, 1974, Vol 38(4), 329-338.—Studied the action of cannabinal (CBN) and cannabidiol (CBD) using several test procedures known to be altered by  $\Delta^1$ -tetrahydrocannabinol (THC) or crude cannabis preparations. In male Wistar rats, CBN and CBD were inactive in doses up to 80 mg/kg in tests on S motility, food and water intake, body temperature and catalepsy. In contrast, CBD enhanced the hexobarbitone sleeping time more than THC, whereas CBN increased the sleeping time only slightly. When administered in combination CBD prolonged all actions of THC, whereas CBN selectively blocked the effect of THC on hexobarbitone sleeping time. The enhancement by CBD is best explained by an inhibition of THC metabolism. (21 ref)—*Journal abstract*.

4706. Frankenhaeuser, Marianne; Dunne, Elizabeth; Bjurström, Hans & Lundberg, Ulf. (U Stockholm, Psychological Lab, Sweden) **Counteracting depressant effects of alcohol by psychological stress.** *Psychopharmacologia*, 1974, Vol 38(4), 271-278.—Examined the interaction between effects of acute alcohol intoxication and psychological stress in 8 male and 8 female 20-30 yr old college students. Alcohol was given as whiskey, 2 ml/kg of body weight to males and 1.7 ml/kg to females. Psychological stress was induced by applying electric shocks of a moderate intensity to one of the S's hands. Performance in reaction-time tasks representing different levels of complexity, self-estimates of wakefulness and mood, measurements of catecholamine excretion and of heart rate were used as indices of the effects caused by alcohol and shock, singly and in combination. Shocks and alcohol had opposite effects, with shocks decreasing and alcohol increasing reaction time. When the Ss were simultaneously exposed to both influences, the impairment produced by alcohol was significantly reduced by shock at all levels of task complexity. No sex differences could be detected. (17 ref)—*Journal abstract*.

4707. Freed, Earl X. (VA Hosp, Alcohol Research Lab, Lyons, NJ) **Fluid selection by rats during schedule-induced polydipsia.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 1035-1043.—Offered water and solutions containing either 5.6% alcohol, 6.05% 1,3-butanediol, or 5.6% acetone for 32 days to 8 male Blue Spruce albino rats during schedule-induced polydipsia. The 3 Ss offered alcohol (Group I) drank 47, 68, and 89% of their daily fluid intake as the alcohol solution, the 2 given butanediol (Group II) drank 92 and 50% as butanediol, and the 3 offered acetone (Group III) drank 3, 16, and 28% as acetone. Random shock, administered for the next 16 days, reduced intake of all fluids but that of alcohol least. After reestablishment of baseline drinking for 20 days, fluid choices were switched for another 20 days. Ss in Group I drank 67, 67, and 68% of their daily intake as butanediol, Group II drank 97% and 71% as butanediol, and Group III drank 2, 81, and 68% as alcohol. Random shock for the next 20 days slightly increased the proportion of alcohol consumption by all Ss. It is concluded that fluid consumption was based on caloric need.—*Journal abstract*.

4708. Fukuda, Sachio & Iwahara, Shinkuro. (Tokyo U of Education, Japan) **Dose effects of chlordiazepoxide upon habituation of open-field behavior in white rats.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 82-90.—Examined the relationship between drug dose and response in naive male rats observed in an open field for 10 min/day on 6 successive days. Drug-state changes in 2 directions increased ambulation and rearing when chlordiazepoxide dosage was at a relatively low level, but at higher levels these changes occurred in only 1 direction. Correlations between 2 skeletal measures and 2 autonomic measures were very low. Results are presented in detail.—R. D. Nance.

4709. Gamberale, Francesco & Hultengren, May. **Exposure to styrene: II. Psychological functions.** *Work-Environment-Health*, 1974, Vol 11(2), 86-93.—Studied the effect of the solvent styrene on psychological functions (e.g., perceptual speed, reaction time and



manual dexterity) in 12 healthy 21-31 yr old male Ss. Each S was repeatedly studied during exposure to 50, 150, 250, and 350 ppm styrene in inspiratory air and under control conditions. Samples of Ss' alveolar air were taken every other minute during trials. In a subsequent trial parallel samples of alveolar air and arterial blood were taken for 3 Ss. Results show that styrene concentration in alveolar air could not be used as a reliable indicator of the concentration of styrene in arterial blood. A significant impairment in reaction time was observed in exposure to 350 ppm styrene in inspiratory air. Perceptual speed and manual dexterity were not affected by exposure. Results suggest that, in the evaluation of the safety risks connected to exposure to styrene, a special importance must be ascribed to the duration of exposure.—*Journal abstract.*

4710. Gamberale, Francesco & Svensson, Gerd. The effect of anesthetic gases on the psychomotor and perceptual functions of anesthetic nurses. *Work-Environment-Health*, 1974, Vol 11(2), 108-113.—Administered simple and choice reaction time and perceptual speed tasks to 20 25-32 yr old anesthetic nurses and 20 24-34 yr old nurses with duties in intensive care units at the start and at the end of a work day. The anesthetic nurses were exposed to anesthetic gases in their daily work. The duties of the other nurses were carried out in rooms in which the nurses were not exposed to anesthetic gases. No measurable impairment in reaction time and in perceptual speed of the anesthetic nurses, as compared to the intensive care staff, could be detected. Results obtained in 1 of the reaction time tests, however, indicate that the individual variability of the responses of anesthetic nurses was greater than that of the comparison group at the end of the work day but not after 16 hrs of rest from exposure.—*Journal abstract.*

4711. Graf, Curtis L. (State U New York, Stony Brook) Effects of scopolamine on inhibitory mechanisms. *Physiological Psychology*, 1974(Jun), Vol 2(2), 164-170.—Scopolamine-injected hooded rats remained withdrawn from a novel chamber longer than controls under free exploratory conditions (Ss could withdraw into the home cage). This finding was interpreted to mean that scopolamine prevents the habituation of fear induced by the novel chamber. Under forced exploratory conditions (no opportunity to withdraw), scopolamine-injected Ss showed (a) continuous general motor behavior rather than a within-session decrease as found in control Ss; (b) as much within-session decrease in locomotion, scanning, and object contact as controls. Results are interpreted to mean that scopolamine produces a disinhibitory effect on general activity without interfering with behavioral response habituation. The drug's disinhibitory effect on fear and general motor activity may be due to the impairment of an inhibitory cholinergic system within the brain, but this system does not appear to mediate the inhibitory process underlying behavioral response habituation. (25 ref)—*Journal abstract.*

4712. Greizerstein, Hebe B. & Smith, Cedric M. (Research Inst on Alcoholism, Buffalo, NY) Ethanol in goldfish: Effect of prior exposure in a test procedure. *Psychopharmacologia*, 1974, Vol 38(4), 345-349.—Investigated the authors' 1973 finding that goldfish acquire

tolerance to ethanol, to determine whether prior exposure to the test procedure contributed to tolerance development. The actions of ethanol were measured by the time required for the appearance of overturn (loss of righting reflex) and the brain ethanol content at the instant of overturn following immersion of 60 goldfish in 3.1% ethanol. Neither the time required for onset of action nor ethanol brain levels at overturn were significantly affected by 1-5 exposures to the 3.1% solution over an interval of 2-5 days. Findings confirm the use of the overturn test as a behavioral measure relatively uninfluenced by repeated exposure to the test situation.—*Journal abstract.*

4713. Guedry, Fred E.; Gilson, Richard D.; Schroeder, David J. & Collins, William E. Some effects of alcohol on various aspects of oculomotor control. Pensacola, FL: Naval Aerospace Medical Research Lab, with US Army Aeromedical Research Lab, Ft Rucker, AL, & FAA Civil Aeromedical Inst, Oklahoma City, OK, NAMRL-1206 & USAARL 75-2, 1974. 23 p.—Measured performance on 3 tasks (visual suppression of vestibular nystagmus, tracking of a moving target, and repetitive rapid voluntary shifts in gaze) before and after a mild dose of alcohol in 11 male Ss. Oculomotor control was decreased on the 1st 2 tasks with a recovery toward initial performance level 4 hrs after drinking; performance on the 3rd task was not degraded. (23 ref)

4714. Guha, D. & Pradhan, S. N. (Howard U, Medical School) Effects of mescaline,  $\Delta^9$ -tetrahydrocannabinol and pentobarbital on the auditory evoked responses in the cat. *Neuropharmacology*, 1974(Aug), Vol 13(8), 755-762.—Effects of intraperitoneal mescaline,  $\Delta^9$ -tetrahydrocannabinol (THC), and pentobarbital were studied on the peak latency, area, and amplitude of the waves of the average auditory evoked potentials in restrained conscious cats. Mescaline caused a significant increase in peak latency, area, and amplitude of these waves. The onset of these changes was within 10-40 min, and their duration ranged between 90-180 min. THC also caused a marked increase in peak latency, area, and amplitude. The effects of THC had its onset within 40-105 min and lasted for more than 120-180 min. Pentobarbital also caused an increase in the peak latency, area, and amplitude of these waves within 5-7 min. The peak effect occurred within 10-15 min and lasted for more than 100-120 min. These effects of the hallucinogens, mescaline and THC thus appear to resemble those of pentobarbital, a central nervous system depressant; however, the mechanism of their actions differs. (29 ref)—*Journal abstract.*

4715. Harley, J. Preston; Cohen, Rochelle & Silverman, Albert J. (U Wisconsin, Ctr for Health Sciences, Neuropsychology Lab, Madison) Field dependence and response to alcohol. *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 973-986.—Administered the rod-and-frame test to 30 male 18-30 yr old social drinkers before and 2 hrs after they had consumed drinks with .33 or 1 ml of absolute alcohol/kg of body weight. Ss were divided into 3 groups of 10 Ss each—field dependent (d), field independent (I), and medium field dependent (M). Mean blood alcohol concentrations in the 3 groups were comparable—.020-.025% after the low dose and .089-.094% after

the high dose. D Ss gave more accurate responses after the low dose than I Ss, and all groups were less accurate after the high dose. Respiration, blood pressure, and pulse rate were measured before and at 10-min intervals after drinking; there were no significant respiration changes, but 1.5 hrs after drinking blood pressure increased after the low dose but decreased after the high dose in all groups. Pulse rate did not change in D Ss after either dose but increased in the M and I Ss after the high dose. (27 ref)—*Journal abstract*.

4716. Hartmann, Ernest; Cravens, James & List, Samuel. (Boston State Hosp, MA) **Hypnotic effects of l-tryptophan.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 394-397.—Reports that sleep latency in 10 normal 21-35 yr old males was significantly reduced by bedtime administration of the amino acid levotryptophan. The reduction in sleep latency (approximately 50%) was significant even at a dose of 1 gm of levotryptophan, which approximates the levotryptophan content of .5 kg of meat. EEG stages of sleep and the cycle of sleep were not significantly affected by low doses of levotryptophan but at one or more of the higher doses (10-15 gm) there was a decrease in desynchronized sleep and an increase in slow-wave sleep. (36 ref)—*Journal abstract*.

4717. Heilman, R. D.; Bauer, E. W. & da Vanzo, J. P. (Ortho Research Foundation, Raritan, NJ) **Pharmacologic studies with triflubazam (ORF 8063): A new psychotherapeutic agent.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 1022-1032.—ORF-8063, a benzodiazepine derivative with a unique structural modification, produced in mice, cats, and dogs pharmacologic effects that were similar to, and different from, those of chlordiazepoxide and diazepam, respectively. The drug was generally intermediate in potency to chlordiazepoxide and diazepam in motor performance and anticonvulsant and antiaggressive behavior tests in mice and produced minimal cardiovascular and autonomic effects in dogs. It had a larger lethal dose and a considerably longer duration of action than diazepam in mice and produced sedation without presedation excitation in cats. ORF-8063 did not stimulate appetite in dogs at a dose of 2.0 mg/kg administered for 14 consecutive days and produced a slight, antiemetic effect. While the significance of these effects remains to be shown in clinical studies, early clinical studies have shown an anxiolytic effect of ORF-8063. (18 ref)—*Journal abstract*.

4718. Hodge, Gordon K. & Butcher, Larry L. (U California, Los Angeles) **5-Hydroxytryptamine correlates of isolation-induced aggression in mice.** *European Journal of Pharmacology*, 1974(Oct), Vol 28(2), 326-337.—Recorded aggressive behavior in pairs of male Swiss-Webster SIM/WS albino mice, who had been isolated for 4 wks, for 15 min every other day. Drug procedures were begun after the baseline for aggression and activity stabilized. While motility remained unaffected, Ss injected intraperitoneally with 5-hydroxytryptophan in combination with a peripheral decarboxylase inhibitor engaged in fewer fights of shorter average duration which were preceded by longer attack latencies. Biochemical analyses indicated that although serotonin levels were increased, catecholamine levels were reduced. A putative inhibitor of tryptophan hydroxylase, p-

chloro-N-methylamphetamine (PCMA), increased fighting frequency. At time periods in which fighting was increased, levels of brain serotonin were reduced while catecholamine levels remained unaltered. Although PCMA did not affect motility at time intervals when fighting was increased, locomotor activity was increased for the first 8 hrs after administration. Results suggest that serotonergic mechanisms are involved in the control of isolation-induced aggression in mice. (38 ref)—*Journal abstract*.

4719. Horst, W. Dale & Spirt, Nena. (Hoffmann-La Roche Inc, Nutley, NJ) **A possible mechanism for the anti-depressant activity of thyrotropin releasing hormone.** *Life Sciences*, 1974(Sep), Vol 15(6), 1073-1082.—In a series of experiments with male Charles River rats, intraperitoneally injected thyrotropin releasing hormone (TRH) caused an increase in the release and turnover of norepinephrine in brain tissue but had no effect on the endogenous levels of this amine. TRH did not influence the uptake of norepinephrine by brain tissue. It is suggested that the release of norepinephrine by THR may be the mechanism whereby TRH reverses mental depression. (26 ref)—*Journal abstract*.

4720. Houser, Vincent P. & Van Hart, Dale A. (VA Hosp, Psychotropic Drug Lab, Perry Point, MD) **The effect of chlorpromazine and imipramine on the aversive threshold of rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 333-336.—Assayed the analgesic potency of chlorpromazine (CPZ—.25, 2.0, 4.0, and 8.0 mg/kg) and imipramine (2.5, 5.0, 10.0 and 20.0 mg/kg) in 12 male Sprague-Dawley rats, using the spatial preference technique. CPZ raised the aversive threshold in a dose-dependent manner in doses at or above 2.0 mg/kg. These same dosages, however, also significantly reduced the number of motor responses made during threshold testing. Results suggest that CPZ produces analgesia and/or inhibits the execution of the escape response. Imipramine, on the other hand, significantly raised the aversive threshold without reducing motor activity. These results suggest that imipramine produced an analgesic effect. (20 ref)—*Journal abstract*.

4721. Izquierdo, Ivan. (Farmacologia e Biofisica Inst de Bociencias, Port Alegre, Brazil) **Effect on pseudoconditioning of drugs with known central nervous activity.** *Psychopharmacologia*, 1974, Vol 38(3), 259-266.—Placed 158 female Wistar rats in a conventional shuttle-box and submitted them to buzzers and shocks presented in random sequence and with no temporal association. Ss made pseudoconditioned barrier-crossing responses to the buzzer. The performance of these responses was enhanced by metrazol and trimethadione, depressed by amobarbital, phenobarbital, meprobamate, diazepam, chlorpromazine, and reserpine, and unaffected by diphenylhydantoin, cannabidiol, caffeine, strychnine, picrotoxin, and dibenamine. The enhancing effect of trimethadione, but not that of metrazol, was antagonized by dibenamine. With the exception of metrazol, chlorpromazine, and reserpine, the drug effects on pseudoconditioning did not correlate with those reported for pretrial administration on conditioned avoidance, using the same doses and route of administration (intraperitoneal). Results support the notion that pseudoconditioning is a distinct behavioral entity with pharmacologic



characteristics clearly different from those of avoidance conditioning. (32 ref)—*Journal abstract.*

4722. Kahn, Jeffrey; Gorelick, David A. & Bridger, Wagner H. (Swarthmore Coll) **Mescaline facilitates retention of passive avoidance in rats.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 120-122.—Tested the hypothesis that hallucinogens produce memory disturbance. Of 81 male hooded rats, half were given 1 trial of step-through passive avoidance, then immediately injected with saline or mescaline (160  $\mu$ mol/kg intraperitoneally) and tested for retention 48 hrs later. Controls were given identical treatments, except that they did not receive footshock during the training trial. Groups receiving footshock showed learning and retention, with the mescaline group showing better retention than the saline group. The no-footshock groups showed no learning, with the mescaline group not differing from the saline. In a separate experiment, rats were given 1 trial of step-through passive avoidance, then injected with saline or mescaline 72 hrs later and tested for retention 48 hrs after injection. The mescaline and saline groups did not differ, indicating that mescaline did not have a 48-hr proactive effect on performance in this task.—*Journal abstract.*

4723. Kaplan, J. et al. (NIMH Lab of Clinical Psychopharmacology, St Elizabeths Hosp, Washington, DC) **Blood and urine levels of N,N-dimethyltryptamine following administration of psychoactive dosages to human subjects.** *Psychopharmacologia*, 1974, Vol 38(3), 239-245.—Psychoactive doses (7 mg/kg) of the hallucinogen N,N-dimethyltryptamine (DMT) were administered intramuscularly to 11 21-28 yr old normal male experienced hallucinogen users. A gas chromatographic-mass spectrometric isotope dilution determination of DMT concentrations in whole blood and urine revealed that only a fraction of the injected dose was recovered, and the blood DMT concentrations had a very similar time course to the subjectively reported "high." (21 ref)—*Journal abstract.*

4724. Karler, Ralph; Cely, William & Turkianis, Stuart A. (U Utah, Coll of Medicine) **Anticonvulsant properties of  $\Delta^1$ -tetrahydrocannabinol and other cannabinoids.** *Life Sciences*, 1974(Sep), Vol 15(5), 931-947.—Anticonvulsant doses of  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC) markedly lowered body temperature in male ICR mice at 22°C, but there was little such effect at 30°C. The drug abolished hind-limb extension in a maximal electroshock (MES) test, elevated both the MES (extensor) and 6-Hz electroshock thresholds, exerted no effect on the 60-Hz electroshock threshold, and enhanced minimal seizures caused by pentyleneetetrazol. All anticonvulsant properties studied, with the exception of the 60-Hz electroshock threshold, were unaffected by the hypothermia resulting at 22°C. Additional experiments with  $\Delta^1$ -THC indicated that chronic treatment resulted in the development of tolerance, as determined by the MES test with male Sprague-Dawley rats.  $\Delta^1$ -THC,  $\Delta^1$ -THC, cannabinol, and cannabidiol displayed anticonvulsant activity, as did the major, primary metabolite of  $\Delta^1$ -THC, 11-hydroxy- $\Delta^1$ -THC. The synthetic cannabinoids, dimethylheptylpyran and its isomers, were the most potent anticonvulsants in mice. Study of the activity of the cannabinoids demonstrates that these anticonvulsant properties are at least

partially separable among the various agents. (32 ref)—*Journal abstract.*

4725. Kaymakçalan, Şükrü. (Ankara U, Medical School, Turkey) **Tolerance to and dependence on cannabis.** *Bulletin on Narcotics*, 1973(Oct-Dec), Vol 25(4), 39-47.—Discusses physical dependence on cannabis and self-administration in monkeys. (24 ref)

4726. Keyes, Joseph B. (Louisiana State U) **Effect of ACTH on ECS-produced amnesia of a passive avoidance task.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 307-309.—96 male albino rats given electroconvulsive shock (ECS) following a 1-trial passive avoidance step-down task showed amnesia for that task. Administering adrenocorticotrophic hormone 4 hrs after training produced recovery of the avoidance behavior. This suggests that reactivating the internal physiological state present during training is sufficient to retrieve memories that are inaccessible following ECS. (16 ref)—*Journal abstract.*

4727. Klein, Stephen B.; Barter, Marie J.; Murphy, Arthur L. & Richardson, John H. (Old Dominion U) **Aversion to low doses of mercuric chloride in rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 397-400.—In contrast to the detrimental influence of low mercury doses observed in prior research, mercuric chloride had no significant effect on either emotional behavior in the open field or on aversive conditioning of 24 adult and 24 juvenile Sprague-Dawley rats in the 1-way shuttlebox. Results also show that mercuric chloride had no obvious physiological effect as indicated by the absence of significant differences between experimental Ss and the 24 controls. However, the data indicate that adult male and female Ss were capable of reducing their intake of a solution containing mercury. This aversion to low doses of mercury developed in the apparent absence of any gross physiological and behavioral impairment. Juvenile Ss were able to develop an aversion to sugar water containing mercury but exhibited a difficulty in maintaining their aversion.—*Journal abstract.*

4728. Klonoff, Harry. (U British Columbia, Vancouver, Canada) **Marijuana and driving in real-life situations.** *Science*, 1974(Oct), Vol 186(4161), 317-324.—Determined (a) the effects of low and high doses of marijuana (4.9 and 8.4 mg of  $\Delta^1$ -tetrahydrocannabinol) on driving performance in a restricted, traffic-free area (i.e., a driving course) and on the streets of a downtown area during peak hours of traffic flow, and (b) the effects of marijuana and driving on heart rate. Ss were 64 19-31 yr old volunteers with a mean of 6.92 yrs of driving experience. Results indicate that the smoking of marijuana does have a detrimental effect on driving skill and performance in a restricted driving area, and that this effect is even greater under normal driving conditions on city streets. Heart rates increased significantly during the drug (vs placebo) condition for all types of traffic patterns and events. The effects of marijuana appeared to be bidirectional—whether a significant decline occurred in driving ability was dependent both on S's capacity to compensate and on the dose. In some Ss whose driving performance improved, the explanation may be found in overcompensation and the sedative effect of the drug.—*L. Gorsev.*

4729. Koff, Wayne C. **Marijuana and sexual activity.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 194-204.

—Investigated the effects of marihuana on human sexual activity. Questionnaires were returned by 251 college students who smoke marihuana and a limited number of interviews were conducted. 57.8% of the females and 39.1% of the males stated that marihuana increased their sexual desire. 51.3% stated that sexual enjoyment increased following the use of marijuana. The most active dose was said to be 1-2 cigarettes containing 1% of tetrahydrocannabinol.—*E. B. Jaffa*.

4730. Kosman, Mary E. (American Medical Assn, Chicago, IL) **Pharmacokinetic drug interactions: Sedative, hypnotic, and antianxiety agents.** *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(11), 1485-1488.—Reviews evidence on the enhancement and inhibition of metabolism, drug distribution, and the clinical applications of sedative, hypnotic, and antianxiety drug interactions. Barbiturates have adverse effects on the course of coumarin therapy, manifested by increased or fluctuating anticoagulant requirements during combined therapy. In some patients, barbiturates may reduce the therapeutic response to corticosteroids, griseofulvin, and possibly to digitoxin, but they appear to have no effect on the response to methyl dopa. Plasma levels of tricyclic antidepressants and chlorpromazine may also be decreased by the barbiturates, but an effect on the clinical response has not been demonstrated. Chloral hydrate, chloral betaine, triclofos, glutethimide, ethchlorvynol, and possibly meprobamate may also alter responses to coumarin anticoagulants. Benzodiazepines appear to have no adverse interactions with coumarin anticoagulants or tricyclic antidepressants. (53 ref) —*Journal summary*.

4731. Ladisich, W. (Max-Planck-Inst für Psychiatrie, München, W Germany) **Effect of progesterone on regional 5-hydroxytryptamine metabolism in the rat brain.** *Neuropharmacology*, 1974(Sep), Vol 13(9), 877-883.—Investigated the influence of progesterone upon 5-hydroxytryptamine (5-HT) metabolism in the brains of ovariectomized Wistar rats in view of a possible connection with premenstrual tension and postpartum depression. A subcutaneous progesterone dose, resulting in a plasma level which was still in a physiological range, increased 5-HT turnover in septum, hypothalamus, and raphe. A higher unphysiological dose, besides producing a further increase of 5-HT turnover, also resulted in a decrease of 5-hydroxyindoleacetic acid levels which was most pronounced in the septum. Neither of the 2 doses showed a clearcut influence on 5-HT concentrations in any of the investigated brain areas.—*Journal abstract*.

4732. Lehrer, Paul M. & Taylor, H. Augustus. (Coll of Medicine & Dentistry of New Jersey—Rutgers Medical School, Piscataway) **Effects of alcohol on cardiac reactivity in alcoholics and nonalcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 1044-1052.—After drinking an intoxicating amount of alcohol, the cardiac responses of 8 male alcoholics to loud tones and reaction-time trials were significantly different from those of nonalcoholics. Alcohol also affected the direction of the cardiac responses to the tones.

4733. Lowy, K.; Weiss, B. & Aboud, L. G. (U Rochester Medical Ctr) **Influence of an anticholinergic psychotomimetic agent on behaviour in cats controlled**

**by an auditory stimulus.** *Neuropharmacology*, 1974(Aug), Vol 13(8), 707-718.—Investigated the effects of N-methyl 4-piperidylcyclo butylphenyl glycolate (CBG), the quaternary derivative of CBG, and scopolamine on 7 cats trained to press a lever, the location of which corresponded to 1 of 2 sound sources. Ss were trained to lick a protruding sponge in dim light which then caused the main light to turn on and an auditory signal to be emitted from either side of a panel in the chamber. Any lever response terminated the trial. A food reward was given only if S pressed a lever on the same side as the sound signal. Doses of 10-20  $\mu$ /kg CBG reduced the number of responses and tended to lower the relative time spent in the light period. At lower doses CBG produced a marked increase in some Ss in total number of trials. Higher doses of scopolamine also reduced total trials, but less consistently. A number of Ss exhibited a lateral preference for either the right or left lever. CBG, but not scopolamine, markedly shifted this lateral tendency.—*Journal abstract*.

4734. Maickel, R. P. & Maloney, G. J. (Indiana U) **Taste phenomena influences on stimulation of deprivation-induced fluid consumption of rats.** *Neuropharmacology*, 1974(Aug), Vol 13(8), 763-767.—The dipsogenic actions of intraperitoneal barbital and chlordiazepoxide were selectively influenced by the taste of the consummatory fluid presented to deprived male Sprague-Dawley rats. The potency of barbital as a consummatory stimulant was reduced relative to distilled water or tartaric acid by the use of a pleasant tasting fluid, saccharin. The potency of chlordiazepoxide as a dipsogenic agent was reduced by the use of either tartaric acid or saccharin as a consummatory fluid as compared to water. Promazine depressed deprivation-induced fluid consumption with a similar potency regardless of the consummatory fluid used.—*Journal abstract*.

4735. Mendelson, Jack H.; Kuehnle, John; Ellingboe, James & Babor, Thomas F. **Plasma testosterone levels before, during and after chronic marihuana smoking.** *New England Journal of Medicine*, 1974(Nov), Vol 291(20), 1051-1055.—No statistically significant changes in plasma testosterone levels were observed in young adult males during and after a 21-day marihuana smoking period as compared with presmoking baseline levels. Data do not corroborate an association between chronic marihuana use and decreased plasma testosterone.

4736. Middaugh, Lawrence D.; Blackwell, L. Ann; Santos, Carroll A. & Zemp, John W. (Medical U South Carolina) **Effects of d-amphetamine sulfate given to pregnant mice on activity and on catecholamines in the brains of offspring.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 429-438.—Offspring of C57BL/6J mice injected intraperitoneally with dextroamphetamine sulfate during the last third of pregnancy had slightly reduced body weight at birth, altered concentrations of catecholamines (CAs) in their brains during development, and increased activity after they had matured. Norepinephrine concentrations were depressed at birth, returned to control values by Day 3, and were elevated at Days 21 and 30. Dopamine values were elevated at Day 30. At Day 75, Ss prenatally exposed to the drug had CA concentrations similar to controls but had heightened



activity levels compared to controls tested in the open field. Results demonstrate that dextroamphetamine sulfate administered to mice during the last third of pregnancy produce transient alterations in CA concentrations and long-lasting changes in behavior. (27 ref)—*Journal abstract*.

4737. Milner, Joel S. (Western Carolina U) **Effects of d-amphetamine on acquisition of leverpress Sidman avoidance in rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 392-396.—In 2 experiments with a total of 202 male and female Wistar rats, Ss, following intraperitoneal injections of dextroamphetamine, showed no drug-dose effects on response rates during the acquisition of a Sidman avoidance task. Dose-dependent differences in shock-avoidance rates were observed. Low test doses showed no effect on, moderate test doses facilitated, and high test doses inhibited shock-avoidance rates. Interresponse times (IRT) indicated that females, relative to males, emitted a greater number of well-timed responses and were facilitated by a relatively wider range of test doses. IRTs obtained during the acquisition study and motility data obtained from Exp II indicate that some mechanism other than increased motor activity, such as improved timing, was involved in amphetamine's facilitation of shock-avoidance rates. (24 ref)—*Journal abstract*.

4738. Mundo, Antonio S. et al. (Inst di Ricerche Farmacologiche "Mario Negri," Milano, Italy) **Relationships between tricyclic antidepressant concentrations, 1-H-noradrenaline uptake and chronotropic effect in isolated rat atria.** *European Journal of Pharmacology*, 1974(Oct), Vol 28(2), 368-375.—The main effect of imipramine, desipramine, amitriptyline, and chlorimipramine was a slowing of the spontaneous atrial rate which was more evident for the dimethyl than for the monomethyl compounds. All drugs potentiated 1-noradrenaline chronotropic response, but the potentiation was not always correlated with the inhibition of its uptake. Thus, inhibition of uptake is not a valid parameter for prediction of noradrenaline potentiation and vice versa. (19 ref)

4739. National Academy of Sciences, Committee on Problems of Drug Dependence. (Washington, DC) **Testing for dependence liability in animals and man (Revised 1972).** *Bulletin on Narcotics*, 1973(Apr-Jun), Vol 25(2), 25-39.—Describes procedures for submitting new compounds for evaluation in animals and man, and the details of evaluation.

4740. Panksepp, Jaak & Nance, Dwight M. (Bowling Green State U) **Effects of para-chlorophenylalanine on food intake in rats.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 360-364.—Food intakes, water intakes, and body weights of a total of 42 Long-Evans and 18 Sprague-Dawley male rats in 3 experiments were monitored for up to 30 days during daily intragastric administration of 100 mg/kg p-chlorophenylalanine (PCPA). During treatment, food intake was reduced to 50-75% of control levels, water intake was decreased to about 28% of control levels, and body weights stabilized at about 80-90% of control levels. Body weight remained low as long as treatment continued, and Ss defended the low body weights against food deprivation and weight gain induced by insulin injections. It is unlikely that the

decrease in body weight during PCPA treatment was due to malaise, since anorexia could be prevented by depriving Ss of food during the 1st 2 days of drug treatment. (27 ref)—*Journal abstract*.

4741. Person, Robert J. & Gunn, C. G. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Effects of ethanol on recruiting, augmenting and reticular activation response thresholds.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 987-1002.—Determined threshold levels of the thalamic recruiting and augmenting responses and reticular activating system responses in 20 paralyzed cats. Ethanol was infused intravenously in 12 cats to produce cumulative doses of 100, 200, 400, 800, and 1600 mg/kg of body weight. Compared with control levels, thresholds of the cortical desynchrony response to mesencephalic reticular formation stimulation decreased concomitant with an increase in threshold of the recruiting response after 100 mg/kg, but returned to control levels after 400 mg and, after the higher doses, increased in proportion to the blood ethanol concentration. Augmenting response thresholds increased after 100 mg and remained elevated at all higher doses. Cardiovascular pressor response thresholds remained constant after 100 mg, then increased after the higher doses in proportion to the blood alcohol concentration. Skin resistance thresholds were not significantly changed at any dose level. (27 ref)—*Journal abstract*.

4742. Pert, Agu & Avis, H. H. (Experimental Medicine Branch, Biomedical Lab, Edgewood Arsenal, MD) **Dissociation between scopolamine and mecamylamine during fear conditioning in rats.** *Physiological Psychology*, 1974(Jun), Vol 2(2), 111-116.—Tested whether or not state-dependent (dissociated) learning would occur differentially for scopolamine (muscarinic anticholinergic) and mecamylamine (nicotinic anticholinergic) in a conditioned suppression task. In Exp I, 84 food-deprived rats were trained to drink sweetened condensed milk in a test chamber for 8 days. On Day 9, all Ss received a single electric shock in the same chamber 20 min after injections of scopolamine, mecamylamine, or saline. 3 days later, subgroups were tested for conditioned suppression under the same drug condition, the other drug condition, or saline. Conditioned suppression was found in all groups except those trained under scopolamine or mecamylamine and tested under saline or the other drug condition. Exp II controlled for some of the variables which may have produced dissociation in Exp I. Findings are interpreted to imply the existence of 2 separate cholinergic (nicotinic and muscarinic) pathways which mediate fear conditioning. (23 ref)—*Journal abstract*.

4743. Regina, Edmund G.; Smith, Gene M.; Kelper, Charles G. & McKelvey, Robert K. (Massachusetts General Hosp, Boston) **Effects of caffeine on alertness in simulated automobile driving.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 483-489.—30 min after ingesting 200 mg of caffeine or a placebo, each of 24 21-26 yr old males drove an automobile simulator for 90 min. Immediately thereafter, the S ingested a supplemental dose of 200 mg of the medication taken initially and then drove for another 90 min. The simulator provided a comprehensive and coherent set of stimulus inputs which produced a degree of realism not usually found in

laboratory studies. Both the initial and the supplemental doses of caffeine significantly enhanced performance beyond that found with placebo, on each of 4 measures of alertness.—*Journal abstract.*

4744. Rigter, H.; Van Riezen, H. & de Wied, D. (Scientific Development Group, Oss, Netherlands) **The effects of ACTH- and Vasopressin-analogues on CO<sub>2</sub>-induced retrograde amnesia in rats.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 381-388.—In an experiment with 120 male Wistar-derived rats, amnesia for a 1-trial step-through passive avoidance response was induced by application of CO<sub>2</sub> until respiratory arrest occurred. An adrenocorticotrophic hormone (ACTH) analog, ACTH<sub>4-10</sub>, alleviated the amnesia when administered 1 hr prior to the retrieval test but not when given 1 hr prior to the acquisition trial. A behaviorally inert ACTH-analog, ACTH<sub>11-39</sub>, appeared to have no effect on the amnesia. A vasopressin-analog, desglycinamide lysine vasopressin, antagonized the amnesia when administered 1 hr prior to the acquisition trial or 1 hr prior to the test trial. The relevance of these data to present theories on amnesia is discussed. (26 ref)—*Journal abstract.*

4745. Rolls, E. T. et al. (U Oxford, England) **The relative attenuation of self-stimulation, eating and drinking produced by dopamine-receptor blockade.** *Psychopharmacologia*, 1974, Vol 38(3), 219-230.—Spiroperidol, which blocks dopamine (DA) receptors, attenuated self-stimulation of the nucleus accumbens, septal area, hippocampus, anterior hypothalamus, and ventral tegmental area of a total of 7 Sprague-Dawley and 24 Lister hooded male rats. The attenuation was not a simple motor impairment of the speed of barpressing in that the nucleus accumbens and septal self-stimulation rates were lower than those in treated Ss self-stimulating at other sites (Exp I). Feeding was partly attenuated and drinking was much less attenuated by the spiroperidol. Since the Ss barpressed for brain-stimulation reward, DA receptor blockade may attenuate complex motor responses most. Alternatively, the blockade could affect brain-stimulation reward more than the controls of eating, and these latter more than the controls of drinking (Exp II). In Exp III feeding and drinking were equally and severely attenuated when Ss had to barpress to obtain food or water. The attenuation was to a level similar to that found for self-stimulation. Results suggest that DA receptor blockade impairs eating, drinking, and self-stimulation by interfering with complex motor responses. (20 ref)—*Journal abstract.*

4746. Rosenberg, Kenneth M. & Sherman, Gordon F. (State U New York, Oswego) **Testosterone induced pup-killing behavior in the ovariectomized female rat.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 697-699.

4747. Ross, David H.; Medina, Miguel A. & Cardenas, H. Lee. (U Texas, Health Science Ctr, San Antonio) **Morphine and ethanol: Selective depletion of regional brain calcium.** *Science*, 1974(Oct), Vol 186(4158), 63-65.—Reports that administration of morphine or ethanol to Sprague-Dawley rats produced a decrease in regional brain calcium in vivo. Reserpine and the dopamine-acetaldehyde conjugate salsolinol also produced a depletion of regional brain calcium, but only the

salsolinol depletion was antagonized by naloxone. Evidence for 2 calcium-sensitive pools in the central nervous system was also reported. (18 ref)

4748. Salzman, Carl et al. (Massachusetts Mental Health Ctr, Psychopharmacology Research Lab, Boston) **Chlordiazepoxide-induced hostility in a small group setting.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 401-405.—Used a small group model to examine the effects of chlordiazepoxide hydrochloride on affective and behavioral hostility in a social interactive setting. 48 normal male volunteers in 3-person groups completed the Buss-Durkee Hostility Inventory individually and interacted with each other during a 10-min discussion period that was videotaped and scored for behavioral hostility. Results indicate that chlordiazepoxide was associated with an increase in individual affective but not behavioral hostility. However, when a frustration stimulus was presented to the group, interpersonal behavioral hostility was increased in those who received chlordiazepoxide as compared with those taking a placebo. Increases in hostility may be a regular rather than a paradoxical effect of chlordiazepoxide. However, overt hostility may only become apparent in settings of interpersonal frustration. (44 ref)—*Journal abstract.*

4749. Sampson, Larry D.; Francis, James & Schneiderman, Nell. (U Miami) **Selective autonomic blockades: Effects upon classical conditioning of heart rate and lever-lift suppression in rabbits.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 953-962.—Studied heart rate, blood pressure, and lever lifting during differential classical conditioning in 2 experiments with a total of 8 female Belgian hares. The unconditioned stimulus was electrical stimulation of the septal region or the hypothalamus through chronically implanted electrodes; the conditioned stimuli were 2 tones differing in frequency. Beta-adrenergic blockade by propranolol did not affect cardiovascular unconditioned responses (bradycardia and pressor UCRs), conditioned responses (bradycardia CRs), or lever-lift responses. Cholinergic blockade by atropine methylnitrate abolished heart-rate responses but not lever-lift responses. Findings suggest that heart-rate responses were mediated by increases in vagal tone. Alpha-adrenergic blockade by phentolamine abolished bradycardia and pressor UCRs, but not bradycardia CRs. It is also suggested that separate central mechanisms mediated bradycardia UCRs and CRs. Removal of the lever diminished without eliminating bradycardia CRs, indicating partial independence between lever-lift and cardiac CRs.—*Journal abstract.*

4750. Sanger, David J. & Steinberg, Hannah. (U Coll London, England) **Inhibition of scopolamine-induced stimulation of l-maze activity by  $\alpha$ -methyl-p-tyrosine and by lithium.** *European Journal of Pharmacology*, 1974(Oct), Vol 28(2), 344-349.—In 2 experiments a single intraperitoneal dose of scopolamine (1 mg/kg) markedly increased the spontaneous activity of 40 female Lister hooded rats when tested in a Y-shaped runway as compared with 40 saline controls. When Ss were retested in the maze 24 hrs later, this time without any drugs having been administered, those which had previously been tested under the influence of the drug were again more active than the controls. Pretreatment before the



1st trial with either  $\alpha$ -methyl-p-tyrosine or lithium chloride blocked the immediate stimulant action of scopolamine though it did not significantly modify the after-effect. (29 ref)—*Journal abstract*.

4751. Schneider, Allen M.; Weinberg, Joel & Weissberg, Robert. (Swarthmore Coll) **Effects of ACTH on conditioned suppression: A time and strength of conditioning analysis.** *Physiology & Behavior*, 1974(Nov), Vol 13(5), 633-636.—Measured the effects of subcutaneous adrenocorticotrophic hormone (ACTH) injections on acquisition and retention of a conditioned-suppression response as a function of the time of training and the duration of the conditioned stimulus. Training of the Ss (174 experimental and 48 control male Sprague-Dawley rats) consisted of a single trial in which either a 10- or 60-sec tone was followed by footshock. Retention increased following a shift in time of training from AM to PM and in tone duration from 60 to 10 sec. ACTH as corticotrophin gel was injected before training, before testing, or before both training and testing. The facilitory effects of the injections were selective. Retention was improved given that the injections were made before training, as opposed to before testing, and that training was conducted in the AM. In the 60-sec tone condition, the facilitory effects of the injections before training were canceled if the Ss were also injected before testing.—*Journal abstract*.

4752. Schnell, R. C. (Purdue U, School of Pharmacy & Pharmacal Sciences) **Enhancement of the chlorpromazine-induced suppression of the conditioned avoidance response by carbonic anhydrase inhibition.** *Neuropharmacology*, 1974(Sep), Vol 13(9), 847-850.—Suppression of a conditioned avoidance response in male Holtzman rats by 2 mg/kg chlorpromazine hydrochloride (CPZ) given intraperitoneally was enhanced (230%) after treatment with 50 mg/kg acetazolamide. This enhanced pharmacological response in the acetazolamide-treated Ss was accompanied by increased brain levels of  $^3\text{H}$  after administration of CPZ. In parallel experiments, an analog of CPZ, CL-13,850, which possesses no carbonic anhydrase inhibitory activity, had no influence on the pharmacological effect or the brain levels of  $^3\text{H}$  after administration of CPZ. Data suggest the enhanced pharmacological response following acetazolamide treatment is the result of increased brain levels of CPZ brought about by carbonic anhydrase inhibition. (16 ref)—*Journal abstract*.

4753. Schwartz, John L.; Kramer, Milton & Roth, Thomas. (U Cincinnati, Coll of Medicine) **Triazolam: A new benzodiazepine hypnotic and its effect on mood.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 964-970.—Administered triazolam to 12 normal male paid volunteers in clinical doses of .25, .50, and 1.00 mg. Triazolam had no significant effect on Ss' mood or normal mood rhythms. There were no pre- or postsleep effects on mood, and no systematic differences in mood were noted at the various dose levels. More research investigating the effect on mood of the commonly used hypnotics during both acute and chronic usage is clearly warranted.—*Journal abstract*.

4754. Shillito, M. Larry; King, L. Ellis & Cameron, Colin. (Eastman Kodak Co, Rochester, NY) **Effects of alcohol on choice reaction time.** *Quarterly Journal of*

*Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 1023-1034.—Studied the effects of alcohol on choice reaction time, information transmission and task performance in 5 23-28 yr old men who completed a keypressing task after they drank 0, .26, .52, and .78 ml of alcohol/kg of body weight. Mean peak blood alcohol concentrations after the 3 doses were .001, .037 and .055%. None of the doses of alcohol had a significant effect on choice reaction time, information transmission, or number of errors. The lowest rate of error was achieved after the .26 ml/kg dose, suggesting a facilitative effect. Accuracy appeared to be more sensitive than speed to the effects of alcohol. It is concluded that complex motor skills are more likely to be affected by low doses of alcohol than cognitive functions. (35 ref)—*Journal abstract*.

4755. Simpson, Lance L. (Columbia U, Coll of Physicians & Surgeons) **A study of the interaction between amphetamine and food deprivation.** *Psychopharmacologia*, 1974, Vol 38(4), 279-286.—Studied the effect of dextroamphetamine on spontaneous motor behavior in 31 male Wistar satiated and food-deprived rats. Amphetamine (1 mg/kg) evoked a large increase in motor activity in satiated Ss and an even larger increase in deprived Ss. The magnitude of motor stimulation by amphetamine in deprived Ss was roughly proportional to the duration of deprivation. Food deprivation by itself did not increase motor activity. Neither sympathectomy nor adrenalectomy modified the response to amphetamine or to amphetamine plus deprivation. Data suggest that food deprivation potentiates the action of amphetamine by a central rather than a peripheral mechanism.—*Journal abstract*.

4756. Soubrie, P. et al. **Preselection of animals in studies of anti-anxiety drugs.** *Neuropharmacology*, 1974(Aug), Vol 13(8), 719-728.—Experiments with male Wistar rats in the open field led to Ss' classification into 2 emotionality groups. Results show that (a) the distribution of the number of Ss in each group was stable and reproducible over a 3-mo period; (b) Ss of the emotional group were more susceptible to gastric lesions produced by immobilization; (c) Ss which were more susceptible to lesions showed more behavior deterioration upon repeated trials in a heated floor maze; and (d) the favorable action of benzodiazepines—reduction in the number of Ss developing lesions and reduction of the behavioral deterioration in the heated floor maze—was group dependent. Dextroamphetamine imipramine, and chlorpromazine acted independently of emotionality. A relationship between emotionality and differential susceptibility to drugs is discussed. The preselection of animals in studies of antianxiety drugs is considered as a possible way to more precise results and as a possible approach to a better understanding of the mechanism of action of anxiolytics. (37 ref)—*Journal abstract*.

4757. Spohn, Herbert E.; Lacoursiere, Roy B. & Williams, Roger O. (Menninger Foundation, Topeka, KS) **The effect of chlorpromazine on visual information processing in normal subjects.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 198-204.—Tested the hypothesis that chlorpromazine (CPZ) has the effect in visual information processing of protecting the short-term memory (STM) visual trace by serving to filter or habituate stimuli following an initial stimulus. 40 normal



undergraduates served as Ss. The method involved the tachistoscopic presentation of paired, successive  $3 \times 2$  consonant arrays, separated by a 200-msec interval, with instructions to report either the 1st or the 2nd array, in a double-blind repeated measurement design in which Ss served as their own placebo controls and a single dose of 50 mg of CPZ was administered. Results do not support the hypothesis but suggest that when ipsimodal, isomorphic distraction follows an initial relevant stimulus, CPZ reduces the STM span and delays the processing (coding) of visual information.—*Journal abstract.*

4758. Stephens, Joseph H.; Shaffer, John W. & Brown, Clinton C. (Johns Hopkins U, Medical School) **A controlled comparison of the effects of diphenylhydantoin and placebo on mood and psychomotor functioning in normal volunteers.** *Journal of Clinical Pharmacology*, 1974(Oct), Vol 14(10), 543-551.—Studied the effects of diphenylhydantoin (DPH) on motor functioning and mood in 107 21-32 yr old normal volunteers. Evaluation measures included the Lorr Outpatient Mood Scale, Outpatient Symptom Check List, Wessman-Adler Personal Feeling Scales, steadiness, apparent eye level, puzzle box, and time estimation tasks, and the Modified Stroop Color-Word Test. Each S was randomly assigned to one of 2 experimental conditions for 2 wks: 100 mg DPH 3 times daily or 5 mg DPH 3 times daily. Significant differences were found on 10 of the 29 mood measuring variables and on 1 of the 9 variables measuring psychomotor coordination and intellectual functioning. (23 ref)—*P. Federman.*

4759. Stricker, Edward M. & Macarthur, John P. (U Pittsburgh, Psychobiology Program) **Physiological bases for different effects of extravascular colloid treatments on water and NaCl solution drinking by rats.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 389-394.—Notes that extravascular injections of colloidal solutions gradually promote the sequestration of isosmotic protein-free plasma fluid which has been extruded from local capillaries. This procedure avoids many of the drawbacks of hemorrhage and seems ideal for studying appetitive behaviors elicited by hypovolemia. In the present 2 experiments with a total of 99 male Sprague-Dawley rats, Ss given 30% polyethylene glycol (PG) solution subcutaneously increased their intake of water and, after a delay of 6-8 hrs, also began to drink concentrated NaCl solution. Ss given the same colloidal solution intraperitoneally showed thirst but did not develop a sodium appetite. These behaviors can be related to the induced plasma volume deficits, which persist only so long as the colloid remains where it is injected. Thus, progressive decreases in plasma volume occur for 12-18 hrs after subcutaneous injections, and PG does not appear in plasma during this time. In contrast, PG can be found in plasma within 6-12 hrs after intraperitoneal injection, which rapidly vitiates the effects of this treatment and thereby removes the hypovolemic stimulus for NaCl intake. (26 ref)—*Journal abstract.*

4760. Stripling, Jeffrey S. & Alpern, Herbert P. (U Colorado, Inst for Behavioral Genetics) **Nicotine and caffeine: Disruption of the long-term store of memory and proactive facilitation of learning in mice.** *Psychopharmacologia*, 1974, Vol 38(3), 187-200.—Conducted 3

experiments in which a wide range of intraperitoneal dosages of nicotine and caffeine were administered to a total of 301 male F<sub>1</sub> mice (C57BL/6J  $\times$  DBA/2J). Ss were given 2 trials in an appetitive maze 24 hrs apart. 24 hrs after the 2nd trial each S was given the 1st of 5 daily injections of one of the dosages being tested. Beginning 48 hrs after the last injection, Ss received 1 trial/day until a learning criterion was reached. Both nicotine and caffeine produced a dose-dependent disruption of performance in the trials following the injection series. In contrast, nicotine produced facilitation of performance in Ss given a series of injections in the absence of previous training, and caffeine produced a strong trend in this direction. It is concluded that these drugs produced disruption of the long-term store of memory for the initial training and proactive facilitation of maze learning. The existence of separate and opposing effects of these drugs on different aspects of learning and memory is discussed. (57 ref)—*Journal abstract.*

4761. Székely, J. I.; Borsy, J. & Ildikó, Király. (Research Inst for Pharmaceutical Chemistry, Budapest, Hungary) **Potentiation of tetrabenazine-induced behavioural depression by imipramine on a discrete-trial avoidance escape schedule.** *Psychopharmacologia*, 1974, Vol 38(4), 339-343.—Studied the tetrabenazine-imipramine interaction on a discrete-trial avoidance escape schedule in 24 male hooded Long-Evans rats. In a large dose, imipramine (30 mg/kg intraperitoneal injections) failed to antagonize the 10 mg/kg (subcutaneous) tetrabenazine-induced behavioral depression. 3-6 mg/kg imipramine in combination with .5 mg/kg tetrabenazine induced a significant depression, while the same drugs alone (in similar dose) had no significant effect on responding. The depressant action of 1 mg/kg tetrabenazine was potentiated by imipramine pretreatment.—*Journal abstract.*

4762. Tong, J. E.; Knott, V. J.; McGraw, D. J. & Leigh, Gillian. **Alcohol, visual discrimination and heart rate: Effects of dose, activation and tobacco.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 1003-1022.—Measured visual discrimination (2-flash threshold) and heart rate in 21-35 yr old male social drinkers after they had consumed various amounts of 35% alcohol and in combinations of low (relaxed) and high (exercising) arousal conditions. In 10 low-arousal Ss, mean blood alcohol concentrations (BACs) between .05 and .08% were associated with a decrease in tiny eye movements and an increase in facial movements during visual discrimination trials. Data also show that sensory sensitivity correlated positively with low doses of alcohol in low-arousal Ss and negatively in high-arousal Ss, but high doses lowered sensitivity regardless of arousal condition. Data from 8 nonsmokers and 8 smokers (age range 19-26) obtained before and after 2 cigarettes show that heart rate significantly increased after both doses of alcohol and after smoking. In 6 smokers, flash threshold scores were higher (less efficient discrimination) after alcohol when they did not smoke; after smoking and a low dose of alcohol, scores were significantly lower. It is concluded that visual discrimination is enhanced at BACs below .02%; after smoking, however, this improvement is significant only at higher BACs. (92 ref)—*Journal abstract.*



4763. Ungerer, Arielle; Ropartz, Philippe & Karli, Pierre. (U Louis Pasteur, Lab de Psychophysiology, Strasbourg, France) [Modifications of bioelectrical activity of the hippocampus of mice induced by acetoxycycloheximide.] (Fren) *Physiology & Behavior*, 1974(Nov), Vol 13(5), 653-660.—Chronically implanted 12 male Swiss mice with electrodes in dorsal hippocampus and in mesencephalon. Effects of acetoxycycloheximide (AXM) on spontaneous bioelectrical activity of the hippocampus and on hippocampal response to mesencephalic stimulation were analyzed. Subcutaneous AXM injection provoked a decrease in frequency and amplitude of the spontaneous hippocampal activity and a marked decrease in the theta activity in the 6-10 cyc/sec band. AXM induced no change in the mesencephalic stimulation threshold shown to induce hippocampal theta rhythm. However, decrease in frequency and amplitude of the theta rhythm induced by mesencephalic stimulation was recorded. These alterations, which appeared during the 1st hour following AXM injection, were especially obvious from 3-6 hrs after treatment. From 7-24 hrs after injection, the hippocampal bioelectrical activity, either spontaneous or induced, recovered gradually its initial characteristics. (French summary) (26 ref)—*English summary*.

4764. Vale, Jack R.; Ray, Donald & Vale, Carol A. (U California, Berkeley) Neonatal androgen treatment and sexual behavior in males of three inbred strains of mice. *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 483-488.—Male neonates of the A, BALB/c, and C57BL/6 mouse strains were injected subcutaneously with androgen and the effects upon their sex behavior studied. Genotype and treatment combined interactively on a number of variables, particularly in the proportions of Ss responding, indicating that the effects of perinatally administered androgen and genotype cannot be considered separately. (20 ref)—*Journal abstract*.

4765. Valli, P.; Taglietti, V. & Rossi, M. L. (U Pavia, Inst of General Physiology, Italy) Effects of D-tubocurarine on the ampullar receptors of the frog. *Acta Otolaryngologica*, 1974(Jul-Aug), Vol 78(1-2), 51-58.—Curare depressed or abolished both the resting discharge of the ampullar receptors and their responses to mechanical or electrical stimulations administered to the isolated open semicircular canals. This blockade of the mechanical responsiveness in ampullar receptors was fully reversible 15 min after withdrawal of the drug, while resting discharge and electrical responsiveness were much more rapidly restored and even enhanced in excess of normal values after washing. (German summary)

4766. Vasquez, Beatriz J.; Overstreet, David H. & Russell, Roger W. (U California, Irvine) Psychopharmacological evidence for increase in receptor sensitivity following chronic morphine treatment. *Psychopharmacologia*, 1974, Vol 38(4), 287-302.—Conducted 2 experiments to study the behavioral effects of cholinergic and adrenergic agents on fixed ratio responding in 32 male Sprague-Dawley control rats and in rats chronically treated with morphine (5 mg/kg day). Tolerance to morphine on total responses was observed, but not on rate of responding. Following tolerance development, pilocarpine depressed the behavior of the morphine-treated Ss to a significantly greater degree than that of

the controls. Similarly, drugs which directly or indirectly stimulate alpha adrenergic and central dopaminergic receptors (e.g., atropine and nicotine) also affected the behavior of the morphine-treated Ss to a significantly greater degree. Muscarinic cholinergic, alpha adrenergic, and central dopaminergic receptors may become supersensitive to their respective neurotransmitters during chronic treatment with morphine. Such a change in receptor sensitivity could constitute a mechanism underlying the development of tolerance to morphine. (4 p ref)—*Journal abstract*.

4767. Wauquier, A. & Niemegeers, C. J. (Janssen Pharmaceutica, Research Lab, Beerse, Belgium) Intracranial self-stimulation in rats as a function of various stimulus parameters: V. Influence of cocaine on medial forebrain bundle stimulation with monopolar electrodes. *Psychopharmacologia*, 1974, Vol 38(3), 201-210.—Studied the effects of different subcutaneous doses of cocaine (.63, 1.25, 2.50, 5.00 and 10.00 mg/kg) on self-stimulation in 6 male Wistar rats. Monopolar nichrome electrodes were implanted in the medial forebrain bundle at the level of the lateral hypothalamus. 6 different stimulus parameter combinations (SPCs) inducing different predictable response rates were used. Cocaine showed a dose-related response stimulation, the highest at 10 mg/kg; the response depression was very low at all doses. Apomorphine, amphetamines, and cocaine had some properties in common, but there were also important differences. With the 3 compounds response stimulation was related to the total control response rates at the different SPCs and was the highest at the 2 SPCs inducing the lowest control response rate. The differences in response stimulation associated with low intensity and low frequency SPCs could be related to a different mechanism of action. The response depression, the highest with apomorphine and the lowest with cocaine, seems to be related to the stereotype-inducing property of the compounds. (18 ref)—*Journal abstract*.

4768. Weltz, Mary K. (U Hawaii) Effects of ethanol on shock-elicited fighting behavior in rats. *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 953-958.—Studied shock-elicited fighting in 16 male hooded rats after they received intraperitoneal injections of saline or .25, .50, or .75 cc of a 30% ethanol solution per 100 g of body weight. Ss received all treatments and were tested in pairs. The base rate of fighting behavior was established for each pair between sessions. Compared with saline, the lowest dose of ethanol increased the frequency of fighting ( $p < .008$ ), the medium dose tended to increase it, while the high dose decreased it.—*Journal abstract*.

4769. Yanagita, T. (Central Inst for Experimental Animals, Kawasaki, Japan) An experimental framework for evaluation of dependence liability of various types of drugs in monkeys. *Bulletin on Narcotics*, 1973(Oct-Dec), Vol 25(4), 57-64.—Presents profiles of several drugs of abuse in terms of their ability to produce physical dependence, self-administration, and behavioral toxicity. Procedures are described for testing drugs in monkeys for (a) acute central nervous system effect, (b) substitution in morphine- or barbiturate-dependent animals, (c) ability to produce tolerance and physical dependence, (d) self-administration with experimental compound

after establishing self-administration for a standard reference drug, (e) intravenous or intragastric continuous self-administration, and (f) increasing ratio to obtain the reinforcement of the experimental drug.—A. S. Kulkarni.

4770. Ziskind, David; Amit, Zalman & Baum, Morrie. (Sir George Williams U, Ctr for Research on Drug Dependence, Montreal, Quebec, Canada) **Resistance to extinction of an avoidance response in rats following the administration of chlordiazepoxide (Librium) or diazepam (Valium).** *Psychopharmacologia*, 1974, Vol 38(3), 231-238.—In a 1-way avoidance task with a total of 140 male Wistar rats, intraperitoneal injections of Librium following avoidance acquisition resulted in prolonged resistance to extinction of the avoidance response. This effect occurred regardless of whether the Ss had had prior experience with Librium or whether they were naive with respect to the drug. The same results were found with the same task when low doses of Valium were used. However, at a higher dosage an "extreme reaction" of either no responding or a high number of responses to extinction occurred in the naive Ss. 16 saline controls served in both Exps I and II. The Librium and Valium effects were compared to similar effects obtained using ethanol and hashish resin. Results indicate that the novelty hypothesis cannot be supported, because experience with the drugs prior to avoidance training did not attenuate the drug effect on avoidance. (19 ref)—*Journal abstract*.

## ANIMAL PSYCHOLOGY

4771. Agranoff, B. W. & Davis, R. E. (U Michigan, Mental Health Research Inst, Neuroscience Lab) **More on seasonal variations in goldfish learning.** *Science*, 1974(Oct), Vol 186(4158), 65.—Refutes E. J. Fjerdingstad's 1973 suggestion that the authors' previous findings of seasonal variations in goldfish learning were due only to stress of shipping and starvation in the laboratory. Further evidence for seasonal variations is presented in terms of age, time of breeding, methods of handling, and physiological status of the goldfish.

4772. Baiz, Yasmira & Galvis, Carlos M. (U Javeriana, Bogotá, Colombia) **[A new type of maze.]** (Span) *Revista Latinoamericana de Psicología*, 1974, Vol 6(2), 235-238.—Describes the Galvis-Baiz Multiple Maze, a simple and flexible instrument for the study of psychological processes in small animals. It consists of a large box with 40 wooden cubes. The alleys of the maze are formed with the cubes without any additional tools.

4773. Davis, David E. (Ed.). (North Carolina State U, Raleigh) **Behavior as an ecological factor.** Stroudsburg, PA: Dowden, Hutchinson & Ross, 1974. xv, 390 p. \$24.—Presents a collection of 27 papers which trace the development of the study of animal behavior as it relates to the environment. Topics include behavioral adjustments to habitat, reproductive behavior, social behavior, behavior of populations, and applied behavior.

4774. Ehrlich, Annette. (California State U, Los Angeles) **Infant development in two prosimian species: Greater galago and slow loris.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 439-454.—Recorded the initial appearance and/or the eventual disappearance of vari-

ous simple motor behaviors in 9 greater galago and 5 slow loris infants. The time spent by 4 mother-infant pairs in contact, near, and away from each other was measured during the first 10 wks of life. Results show that (a) contrary to the views advanced by some authors, the speed with which simple motor behaviors attained the adult form was not related in any consistent way to phyletic status, age at which sexual maturity was reached, or the mother's ability to provide manual support for her infant; (b) the pattern of mother-infant interaction was more variable in prosimian than in anthropoid primates; and (c) the disappearance of involuntary foot-grasping coincided with the initiation of infant independence from the mother. (17 ref)—*Journal abstract*.

4775. Gallup, Gordon G. (Tulane U) **Animal hypnosis: Factual status of a fictional concept.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 836-853.—Notes that animal hypnosis, or tonic immobility, is an easily induced and readily quantifiable phenomenon found in many different species. Recent findings on the behavioral, ecological, chemical, neurological, genetic, and ontogenetic aspects of animal hypnosis are reviewed in light of current and historical interpretations. The response seems to be quite sensitive to manipulations designed to affect fear. In terms of adaptive significance, the reaction can be modified through selective breeding, and both naturalistic as well as laboratory investigations bolster the thesis that tonic immobility may participate in the ecology of predator-prey relationships. (93 ref)—*Journal abstract*.

4776. Kozlovskaya, I. B. et al. (Inst of Problems of Information Transmission, Moscow, USSR) **Preprogrammed and feedback-guided movements of monkeys.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 243-248.—Presents evidence for preprogramming of a certain type of arm movement made by 4 chronic Cebus monkeys in execution of a self-paced step-tracking task. Accuracy of guiding a handle into mechanically undetectable target areas depended on adequate auditory or visual target cues or on consistent practice without cues. "Continuous" movements made in one step retained their original learning amplitudes, revealing their preprogrammed mode of execution. In contrast, "discontinuous" movements, made in successive small steps, over- or undershot for many trials, until residual cues were used by the Ss. The 2 Ss that were well trained to the use of continuous movements retained their use during cue deprivation, while the others substituted discontinuous movements.—*Journal abstract*.

4777. Leibrecht, Bruce C. (US Army Medical Research Lab, Experimental Psychology Div, Ft Knox, KY) **Small animal restraint and movement detection apparatus.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 455-459.—Describes a restraint and movement detection device for use in behavioral studies with small animals. The apparatus consists essentially of a hinged 2-piece circular neck collar attached to a platform stabilimeter. The device is simple, inexpensive, and easy to use. (31 ref)

4778. Parker, Christopher E. (San Diego State U) **Behavioral diversity in ten species of nonhuman primates.** *Journal of Comparative & Physiological Psy-*



chology, 1974(Nov), Vol 87(5), 930-937.—The manipulative propensity and diversity of 4 members each of 10 species of primates, from lemurs to great apes to a simple inanimate object was recorded by means of a multidimensional behavioral taxonomy. The great apes as a group demonstrated a higher degree of behavioral diversity as indexed by (a) the number of combinations of body part and action used, (b) an index of diversity based on the communications technology concept of uncertainty, and (c) the proportion of the total behavior accounted for by the 30 most frequent response categories. (20 ref)—*Journal abstract*.

4779. Sachs, Benjamin D. & Rosenblatt, Jay S. (U Connecticut) **Prepartum suckling reduces survival of newborn in the rat.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 399-406.—Induced 46 pregnant female Sprague-Dawley albino rats to show maternal behavior by continuous exposure to 5-10 day old pups. Prepartum suckling continuing into the immediate postpartum period (when the new litter was present) resulted in a high rate of mortality among the newborn. Preventing suckling by the older pups by sealing their mouths with collodion or removing them within 17 hrs before parturition restored the normal low rate of pup mortality. Examination showed that pre- and early postpartum suckling by the older pups had damaged the mother's nipples preventing the delivery of milk to the newborn. Presumably, the mother's nipples are hormonally conditioned to respond to the sucking of newborn at parturition and become gradually adapted to the increased suckling strength of older pups as nursing proceeds.—*Journal abstract*.

4780. Welker, Christian. (Justus-Liebig-U, Fachbereichs Biologie und Zentrum für Neurologie, Giessen, W Germany) [Ethological importance of urine-washing of *Galago crassicaudatus*.] (Germ) *Folia Primatologica*, 1973, Vol 20(5-6), 429-452.—Studied behavioral sequences in which 2 male thick-tailed galagos urinated on hands or feet. Frequency depended on temperature, humidity, and substrate conditions. Urination provided additional moisture to the palmar or solar surfaces, but no support was found for the hypothesis that the behavior functions as an olfactory marker. Activity profiles are also reported. (32 ref)—*English abstract*.

4781. White, Fred N. & Kinney, James L. (U California, Los Angeles) **Avian incubation.** *Science*, 1974(Oct), Vol 186(4159), 107-115.—Discusses evidence of the relationship between attentiveness and environmental temperature in a single-sex intermittent incubator, the village weaverbird (*Ploceus cucullatus*). The relationship between nest insulation and attentiveness, mean egg temperature and embryonic heat production, and adjustments in attentiveness and environmental temperature are also examined. It is concluded that interactions among behavior, environment, nest, and eggs result in regulation of egg temperature. (30 ref)

### Learning & Motivation

4782. Billbrey, John & Winokur, Stephen. (Texas Christian U) **Behavioral contrast in a second-order multiple schedule of reinforcement.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 206-208.—3 auto-sexing King pigeons were maintained on a 2-

component multiple schedule of reinforcement, each component of which was a 2-component multiple schedule. Behavioral contrast was produced when (a) 1 of 2 variable interval (VI) 5-min components, (b) 1 of 2 VI 1-min components, or (c) 1 VI 5-min and 1 VI 1-min component were changed to extinction. The magnitude of the behavioral contrast was the same in all 3 cases. Some generalization of extinction and contrast was observed. Data are interpreted as favoring an account of behavioral contrast which is based on emotional processes.—*Journal abstract*.

4783. Bulut, Fatma G. & Altman, Joseph. (Purdue U, Lab of Developmental Neurobiology) **Spatial and tactile discrimination learning in infant rats motivated by homing.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 465-473.—Tested 96 6-, 10-, and 15-day-old Purdue-Wistar rats in each of 2 experiments on acquisition and reversal of position and tactile discrimination tasks in a 2-choice situation using access to the home cage as reinforcement. In the early trials the 6-day group often failed to respond due to locomotor immaturity. Despite the missed opportunities, they mastered the position habit in about the same number of choice trials as the 10-day group. However, the 15-day group was superior to the 2 younger groups. In tactile discrimination these subgroups differed significantly in learning to select the rough or smooth surfaces both in acquisition and reversal. On both the spatial and the tactile discrimination tasks the Ss older than 2 wks showed improvement in learning ability. (30 ref)—*Journal abstract*.

4784. Carlson, John G. (U Hawaii) **Preconditioning the effects of shock-correlated reinforcement.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 409-413.—Taught 24 albino rats a discrimination problem with respect to 2 auditory stimuli (S<sub>1</sub> and S<sub>2</sub>). Pressing 1 lever in the presence of S<sub>1</sub> was followed by food and a mild electric shock, and pressing a 2nd lever in the presence of S<sub>2</sub> was reinforced with food alone. A group for which the stimuli had been paired with the reinforcers in an earlier phase in the same relationship (i.e., S<sub>1</sub> = food plus shock, S<sub>2</sub> = food alone) acquired the discrimination most rapidly. A group for which the stimuli and reinforcers had been prepared in the opposite of this order (i.e., S<sub>1</sub> = food plus shock, S<sub>2</sub> = food alone) learned least rapidly. Results are interpreted in light of an associative mediational theory and a current "distinctive cue" hypothesis of shock-correlated reinforcement effects.—*Journal abstract*.

4785. Dua, J. K. & Dobson, M. J. (U New England, Armidale, NSW, Australia) **Role of olfactory cues in acquisition and extinction of avoidance.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 461-465.—Used 124 male albino rats as Ss in 2 experiments. In a hurdle-jumping situation a model animal was shocked behind either an opaque door or a transparent door in the safe box, thus providing olfactory or olfactory-visual cues, respectively. One control group used a nonshocked model animal (olfactory control) in the safe box, and another control group had no animal in the safe box. The study of avoidance in test Ss showed that olfactory and olfactory-visual groups made fewer avoidance responses than the control groups. In Exp II, olfactory, olfactory

control, and no-animal control Ss were given extinction after acquisition to a criterion. The avoidance in the olfactory group was less resistant to extinction than that in the control groups. Results are discussed in terms of N. E. Miller's 1951 fear reduction theory. (20 ref)  
—*Journal abstract.*

4786. Goldstein, Melvin L. (Indiana U, Kokomo) **The persistence of UCS intensity effects in acquired drive conditioning.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 166-168.—Measured the persistence of conditioned fear for varying intervals of time after conditioning 16 male Holtzman albino rats in an acquired drive experiment. Unconditioned stimulus (UCS) intensity and number of conditioned-stimulus-UCS pairings were varied at 2 levels during conditioning, and the effects on a hurdle-jump test response were measured. It was found that the effects of a high UCS intensity persisted for 7 days after conditioning, but that the effects of a medium UCS intensity dissipated 48 hrs after conditioning. Results are interpreted in terms of the relative contribution of UCS intensity to learning and to drive in the Spence-Hull system.—*Journal abstract.*

4787. Gustavson, Carl R. & Garcia, John. (Eastern Washington State Coll) **Aversive conditioning: Pulling a gag on the wily coyote.** *Psychology Today*, 1974(Aug), Vol 8(3), 68-72.—Shooting coyotes and other species who eat sheep is in the long run counterproductive because natural predators keep down the populations of species (e.g., rabbits) who compete with the sheep for grass. Conditioning coyotes to avoid sheep may be possible using lamb meat tainted with lithium chloride. Such meals make coyotes sick and seem to cause them to avoid sheep but do not affect their ability to feed on other species.—*E. J. Posavac.*

4788. Hall, Geoffrey & Honig, W. K. (U Sussex, Lab of Experimental Psychology, Brighton, England) **Stimulus control after extradimensional training in pigeons: A comparison of response contingent and noncontingent training procedures.** *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 945-952.—In an experiment with a total of 32 White Carneaux pigeons, 2 groups of Ss for which reinforcement was procured by keypecking were given true discrimination (TD) or pseudodiscrimination (PD) training with different colors of the house light before they were taught to peck at a display of 3 vertical lines and tested on the line orientation continuum. 2 other groups were trained in the same way except that no response was required during discrimination training. Of the latter groups, the TD-trained Ss acquired the keypecking response (with autoshaping) more quickly than the PD-trained Ss. Their generalization gradients did not differ. Of the former groups, the TD-trained Ss produced a steeper generalization gradient than the PD-trained Ss. These results suggest that (a) general transfer effects are produced by TD and PD training and (b) differential stimulus control resulting from these procedures is mediated by the operation of response-produced cues.—*Journal abstract.*

4789. Hatton, Glenn I. & Veith, Allen. (Michigan State U) **Stress-related and diurnal alcohol drinking in rats.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 195-196.—Recorded ethanol intakes 24 hrs/day for 3 adult male Holtzman albino rats which experienced

shock avoidance sessions during the light portion of a 14-hrs-light to 10-hrs-darkness cycle. Results show that (a) Ss drank immediately after coming back to the home cage, but not before or during the sessions; (b) dark onset was followed by a sharp increase in intake, declining towards light onset for alcohol but not for water. The amounts and times of ethanol intake suggest that corticosterone may mediate stress-related ethanol preference in rats.—*Journal abstract.*

4790. Hogan, J. A. (U Toronto, Ontario, Canada) **Responses in Pavlovian conditioning studies.** *Science*, 1974(Oct), Vol 186(4159), 156-157.—Presents data from observations of a broody hen with young chicks which challenge E. A. Wasserman's (see PA, Vol 51:4761) conclusion, based on findings with similar chicks, that approach and contact of conditioned stimuli does not depend on similar conditioned or unconditioned stimulus-controlled responses. The present observations indicate that the behavior of Wasserman's chicks toward a lighted key was a part of normal heat-seeking behavior redirected toward a new stimulus, and not a new determinant of the form and direction of the conditioned responses in conditioning studies.

4791. Jobe, Jared B. & Mellgren, Roger L. (U Oklahoma) **Successive nonreinforcements (N-length) and resistance to extinction at spaced trials.** *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 652-657.—Investigated the effects of number of nonreinforced trials prior to reinforcement (N-length) at spaced trials. In Exp I with 32 male Sprague-Dawley albino rats, 120 acquisition trials were used, and in Exp II with an additional 32 Ss, 24 acquisition trials were used, both with an intertrial interval of 30 min. One half of each group ran in a gray runway and goal box and one half in the gray runway with a striped goal box. In the gray goal-box condition after 120 acquisition trials, Ss receiving N-lengths of 1, 2, and 3 were more resistant to extinction than Ss receiving only N-lengths of 3, but after 24 acquisition trials Group N<sub>1</sub>-length Ss were more resistant. In the striped goal-box condition there were no differences in resistance to extinction in either case. (15 ref)—*Journal abstract.*

4792. Kaufman, Michael C.; Aderman, Morris & Wolach, Allen H. (Southwest Coll, Chicago, IL) **Punishment as a variable in sequential learning.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 121-130.—48 male Sprague-Dawley rats were given runway acquisition training for either 8 or 20 days with either 1 of 2 sequences containing N (nonreinforced), R (reinforced), and P (punished) trials. One sequence had a single NP-length (always the same number of N trials followed by the same number of P trials) of 6. The other sequence had multiple NP-lengths of 2, 4, and 6. Differences in running speeds during extinction between groups trained with either the single or the multiple NP-length sequence were not significant for either level of acquisition training. During acquisition, differences in running speeds as a function of stimulus condition (N, P, or R) were observed in both the single and multiple NP-length groups. Results are discussed in terms of sequential reinforcement theory.—*Journal abstract.*

4793. Labarba, Richard C.; Fernandez, Betty; White, Jerry L. & Stewart, Allan. (U South Florida) **The effects**



of neonatal tactile stimulation on adult emotional reactivity in BALB/c mice. *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 393-398.—Attempted (a) to isolate tactile stimulation as a major independent variable treatment and (b) to investigate the effects of 2 levels of neonatal tactile stimulation on the ontogenesis of emotional reactivity in 18 litters of 5 BALB/c mice. Findings strongly indicate differential reactivity as a function of intensity of tactile stimulation, with moderate levels of intensity producing the lowest levels of emotionality and the highest levels producing the highest emotionality.—*Journal abstract*.

4794. Mason, Mildred & Wilson, Martha. (U Connecticut) Temporal differentiation and recognition memory for visual stimuli in rhesus monkeys. *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 383-390.—Reports 3 experiments using a matching-to-sample procedure. Ss were 3 rhesus monkeys in Exp I, plus 3 others in Exps II and III. Exps I and II studied identification of visual stimuli in a 2-alternative task as a function of the frequency of presentation of each specific stimulus within a fixed unit of time. Identification performance was found to be an inverse function of frequency of presentation. Exp III manipulated frequency of presentation by employing 2 information loads (4 and 6 alternatives) in an attempt to assess the relative contributions of facilitation from improved temporal differentiation and interference from an increased number of stimuli. Results are interpreted as showing that recognition is mediated by retrieval of temporal information encoded with the stimulus.—*Journal abstract*.

4795. McHale, Maureen A. & Wolach, Allen H. (Northwestern State U Louisiana) Successive acquisitions and extinctions: N-length and transition time. *Japanese Psychological Research*, 1974(May), Vol 16(1), 29-39.—Ran a total of 128 naive male Sprague-Dawley rats in a shuttle runway using a successive acquisition and extinction paradigm with short delays between trials. In Exp I, 4 groups of Ss experienced 100, 87.5, 62.5, or 37.5% reinforcement. Daily acquisition sessions were followed by extinction sessions. Ss in Exp II experienced nonreinforcement-lengths (N-lengths) of 0 (100% reinforcement), 1, 2, or 1, 2, and 3 during successive acquisitions. Ss with N-lengths of 0 and discriminative nonreinforcement-reinforcement (N-R) vs N-N transition times did not produce increasing resistance to extinction across extinctions in either experiment. Partial reinforcement factors other than N-length during acquisition determined successive extinction performance.—*Journal abstract*.

4796. McHewitt, Earl R. (Bard Coll) Reward shift effects in differential conditioning. *Journal of Experimental Psychology*, 1974(Oct), Vol 103(4), 646-651.—A total of 120 naive female Holtzman albino rats received differential large (L) and small (S) or nondifferential L or S reward training in a nonchoice brightness discrimination apparatus. Following 72 trials, reward conditions were changed according to a factorial manipulation of preshift reward conditions (LL, LS, and SS), postshift reward in the bright alley (L and S), and postshift reward in the dark alley. Results indicate typical simultaneous contrast effects in preshift, an effect of the preshift

contrast manipulation on postshift speeds—decreasing postshift speeds, successive negative contrast effects for both the LL and LS preshift conditions, and functionally similar effects of a reward increase following both differential and nondifferential conditioning. This pattern of findings, indicating independence between simultaneous and successive contrast effects, is discussed in terms of implications for present models of differential conditioning.—*Journal abstract*.

4797. Misanin, James R.; Chubb, Lyle D.; Quinn, Sharon A. & Schweikert, G. Edward. (Susquehanna U) An apparatus and procedure for effective instrumental training of neonatal and infant rats. *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 171-173.—Describes an apparatus and procedure for the escape training of neonatal rats. In this apparatus, 20 5- and 7-day-old Wistar albino rats improved their performance in terms of a speed increase over a 25-trial training session. A procedure for active avoidance training in the same apparatus is also described; its effectiveness was demonstrated in the behavior of 10 trained 10-day-old Ss relative to that of yoked controls. The appropriateness of the described apparatus for the instrumental training of neonatal and infant rats is discussed in relation to that of other apparatuses that have been used for this purpose. (15 ref)—*Journal abstract*.

4798. Mitchell, Denis; Williams, Kipling D. & Sutter, Juli. (U Washington) Container neophobia as a predictor of preference for earned food by rats. *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 182-184.—In a counterbalanced design, 16 male Long-Evans rats were alternately tested for container neophobia and preference for earned food. Testing for earned food preference was conducted after 3 exposures to the free food source followed by 7 exposures to the earned food source in an operant conditioning chamber. Testing for container neophobia was conducted in home cages after 21 sessions of habituation to a familiar container. There was a significant positive correlation between preference for earned food and container neophobia.—*Journal abstract*.

4799. Poulos, C. X. & Gromezano, I. (U Toronto, Ontario, Canada) Effects of partial and continuous reinforcement on acquisition and extinction in classical appetitive conditioning. *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 197-198.—Conducted a study with 24 albino rabbits to determine the effects of a continuous and random 50% schedule of reinforcement on classical appetitive conditioning and extinction of the Ss' jaw movement responses. It was found that partial reinforcement led to a slower rate of acquisition, lower asymptotic level, and slower rate of extinction. Findings are discussed with regard to incentive theory and stimulus aftereffects accounts of partial reinforcement effects in instrumental reward conditioning.—*Journal abstract*.

4800. Schrier, Allan M. (Brown U, Walter S. Hunter Lab of Psychology) Transfer between the repeated reversal and learning set tasks: A reexamination. *Journal of Comparative & Physiological Psychology*, 1974(Nov), Vol 87(5), 1004-1010.—Trained 16 stump-tailed and 4 rhesus monkeys to a high level of performance on a repeated reversal (RR) task, either

with or without overtraining on each reversal; Ss were then shifted to a learning set (LS) task. There was a substantial amount of positive transfer between the 2 tasks, but initial LS performance was well below the level that would be expected if RR training were equivalent to LS training. Results for control groups indicate that there was little, if any, nonspecific transfer between the 2 tasks. Overtraining facilitated performance of the stump-tailed monkeys on the RR task. (17 ref)—*Journal abstract*.

4801. Shimp, Charles P. & Menlove, Ronald L. (U Utah) **Contrast as a function of component duration.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 193-194.—Studied behavioral contrast in 3 White Carneaux pigeons as a function of the duration of 2 components of a multiple schedule: a constant component (a variable-interval 1-min schedule) alternated either every 5 sec or every 180 sec with a variable component (a variable-interval 1-min or an extinction schedule). The rate at which Ss pecked for food during the constant component revealed a strong reinforcement interaction when component duration was 5 sec, but not when component duration was 180 sec. Results add to previous findings that component duration in concurrent and concurrent-like schedules of reinforcement affects both preference for a component and reinforcement interactions between components.—*Journal abstract*.

4802. Singh, Sheo D. & Lewis, Jonathan K. (Meerut U, Inst of Advanced Studies, Primate Research Lab, India) **An evaluation of transfer suppression phenomenon at different stages of learning-set formation.** *Primates*, 1974(Sep), Vol 15(2-3), 205-208.—3 groups of 3 rhesus monkeys each trained to varying levels of object discrimination learning-set formation were tested for reversal-learning proficiency. Training consisted in presenting discrimination problems by the usual learning-set procedure; reversal-learning proficiency was tested by presenting the reversal problems along with control problems according to the usual learning-set procedure and also according to the serial-learning procedure. No substantial change in negative interproblem transfer effects was observed as a result of learning-set proficiency, as reversed-problem performance remained significantly poorer than control-problem performance at all the levels. Learning of a reversed problem was not in any way related to an S's correct or incorrect response on its 1st acquisition trial.—*Journal abstract*.

4803. Tombaugh, Tom. (Carleton U, Ottawa, Ontario, Canada) **The interactive effects of type of deprivation and sucrose concentration on the acquisition and extinction performance in the rat.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 351-358.—In a discrete-operant barpress situation with 128 female albino Sprague-Dawley rats, 4 types of deprivation (food, water, water plus food, and no deprivation) were combined factorially with 4 levels of reward (0, 4, 16, and 64% sucrose concentration). In acquisition, water (0% sucrose) served as an effective reinforcer only when Ss were deprived of water alone. Higher sucrose concentrations tended to produce correspondingly higher levels of performance when food, water plus food, and no deprivation were used. No such differences were obtained with water deprivation. Resistance to extinction

was an increasing function of sucrose concentration when Ss were deprived of food and water plus food. No differences were observed under the other 2 deprivation conditions. (French summary) (21 ref)—*Journal abstract*.

4804. Wachs, Theodore D. (Purdue U) **Visual exploratory behavior as a function of early handling, sex, and level of auditory prestimulation.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 385-392.—Attempted to determine whether or not early handling could "buffer" animals against intense stimulation effects. At birth, Maudsley nonreactive rat strain pups were assigned to either a handling or a nonhandling condition. As adults, they received either intense, moderate, or no stimulation prior to being allowed 3 min of visual exploration. It was predicted that (a) handled Ss would show significantly more exploration than nonhandled Ss; (b) intensely stimulated Ss would show significantly less exploration than Ss receiving lower amounts of stimulation; and (c) handled Ss, under intense stimulation, would show significantly more exploration than nonhandled Ss under intense stimulation. Results support (b) and (c). The 1st prediction was supported but was complicated by a Sex  $\times$  Handling interaction. (29 ref)—*Journal abstract*.

4805. Wilson, Linda M.; Phinney, Richard L. & Brennan, James F. (Kent State U) **Age-related differences in avoidance behavior in rats following CS preexposure.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 421-427.—40 male Holtzman albino weanling and adult rats were exposed to either 0 or 10 conditioned stimulus (CS) presentations prior to 1-way active-avoidance training. Although CS exposure retarded avoidance acquisition in the adults, it produced no effect in the pups during avoidance learning. Neither adult nor young Ss demonstrated preexposure effects in extinction. A general extinction analysis showed that pups had less resistance to extinction than adults, despite a comparable avoidance learning criterion between age groups. Lack of preexposure influences on performance by the pups is compared to previous findings of response inhibitory deficits in immature rats. Results are considered in light of selective attention interpretations of latent inhibition. (22 ref)—*Journal abstract*.

### Social & Sexual Behavior

4806. Adkins, Elizabeth K. (Bucknell U) **Electrical recording of copulation in quail.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 475-477.—An automatic method previously used with rats and rabbits was used to record genital contacts between pairs of copulating Japanese quail. Copulation typically consisted of a single brief (1 sec or less) contact. Ejaculatory and nonejaculatory contacts did not differ. Contacts between pairs of males were briefer than contacts with female partners, but contacts with estrogen-treated male partners were similar to contacts with female partners. (18 ref)—*Journal abstract*.

4807. Barash, David P. (U Washington) **Mother-infant relations in captive woodchucks (*Marmota monax*).** *Animal Behaviour*, 1974(May), Vol 22(2), 446-448.—Studied mother-infant relations in 3 litters of woodchucks from birth until about 1 wk after dispersal normally occurs in nature. Weaning correlated with



dispersal age and with an increase in aggressive mother-infant relations and a decrease in solicitous behavior.

4808. **Burton, Frances D. & Sawchuk, Lawrence A.** (U Toronto, Scarborough Coll, Ontario, Canada) **Demography of *Macaca sylvanus* of Gibraltar.** *Primates*, 1974(Sep), Vol 15(2-3), 271-278.—Analyzes the demographic structure of Gibraltar macaques over a 21-yr period in light of human interference on this population. Social behavior is examined in terms of its influence on the parameters investigated, and speculations are made concerning the nature of homeostatic processes operating in a nonwild group. (20 ref)

4809. **Carr, W. J.** (Beaver Coll) **Pheromonal sex attractants in the Norway rat.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Summarizes research on odors as sex attractants in Norway rats (*Rattus norvegicus*). The conditions under which male and female rats respond are explored. (4 p ref)

4810. **Chevalier-Skolnikoff, Suzanne.** (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **The ontogeny of communication in the stump-tail macaque (*Macaca arctoides*).** Basel, Switzerland: S. Karger, 1974. ix, 174 p.

4811. **Coelho, Anthony M.** (Texas Tech U) **Sociobioenergetics and sexual dimorphism in primates.** *Primates*, 1974(Sep), Vol 15(2-3), 263-269.—Suggests that sociobioenergetics is a practical method of estimating energy budgets of primates in a social context. Data on a captive colony of Sykes' monkeys and baboons are incorporated as illustrations of the possible effects of group composition, body size, reproductive status, and activity patterns on energy requirements. (19 ref)

4812. **Deets, Allyn C. & Harlow, Harry F.** (U Pittsburgh) **Adoption of single and multiple infants by rhesus monkey mothers.** *Primates*, 1974(Sep), Vol 15(2-3), 193-203.—8 multiparous rhesus mothers were separated from their biological offspring within hours following parturition, and 2½ days later, on the average, they were offered neonates for adoption. These 12 male foster infants had been separated from their biological mothers shortly after birth and averaged 2½ days old when subjected to adoption. Mothers that were offered a single neonate immediately and completely adopted the foster infant, but mothers that were offered 2 infants at the same time were ambivalent. Many infants were rejected initially, although with 1 partial exception, the mothers eventually accepted and cared for 2 infants. It is concluded that the macaque maternal affectional system may be biased toward accepting and nurturing 1 infant at a time. (15 ref)—*Journal abstract*.

4813. **Deets, Allyn C.** (U Pittsburgh, Lab of Clinical Science) **Age-mate or twin sibling: Effects on monkey age-mate interactions during infancy.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 913-928.—12 rhesus monkey infants were reared with a mother and nonsibling peers; 8 had an age-mate or twin sibling, while 4 control infants did not. The twin sibling relationship was produced experimentally by pairing infants at birth and fostering them 2 to a mother; the control infants were also paired but fostered 1 to a mother. Positive affiliation with the paired rearing partner began earlier in the twin group and continued at higher levels throughout a 7-mo

period of observation. The twins also engaged in more positive affiliation with age-mates other than the rearing partner, while the control infants more frequently engaged in solitary activities and displayed more aggressive and submissive behavior. It is concluded that the age-mate sibling had a beneficial effect upon early social development. (31 ref)—*Journal abstract*.

4814. **Deutsch, Joan & Larsson, K.** (Inst of Animal Behavior, Newark, NJ) **Model-oriented sexual behavior in surrogate-reared rhesus monkeys.** *Brain, Behavior & Evolution*, 1974, Vol 19(3), 157-164.—2 male and 2 female surrogate- and 10 mother-reared rhesus monkeys were exposed to a stationary cloth-covered model. All of the surrogate-reared Ss displayed social and sexual patterns toward the object, but the mother-reared Ss did not. While the surrogate-reared males performed repeated mounts on the object, one of them was capable of consistently performing complete sequences of properly oriented mounts interspersed with grooming and terminating in ejaculation. When tested with female monkeys, neither of the surrogate-reared males performed repeated mounts. The establishment and maintenance of contact requisite for sexual interaction with the females appeared to be prevented by the surrogate-reared males' tendencies to either passivity and withdrawal or erratic aggressiveness. Since the presence of a reciprocally active female monkey disrupted the expression of sexual patterns elicited by the unresponsive model, it is suggested that early adjustment to a noninteractive mother interferes primarily with the surrogate-reared monkey's perception of the social object and ability to organize interactive social events.—*Journal abstract*.

4815. **Erwin, J.; Maple, Terry; Mitchell, G. & Willott, J.** (U Washington, Primate Field Station, Medical Lake) **Follow-up study of isolation-reared and mother-reared rhesus monkeys paired with preadolescent conspecifics in late infancy: Cross-sex pairings.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 808-814.—8 rhesus monkeys, 4 of each sex, which had been reared either with their mothers or in social isolation during early infancy, were paired with preadolescent conspecifics during late infancy. Some isolate-reared Ss appeared to have gained from this social experience. At nearly 3 yrs of age, each S was paired (sequentially) with 2 other-sex animals (1 isolate- and 1 mother-reared) after having been housed alone for the entire 2nd (and most of the 3rd) yr of life. Little social interaction occurred between the members of any pair. Several significant effects of rearing experience indicated that social experience with preadolescents in late infancy did not permanently reverse the deleterious effects of early isolation. However, the mother-reared Ss also failed to establish social rapport with one another. Comparison of these results with those of similar research employing mother-reared animals which had received supplemental social experience during the 2nd yr of life suggests that such social experience is of some importance for optimal development of later sociosexual behavior.—*Journal abstract*.

4816. **Fittinghoff, N. A.; Lindburg, D. G.; Gomber, J. & Mitchell, G.** (U California, Davis) **Consistency and variability in the behavior of mature, isolation-reared, male rhesus macaques.** *Primates*, 1974(Sep), Vol 15(2-3), 111-139.—Indicates that self-punishments, hy-

peraggressiveness, stereotyped behaviors, bizarre movements, and masturbation were more typical of 6 adult-male isolates than of 5 adult-male wild-born rhesus controls. These differences persisted into the 13th year. Social exploration and cage-shaking were depressed in isolates. A number of speculative explanations are offered for many isolate behaviors. An individual S's abnormalities not only changed but decreased with age, and the kinds and frequencies of abnormalities decreased as isolates habituated to a new situation. The behavior of controls was much less variable than was the behavior of isolates. Isolate abnormalities are viewed as "normal" responses to an altered ecology. (24 ref) —*Journal abstract.*

4817. Gouzoules, Harold T. (Arashiyama West, Primate Research Ranch, Laredo, TX) **Group responses to parturition in *Macaca arctoides*.** *Primates*, 1974(Sep), Vol 15(2-3), 287-292.—Describes the birth of an infant to the highest ranking female in a captive social group of stump-tail macaques. Along with certain details of delivery behavior, the responses of group members to the birth are given.

4818. Horwich, Robert H. (Inst of Micro-ontogenetic Ethology & Macro-cosmological Ecology, La Grange Park, IL) **Regressive periods in primate behavioral development with reference to other mammals.** *Primates*, 1974(Sep), Vol 15(2-3), 141-149.—Results of studies on behavioral development in 12 species of monkeys indicate normal fluctuations of high frequency of nipple contact. These periods decreased in intensity as the infant developed and occurred at similar times in development in the 12 species. Literature on 11 species of primates and 3 species of nonprimates indicates similar regressions in mother-infant contact, which implies a common genetic basis for the phenomenon. (26 ref) —*Journal abstract.*

4819. Horwich, Robert H. (Inst of Micro-ontogenetic Ethology & Macro-cosmological Ecology, La Grange, Park, IL) **Development of behaviors in male spectacled langur (*Presbytis obscurus*).** *Primates*, 1974(Sep), Vol 15(2-3), 151-178.—Observed a male infant langur in a group setting, from birth until 1 yr of age. Frequency or duration of 30 behaviors was recorded during 2-hr periods and plotted chronologically. The Maternal Care Period (0-20 days) was characterized by close mother-infant contact, including a great deal of nipple contact and a high frequency of maternal behaviors. The Individuation Period (21-70 days) was typified by maternal restraint and retrieval and by independence and self-oriented behaviors like scratching, mouthing, and locomotory skills. The Socialization Period (71-240 days) was manifested by behavioral fluctuations, involving nipple contact, play, and care by other troop members and coincided with the molt from infant to juvenile pelage. During the Juvenile Period, the mother-infant distance increased and the mother interacted more with other troop members. Behavioral fluctuations are discussed with reference to other primates studied. (39 ref) —*Journal abstract.*

4820. Krames, Lester; Pliner, Patricia & Alloway, Thomas (Eds.). (Erindale Coll, U Toronto, Ontario, Canada) **Nonverbal communication.** New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.

4821. Marler, Peter. (Rockefeller U, Ctr for Field Research in Ethology & Ecology, New York, NY) **Animal communication.** In L. Krames, P. Pliner & T. Alloway (Eds.), *Nonverbal communication.* New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Reviews and discusses literature on animal signals, genetics of social cooperation, the design of animal societies, and related topics. It is suggested that the key to acquiring understanding of animal communication lies in better knowledge of the organization of animal societies. (31 ref)

4822. Masur, Jandira & Struffaldi, Gina. (Escola Paulista de Medicina, São Paulo, Brazil) **Division of labor between rats: Influence of differential social rearing conditions.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 233-241.—Previous studies have shown that when pairs of rats are placed in a modified Skinner box with the water dipper and the bar attached on opposite walls, one of the rats usually becomes the worker, performing most of the barpresses, while the partner receives the reward without working (parasite rat). The influence of differential social-rearing condition on this peculiar division of labor was studied in the present 2 experiments with a total of 76 male Wistar rats. In Exp I, the development of the worker-parasite relationship was compared between pairs made up of 2 isolated- or 2 nonisolated-raised rats. Isolated Ss reacted to the presence of another isolated S through searching physical contact which led to a different pattern of development of the division of labor when compared to pairs made up by 2 socially raised Ss. In Exp II, in which each pair was made up of 1 isolated and 1 nonisolated S, the isolated became parasite. The stability of the worker-parasite relationship and the behavior of 2 parasites or 2 workers when tested together in the "social situation" was also analyzed. —*Journal abstract.*

4823. Maurus, M.; Hartmann, E. & Kuhlmann, B. (Max-Planck-Inst for Psychiatry, München, W Germany) **Invariant quantities in communication processes of squirrel monkeys.** *Primates*, 1974(Sep), Vol 15(2-3), 179-192.—Invariant quantities provide the basis for recognizing generally valid rules for intraspecific communication among squirrel monkeys. These invariant quantities, independent of individual characteristics of the animals or the animal groups, give rise to the following rules: (a) The behavior units, set up according to a physical description of movements and postures involved, are not directed from each animal towards every partner in arbitrary frequency. Rather, each behavior unit is characterized through being distributed in definite frequency relations among the partners. (b) Not only "what" is done is significant, but also "who" does it and toward "whom" it is done. (c) The hierarchical rank of animals correlates with the variability with which the animals use the given behavior units. (d) Behavior units resembling each other have similar functions in the communication processes. (e) Behavior units definitely differing from each other have different functions in the communication processes. (28 ref) —*Journal abstract.*

4824. McKinney, William T. (U Wisconsin, Medical School, Madison) **Primate social isolation: Psychiatric implications.** *Archives of General Psychiatry*, 1974(Sep).



Vol 31(3), 422-426.—A review of the literature shows that social isolation of rhesus monkeys for the 1st 6-12 mo of life produces severe and persistent behavioral effects including social withdrawal, rocking, huddling, self-clasping, stereotyped behaviors, and inappropriate heterosexual and maternal behaviors as adults. The mechanisms by which these effects are produced are uncertain and require additional investigations. The social isolation syndrome has been likened to several human psychopathological states, but exact labeling of it in human terms is premature at present. It is suggested that the syndrome be viewed in terms of its heuristic value as a model system for further clarifying the interactions among early rearing conditions, their possible neurobiological consequences, and subsequent social behaviors. (41 ref)—*Journal abstract*.

4825. Miller, Robert E. (U Pittsburgh) **Social and pharmacological influences on the nonverbal communication of monkeys.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Investigated variables affecting nonverbal communication and related individual nonverbal fluency with social and physiological performances in tests on rhesus monkeys. Stimulant, tranquilizer, and psychotomimetic drugs were used. Drugs affecting transmission or reception of affective expression also altered group social patterns. Undrugged Ss responded to treated Ss differentially depending on the drug used. (41 ref)

4826. Nash, Leanne T. (Arizona State U) **Parturition in a feral baboon (*Papio anubis*).** *Primates*, 1974(Sep), Vol 15(2-3), 279-285.—During a study of feral Tanzanian baboons, the premature birth of a dead, breechborn infant was observed and photographed. The birth attracted little attention from other troop members, but the dead infant was carried by the mother for 2 days and was investigated by several baboons, including 3 females who had recently become dominant to the mother in a fight. (18 ref)

4827. Reynierse, James H. (Hope Coll) **Communication elements constraining animal learning and performance.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Reviews literature on the function of odors, generality of discrimination and cue effects, generality of pheromonal effects, and agonistic postures. It is concluded that performance on several appetitive learning tasks is clearly constrained by odors associated with nonreward, an effect that parallels ecologically adaptive behavior of animals in the wild. (3 p ref)

4828. Savage, E. S.; Temerlin, J. W. & Lemmon, W. B. (U Oklahoma, Inst for Primatological Studies) **Group formation among captive mother-infant chimpanzees (*Pan troglodytes*).** *Folia Primatologica*, 1973, Vol 20(5-6), 453-473.—Studied interaction patterns of 3 adult female chimpanzees and their offspring before and after they were caged as a group. Aggression was of low intensity during group formation. Mother-infant interaction patterns changed as a function of group caging: (a) Infants broke contact with their mothers more frequently. (b) Mothers initiated fewer breaks in contact with their infants. (c) Duration of mother-infant contact

increased. (d) Grooming of mobile infants became infrequent. (e) Both duration of play and variety of play patterns increased. Mothers were aggressive toward neither their own nor other mothers' infants after group formation, and they carried and occasionally nursed infants of other mothers. Other cooperative or altruistic behaviors are described. Peer play was reciprocal, but infants playing with mothers were typically passive after initiating play.—*W. K. Redican*.

4829. Tavalga, William N. (American Museum of Natural History, New York, NY) **Application of the concepts of levels of organization to the study of animal communication.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Reviews the literature and explores an organizational level approach to animal communication research. Topics include the energy source (the emitter), the energy receiver (the responder), and various levels of organization (e.g., vegetative, tonic, and symbolic). It is suggested that research must examine each species as a unique product of natural selection in its own right. (3 p ref)

4830. Uematsu, T. & Saito, K. (Kagawa U, Faculty of Education, Takamatsu, Japan) **[Social facilitation of feeding behavior in the fresh water fish: II. Medaka *Oryzias latipes*.]** *Japn Annual of Animal Psychology*, 1973(Dec), Vol 23(1), 43-47.—Studied social facilitation in 28 "medaka" (Japanese freshwater fish). Food intake in a 10-min period, after 24-hr food deprivation, increased in the presence of 1 or 3 other fish on the opposite side of a glass wall. Results indicate social facilitation under a high-drive condition.—*S. Nakajima*.

4831. Vandenberg, John G. & Drickamer, Lee C. (North Carolina Dept of Mental Health, Research Div, Raleigh) **Reproductive coordination among free-ranging rhesus monkeys.** *Physiology & Behavior*, 1974(Sep), Vol 13(3), 373-376.—Reports that 2 female rhesus monkeys in 1 free-ranging social group were brought into sexual receptivity with estradiol benzoate during the nonmating season of the year. The presence of sexually active females resulted in increased sexual behavior and reddening of sex skin among the adult males in the experimental group. The effects were most intense for males of high social rank. These changes occurred while 2 other social groups were sexually quiescent, 2 mo before the normal onset of mating activity. In the birth season following this wave of induced sexual activity, untreated females in the experimental group delivered infants 1 mo earlier than in control groups.—*Journal abstract*.

4832. Vandenberg, John G. (Dorothea Dix Hosp, Div of Mental Health Services, Raleigh, NC) **Social determinants of the onset of puberty in rodents.** *Journal of Sex Research*, 1974(Aug), Vol 10(3), 181-193.—The age at which female mice reach puberty depends on prior experience with male stimuli; females exposed to male odors hasten their maturation. The effects of social stimuli on the process of sexual maturation of mice are discussed. (18 ref)

4833. Wenner, Adrian M. (U California, Santa Barbara) **Information transfer in honey bees: A population approach.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum

Press, 1974. x, 212 p. \$14.95.—Examines anomalous findings and other data to delineate the experimental problems of this research. A model is proposed concerning the flight patterns of recruit bees, and methods of testing it are suggested. (37 ref)

4834. Zack, Sheldon. (Max Planck Inst for Behavioral Physiology, Seewiesen, W Germany) **The effects of food deprivation on agonistic behavior in an opisthobranch mollusc, *Hermisenda crassicornis*.** *Behavioral Biology*, 1974(Oct), Vol 12(2), 223-232.—Observed the encounters occurring among molluscs which had been deprived of food for 1-3 days. Although deprivation resulted in an increase of locomotor activity, there was not a corresponding increase in the number of encounters. Deprivation greatly increased the proportion of agonistic encounters. As the deprivation period increased from 1 to 3 days, the proportion of agonistic encounters involving biting increased while the proportion of agonistic encounters without biting decreased. The overall proportion of agonistic encounters of both types appeared unchanged by the length of the deprivation. (23 ref)—*Journal abstract*.

### Sensory Processes

4835. Booth, D. A.; Stoloff, Robert & Nicholls, Joy. (U Birmingham, England) **Dietary flavor acceptance in infant rats established by association with effects of nutrient composition.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 313-319.—In 4 experiments, cross-bred Sprague-Dawley-derived albino rat pups came to accept a starch-containing diet and to prefer its flavor or other sensory properties, even when they also had access to the laboratory chow on which their mother was maintained. Protein induced acceptance somewhat more weakly, triglyceride not at all under the conditions used. Nutrient-free material became aversive. It is concluded that at least part of the acceptability of a food is an augmentation of its power to elicit ingestory reactions, which has been established by the contingency of physiological effects of ingested carbohydrate or protein on experiences of that foodstuff's distinctive sensory qualities. (38 ref)—*Journal abstract*.

4836. Kavanau, J. Lee & Peters, Charles R. (U California, Los Angeles) **Primate locomotor pattern repetitions, program clocks, and orientation to light.** *Primates*, 1974(Sep), Vol 15(2-3), 209-217.—Observed that remarkable locomotor pattern repetitions by small nocturnal primates (1 owl monkey, 3 slow lorises, and 3 bush babies) in 122-cm activity wheels occurred during 4-hr light cycles with simulated twilights. Some of the repetitions owed their genesis almost entirely to a night-to-night concurrence of endogenous timing programs. Others depended on strong tendencies of the Ss to orient relative to the position of light sources and enclosure environment. Still others were based partly on influences of twilight illuminance level on speed of locomotion. In many aspects the primate locomotor behavior was very similar to that of previously studied rodents and carnivores.—*Journal abstract*.

4837. Luschei, Erich S. & Goodwin, Guy M. (U Washington, Regional Primate Research Ctr) **Patterns of mandibular movement and jaw muscle activity during mastication in the monkey.** *Journal of Neurophysiology*,

1974(Sep), Vol 37(5), 954-966.—Studied patterns of mandibular movement, masticatory muscle activity, and rates of chewing different foods in 5 adolescent rhesus monkeys. The typical pattern during steady mastication of monkey biscuit involved a rapid upward and lateral movement of the tip of the mandible to a point 4 mm below and lateral to the point of occlusion, then a slower upward and medial-directed movement into occlusion. Mastication may be a useful natural behavior for studying the neural control of movement. (17 ref)

4838. Mook, Douglas G. (U Virginia) **Saccharin preference in the rat: Some unpalatable findings.** *Psychological Review*, 1974(Nov), Vol 81(6), 475-490.—A review of the literature and the author's experiments suggest that preferences for sweet solutions, at least in the rat, may reflect the "informational" rather than the "hedonic" properties of sweetness. Whereas saccharin-sweetened water is nearly always preferred to plain water, a saccharin-sweetened liquid diet is seldom preferred to a bland one. Ceiling and masking effects are not responsible for this. Perhaps sweetness identifies a fluid (even a nonnutritive one) as food, so that if other such cues are already present, sweetness is redundant and is ignored. If so, the distinction between the "sensory" and "motivating" properties of taste may be less sharp than previously supposed. (61 ref)—*Journal abstract*.

### DEVELOPMENTAL PSYCHOLOGY

4839. Andersson, Bengt-Erik. (U Göteborg, Inst of Educational Research, Sweden) **Older and younger generations' views of each other: A study in misunderstandings.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(3), 117-132.—Presents 4 Swedish studies of real or perceived differences in the way older and younger generations look upon each other. A total of 455 16-20 yr olds and 548 40-60 yr olds in different groups rated their views of adolescents and adults and their perception of the opposite generation's ratings. Results show no real gap between the generations in their ratings of the opposite generation. However, there appeared to be a perception gap (i.e., the generations had a mistaken perception of the opposite generation's ratings). The adolescents particularly expected the adults to have a clearly negative view of youth while at the same time they believed the adults to have a high opinion of themselves, a perception that was not supported by the data. This misperception decreased among older adolescents and working youth.—*Journal abstract*.

4840. Barroso, Felix & Braine, Lila G. (New York U) **"Mirror-image" errors without mirror-image stimuli.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 213-225.—Recent work has indicated that discrimination between upright and inverted stimuli is difficult when stimuli are one above the other, and discrimination between stimuli turned left and right is difficult when stimuli are side by side (i.e., errors are frequent under conditions in which mirror-image confusions can be made). 85 3-, 4-, and 5-yr-old children were given a task requiring the matching of orientation of (a) identical realistic figures that could form mirror images



of each other or (b) nonidentical realistic figures that could not form mirror images. The same pattern of errors appeared for the identical and nonidentical figures, indicating that the errors were not mirror-image confusions. It is argued that the errors were due to a strategy of matching analogous parts of the 2 figures. (22 ref)—*Journal abstract*.

4841. Bee, Helen L. (Ed.). **Social issues in developmental psychology**. New York, NY: Harper & Row, 1974. x, 438 p.—Presents a collection of 22 discussion and empirical papers on sex differences in child development, working mothers and day care, the effects of poverty, compensatory education, the role of fathers in development, and the effects of paternal absence.

4842. Bench, John; Hoffman, Eric & Wilson, Ian. (Royal Berkshire Hosp, Regional Audiology Research Unit, Reading, England) **A comparison of live and videorecord viewing of infant behavior under sound stimulation: I. Neonates**. *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 455-464.—12 clinically normal human neonates were presented with a battery of sound stimuli while their behavior was assessed live by 2 sound-masked Os and simultaneously videorecorded. This procedure was performed for the baby's whole body aspect and also for the head aspect only. Later, the same Os assessed the behavior from the videorecords. In both situations, Os were permitted to see the babies for 10 sec at each trial. The 1st 5 sec was a prestimulus observation period and the 2nd 5 sec usually contained a sound stimulus. Between trials the Os were allowed 20 sec in which to note (a) prestimulus activity; (b) confidence in response; and (c) facial, digit, and limb movements and "wholistic" impressions. The agreement between live and video assessments was slightly better than the level of inter-O agreement. The use of videorecording caused, at most, slight losses of relevant information and apparently did not generally distort the findings.—*Journal abstract*.

4843. Bo, Ola O. (U Oslo, Norway) **Types of orthographic error: Relations between the types of error and their connections with auditory discrimination and auditory memory**. *Scandinavian Journal of Educational Research*, 1973, Vol 17(4), 95-115.—Orthographic errors made in a dictation test by 240 2nd-class Norwegian children were classified as either phonemic or nonphonemic and related to 6 predictor variables (2 discrimination, 2 memory, and 2 decoding variables). Results show that the predictors correlated slightly higher with nonphonemic than with phonemic errors, although the relationship was altered somewhat when IQ and endurance were controlled. (21 ref)

4844. Bosma, James F. (Ed.). (NIH, National Inst of Dental Research, Bethesda, MD) **Oral sensation and perception: Development in the fetus and infant: Fourth symposium**. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4845. Busse, Thomas V.; Mansfield, Richard S. & Messinger, Lee J. (Temple U) **Activities in child and adolescent development**. New York, NY: Harper & Row, 1974. xiii, 170 p.

4846. Calderone, Mary S. (Sex Information & Education Council of the US, New York, NY) **Eroticism as a norm**. *Family Coordinator*, 1974(Oct), Vol 23(4), 337-341.—Erotic feelings, thoughts, fantasies, and responses invariably occur in children from their earliest days onward, simply as a "given" to being born male or female. The attitudes of the parent figures about these and about the gender identity and role behavior of the child constitute the child's primary sex education from birth to 5 yrs of age. Sex of assignment and of rearing should be congruent, or be helped to become so, before the age of 3. In particular, most parents need to be made aware of their own crucial role in determining their child's future adult capacity for erotic response and sex object choice.—*Journal abstract*.

4847. Eisner, H. C.; Siegler, I. C. & Elsele, F. R. (Duke U, Medical Ctr) **Contemporary views on behavioral development: A review of the 1973 meetings of the International Society for the Study of Behavioral Development**. *Human Development*, 1974, Vol 17(3), 231-234.—Discusses major themes and trends in the conference, including (a) the role of history in shaping present-day conceptualizations of behavioral development, (b) the need for behavioral scientists to move outside traditional Western cultures for a fuller understanding of human growth, (c) models of cognition and preception; and (d) different aspects of the ecology of the developing individual.

4848. Escalona, Sibylle K. (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr for Research in Mental Retardation & Human Development, Yeshiva U) **Developmental issues in the second year of life: Their implications for day care practices**. *Psychosocial Process*, 1974(Spr), Vol 3(1), 28-33.—Discusses aspects of toddler behavior (children 12-24 mo old) which caretakers often misperceive, as when they view much of the toddler's independent, meaningful behavior as random restlessness. Caretakers, by keeping the toddler occupied, may also deprive him of the full opportunity to build up and consolidate autonomy and structure in his world and in himself.

4849. Fink, R. (York U, Downsview, Ontario, Canada) **Orthography and the perception of stops after s**. *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 152-159.—Stimuli containing voiced or voiceless stops occurring after /s/ were presented in the form of a spelling test to 18 2nd and 14 3rd graders and 11 adults. Responses indicate that the child's perceptual categorization of these phones undergoes a change during his internalization of the rules of English orthography (i.e., at the age of 7 or 8 yrs). Results also suggest that the value of the feature of voicing assigned to these stops may not be the same for all places of articulation.—*Journal abstract*.

4850. Freedle, Roy. (Educational Testing Service, Princeton, NJ) **A general system's view of the second biennial meeting of the International Society for the Study of Behavioral Development**. *Human Development*, 1974, Vol 17(3), 235-240.—Suggests that to cover such a wide variety of ideas as were presented at the 1973 conference on behavioral development, an extremely general framework is needed; general systems theory is such a framework. It is argued that this framework has import for theorizing about the developmental process

itself. The general patterning of ideas at the conference is discussed.—*Journal abstract.*

4851. Fry, William F. (Stanford U, Medical School) **Psychodynamics of sexual humor: Sexual views of children.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 77-80.—Attempts to interpret the psychological aspects of children's humor, particularly in the area of sex, and to relate them to developmental changes in sexual understanding. Childhood sexual humor often emphasizes oral and anal concepts, although these are often mixed randomly with ideas about genitality. The psychodynamics of 2 types of jokes are discussed: those in which children themselves tell about sex, and those which are essentially adult jokes about childhood attitudes toward sex. Neurological, psychological, and physiological reasons for children's random association of sexual zones and functions are cited, and the normality of this developmental phenomenon is stressed.—L. Gorsey.

4852. Gyr, John W.; Willey, Richmond; Gordon, David & Kubo, Richard H. (U Michigan, Mental Health Research Inst) **Do mathematical group invariants characterize the perceptual schema of younger and older children?** *Human Development*, 1974, Vol 17(3), 176-186.—Explores whether perceptual processes of children can be viewed within a structuralist frame of reference and whether the concept of the group of transformations and related notions can be used to formulate perceptual phenomena and to predict experimental results. The following topics are discussed: (a) the benefit for perception theory to be derived from having its processes described in terms of group theory, (b) past work in perception which has used group theory, and (c) some studies by the authors which explore whether the invariance structure which underlies groups of transformations is reflected in the perceptual functioning of children. (30 ref)—*Journal abstract.*

4853. Harris, Lauren J. & Allen, Terry W. (Michigan State U) **Role of object constancy in the perception of object orientation: Some methodological considerations in studies of human infants.** *Human Development*, 1974, Vol 17(3), 187-200.—Contends that studies of human infants' sensitivity to object orientation have confounded 2 different psychological questions—one about ability to discriminate object orientation and the other about the existence of object constancy. Several examples from the recent psychological literature support the conclusion that the attempt to separate the constancy and discrimination questions in an experimental design employing only a single dependent variable fails practically and theoretically, since any such separation is predicated on an incorrect theory of constancy. A theoretically more acceptable multivariable design is outlined.—*Journal abstract.*

4854. Harris, Paul & MacFarlane, Aidan. (U Lancaster, England) **The growth of the effective visual field from birth to seven weeks.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 340-348.—Studied visual orientation toward a peripheral stimulus by 28 newborns and 12 7-wk-old infants with both a central stimulus present and absent in 2 experiments. The presence of the central stimulus narrowed but did not eliminate peripheral responding. No age change was

found when a central stimulus was present. However, older infants exhibited greater peripheral responding than newborns when the central stimulus was absent. The neonate appears to exercise internal control over his sampling of the stimulus array rather than being passively captured by it. (18 ref)—*Journal abstract.*

4855. Hashimoto, Syoji. [A developmental study on the cognition of occupations.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 187-191.—Asked 120 6th graders and 120 9th graders to rate their occupational preferences among 40 occupations on a 5-point scale. Factor analysis of the obtained data yielded 6 factors from 6th graders and 7 factors from 9th graders. Factor loadings after the rotation were obtained. Results indicate that (a) the structure of the occupational preference of these age groups has 2 dimensions, interest for the 9th graders and hierarchy for the 6th graders; and (b) the developmental trend is in the direction of occupational socialization.—S. Choe.

4856. Hayashi, Kunio. (Kyoto U, Faculty of Science, Japan) [The development of the smile in infancy.] (Japn) *Japanese Journal of Child Psychiatry*, 1972(Sep), Vol 13(5), 317-322.—Observed the smiling pattern of a female baby for 2½ mo after birth. The spontaneous smile, which is merely an expression of internal pleasure, was followed on the 40th-45th day by the smile at perceived objects occurring after needs for food were satisfied. After the 46th day this smile occurred regardless of her internal state. From the 53rd day she smiled frequently at her favorite toys, or when she was held or talked to. After the 65th day she smiled actively at people around her. Thus the innate spontaneous smile became the communicative smile, a social behavior. (English summary)—S. Ohwaki.

4857. Herbert, Martin. (U Leicester, School of Social Work, England) **Emotional problems of development in children.** London, England: Academic Press, 1974. x, 362 p. £5.

4858. Hersov, Lionel A. (Bethlem Royal & Maudsley Hosp, London, England) **Introduction: Risk and mastery in children from the point of view of genetic and constitutional factors and early life experience.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—It is suggested that "mastery" is one psychological process by which the organism adapts to limitations imposed by genetic and constitutional predispositions to inappropriate development or functioning. (34 ref)

4859. Hesselholdt, Sven & Aggerholm-Madsen, Gudrun. (Danish Coll for Educational Studies, Copenhagen) [Process and product in the marble-board test: The biosocial interaction and reading ability.] (Danh) *Skolepsykologi*, 1974, Vol 11(4), 277-303.—Investigated the relationship between reading ability, process and product on the marble-board test (MBT), social class, sex, and birth complications. Ss were 184 children (chronological age 10.5 yrs) selected from 8,820 born 1959-1961 at the National Hospital. The risk group was characterized by certain relatively mild pre- and perinatal complications with known or supposed relation to neuropsychiatric deviations (e.g., toxemia, premature birth, asphyxia); children of mothers with other known



significant symptoms during or related to pregnancy were excluded. Experimental and control groups were matched as to parents' social status, child's age and sex, and mother's chronological age. To measure process on the MBT, interrupted lines, number of corrections, and time were scored on 4 of the patterns. Results demonstrate a tendency to reading retardation in the risk group which was enhanced by low social class and inferior scores on the MBT, especially for boys. A distinction between minimal brain damage and early frustration could be drawn when the reading test and the MBT were compared. (19 ref)—*P. Mylov.*

4860. Hoffman, Richard J. (Miami U) **A Piagetian paradigm for interpreting and generating research dealing with conservation training.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 47-52.—Presents empirical designs and statistical formulas for analyzing experiments dealing with the stability of conceptual knowledge over time, generalization, and the acquisition of more complex concepts, based on Piaget's theories. Research schemes are presented, and statistical considerations in using repeated measures, problems associated with kurtosis, and the assumption of homogeneity of variance are discussed.

4861. Hoyer, William J. (Syracuse U) **Aging as intraindividual change.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 821-826.—Discusses experimental-manipulative research as a necessary means of establishing functional relationships between developmental change and its antecedents. The current focus of experimental-manipulative research in developmental psychology has been to account for age-associated interindividual differences by using within- and between-Ss methodologies. Consequently, the description, explanation, and modification of intraindividual stability, and change over time have received relatively little emphasis. It is suggested that small-N methodologies (e.g., single-S reversal designs), which represent the most parsimonious source of intraindividual data, circumvent certain methodological problems in developmental research and provide information that cannot be obtained from traditional within- and between-Ss designs. Statistical techniques for studying intraindividual variation and its antecedents over age (or time) are also discussed. (48 ref)—*Journal abstract.*

4862. Knafle, June D. (Eastern Connecticut State Coll) **Children's discrimination of rhyme.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 367-372.—A consonant-vowel-consonant rhyming test, which had 2 slightly different types of auditory differentiation, was given to 273 kindergarten to 3rd-grade children. A related rhyming test was also given to 62 of the kindergarten children. Results show that the rhyming category which required differentiation at the ends of words was more difficult than the category which required differentiation within the words. Correct responses increased with successive grade levels, but category differences remained. Sex differences were not significant. The rhyming test which had initial consonant similarities of stimulus and nonrhyming response words was more difficult for the kindergarten children than the rhyming test which did not have such similarities.—*Journal abstract.*

4863. Kren, George M. & Rappoport, Leon. (Kansas State U) **Glio and psyche. History of Childhood Quarterly: The Journal of Psychohistory**, 1973(Sum), Vol 1(1), 151-163.—Reviews the relationships between history and psychology as converging sciences at the sociocultural and individual levels. Emphasis is placed on childhood as a psychohistorical phenomenon; the understanding of human development requires a knowledge of its historical context. (42 ref)

4864. Longstreth, Langdon E. (U Southern California) **Psychological development of the child.** (2nd ed). New York, NY: Ronald Press, 1974. x, 574 p. \$10.95.—Presents a summary of current knowledge in the field of child development, focusing on the issue of stimulus-response learning theory vs cognitive theory and what each can or cannot account for in the changes that characterize the child's psychological development.

4865. Maller, Owen & Desor, Jeanette A. (U Pennsylvania, Monell Chemical Senses Ctr) **Effect of taste on ingestion by human newborns.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4866. Milianti, Franklin J. & Cullinan, Walter L. (VA Hosp, Hines, IL) **Effects of age and word frequency on object recognition and naming in children.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 373-385.—Visual duration threshold, matching-response latencies, and object-naming latencies were obtained for 30 9-yr-old and 15 6-yr-old normal-speaking male children. Stimuli were drawings of objects whose names represent a wide range of frequency of occurrence in the language according to the Thorndike-Lorge word count. The 9-yr-old Ss had significantly shorter visual-duration thresholds, matching-response latencies, and object-naming latencies than the 6-yr-olds. The latency for object naming was negatively and significantly correlated with the logarithm of frequency of occurrence of the names, but neither visual duration threshold nor latency for matching correlated significantly with frequency of occurrence. Results support the hypothesis that the major source of variance in object-naming latencies for common and rare words is not attributable to the perceptual identification of the objects.—*Journal abstract.*

4867. Mohanty, Gour S. (Ministry of Defence, Directorate of Psychological Research, New Delhi, India) **Analysis of response strategy and sensitivity dimension in the study of age-differences in recognition memory.** *Indian Journal of Psychometry & Education*, 1973(Dec), Vol 4(2), 59-66.—Compared 19-20 yr olds with 9-10 yr olds on expectancy and criterion placement in recognition memory tasks when the probability of signal presence is manipulated. Nonsignificant results suggest that the 2 age groups may differ in criterion placement, supporting the hypothesis that older groups are more cautious in decision-making and younger groups are more liable to take risks.—*J. B. Francis.*

4868. Mori, Ichio. **[The effect of high and low-speed motion pictures on children's spatio-temporal recognition.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 171-176.—Tested the

effect of speed perception on judgment of duration and distance. In Exp I, variable-speed motion pictures were shown to different groups of 92 5-yr-old and 87 11-yr-old children, and pre-post measures of perception of duration were compared. In Exp II, groups of the same children were exposed to synchronous and isochronous projections of the same film. Results indicate that younger children overestimated duration after they were exposed to slow-motion pictures, and underestimated it after fast-motion pictures, but older children were influenced only by fast movement. Younger children's concepts of time and distance depended much more on perception of movement than did those of older children. —S. Choe.

4869. Nowlis, Geoffrey H. (Vassar Coll) **Taste-elicited tongue movements in human newborn infants: An approach to palatability.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4870. Palmer, Robert D. (VA Hosp, Brooklyn, NY) **Dimensions of differentiation in handedness.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 545-552.—Expressions of handedness can be viewed as complex phenomena rooted in more general aspects of motor and psychological differentiation. The present study explored the dimensionality of a domain of behavioral measures of degree of differentiation in handedness of 60 male undergraduate Ss. Results challenge 2 widely held assumptions about the structure and measurement of handedness—that handedness is a unitary phenomenon and that it can be measured comprehensively by questionnaire. On the other hand, some generally held notions about the lesser differentiation of left-handers received substantive support. Findings have potential methodological and theoretical significance for developmentally oriented research on motor and cognitive development. (24 ref)—*Journal summary*.

4871. Regan, Carole. (St Joseph's Coll) **Approaches to research in child development.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

4872. Regan, Carole. (St Joseph's Coll) **Child development theories.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

4873. Rosenblith, Judy F. (Brown U) **Relations between neonatal behaviors and those at eight months.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 779-792.—To determine whether newborn behavioral assessments are related to those at 8 mo, a replication sample design was used with 4 samples ( $n = 400$  each for Samples 1, 2, and 3 and  $n = 350$  for Sample 4) of a nearly randomly chosen clinic population of newborns. Neonatal behavior was assessed by the Graham-Rosenblith Scales and 8-mo behavior by the Collaborative Project (Bayley) Examination. 8-mo data are available for 1,215 of 1,550 cases. In addition to analyses within replication samples, relations were examined separately for males and females, blacks and whites, and within each of 4 gestational age categories. Many relations

between scores on the Neonatal Examination and performance at 8 mo were significant. Most of those found for the total were found in Sample 1 (at the .20 level or better). Fewer relations between ratings and 8-mo performance were significant.—*Journal abstract*.

4874. Sameroff, Arnold J. (U Rochester) **Reflexive and operant aspects of sucking behavior in early infancy.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4875. Schaller, M. Joseph & Harris, Lauren J. (U Wisconsin, Madison) **Children judge "perspective" transformations of letterlike forms as different from prototypes.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 226-241.—96 5-13 yr old children made same-different judgments of prototypes of letterlike forms paired with transforms of these prototypes generated on a dimension either critical or noncritical for object identification. For compression transformations (noncritical—as in perspective shift), frequency of correct "different" judgments increased as the degree of compression in the transform increased. This result challenges the view that dimensions irrelevant in object identification are ignored or not detected in graphic discrimination. (23 ref)—*Journal abstract*.

4876. Sigel, Irving E. (Educational Testing Service, Princeton, NJ) **When do we know what a child knows?** *Human Development*, 1974, Vol 17(3), 201-217.—Notes that assessing the individual's knowledge involves sampling in areas of the class of items and the class of responses. If an individual's knowledge base is sampled with decontextualized items, the response is a better indication of knowledge since it is not dependent on extra dimensional support (i.e., reflects generalization not tied to a particular context). However, if tasks demand similar processes but vary in form of presentation, the meaning and significance of form should be examined. The context in which the item is presented alters the very nature of that item by virtue of necessitated situational constraints or facilitators. Accordingly, the task is to define the context variables in order to discover what questions influence the expression of knowledge—why the child solves a problem in one context and not in another, how much of the context must be included in the evaluation, and what that context should be. The answers must come from 3 kinds of considerations: task-oriented criteria, motivational elements, and the relationship between personality and performance.—*Journal abstract*.

4877. Stark, Rachel E. & Nathanson, Susan N. (Johns Hopkins U, Medical School) **Spontaneous cry in the newborn infant: Sounds and facial gestures.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4878. Thornburg, Hershel D. (Ed.). (U Arizona) **Preadolescent development.** Tucson, AZ: University of Arizona Press, 1974. xii, 356 p.—Presents a collection of 27 papers on the psychological aspects of the preadolescent years. Topics discussed include physical growth, sex



differences, intelligence, values, discipline, drugs, sexuality, and life problems.

4879. Vondracek, Sarah I. & Kirchner, Elizabeth P. (Pennsylvania State U) **Vocational development in early childhood: An examination of young children's expressions of vocational aspirations.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 251-260.—Investigated vocational aspirations in 282 3-6 yr old children. Age comparisons suggested that one aspect of vocational development in early childhood involves mastery of the task of projecting oneself into the future and conceiving of oneself as one day achieving adult status. Race comparisons indicated that urban blacks were less mature than urban whites in terms of mastery of the vocational projective task seen as characteristic of this developmental period. No significant sex differences were found in rate of development. However, there were indications that the pattern of vocational projection differs for males and females and that females undergo occupational foreclosure earlier than their male peers. (22 ref)—*Journal abstract*.

4880. Weiffenbach, James M. & Thach, Bradley T. (NIH, National Inst of Dental Research, Bethesda, MD) **Elicited tongue movements: Touch and taste in the mouth of the neonate.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4881. Whiteside, John A. (Clark U) **Eye movements of children, adults, and elderly persons during inspection of dot patterns.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 313-332.—Recorded the eye movements of 20 4-62 yr old Ss, by a corneal reflection technique, during familiarization with and subsequent attempts at recognition of random patterns of 8 luminous dots located in a 44° square field. Young children tended to scan the entire display, but there was little similarity between their eye movement patterns and the stimuli. College students limited their fixations to a smaller area; nonetheless, there was greater similarity between their eye movement patterns and the stimuli. The fixations of the elderly Ss were spread over a larger area than those of the college students and bore a greater similarity to the stimuli than did the fixations of the young children. (21 ref)—*Journal abstract*.

4882. Winder, Alvin E. (Ed.). (U Massachusetts, School of Health Sciences, Amherst) **Adolescence: Contemporary studies.** (2nd ed). New York, NY: D. Van Nostrand, 1974. xvi, 427 p.—Presents a collection of 27 articles on various aspects of adolescence, including normal growth and development, behavioral expectations of adolescence (e.g., drug use, sexuality, and music), and life decisions (e.g., family relationships, school, and work and life styles).

### Cognitive & Physical Development

4883. Berch, Daniel B. & Israel, Michael. (U New Mexico) **The effects of setting similarity on children's learning of the transverse patterning problem.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 252-258.—Gave 15 4th graders training on the transverse patterning problem, a task consisting of 3 different

geometric forms presented in pairs. 3 other groups of 15 4th graders each received training on problems containing the same geometric forms, along with either 1 (color or size) or 2 (color and size) additional nonspatial dimensions varying among the settings comprising the different cue-cue patterns. None of the Ss solved the basic transverse patterning problem, nor was there any improvement in performance on this problem after 90 trials. The addition of 1 nonspatial dimension resulted in solution, and the greater the number of nonspatial dimensions present, the better the learning.—*Journal abstract*.

4884. Bergman, Lars R. **Parents' education and mean change in intelligence.** *Reports from the Psychological Laboratories, University of Stockholm*, 1972(May), No 350, 17 p.—For 815 Swedish school children aged 9 yrs in 1965, mean changes between 9 and 12 yrs were studied for Verbal Comprehension, Inductive Ability, Spatial Ability, and General Intelligence. Controlling for initial values, moderate differences in estimated mean change were found between groups having different parents' education. These differences were largest for males and were in Verbal Comprehension. Properties of the sample and population are discussed. A comparison with other Swedish samples suggests that the present sample may be reasonably representative of many Swedish urban populations with regard to the problem under study. (22 ref)—*Journal abstract*.

4885. Biller, Henry B. (U Rhode Island) **Paternal deprivation, cognitive functioning and the feminized classroom.** In A. Davids, *Child personality and psychopathology: Current topics: I*. New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.

4886. Bloom, Lois. (Teachers Coll, Columbia U) **Talking, understanding, and thinking.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.—Explores 2 hypotheses on the development of understanding and speech: (a) that both depend on the same underlying information (or competence) but each manifests a different performance mode and (b) that the 2 represent mutually dependent but different underlying processes with shifting influences between them in the course of language development. (2½ p ref)

4887. Bowerman, Melissa F. (U Kansas, Bureau of Child Research) **Discussion summary: Development of concepts underlying language.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.—Critically reviews articles by E. V. Clark, et al (see PA, Vol 53:Issue 3) on language acquisition. 5 major themes prominent in recent literature on the relationship between linguistic and cognitive development are discussed: (a) language as a manifestation of the symbolic function, (b) formal similarities between cognitive and linguistic structures and processes, (c) strategies for language acquisition derived from the child's cognitive structuring of the world, (d) functional concepts and categories underlying early multiword utterances, and (e) representation of children's knowledge of linguistic structure. (33 ref)

4888. Brainerd, Charles J. (U Alberta, Edmonton, Canada) **The age-stage issue in conservation acquisition.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 115-117. —Examined whether experimentally induced conservation acquisition is a function of chronological age, developmental stage, or both. 88 nonconserving kindergarten Ss (mean age = 5 yrs, 7 mo) were assigned randomly to 2 training conditions and 2 control conditions. Ss in the 2 training conditions were trained on number conservation via a simple reinforcement procedure and were posttested 1 wk after training. An initial correlational analysis indicated that both age and stage predicted posttest performance; however, a subsequent partial correlational analysis revealed that stage was the only reliable predictor of posttest performance. Findings suggest that the benefit derived from training experiences by a nonconserving S depends on the S's pretraining stage but not on the S's age.—*Journal abstract.*

4889. Brannigan, Gary G.; Duchnowski, Albert J. & Nyce, Peggy A. (State University Coll New York, Plattsburgh) **Roles of approval motivation and social reinforcement in children's discrimination learning.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 843-846.—144 3rd- and 4th-grade children were given a 2-choice discrimination learning task. The 2 major factors were (a) the 3 levels of social desirability (high, moderate, and low) on the Children's Social Desirability scale; and (b) the 2 types of treatment conditions (monetary-social reinforcement and monetary-no social reinforcement). In opposition to D. P. Crowne and D. Marlowe's (1961) model of the approval-motivated individual, the high-social-desirability group made significantly fewer errors than both the moderate and low groups. It is suggested that for young children, social desirability scores may require a different interpretation than scores for older children and adults. (17 ref) —*Journal abstract.*

4890. Bricker, William A. & Bricker, Diane D. (George Peabody Coll for Teachers, John F Kennedy Ctr for Research on Education & Human Development) **An early language training strategy.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670p \$14.50. —Presents a strategy integrating operant, linguistic, cognitive, and psycholinguistic approaches to language acquisition and language training for children with delayed language development. (6½ p ref)

4891. Butterfield, Earl C. & Cairns, George F. (U Kansas, Medical Ctr, Ralph L. Smith Mental Retardation Research Ctr) **Discussion summary: Infant reception research.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670p \$14.50. —Critically reviews articles by P. A. Morse (see PA, Vol 53:Issue 3) and P. D. Eimas (see PA, Vol 53:Issue 3) concerning use of high amplitude suck procedure and voice onset time to study infants' auditory reception. The need for infant experiments designed to assess the impact of environmental interventions on their perception is noted.

4892. Chapman, Robin S. (U Wisconsin, Madison) **Discussion summary: Developmental relationship between receptive and expressive language.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670p \$14.50. —Critically reviews articles by L. Bloom (see PA, Vol 53:Issue 3) and D. Ingram (see PA, Vol 53:Issue 3) on the developmental relationship between receptive and expressive language.

4893. Chong-Jen, Chuang. (National Taiwan U, Taipei, Republic of China) **[The factors of grade and school achievement in concept formation of children.]** (Chin) *Acta Psychologica Taiwanica*, 1973, Vol 15, 54-58. —To clarify the development of conceptual ability and its relationship to school achievement, the concepts of direction, number, and movement were tested. It was found that the development of conceptual ability was continuous for children in Grades 1-5, and was significantly related to school achievement.

4894. Clark, Eve V. & Garnica, Olga K. (Stanford U, Committee on Linguistics) **Is he coming or going? On the acquisition of deictic verbs.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Oct), Vol 13(5), 559-572. —Examined the acquisition of deictic verbs by asking each of 44 children (5 yrs 6 mo to 9 yrs 5 mo old) to identify the speaker or the addressee of utterances containing *come*, *go*, *bring*, and *take*. Results showed that the youngest Ss appeared to understand *come* and *bring* but not *go* and *take*. Analysis of the strategies used showed that children go through several stages: (a) they identify both speaker and addressee with the goal of the motion; (b) they identify only the addressee with the goal; (c) they identify the addressee of *go* with the goal, but are otherwise correct; (d) they give adult-like responses. Data provide further evidence that strategies play an important role in the acquisition of word meanings. (17 ref)—*Journal abstract.*

4895. Clark, Eve V. (Stanford U, Committee on Linguistics) **Some aspects of the conceptual basis for first language acquisition.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670p \$14.50. —Examines the relation between cognitive-perceptual factors and the acquisition of word meanings. Data on perception of movement, size, sound, taste, texture, and shape are reviewed and hypothesis-and-strategy approaches of children discussed. (3½ p ref)

4896. de Armengol, Mercy; Goldstein, Frida & Lombana, Inés. (U de los Andes, Bogotá, Colombia) **[Comparison of imitation, comprehension and the production of grammatical contrasts by children from high and low socioeconomic classes.]** (Span) *Revista Latinoamericana de Psicología*, 1974, Vol 6(2), 239-254. —Administered a Spanish adaptation of the Imitation, Comprehension and Production Test to 48 children 38-50 mo old in kindergartens in Bogotá, Colombia. Ss were divided in 2 equal groups according to socioeconomic class. Results show statistically significant differences in the performance of the groups, in favor of the high socioeconomic class. In both groups imitation was significantly better than comprehension and production,



and comprehension was better than production. (22 ref)—A. V. Colotla.

4897. Eimas, Peter D. (Brown U) **Linguistic processing of speech by young infants.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Presents a feature detector model of speech perception and discusses its advantages and disadvantages. Problems of interpreting the data are examined. The need to describe the higher order invariances and to establish the existence of phonetic feature detector systems for the remaining phonetic features is noted. (3 p ref)

4898. Engemann, Alwin. (U Tübingen, Psychological Inst, W Germany) **[On strategies in problem solving behavior of children at various intelligence levels.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 39-61.—Presented periodic sequences of geometric symbols to test the strategies of 60 9-11 yr old children when predicting the next symbol in the series. Half of the Ss tested above and half below the mean of a group intelligence test. The group with higher scores on the intelligence test employed significantly more often a strategy based on examination of the shortest periodic sequence detected so far, independently of success or failure of previous predictions. The group with lower scores on the intelligence test was more influenced by successes on previous predictions while developing new hypotheses. (English & French summaries) (36 ref)—W. J. Koppitz.

4899. Entwisle, Doris R. & Frasure, Nancy E. (Johns Hopkins U) **A contradiction resolved: Children's processing of syntactic cues.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 852-857.—Using 6-9 yr old children, an attempt was made to replicate D. McNeill's (1970) investigation, which suggested that although semantic cues aided processing of sentences by 5-8 yr olds, syntactic cues did not. In agreement with other more recent studies, results show that children's ability to process syntactically well-formed sentences increased over the early school years. The difference between McNeill's data and later data sets probably stems from (a) unreliability owing to small samples (5 children) at each age level and (b) unreliability due to the high difficulty of sentences used for the criterion.—*Journal abstract*.

4900. Fein, Greta G. & Eshleman, Suzann. (Yale U) **Individuals and dimensions in children's judgment of same and different.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 793-796.—Used the 2-choice transposition problem to examine children's judgments of "same" and "different." When instructed to choose "the same" object in the test phase, kindergartners ( $n = 24$ ) chose the same dimensional value whereas 3rd graders ( $n = 24$ ) chose the specific stimulus which had been positive during training. When instructed to choose "the different" or "a different" object, both groups chose on the basis of individual identity. Ontogenetic changes in children's use of individual identities and dimensional values, and the relation between linguistic and cognitive factors, are discussed.—*Journal abstract*.

4901. Friedman, Steven; Bruno, Lois A. & Vietze, Peter. (George Peabody Coll) **Newborn habituation to**

**visual stimuli: A sex difference in novelty detection.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 242-251.—Repeatedly exposed 18 male and 18 female newborn human infants to 1 of 2 visual stimuli, a 4-square or 144-square black and white checkerboard target, until a set criterion of habituation was demonstrated, as measured by a decrement in visual fixation time. When the habituation criterion was reached, independent groups of Ss were either presented with the same target or with a target of either moderate or large discrepancy from the standard habituation stimulus. Results indicate that (a) there was habituation of visual attention, which suggests that some infants are capable of storing simple visual information soon after birth, and (b) following habituation female infants displayed greater recovery of attention than male infants when the moderate stimulus change was introduced. (23 ref)—*Journal abstract*.

4902. Garb, Jane L. & Stunkard, Albert J. **Taste aversions in man.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1204-1207.—A questionnaire survey of 696 Ss in 6 different age groups, early childhood to old age, revealed that taste aversions may be acquired by a special kind of learning that has previously been demonstrated clearly only in animals. Gastrointestinal illness was associated with acquisition of aversions in 87% of the Ss. One pairing of food and illness was sufficient to produce aversions that lasted for many years. Onset of aversions was most common between ages 6 and 12, when the prevalence rate reached 30%; it then fell steadily to a low of 6% after age 60. A better understanding of taste aversions may help improve conditioned aversion procedures in the treatment of alcoholism and obesity. (21 ref)—*Journal abstract*.

4903. Gladstone, Roy & Palazzo, Richard. (Oklahoma State U of Agriculture & Applied Science) **Empirical evidence for reversibility by inversion.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 942-948.—The State U nonconservers to give correct reversal judgments of height and amount (volume) was tested with the water conservation problem. Ss were 72 children, 24 from each of the following age groups: 3-yr-olds, 4-yr-olds, and 5-yr-olds. Each child answered each question 8 times (8 trials). Results show that the ability to give correct height- and amount-reversal judgments increased with trials, and correct height judgments increased with age. The Genevan school explains such results by positing a capacity for empirical reversibility in nonconservers in contrast to a capacity for logical reversibility in conservers. It is maintained that the data from this task do not justify the postulation of 2 different kinds of reversal capacities.—*Journal abstract*.

4904. Hale, Gordon A. & Piper, Richard A. (Educational Testing Service, Princeton, NJ) **Effect of pictorial integration on children's incidental learning.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 847-851.—Conducted 2 experiments to examine 192 8-, 11-, and 14-yr-old children's incidental learning with the central and incidental pictorial elements in each stimulus (a) presented as separate entities (standard condition), (b) depicted together in an action relation (2 types—weak action and strong action), or (c) depicted together in a

static relation. Following a learning task in which attention to a single element in each stimulus was required, incidental learning was measured by having the S indicate the incidental feature associated with each central component. Results show that incidental learning was higher with the action than the standard materials, but the developmental trend in these scores was little affected by pictorial integration. While extending the generality of previous incidental learning results, these data contrast with evidence showing an increase with age in the effects of action portrayal on intentional learning of pictorial associations.—*Journal abstract.*

4905. Hale, Gordon A. & Stevenson, Edward E. (Educational Testing Service, Princeton, NJ) **The effects of auditory and visual distractors on children's performance in a short-term memory task.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 280-292.—Assessed 144 5- and 8-yr-old children's performance in a short-term memory task under 2 auditory and 2 visual distraction conditions, as well as with no extraneous stimuli present. Performance under distraction was inferior to that under nondistraction, but the degree of difference was roughly the same at ages 5 and 8, indicating little developmental change in the effects of distraction over this age range. Other findings included differences in the effectiveness of the distractors used and evidence that the Ss adapted somewhat to the influence of extraneous stimulation. (16 ref)—*Journal abstract.*

4906. Hall, James W. (Northwestern U, School of Education) **Experimentally acquired associations in memory encoding by preschoolers.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 113-114.—25 preschool children (mean age = 3 yrs, 7 mo) were given extensive paired-associate (PA) training in which response terms were highly familiar words and stimulus terms were words semantically related to response terms but relatively unfamiliar to the Ss. Subsequent recognition memory (RM) performance indicated, by an analysis of false recognitions, that the newly acquired associations functioned during the encoding of the RM items (i.e., the PA response terms occurred as implicit associative responses to the PA stimulus terms presented for learning). The feasibility of using an entirely verbal PA task with children as young as 3 yrs also was demonstrated.—*Journal abstract.*

4907. Hallahan, Daniel P.; Kauffman, James M. & Ball, Donald W. (U Virginia) **Effects of stimulus attenuation on selective attention performance of children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 71-77.—Studied 108 children in Grades 1, 5, and 7 to determine whether (a) attenuation of irrelevant information on a selective attention task would result in increased selective attention and (b) a developmental increase in selective attention would be replicated with the use of a different procedure of data analysis than has been used previously. Results do not indicate that stimulus attenuation had any effects. This result is discussed in terms of its relevance to fading techniques in discrimination training studies. There was a developmental increase in selective attention which was most pronounced from the 5th- to the 7th-grade Ss. (19 ref)—*Journal abstract.*

4908. Hamel, B. R. (Free U Amsterdam, Netherlands) **Children from 5 to 7: Some aspects of the number concept.** Rotterdam, Netherlands: Rotterdam University Press, 1974. ix, 91 p.—Reports 6 experiments on the development of the Piagetian number concept and the transition from nonconservation to conservation of quantity in young children. Issues involved in the validity of training experiments and longitudinal research on concept acquisition are also examined. (3½ p ref)

4909. Hammer, Madeline & Turkewitz, Gerald. (Graduate School & University Ctr, City U New York) **A sensory basis for the lateral difference in the newborn infant's response to somesthetic stimulation.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 304-312.—Examined 27 female newborn infants' cardiac response to stimulation of the left and right perioral region. Cardiac acceleration occurred significantly more frequently to stimulation of the right than to stimulation of the left. Ipsilateral head turning also occurred more reliably to stimulation of the infant's right side than to stimulation of his left side. Evidence of reliable lateral differences in cardiac acceleration responses even under conditions in which the effects of lateral differences in head turning were removed suggest that laterally differentiated cardiac responsiveness is not merely a function of increased motor activity consequent upon stimulation of the infant's right side, but also reflects a difference in sensitivity at the infant's 2 sides as well. (17 ref)—*Journal abstract.*

4910. Hass, Wilbur A. & Wepman, Joseph M. (Shimer Coll) **Dimensions of individual difference in the spoken syntax of school children.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 455-469.—Language produced by 180 5-13 yr olds on a story-telling task was analyzed in terms of 57 variables. Factor analysis revealed 5 dimensions of syntactic usage: general fluency, embeddedness, finite verb structure, noun phrase structure, and qualified speech. The embeddedness dimension was the only one with a sizable relation to age. (38 ref)

4911. Hollos, Marida. **Growing up in Flathill: Social environment and cognitive development.** Oslo, Norway: Universitetsforlaget, 1974. 166 p.—Presents a comparative study of social roles and environmental factors in intellectual development based on tests conducted with 3 groups of Norwegian children from 3 different social milieus. One of these groups, the children from Flathill, an isolated Norwegian farm community, is discussed in detail based on the author's own experiences with them. (3½ p ref)

4912. Hoving, Kenneth L.; Morin, Robert E. & Konick, Dorothy S. (Kent State U) **Age related changes in the effectiveness of name and visual codes in recognition memory.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 349-361.—In the 1st of 3 studies 48 college, 3rd-grade, and kindergarten Ss were able to determine that 2 stimuli presented 700 msec apart were the same more quickly if they were visually identical than if they shared the same name. If 3,000 msec elapsed between stimulus presentations, 3rd graders and college Ss responded at the same rate in making both types of matches, whereas kindergarten Ss continued to respond



more quickly in making visual matches. In Study 2, a warning signal, presented 500 msec prior to the 2nd stimulus, reduced reaction times (RT) at both interstimulus intervals, but no significant differences in making visual and name matches occurred. In Study 3 32 1st-graders, responding either with or without a warning signal, responded like the older Ss in Study 1. The warning signal again reduced RT at both intervals. —*Journal abstract.*

4913. Ingram, David. (U British Columbia, Vancouver, Canada) **The relationship between comprehension and production.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Proposes that comprehension precedes production as a linguistic universal of acquisition. It is suggested that confusion on this point has resulted from lack of definition of terms and that current research supports rather than contradicts this view. (2 p ref)

4914. Jensen, Arthur R. (U California, Inst of Human Learning, Berkeley) **Cumulative deficit: A testable hypothesis?** *Developmental Psychology*, 1974(Nov), Vol 10(6), 996-1019.—Discusses theoretical issues and the methodological problems involved in establishing the progressive decrement phenomenon in relation to the relevant research on disadvantaged groups, especially American blacks. In this group in particular there is no methodologically adequate evidence in the literature for a progressive decrement in IQ or other mental measurements. The present study with over 8,000 black and white elementary school children used differences between younger and older siblings, which satisfies more rigorous methodological requirements for the detection of progressive decrement than have existed in previous studies. A significant age decrement was found in Lorge-Thorndike Verbal IQ but not in Nonverbal IQ among blacks, although the mean white-black difference was similar for Nonverbal and Verbal IQ. (31 ref)—*Journal abstract.*

4915. Kajita, Masami & Nakano, Yasuhito. [Study of the development of performance and learning type in paired-associate learning.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 160-170.—Administered 2 independent paired-associate learning tasks to 83 5-11 yr old children. Task 1 consisted of 6 stimulus pictures and 3 response colors, and Task 2 consisted of 9 pictures and 4 colors. Ss who did not reach learning criterion after 15 trials in Task 1 were eliminated for Task 2. E observed the learning types of each performance, and classified into 2 categories: S-R and E-R. Results indicate that older children used the rules of inclusion and exclusion more efficiently, and therefore reached the learning criterion faster than younger children ( $p < .01$ ). (English summary)—S. Choe.

4916. Kastenbaum, Robert. (U Massachusetts, Boston) **Childhood: The kingdom where creatures die.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 11-14.—Challenges the view still held by most adults that children are innocent of the concepts of death. This view is maintained because it protects adults, not children. Much of children's play and conversation is death-oriented. Children may be aware of death as early as age

2 and may go through several stages of conceptualization. It is concluded that children never live in a world apart from death but "are engaged in making a series of discoveries that adults might count themselves privileged to shares." (16 ref)—A. Krichev.

4917. Kern, Stephen. (Northern Illinois U) **Freud and the discovery of child sexuality.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1973(Sum), Vol 1(1), 117-141.—Disputes Freud's claim of being the first to recognize the regular existence of normal sexual feelings in childhood, arguing that every stage of psychosexual development had been recognized before Freud. His contribution was to integrate this information. (75 ref)

4918. Koocher, Gerald P. (Children's Hosp Medical Ctr, Developmental Evaluation Clinic, Boston, MA) **Conversations with children about death: Ethical considerations in research.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 19-21.—Discusses some special problems which must be dealt with when researching children's reactions to death and dying. It is suggested that proper planning eliminates most potential problems and that talking about death is less painful than not talking about it. It is concluded that such research is necessary and beneficial.

4919. Kroes, William H. (US Public Health Service, Cincinnati, OH) **Concept shift and the development of the concept of class in children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 119-125.—A total of 60 kindergarten and 1st- and 2nd-grade girls were presented with 3 tasks: concept-shift, sort, and hierarchization. To check for reliability of performance, Ss were given a retest from 5 to 10 days after the 1st session, with the use of the same tasks but with slightly altered stimuli. Performance on all 3 tasks for both sessions was quite consistent; an invariance of order in task performance was found from sort to concept-shift to hierarchization. Without exception, Ss who failed a task also failed the higher-order task(s); and passing a task meant passing the lower-order task(s). Implications in relation to Piaget's theory of development of classificatory skills are given.—*Journal abstract.*

4920. Liberman, Isabelle Y.; Shankweiler, Donald; Fischer, F. William & Carter, Bonnie. (U Connecticut, School of Education) **Explicit syllable and phoneme segmentation in the young child.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 201-212.—Suggests that phoneme segmentation is particularly difficult and more difficult than syllable segmentation. Direct evidence of a developmental ordering of syllable and phoneme segmentation abilities in the young child is presented. Using a task which required 135 preschool, kindergarten, and 1st-grade children to tap out the number of segments in spoken utterances, it was found that, though ability in both syllable and phoneme segmentation increased with grade level, analysis into phonemes was significantly harder and perfected later than analysis into syllables. The relative difficulties of the different units of segmentation are discussed in relation to reading acquisition. (25 ref)—*Journal abstract.*

4921. Maurer, Adah. **Intimations of mortality.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 14-17.

—Reports a conversation with nursery school mothers about their children and the concept of death.

4922. McCall, Robert B.; Appelbaum, Mark I. & Hogarty, Pamela S. **Developmental changes in mental performance.** *Monographs of the Society for Research in Child Development*, 1973, Vol 38(3, Serial No 150), 83 p. —Investigated patterns of IQ change, using data from the Fels Longitudinal Study. According to that study, normal middle-class children changed an average of 28.5 IQ points between 2½ and 17 yrs of age, and 1 in 7 changed by more than 40 points. 80 Ss who had relatively complete IQ records (maximum of 17 tests) between 2½ and 17 yrs were clustered into 5 groups which represented different patterns of IQ change over age. These profiles were relatively simple linear or quadratic trends and not random fluctuations about a constant value. Major inflection points occurred at 6 and 10 yrs. It was not obvious that these patterns were simple products of repeated testing or of the changing nature of the IQ test. Ss in the 5 IQ profile clusters had parents who differed in the extent to which they attempted to accelerate their child's development and in the severity of punishments they administered. These parental correlates appeared to hold up even when parental education and IQ as well as the general level of the child's IQ were statistically controlled. Given the assumptions prompted by these data, the changing nature of environmental circumstances during the childhood years for a given individual may be as potent in changing IQ as the difference between family environments.—A. Barclay.

4923. Menyuk, Paula. (Boston U, School of Education) **Early development of receptive language: From babbling to words.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50. —Reviews studies of early perception and language production. Data on mother-child communication interactions are examined, and lines of research are suggested to acquire more complete data on the infant's perception of linguistic structural properties and his comprehension of the function of these properties. (41 ref)

4924. Millis, Willard E. & Witte, Kenneth L. (U Arkansas) **Mediation in young children's paired-associate learning.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 203-205.—Tested 4-, 6-, and 8-yr-old children ( $n = 12$  in each age group) with a forward chaining (A-B, B-C, A-C) mediation paradigm. Each list was comprised of 6 pictorial stimulus-response pairs. All associations were acquired in the laboratory via a study-test method involving a recognition task on the test trials. The lists were constructed such that positive transfer was expected for 2 stimulus-response pairs on the 3rd list (mediated facilitation), negative transfer was expected for 2 other pairs (mediated interference), and neither positive nor negative transfer was expected for the remaining 2 pairs (control). Analyses of correct responses during List III indicated (a) positive, but not negative, transfer; and (b) no age differences in positive transfer. (15 ref)—*Journal abstract*.

4925. Morehead, Donald M. & Morehead, Ann. (California State U, Hayward) **From signal to sign: A**

**Piagetian view of thought and language during the first two years.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50. —Provides a structural view of thought and language during the 1st 2 yrs. Piaget's genetic theory is presented and compared to some aspects of N. Chomsky's general theory of language. Piaget's theory of cognitive development is also described, and recent studies which consider linguistic development prior to and including the onset of syntax are discussed within a Piagetian framework. (3 p ref)

4926. Morse, Philip A. (U Wisconsin, Madison) **Infant speech perception: A preliminary model and review of the literature.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50. —Presents a model suggesting that current data can be better understood and future research more intelligently guided if the development of both linguistic and microgenetic coding in the infant is considered. (6 p ref)

4927. Nelson, Katherine. (Yale U) **Structure and strategy in learning to talk.** *Monographs of the Society for Research in Child Development*, 1973, Vol 38(1-2, Serial No 149), 136 p.—Reports the results of a longitudinal study of the acquisition of 1st words by 18 children 1-2 yrs old and discusses them in terms of an interaction model of the language-learning process. The 1st 50 words acquired by each S were analyzed in terms of grammatical form, content, and semantic structure. In general, the Ss began by naming objects exhibiting salient properties of change whether as the result of the child's own action (e.g., ball) or independent of it (e.g., car). They learned words of all major grammatical form classes and tended to differentiate small concept domains—e.g., food words or animals—from the beginning. An interaction model that interrelates the child's preverbal concepts, his acquisition strategies, and parental-acceptance patterns is presented as a framework for understanding these findings. Acquisition histories of individual Ss illustrate the way in which these factors interact.—A. Barclay.

4928. Nigl, Alfred J. & Fishbein, Harold D. (U Cincinnati) **Perception and conception in coordination of perspectives.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 858-866.—Conducted 3 experiments, in an attempt to empirically describe the relative development of perceptual and conceptual understanding of projective relationships between objects and to explain a heuristic model of the cognitive processes involved in coordination of perspective tasks. Ss were a total of 330 4-12 yr olds. The results of Exps I and II indicate that the ability to relate perceptually and conceptually left-right and back-front relationships simultaneously emerged between the ages of 4½ and 5½ yrs, but by age 5½ perception was more advanced than conception. On tasks emphasizing perceptual understanding, performance approached asymptote at about age 9, but for tasks emphasizing conceptual understanding, performance was well below asymptote at age 12. In addition, on the latter tasks, the greatest performance increases occurred between the ages of 9 and 11, suggesting that a developmental shift occurs during that age range. The



results of all experiments are consistent with a model which identifies "extraction" of spatial relationships from the stimulus array and from the choice stimuli and "comparison" and "matching" of the images derived from extraction as the fundamental processes involved in both the perceptual and conceptual aspects of coordination of perspectives. (21 ref)—*Journal abstract.*

4929. Palermo, David S. (Pennsylvania State U, Lab for the Study of the Symbolic Processes) **Still more about the comprehension of "less."** *Developmental Psychology*, 1974(Nov), Vol 10(6), 827-829.—32 3-4 yr old children were asked to indicate "Which one has less?" in 4 different contexts. Results indicate that performance was the same in all contexts indicating that "more" is acquired before "less" and that those children who do not know "less" treat it as a synonym of "more." Differing results of previous studies cannot be attributed to the type of materials to which the comparative judgments are applied.—*Journal abstract.*

4930. Piaget, Jean. **The origins of intelligence in children.** (Trans M. Cook). New York, NY: International Universities Press, 1952. xi, 419 p.—Presents an analysis of the biological, sensorimotor, and cognitive aspects of the development of intelligence in children. Topics include the functional invariants and biological organization of intelligence, elementary sensorimotor adaptations (e.g., use of reflexes), and sensorimotor and practical intelligence and the theories of intelligence (e.g., the theories of grouping, assimilation, and association).

4931. Pollio, Marilyn R. & Pollio, Howard R. (U Tennessee) **The development of figurative language in children.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 185-201.—174 children in Grades 3, 4, and 5 were asked to complete 3 tasks in an attempt to determine their ability to use figurative language. Results for a "composition" task show that children produced a greater number of frozen than novel figures and that the absolute level of such usage decreased over grades. A "multiple sentences" task reveals that children produced more frozen than novel figures and that both showed a marked increase over grade. A "comparisons" task indicates that figurative language increased over grade, and that for this task children used more novel than frozen figures. Taken in conjunction with earlier work, these data suggest that children are able to use figurative language well before they can explain the exact nature of the relationship linking elements of the figure. In Piagetian terms, this implies that children use figurative language in the stage of concrete operations but cannot explain such usage until the stage of formal operations.—*Journal abstract.*

4932. Roberts, Jean & Engel, Arnold. (US DHEW, Health Resources Administration, Div of Health Examination Statistics, Rockville, MD) **Family background, early development, and intelligence of children 6-11 years: United States.** *Vital & Health Statistics, Series 11*, 1974(Aug), No 142, 42 p.—Presents national estimates of the prevalence of selected congenital or other early developmental health problems and describes the relationship of selected aspects of family background, infant health status, and early developmental history to the intellectual development and maturity of noninstitution-

alized 6-11 yr olds in the US, based on findings from the national Health Examination Survey of 1963-1965. A probability sample of 7,119 children were studied. Measures of intellectual development were the short form of the WISC (Block Design and Vocabulary) and the modified Goodenough-Harris Human Figure Drawing tests (HFD). Among other findings, data show that the relationship between intellectual development and academic achievement of the mother was as strong as that previously found for this group with the educational level of the father and that the IQ of children on both measures decreased consistently as the number of other live children in the family increased. (73 ref)—*Journal summary.*

4933. Schiefelbusch, R. L. & Lloyd, L. L. (Eds.). (U Kansas, Bureau of Child Research) **Language perspectives: Acquisition, retardation, and intervention.** Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.

4934. Schlesinger, I. M. (Hebrew U Jerusalem, Israel) **Relational concepts underlying language.** In R. L. Schiefelbusch & L. L. Lloyd (Eds.), *Language perspectives: Acquisition, retardation, and intervention.* Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.—Discusses methodological issues in the investigation of relational concepts underlying children's language, focusing on the relation between linguistic and cognitive development. A careful examination of their interaction is expected to lead to a better understanding of child development. (32 ref)

4935. Siegel, Linda S. (McMaster U, Hamilton, Ontario, Canada) **Development of number concepts: Ordering and correspondence operations and the role of length cues.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 907-912.—The development of ordering and correspondence operations, under varying degrees of the presence of length cues to number, was studied in 91 preschool children aged 3-5 yrs. Results show that ordering operations, as measured by a relative magnitude task, preceded the development of correspondence concepts. Many-to-one correspondence did not clearly develop before one-to-one correspondence. When length was positively correlated with number, performance improved on tasks involving judgments of comparative size, but did not improve where judgments of equality were required. When length and number cues were negatively correlated, performance was significantly retarded. The findings are interpreted in terms of the young child's difficulty in separating and coordinating the dimensions of length and number.—*Journal abstract.*

4936. Smiley, Ellen E. (City Coll, City U New York) **The acquisition of behavioral chains.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 190-200.—Conducted 3 experiments with a total of 38 4-yr-old children to study some conditions which facilitate the acquisition of behavioral chains in the context of marking and naming tasks. In Exp I Ss were required to respond overtly to the internal components of the chain. In Exp II an aversive contingency was imposed following errors. In Exp III instructions were added at the beginning of training. Results show that (a) requiring Ss to mark and name the correct stimuli on each trial increased the accuracy of performance, (b) introducing

time-out contingent on incorrect responses depressed the error rate, and (c) adding instructions concerning a pending change in the experimental task resulted in a lower error rate following withdrawal of the instructional stimuli. (24 ref)—*Journal abstract*.

4937. Spradlin, Joseph E. (U Kansas, Bureau of Child Research) **Discussion summary: Development of receptive language.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Critically reviews articles by P. Menyuk (see PA, Vol 53:Issue 3) and R. F. Cromer (see PA, Vol 53:Issue 3) on receptive language.

4938. Tallmer, Margot; Formanek, Ruth & Tallmer, Jill. (Hunter Coll, City U New York) **Factors influencing children's concepts of death.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 17-19.—Hypothesized that the awareness of death as universal is a function of age, that the understanding of irreversibility is not demonstrated until age 10, and that children of lower socioeconomic status would have a more adequate conception of death. 199 3-9 yr olds were administered a questionnaire dealing with animate and inanimate concept acquisition, 3 Thematic Apperception Test cards, and 5 sentence completion items. 110 parents were individually interviewed concerning their explanations to their children about death. Results indicate the validity of the hypothesis.—*A. Krichev*.

4939. Tindall, Robert C. & Ratliff, Richard G. (U Wyoming) **Interaction of reinforcement conditions and developmental level in a two-choice discrimination task with children.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 183-189.—540 1st, 4th, and 8th graders, equally divided by sex, performed a 2-choice discrimination task under 1 of 3 reinforcement conditions: reward (R) for correct responses, punishment (P) for incorrect responses, or reward and punishment (RP) for correct and incorrect responses. Half the Ss were tested by a male E; half, by a female E. Across all developmental levels, learning was superior in the P group. Complex interactions involving sex of S and E underline the importance of organismic variables in discrimination learning and in specifying parameters of reinforcer effectiveness.—*Journal abstract*.

4940. Townsend, David J. (Montclair State Coll) **Children's comprehension of comparative forms.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 293-303.—Tested 72 3.5-5.5 yr old children on their comprehension of the terms *taller*, *shorter*, *more*, and *less* in 5 types of sentences: truncated, explicit standard, expanded explicit standard, 2-dimensional 2nd-clause subject noun, and 2-dimensional 2nd-clause subject pronoun. Many Ss performed poorly on *less* and *shorter* in truncated sentences; the presence of explicit comparative cues did not improve these Ss' performance. Ss who performed perfectly on truncated sentences still had difficulty understanding 2-dimensional comparisons, especially those with a 2nd-clause subject pronoun. These Ss interpreted only the 1st clause of the 2nd-clause subject pronoun sentences. (16 ref)—*Journal abstract*.

4941. Umansky, Richard. (Children's Hosp Medical Ctr, Northern California Regional Child Development Ctr, Oakland) **Effect of a hand sock on prehension in**

**infancy.** *Developmental Psychobiology*, 1974(Sep), Vol 7(5), 407-419.—In 67 4-12 mo old human infants a briefly applied hand sock frequently resulted in marked prehensile disuse of the socked arm (SA) in excess of the sock's mechanical restriction. Most Ss failed to reach with the SA for midline objects on a majority of trials while continuing to use the unsocked arm (UA). The onset of disuse was rapid, as was resumption of use after sock removal. The SA disuse was attributed to the effect of excess contactual input from the SA. Younger Ss often appeared not to recognize the option to attempt prehension with the SA, and older ones were capable at times of deliberate disuse of the arm and could reverse existing patterns of SA disuse. Older Ss also displayed (a) better awareness of the handicapping effects of the sock in the framework of an improved concept of arm structure and function and (b) better adaptive and compensatory responses including substitute use of the UA. Data suggest a general transition from peripheral to central control of prehensile intention during the 2nd half of the 1st year. (23 ref)—*Journal abstract*.

4942. Wickens, Christopher D. (U Illinois) **Temporal limits of human information processing: A developmental study.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 739-755.—Presents a schematic model of the human information processing system, and within this framework discusses differences between adults and children in information processing limits. It is tentatively concluded that some irreducible maturational differences in processing rate are present, along with differences due to nonprocessing factors of incentive, motivation, attentiveness, and practice. The following areas of investigation of rapid information processing are discussed as they relate to reported or potential developmental research: tachistoscopic recognition, visual search, stimulus familiarity, stimulus sequential effects, choice reaction time, and central channel limitations. Tentative conclusions are drawn concerning possible loci in the processing model of age differences in processing rate capacity. (65 ref)—*Journal abstract*.

4943. Winer, Gerald A. & Kronberg, Debra D. (Ohio State U) **Children's responses to verbally and pictorially presented class-inclusion items and to a task of number conservation.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 141-152.—Presented verbal and pictorial class-inclusion questions to 24 children in kindergarten through Grade 6, and found evidence indicating that the purely verbal form of the question was less difficult than the pictorial form. A comparison of the development of class-inclusion behavior and conservation indicates that conservation developed at a younger age and at a faster rate than did class-inclusion behavior. Results are interpreted in terms of the competence-performance distinction.—*Journal abstract*.

### Emotional & Personality Development

4944. Anthony, E. James. (Washington U, Medical School) **The syndrome of the psychologically invulnerable child.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses various aspects of invulnerability and offers



steps that can be taken to make children relatively invulnerable to the stresses of life. (16 ref)

4945. **Bamber, James H.** (Queen's U Belfast, Northern Ireland) **The fears of adolescents.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 127-140.—Investigated the self-reported fears and selected personality characteristics of 1,112 adolescents, using the Fear Survey Schedule and the Eysenck Personality Inventory. Analysis of the results indicates that there were considerable sex differences and to a lesser extent differences between intellectual, socioeconomic, and age groups. Comparisons are made with other relevant studies, and possible explanations are discussed. (25 ref)—*Journal abstract*.

4946. **Berger, David F.** (State University Coll New York, Cortland) **The reaction to frustration of middle- and lower-class children.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 269-279.—In 2 experiments, 49 4-6 yr old white children from lower and middle socioeconomic backgrounds were exposed separately to the same operant analog of the A. Amsel "double alley" procedure. 2 measures of responding, latency of press and pressing rate, were taken following frustration and reward of prior responding. Middle-class Ss responded slower, in both measures, on nonrewarded compared to rewarded trials, a reversal of the more frequently observed frustration effect (FE). The lower-class Ss showed the usual FE, shorter response latencies following frustrative nonreward. The FE did not occur with the rate measure. Class differences in perceived locus of control of reinforcement and maximizing vs response patterning behavior in 3-choice probability learning tasks are discussed. (24 ref)—*Journal abstract*.

4947. **Ferreira, G. V.** [Experiencing as psychopedagogic category.] (Afri) *Suid-Afrikaanse Tydskrif vir die Pedagogiek*, 1974(Jul), Vol 8(1), 51-73.—Presents a phenomenological discussion of the concept of "experiencing" as a mode of actualization of becoming and learning in the psychic life of the child. Experiencing is viewed as the intentional, continuing act of moving toward and meeting reality which leads to knowledge (both preconceptual and conceptual). It is suggested that learning and becoming are similar in their actualization by experience. Because the experiencing of the child is a clarifying process aimed at developing the psychic structures of becoming and learning, it is concluded that experiencing should be included as a psychoeducational category. (38 ref)—*English summary*.

4948. **Jackson, Dorothy W.** (Ohio State U) **Stage factors relating alienation and self-role diffusion.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 269-274.—Conducted a study, controlling for age, sex, and vocational commitment of 290 adolescents (ages 17-19 and 20-22), to determine the relationship between self- and social alienation attitudes and the identity-role crisis of the adolescent stage. D. W. Jackson's DJ Social-Self-Alienation Scale was administered to all Ss. Specific subscale differences due to age and sex for social alienation were found. Younger adolescents expressed greater self-alienation than older males, who were significantly more self-satisfied than both younger and older females and younger males. The hypothesis that self-alienation reflects conflict and dissatisfaction emerg-

ing from identity-role discrepancies during the adolescent stage of psychosocial development, and that it would decrease with vocational commitment, was supported for males but not females. (16 ref)—*Journal abstract*.

4949. **Kaufman, Gershen.** (Michigan State U, Counseling Ctr) **The meaning of shame: Toward a self-affirming identity.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 568-574.—Considers that shame becomes inevitably bound up with the process of identity formation which underlies man's striving for self, for valuing, and for meaning. The experience of shame is a fundamental sense of being defective as a person, accompanied by fear of exposure and self-protective rage. The shame-inducing process involves one significant person breaking the interpersonal bridge with another. Original shame inducement occurs prior to language development; it is precipitated by parental failure to respond appropriately to a child's needs and by parental anger toward the child. The process of restoring the severed interpersonal bridge enables one to transcend shame and begin to develop a self-affirming identity.—*Journal abstract*.

4950. **Kokenes, Barbara.** (Millersville State Coll) **Grade level differences in factors of self-esteem.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 954-958.—Investigated the construct validity of the Coopersmith Self-Esteem Inventory. Factor analyses were performed using approximately 1,500 students in public schools in each of Grades 4-8. 3 factors emerged in the grade-level analyses that were related to the Self subscale proposed by S. Coopersmith. 2 factors represented negative attitudes toward the self, while 1 factor represented positive attitudes. Items that loaded into these factors were moderately congruent with the subscale items. 2 factors emerged related to the Home subscale. Items that loaded into these factors were highly congruent with the subscale items. 2 factors expressing bipolar attitudes emerged that were related to the School subscale. The items that loaded into these factors were moderately congruent with the subscale items. One factor emerged that expressed positive attitudes toward the self derived from peers. This factor was related to the Peer subscale through a moderate amount of common items. Grade-level differences were observed in the comparative amount of variance accounted for by factors, as well as the occurrence of factors.—*Journal abstract*.

4951. **Koocher, Gerald P.** (Children's Hosp Medical Ctr, Developmental Evaluation Clinic, Boston, MA) **Emerging selfhood and cognitive development.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 79-88.—Designed a study to provide empirical support for viewing personality development from a cognitive framework. With controls established for IQ and socioeconomic status, 75 6-15 yr olds were classified by level of cognitive functioning according to Piaget's system. Measures of self-concept, other concept, and ideal self were obtained, and differences were compared within and across groups. Intergroup differences show the ideal-self ratings increasing in uniformity and positive value as Ss moved beyond the preoperational

level of cognitive functioning. No significant sex differences were found.—*Journal abstract.*

4952. Masler, Ernest G. **The subjective perception of two aspects of time: Duration and timelessness.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 425-429.—Suggests that infants tend to form "timeless" groupings of similar perceptions, such as "bad" or frustrating impressions of the mother. As the ego matures, this tendency gives way to the recognition that complex objects may change as time passes. However, traces of this grouping tendency or similar habits are found in psychoanalytic practice, primitive cultures, and elsewhere. Of particular interest is the immature, countertherapeutic belief that to change is to die.—C. T. Sullivan.

4953. Mitchell, John J. (U Alberta; Edmonton, Canada) **Moral dilemmas of early adolescence.** *School Counselor*, 1974(Sep), Vol 22(1), 16-22.—Considers that the moral dilemmas of early adolescence arise from the interaction between the stress generated by personal-internal growth and conflicts from social-external growth. The discussion focuses on dilemmas of sexual behavior, independence, conscience, double standards, and conformity. Counselors are encouraged to identify (a) factors inherent in adolescent growth requirements, (b) deficiencies within the adolescent, and (c) deficiencies within the environment. The first requires the counselor to give encouragement to the client, while the other 2 may require counseling for the client.—A. S. Helge.

4954. Nowicki, Stephen & Duke, Marshall P. (Emory U) **A preschool and primary internal-external control scale.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 874-880.—Attempted to construct a preschool and primary form of an internal-external control scale that would be comparable to already completed forms for older Ss. On the basis of construct validation procedures, certain requirements were established for the new measure. After pilot work, yielding a 26-item cartoon format, the scale was administered to 240 5-8 yr olds. Data reflecting achievement, interpersonal distance, and social desirability were also gathered. Results indicate that the test met internal and external validity requirements. (24 ref)—*Journal abstract.*

4955. Pawlicki, Robert E. (State University Coll New York, Oswego) **Locus of control and the effectiveness of social reinforcers.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 153-159.—Tested the hypothesis that the developmental change in the effectiveness of social reinforcement is related to changes in locus of control. 146 Ss in Grades 3, 4, 6, and 7 responded to the Locus of Control Scale for Children and to a simple game measuring the effectiveness of either praise-connoting or information-connoting social reinforcers. Results do not indicate a developmental change in the effectiveness of various types of social reinforcers, but show a consistent superiority in the effectiveness of information connoting social reinforcers at each grade level. This contradiction of previous research is discussed in terms of task complexity and dependent measures. The data also reveal a developmental trend of increasing feelings of control over the environment with increased maturity. (15 ref)—*Journal abstract.*

4956. Provence, Sally. (Yale U, Child Study Ctr, Child Development Unit) **Some relationships between activity and vulnerability in the early years.** In E. J. Anthony & C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Presents 4 case studies that suggest that the child's capacity to be active in relation to the external world is an essential component of psychological development. The assumption is that such activity is both essential to and an indicator of psychic differentiation and of many aspects of early ego development.

4957. Raphael, Beverley. (Broughton Hall Psychiatric Clinic, Leichhardt, NSW, Australia) **Youth in a world of change.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 131-137.—Describes adolescent responses to 3 areas of life change or crisis. It is proposed that these responses may reflect and accentuate patterns of response to the adolescent developmental crisis. 22 recently bereaved adolescents showed denial, anger, and possibly withdrawal and were often threatened by the new roles into which they were forced by their fathers' deaths, particularly the oedipal aspects of these roles. Of 22 adolescent girls experiencing their 1st pregnancy, 11 showed evidence of some emotional disorder: 17 girls seeking termination of pregnancy were evaluated. Denial, rationalization, and ambivalent feelings were marked. It is concluded that these 3 areas have potential for preventive intervention in the form of specific ego support. Such intervention would be aimed at decreasing the incidence of subsequent health impairment in those at risk.—*Journal abstract.*

4958. Shotter, John. (U Nottingham, England) **Acquired powers: The transformation of natural into personal powers.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 141-156.—Describes the process whereby personal powers are derived from natural powers. Specifically, the topic is what goes on between and within a child and his mother during that part of his early development which results in him being transformed from a natural agent—a child of nature—into an individual personality—a child of culture. The issue of whether personal powers are acquired or innate is discussed. Psychological symbiosis in the child is detailed, as is the development of play behavior. It is concluded that human beings have no personal powers at birth, but gain them in negotiated interaction with those who already possess them. (17 ref)—R. S. Albin.

4959. Yates, Gregory C. (U Adelaide, SA, Australia) **Influence of televised modeling and verbalization on children's delay of gratification.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 333-339.—Studied voluntary delay of gratification in 56 9-yr-old children 4 wks prior to, immediately after, and 4 wks subsequent to exposure to 1 of 4 televised films. The modeling group observed an adult female model exemplify high-delay behavior. The persuasion group observed the model verbalize good reasons for waiting. The persuasion-modeling group observed the model exemplify high-delay behavior and verbalize reasons for waiting. Ss in each of the treatment groups emitted more delay choices on the posttest than control group Ss who observed the model exhibit neutral behavior. The greatest magnitude of change occurred when modeling



and persuasive cues were combined. Treatment effects were still in evidence for the modeling and the persuasion-modeling groups after a period of 4 wks.—*Journal abstract.*

### Social Behavior & Family Relations

4960. Abramson, Paul R. & Abramson, Seth D. (U Connecticut) **A factorial study of a multidimensional approach to aggressive behavior in black preschool age children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 31-36.—A multidimensional aggression scale developed by P. Abramson et al (1972) containing 34 variables of aggression was used to score the doll-play responses of 123 black preschool-age children. 6 factors were extracted on the basis of the amount of total variance contributed by each factor and the number of loadings exceeding .50. To assist in verbal reference these factors were labeled as follows: Factor 1, Violent Aggression Toward the Family; Factor 2, Violent Aggression by the Family; Factor 3, Aggression by the Self; Factor 4, Aggression Directed Toward the Self; Factor 5, Assertion Directed Toward Others; and Factor 6, Assertion Directed Toward the Family. The data support the contention that aggression can be conceptualized along several dimensions. (16 ref)—*Journal abstract.*

4961. Aldrich, C. Knight. **Youth's fulfillment of adult prophecies.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 127-129.—Posits that the quickness of youth's response to social change makes parents and other adults nervous and triggers the expectation that a change in youthful manners will lead inevitably to a change in morals. Since this expectation can become a self-fulfilling prophecy, adults can create the problems they seek to avoid if they communicate to their children their expectations of antisocial behavior. It is argued that, to counterbalance the sanctions of a permissive society, youth needs adult confidence in its capacity to set its own limits. If adults have confidence in youth in a world of change, youth will have confidence in itself. (15 ref)—*Journal abstract.*

4962. Allen, Vernon L. & Allen, Patricia S. (U Wisconsin, Madison) **On the attractiveness of forbidden objects.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 871-873.—Toys were ranked for attractiveness by 15 preschool and 21 4th-grade children. After the initial ranking, the S was told that he could not play with one of the toys. Each toy was subsequently ranked a 2nd time. Results show a strong decrease in the attractiveness of the forbidden toy by preschoolers, but an increase in attractiveness was exhibited by 4th graders. Results suggest that a perceived association between an object's being forbidden and its attractiveness may be learned through the course of socialization.—*Journal abstract.*

4963. Anthony, E. James. (Washington U, Medical School) **Children at risk from divorce: A review.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Examines the clinical liabilities for the children of divorced parents and the extent to which these liabilities can be modified by appropriate interventions.

4964. Bach, George R. & Goldberg, Herb. (Inst of Group Psychotherapy, Los Angeles, CA) **Creative aggression.** Garden City, NY: Doubleday, 1974. 407 p. \$8.95.—Demonstrates the grave damage to mental health that can result from suppression of natural anger and aggression and presents case histories which reveal the dangerous hostility exuded by "nice" parents, spouses, teachers, bosses, and psychotherapists. It is shown how the constructive use of aggression can remove artificiality from interpersonal relationships and open the way for real contact and intimacy. (6 p ref)

4965. Barnett, Mark A. & Bryan, James H. (Northwestern U) **Effects of competition with outcome feedback on children helping behavior.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 838-842.—80 2nd- and 5th-grade boys played a bowling game within either a competitive or noncompetitive atmosphere. Within the competition conditions, the children were randomly assigned outcomes (win, tie, or lose) and were given feedback accordingly. Each child was subsequently given the opportunity to donate to a charity. While competition with feedback was found to decrease altruism, one important limiting factor was found to be the individual's outcome within the situation. (20 ref)—*Journal abstract.*

4966. Biller, Henry B. (U Rhode Island) **Paternal deprivation: Family, school, sexuality, and society.** Lexington, MA: D. C. Heath, 1974. xi, 226 p.—Presents an analysis of the various forms of paternal deprivation and their effects, the influence of fathering on cognitive functioning and school adjustment, how inadequate fathering can contribute to the development of personal, sexual, and social problems, biological and sociocultural perspectives on paternal deprivation and sex-role functioning, and paternal deprivation and mother-child relationships. (37 p ref)

4967. Bulum, Nissan. (U Minnesota) **An investigation of the word order parameter of a parent-child verbal interaction in a relatively free order language.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 182-186.—A number of investigators have assumed that the relatively free word order of a given language was the relatively free word order which the child encountered during his language acquisition period. This study investigated the word order of a Hebrew speaker's verbal interaction with (a) his 2-yr-old daughter and (b) an adult. Results show that the father used a relatively free word order in his verbal interaction with the adult and a fairly rigid word-order in his verbal interaction with his child. Some possible interpretations are discussed.—*Journal abstract.*

4968. Campbell, Dugal. (Queen's U, Kingston, Ontario, Canada) **Sucking as an index of mother-child interaction.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

4969. Cicirelli, Victor G. (Purdue U) **Relationship of sibling structure and interaction to younger sib's conceptual style.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 37-49.—Investigated the effects of the older sibling's aid in an object-sorting task on the younger sibling's conceptual style. 160 sibling pairs from

2-child families were sampled from 16 subgroups defined by the following factors: grade level of younger sibling (kindergarten or 2nd grade), age spacing between siblings (2 or 4 yrs), sex of younger sibling, and sex of older sibling. For half the pairs, the younger sibling sorted alone; for the remainder, the older sibling aided and the children's interaction was recorded. Children aided by siblings used descriptive style less than children who worked alone; children aided by siblings 4 yrs older used inferential style more than children aided by siblings 2 yrs older; children with opposite-sex siblings used relational style more than children with same-sex siblings. Certain sibling interaction behaviors were related to more mature conceptual style. (19 ref) —*Journal abstract.*

4970. Dale, Philip S. (U Washington) **Hesitations in maternal speech.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 174-181.—Investigated the possibility that a significant source of segmentation information concerning the syntactic structure of sentences might be present in hesitation placement in maternal speech. 6 mothers were recorded speaking to their younger children (2-3½ yrs old) and to their older children (5-8 yrs old). Hesitations occurred more often at sentence boundaries in speech to younger children. However, using 3 distinct definitions of phrase boundary, no tendency was found for hesitations to occur more often at phrase boundaries in speech to younger children.—*Journal abstract.*

4971. DePalma, David J. (Loyola U, Chicago) **Effects of social class, moral orientation, and severity of punishment on boys' moral responses to transgression and generosity.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 890-900.—In 2 experiments with a total of 128 2nd- and 3rd-grade boys, the effects of social class, moral orientation, and severity of punishment on moral responses to transgression and generosity were investigated. In Exp I, a modified version of J. Aronfreed's task (see PA, Vol 38:2542), the response measures were the self-critical and reparative responses on the transgression trial, the self-critical responses prior to this trial, and the number of candies removed by the S during the task. In Exp II, the S was asked if he wished to donate any of his candy from Exp I to a "needy" child. Results indicate a differential effect of punishment treatment on the responses of the various moral orientation Ss. The flexible moral orientation Ss punished themselves less and donated more candy than the rigid Ss across the punishment conditions. The data suggest that the flexible moral orientation Ss may be more "mature" and "internalized" than the rigid orientation Ss. (30 ref) —*Journal abstract.*

4972. Dunn, Patrick P. (U Wisconsin, La Crosse) **Fathers and sons revisited: The childhood of Vissarion Belinskii.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Win), Vol 1(3), 389-407.—Describes the close relationship between V. Belinskii and his father, which was uncharacteristic of 19th century Russian families, and speculates on the relationship between traditional Russian child rearing and the conditions leading to the 1917 revolution. (4 p ref)

4973. Gottfried, Nathan W. & Seay, Bill. (Louisiana State U) **Early social behavior: Age and sex baseline data from a hidden population.** *Journal of Genetic*

*Psychology*, 1974(Sep), Vol 125(1), 61-69.—Studied the influences of age and sex on early social behavior in 37 3-5 yr olds in a day-care setting and 16 5-yr-olds in a Head Start center; most of the Ss were black. With the use of a standard observational category system, individuals were observed while in a 15-min play session in 3-child groups homogeneous as to age and sex. Results for 14 object-directed and 9 peer-social categories indicate that males and older children engaged more frequently in peer-social activity. However, no pattern of age or sex effects was found for object-directed behavior. Of special importance were the higher scores for verbalization for boys in both samples.—*Journal abstract.*

4974. Grandy, Thomas G. & Stahmann, Robert F. (U Iowa) **Types produce types: An examination of personality development using Holland's theory.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 231-239.—Tested J. L. Holland's hypothesis that parents encourage the development of their own personality types (realistic, investigative, artistic, social, enterprising, and conventional) in their offspring. Data were collected by personal interviews from 507 college freshmen at a large midwestern university. Parent's personality types (occupations) were compared to offsprings' personality types (expressed occupational choices) using the Kolmogorov-Smirnov 1-sample test to determine whether the comparisons were due to chance. Results indicate that relationships existed between the personality types of fathers and sons, fathers and daughters, and mother and daughters, but not mothers and sons.—*Journal abstract.*

4975. Hardgrove, Carol & Warrick, Louise H. (U California, San Francisco) **"How shall we tell the children?"** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 448-450.—Presents a communications model for parents to use in telling their children about the death of an expected baby. The model is based upon principles from communication and learning theories. Children's reactions to death are related to parental attitudes and to the developmental stage of the child. Children observe and imitate parental responses to death. Parents who openly use the model, communicate their grief, and explore their children's understanding and feelings about death will develop effective ways of coping with death. A child's reaction to death follows a developmental sequence: (a) fear of loss of parental love, (b) fear of his own death, and (c) feelings of survivor guilt. Interview techniques for nursing assessments and interventions in a family system confronted with death are discussed.—R. G. Gibson.

4976. Jayanagaraja, Dr. **The child in the family.** *Child Psychiatry Quarterly*, 1974(Apr), Vol 7(2), 11-13.—Discusses the child in the family, the parental role, and the emotional set-up and development of this interaction in India. The stages of parenthood and childhood are detailed.

4977. Jensen, Larry & Buhanan, Karl. (Brigham Young U) **Resistance to temptation following three types of motivational instructions among four-, six-, and eight-year-old female children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 51-59.—A total of 30 Ss were given 3 types of motivational instructions prior to a resistance to temptation test. 4-yr-old Ss deviated less under fear or punitive oriented instructions than under



reward or empathy oriented conditions, but 6-yr-olds deviated less under promised reward. 8-yr-olds performed as well or better when motivated by more intrinsic empathy-oriented instructions. All manipulations were more effective than the nurturance-nurturance withdrawal operation used in previous experiments. The latter results were interpreted as demonstrating the importance of external sanctions on children's moral behavior. It is concluded that the employment of either direct or indirect sanctions promotes obedience to the rules among young female children. It is suggested that resistance to temptation among female children may first be governed by a fear of punishment, expand to include a desire for a reward, and then progress to a more intrinsic motivation, or at least to a hedonism which results in satisfaction to another.—*Journal abstract.*

4978. Kerckhoff, Alan C. & Huff, Judith L. (Duke U) **Parental influence on educational goals.** *Sociometry*, 1974(Sep), Vol 37(3), 307-327.—Used interview data from 76 12th-grade and 67 9th-grade boys and their parents to determine whether parent-child agreement on goals can be accepted as evidence of parental influence. It is concluded that (a) parent-child agreement cannot be viewed as a wholly spurious basis for imputing influence, although any simple agreement measure tends to overstate the amount of influence involved; (b) agreement measures based on the child's report of the parent's goals lead to different outcomes than those based on the parent's own report; (c) the child's report of the parent's goal reflects the child's projection of his own goals and criteria of goal-setting onto his parents; and (d) evidence of direct goal transmission from parent to child is stronger among the older boys, but a paternal influence in the form of the son's modeling his father appears to be stronger among the younger boys. Agreement on goals did not vary with the quality of the parent-child relationship. (15 ref)—*Journal abstract.*

4979. Kern, Stephen. (Northern Illinois U) **Explosive intimacy: Psychodynamics of the Victorian family.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Win), Vol 1(3), 437-461.—Questions the traditional image of the typical Victorian family as stable, protective, and peaceful. Based on an examination of family pressures and sexual fears, the Victorian family is seen as a source of anxiety and conflict leading to excessive intimacy and interdependence. (3 p ref)

4980. Leiderman, P. Herbert & Leiderman, Gloria F. (Stanford U, Medical School) **Familial influences on infant development in an East African agricultural community.** In E. J. Anthony & C. Koupemnik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Studied the relationship between psychological test performance, familial, economic, and demographic variables, and child-rearing practices in 67 infants and their mothers. Results indicate that (a) familial economic level was related to the "average level" of infant test performance and not the "rate" of development, (b) caretaking behaviors varied with the economic level of the family, (c) infant caretaking involved multiple "mothering," and (d) the mother's presence was positive-

ly associated with the rate of psychological development during the infant's 1st yr.

4981. Leiderman, P. Herbert. (Stanford U, Medical School) **Mothers at risk: A potential consequence of the hospital care of the premature infant.** In E. J. Anthony & C. Koupemnik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Studied the effects of early mother-infant interaction in groups of mothers of prematures who had early contact with their infants, mothers of prematures who were separated from their infants, and mothers of full-term infants. Findings indicate that full-term mothers smiled more at their infants and maintained more ventral contact with them and that maternal self-confidence was lower in the separated group. It is suggested that mothers of prematures are particularly at risk when deprived of contact with their infants in the immediate postpartum period.

4982. Moore, Nancy V.; Everson, Carolyn M. & Brophy, Jere E. (U Texas, Austin) **Solitary play: Some functional reconsiderations.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 830-834.—Observed solitary play in kindergartners to investigate the Sex  $\times$  Birth Order interaction noted in 2 previous studies by R. Herron and B. Sutton-Smith (1971) and by L. Laosa and J. Brophy (1972). The sample included 26 firstborn males, 16 firstborn females, 36 later-born males, and 36 later-born females. The expected Sex  $\times$  Birth Order interaction was not replicated. However, the data reveal that contrary to traditional views, most solitary play observed was indicative of independence and maturity rather than immaturity or dependency. The only children who showed immature solitary play patterns as a group were twins. Boys and girls showed similar patterns, although the girls showed more educationally oriented solitary play.—*Journal abstract.*

4983. Moss, Howard A. (NIMH, Child Research Branch, Bethesda, MD) **Communication in mother-infant interaction.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Traces the developmental role of crying behavior during the early months of life. It is noted that different types of cries can be discriminated. The general effect of crying on maternal behavior, differences in maternal response, and the mother's potential for shaping crying behavior seem to be important and prepotent factors reflecting both the structure and the growth of this early communication system. (17 ref)

4984. Muensterberger, Werner. (State U New York, Downstate Medical Ctr, Brooklyn) **Some reflections on multiple mothering, cross-culturally.** *Psychosocial Process*, 1974(Spr), Vol 3(1), 57-71.—Discusses the effects of multiple mothering on the ability to maintain stable relationships and the implications for day care. Using information provided by a Thai student about child-rearing practices, an anthropological study of 2 Tahitian communities, and observations of 2 individuals in therapy, it is concluded that multiple mothering produces unstable relationships. (18 ref)

4985. Murphy, Henry B. (McGill U, Montreal, Quebec, Canada) **Long-term foster care and its influence on adjustment to adult life.** In E. J. Anthony & C.

Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Studied the influences of foster home care in 199 former and 50 current foster home children. Results indicate that "suburban location" was most associated with poor adult adjustment in the former foster child. While current Ss had a better identification with their foster homes than the urban-placed, were better accepted by the foster parents' relatives, and showed more signs of personality integration, they showed more signs of immaturity and neurosis and were poorer at solving concrete problems. (19 ref)

4986. Myers, Wayne A. (Cornell U, Medical Ctr, New York) **The primal scene: Exposure to parental intercourse.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 156-165.—Presents a psychoanalytically-oriented discussion of ancillary factors which may enhance or mitigate the effects of early primal scene (i.e., parental intercourse) observations on the young child. 6 of these factors are identified and related to the child's behavior after exposure: the child's age and state of ego development, stage of psychosexual development, frequency and chronicity of exposure, the exact nature of the observation, immediate parental response to the episode, and the long-range parental response. Various interpretations of the scene by the child are discussed, including the perception of the sexual encounter as an aggressive act. Frequent exposure is much more psychologically harmful and traumatic than a single, inadvertent exposure. A case history of exposure to the primal scene is presented, and suggestions for both parents and therapists in handling the situation are included.—*L. Gorsey*.

4987. Pareek, Udai & Dixit, Narendra. (Indian Inst of Management, India) **Personal correlates of cooperative game behaviour.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 94-98.—Used the Maximizing Difference Game to study cooperative behavior. The game is played dyadically with the players not visible to each other. Ss were preadolescent, 20 boys and 20 girls. 23 independent variables were employed. Results indicate that 3 of the independent variables correlated positively with the dependent variable at a significant level, and 2 of them correlated significantly in a negative direction. (25 ref)—*R. D. Nance*.

4988. Pareek, Udai & Dixit, Narendra. (Indian Inst of Management, Ahmedabad) **An analysis of cooperation and competition amongst preadolescents.** *Indian Journal of Social Work*, 1974(Apr), Vol 35(1), 73-85.—Administered to 150 preadolescent school children a Cooperative and Competitive Disposition Inventory and a Cooperative and Competitive Proneness Inventory. Ss also participated in 2-person games where each S wants either to maximize the difference in gain between partner and self, or to play so that the partner gets equal points. The variables measured included cooperation, competition, cooperative disposition, competitive disposition, cooperative proneness, competitive proneness, trust, trustworthiness, forgiveness, repentance, retaliation, and exploitation. Relationships between the different variables are discussed and suggestions are given for further studies.—*I. W. Kidorf*.

4989. Post, Barbara & Hetherington, E. Mavis. (U Wisconsin, Madison) **Sex differences in the use of proximity and eye contact in judgments of affiliation in preschool children.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 881-889.—Investigated sex differences in preschool children's use of nonverbal cues in judgments of affiliation in 2 experiments. Ss were a total of 40 male and 40 female 3-6 yr olds. Results of Exp I show that although both 4-yr-old boys and girls used proximity cues in judging liking, only girls showed an increase in the accuracy of use of this cue by age 6. At age 4 neither boys nor girls were functioning above chance in their use of eye contact cues in judgments of affiliation, and again girls alone showed improvement by age 6. Exp II demonstrates that discrimination training involving the proximity cue facilitated the correct use of this cue in the judgments of 4-yr-old girls but not in boys. (35 ref)—*Journal abstract*.

4990. Provence, Sally. (Yale U, Child Study Ctr) **A program of group day care for young children.** *Psychosocial Process*, 1974(Spr), Vol 3(1), 7-13.—Discusses problems that arose when young children were separated from their parents in a day care center. Measures used to alleviate the effect of separation are described.

4991. Ransh, Harold L.; Barry, William A.; Hertel, Richard K. & Swain, Mary A. (U Massachusetts, Amherst) **Communication conflict and marriage.** San Francisco, CA: Jossey-Bass, 1974. xii, 250 p.—Presents ways to study the interactions of married couples in conflict-laden contexts, using a technique called "improvisations." Among the topics explored within 6 interaction categories (cognitive, resolving, reconciling, appealing, rejecting, and coercing) are orientation toward marriage, sex differences, constructive and destructive conflict, pregnancy, and childbirth. (11 p ref)

4992. Steward, Margaret S. & Steward, David S. (U California, Medical School, Davis) **Effect of social distance on teaching strategies of Anglo-American and Mexican-American mothers.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 797-807.—Examined the variable of social distance between teacher and learner by observing the pattern of interaction between mothers and their own preschool sons, boys from a similar background, and boys from a different ethnic and social class background. Ss were 30 3-yr-old Mexican-American and 30 3-yr-old Anglo-American boys. Anglo-American and Mexican-American mothers from middle and lower classes were videotaped as they taught a cognitive and a motor task to each of 3 children. The Parent Interaction Code was employed to analyze the teaching loop behavior. Programmatic and instructional variables were different but stable for each ethnic group across social distance; patterns of feedback and child response shifted significantly across social distance. (30 ref)—*Journal abstract*.

4993. Stinnett, Nick; Farris, Joe A. & Walters, James. (Oklahoma State U) **Parent-child relationships of male and female high school students.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 99-106.—Compared the perceptions of 499 11th and 12th grade males and females concerning selected aspects of parent-child relationships. Significant differences were found in perceptions of males and females concerning each of the



following: source of most parental discipline during childhood, degree of praise received during childhood, source of most affection during childhood, degree to which mother found time to do things together with respondent as a child, and source of greatest parental influence in determining the kind of person the respondent is. (22 ref)—*Journal abstract*.

4994. Tuddenham, Read D.; Brooks, Jane & Milkovich, Lucille. (U California, Berkeley) **Mothers' reports of behavior of ten-year-olds: Relationships with sex, ethnicity, and mother's education.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 959-995.—Mothers' descriptions of their 9-, 10-, and 11-yr-old children were secured by means of a behavior inventory of 100 items, to be sorted into "true," "not true," and "uncertain" categories. Findings are reported for 2,212 whites, 641 blacks, 117 Orientals, and 79 Chicanos from an urban, largely middle-class sample, broken down by ethnicity, sex of child, and in the case of whites and blacks, by education of the mother. Comparisons with 7 other studies, both American and British, show noteworthy agreement in problem prevalence, despite major differences in samples and in methods of investigation. (16 ref)—*Journal abstract*.

4995. Wallerstein, Judith S. & Kelly, Joan B. (U California, School of Social Welfare, Berkeley) **The effects of parental divorce: The adolescent experience.** In E. J. Anthony & C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—A study of 131 adolescents indicates that following parental divorce, many young people live through an acutely painful experience. This psychological trauma, although time-limited for most, is marked by a rapid acceleration and telescoping of normative adolescent perceptions, conflicts, preoccupations, and responses. (28 ref)

4996. Ward, Charles D.; Castro, Angela & Wilcox, Anne H. (U Maryland) **Birth-order effects in a survey of mate selection and parenthood.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 57-64.—A survey of 139 married faculty members at a large state university confirmed the hypothesis that persons tend to marry others of the same birth order as themselves. Results also indicate that firstborn Ss desired fewer children than those who were later born, couples in which the respondent's spouse was firstborn rather than later born actually had fewer children, and the survey questionnaires were returned sooner when the respondent's spouse was firstborn than when later born. An interpretation based on the more socially responsible character of firstborns is suggested for the results.—*Journal abstract*.

4997. Whiteman, Martin; Brook, Judith S. & Gordon, Ann S. (Columbia U, School of Social Work) **Children's motivational perception as related to the instrumentality and effect of action.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 929-935.—On the basis of F. Heider's (1958) balance conceptions, a model was developed for specifying relations between the perceived properties of an act (its instrumentality and its consequentiality) and the intentionality attributed to the act. 129 1st-, 4th-, and 6th-graders made intentionality judgments of actions described in 10 pairs of stories, each pair made up of contrasting actions varying in

instrumentality and/or consequentiality. The older Ss adhered more closely to the naive psychological model both in intentionality choice and in the reasons for their choice. The 1st-graders had more difficulty judging intentionality on the basis of an act's instrumentality as compared to its consequentiality.—*Journal abstract*.

### Adult Development & Aging

4998. Amster, Leslie E. & Krauss, Herbert H. (Hunter Coll, City U New York) **The relationship between life crises and mental deterioration in old age.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 51-55.—Examined the relationship between mental deterioration in old age and recent life history. A family member or close friend completed the Geriatric Schedule of Recent Experience for each of 25 mentally deteriorated and 25 normal elderly women. Results show a positive relationship between mental deterioration and the magnitude and number of life crises.—*Journal abstract*.

4999. Antonucci, Toni. (Syracuse U) **On the relationship between values and adjustment in old men.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 57-69.—Hypothesized that values should reflect the ontogenetic development of the individual, and that a person should develop values that are appropriate to his role, development, and function within the society. 40 white middle-class males were given the Havighurst Life Satisfaction Scale and several values to be rated on a semantic differential. It was shown that adjusted old men considered work-related values to be much less important than did unadjusted men. Comparison of the present older sample with a middle-aged sample revealed that hedonistic values were much more important to the older individuals than to the middle-aged sample. (40 ref)—*Journal abstract*.

5000. Beller, Suha & Palmore, Erdman. (Duke U, Ctr for the Study of Aging & Human Development) **Longevity in Turkey.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 373-376.—Studied 48 individuals aged over 90 yrs and a control group of 108 younger Ss (mean age = 36 yrs) in Turkey. Results show longevity was associated with blood types P<sub>1</sub> and Le(a-b-), good health, being male, normal height and weight, simple diets with little meat, no cigarette smoking, vigorous physical activity, marriage and sexual activity, social activity, and a positive view of life. (17 ref)

5001. Bromley, D. B. (U Liverpool, England) **The psychology of human ageing.** (2nd ed). Harmondsworth, England: Penguin, 1974. 441 p. \$2.95.

5002. Brotman, Herman B. (US DHEW, Administration on Aging, Washington, DC) **Who are the aging?** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5003. Comfort, A. (Ctr for the Study of Democratic Insts, Santa Barbara, CA) **Sexuality in old age.** *Journal of the American Geriatrics Society*, 1974(Oct), Vol 22(10), 440-442.—Reminds geriatricians that many elderly people are still capable of experiencing sexual pleasure. Since sexual experiences can have generally favorable effects, such experiences should be encouraged under appropriate circumstances. Sexuality in the aged should not be rigidly suppressed as it is at present in most nursing homes and other institutions.—*Journal abstract*.

5004. Cutter, Fred. (VA Central Research Unit, Los Angeles, CA) **Coming to terms with death: How to face the inevitable with wisdom and dignity.** Chicago, IL: Nelson-Hall, 1974. xii, 307 p. \$8.95.—Presents an analysis of the experience of death, including the causes of nonacceptance as well as possible solutions to the anguish of acceptance. Characteristics of American attitudes toward dying are discussed, and suggestions for developing mature and confident attitudes toward an inevitable experience are presented. (4% p ref)

5005. Denney, Nancy W. (U Kansas) **Classification criteria in middle and old age.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 901-906.—In Exp I, 32 middle-aged and 32 elderly Ss were presented with the Conceptual Styles Test. A  $2 \times 2$  (Age  $\times$  Sex) analysis of variance on the percentage of complementary responses obtained on this test reveals that Age and the Age  $\times$  Sex interaction were significant. The middle-aged men gave significantly fewer complementary responses than the other 3 groups. It is suggested that these results reflect sex differences in the course of cognitive development which may result from the differential experiences and life-styles of adult males and adult females. To investigate the effect of one of the most apparent differences between the experiences of middle-aged men and middle-aged women—occupation—the performance of 10 professional and 10 nonprofessional men and 10 professional and 10 nonprofessional women was compared in Exp II. A  $2 \times 2$  (Sex  $\times$  Type of Occupation) analysis of variance on the percentage of complementary responses given on the Conceptual Styles Test yielded only 1 significant effect. Nonprofessionals gave significantly more complementary responses than professionals. (16 ref)—*Journal abstract.*

5006. Eysenck, Michael W. (U London, Birbeck Coll, England) **Age differences in incidental learning.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 936-941.—Examined the effects of age and of incidental-learning tasks on recall of a categorized word list. Ss were 50 18-30 yr old college students and 50 55-65 yr old teachers. The control groups were instructed to remember the words; incidental-learning groups performed orienting tasks, but were not informed that they would have to recall the words. 2 orienting tasks required that Ss process the meaning of the words; the other 2 orienting tasks did not involve semantic processing. Analysis of the free-recall data indicates that the semantic processing tasks led to much greater recall and organization of recall than the nonsemantic orienting tasks. In recall, there was a significant interaction between age and orienting task, with old Ss only manifesting incidental learning that was inferior to young Ss, whose orienting task involved semantic processing. The findings indicate that the presence or absence of an age-related decrement in incidental learning is predictable from the depth of processing of the incidentally acquired material. (23 ref)—*Journal abstract.*

5007. Fillenbaum, Gerda G. & Maddox, George L. **Work after retirement: An investigation into some psychologically relevant variables.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 418-424.—Information obtained from a highly select group of 37 healthy, financially secure male university faculty retirees indi-

cates that nearly all worked for pay after retiring. Continued working did not seem to be contingent upon the ready availability of jobs but was related to a personal dislike of retirement, intention to work after that event, active preretirement involvement in work, and the presence of younger friends who were working. It is suggested that work after retirement can be conceptualized as due to a mutually reinforcing interaction among the variables examined. (21 ref)—*Journal abstract.*

5008. Gerontological Society & American Geriatrics Society. (Washington, DC) **Program: 27th Annual Meeting of the Gerontological Society with the American Geriatrics Society, Portland Hilton Hotel, Portland, Oregon, October 28-November 1, 1974.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 2), 101 p.—Presents the program of events and abstracts of papers presented at the annual meeting of the Gerontological Society in the areas of biological sciences, clinical medicine, psychological and social sciences, and social research, planning, and practice.

5009. Hultsch, David F. & Bortner, Rayman W. (Pennsylvania State U, Div of Individual & Family Studies) **Personal time perspective in adulthood: A time-sequential study.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 835-837.—2 measures of personal time perspective were obtained from 1,247 adults using a time-sequential data collection strategy. 2 cross-sectional studies, separated by 1 yr, were conducted to test for the effects of age and time of measurement. Data analyses yielded significant main effects due to ages for both dependent measures. Main effects due to Time of Measurement, Sex, and all interactions were nonsignificant. The findings suggest that differences in personal time perspective during adulthood are related to age rather than sociocultural change during the year.—*Journal abstract.*

5010. Kalish, Richard A. & Reynolds, David K. (Graduate Theological Union, Berkeley, CA) **Widows (view death): A brief research note.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 187-192.—Interviewed 37 pairs of widows and nonwidows, matched for age, ethnicity, and education, about their expectations and preferences concerning death, funerals, belief in immortality, and appropriate behavior for widows and widowers. The role of widowhood had little or no effect on attitudes about death.

5011. Kinsbourne, Marcel. (Duke U, Medical Ctr, Center for the Study of Aging & Human Development) **Cognitive deficit and the aging brain: A behavioral analysis.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 41-49.—Cross-sectional comparisons were performed between young and old S groups matched for socioeconomic status and vocabulary score on Raven's Coloured Progressive Matrices, an incomplete figure recognition test (IFR), and a measure of auditory letter span (ALS). The elderly group's performance was inferior on all 3 measures, but least so on the ALS, for which they were able to use their overlearned knowledge of English spelling patterns. Deficit on the unfamiliar "right-hemispheric" IFR was fully accounted for by deficit on Matrices. This loss on a test of cerebrally localizable process (IFR) and on a nonlocalizable test presumably indicative of diffuse



neuronal depletion (Matrices) were comparable in extent, suggesting that basically homogeneous cerebral atrophy in aging equally affects focally and diffusely organized cerebral processes. Where previously acquired "structure" can be invoked (ALS), test performance is better preserved. (41 ref)—*Journal abstract*.

5012. Kogan, Nathan. (New School for Social Research) **Categorizing and conceptualizing styles in younger and older adults.** *Human Development*, 1974, Vol 17(3), 218-230.—Compared the classification behavior of 200 male and female college students with that of 168 healthy, well-educated older males and females (mean age = 71 yrs). Object-sorting and photo-sorting (male and female faces) procedures were employed. On measures of categorizing style—conceptual differentiation and compartmentalization—older adults were, respectively, lower and higher than college students. On measures of conceptualizing style—categorical—inferential, analytic—descriptive, and relational—thematic— younger adults exhibited stronger preferences for the 1st 2, and older adults for the 3rd. 5 content categories for sorting human faces were derived: physical, age, psychological, demographic, and preferential. No systematic age or sex differences for sorting male photos were obtained. For female photos, however, age and sex differences were observed. On the whole, the results fail to confirm other published evidence maintaining that aging is marked by conceptual deficits or a regressed mode of cognitive functioning. (28 ref)—*Journal abstract*.

5013. Levinson, Daniel J. et al. (Yale U) **The psychosocial development of men in early childhood and the mid-life transition.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5014. Medvedev, Zhores A. (National Inst for Medical Research, London, England) **Caucasus and Altay longevity: A biological or social problem?** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 381-387.—Despite intensive research, no scientific explanations have been found to account for the exceptional longevity claimed for residents of various regions of the USSR. It is suggested that the extreme longevity claimed for certain groups of Soviet citizens appears to be neither a medical nor a biological problem, but rather a complex social problem which has developed for many social, cultural, traditional, local, and political reasons.

5015. Monk, Abraham & Cryns, Arthur G. (State U New York, School of Social Policy & Community Services, Buffalo) **Predictors of voluntaristic intent among the aged: An area study.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 425-429.—Investigated the correlative connection between stated interest in community volunteer work and a number of social and demographic variables descriptive of 180 aged individuals in a white, ethnic working-class neighborhood of Buffalo, New York. Cross-tabulation of the questionnaire responses and subsequent multiple regression analysis identified a cluster of 6 attributes which could best predict such voluntaristic intent: age, education, belief in self's capacity to serve others, interest in senior citizen activity, scope of social interests, and home ownership. Because the study was limited to general attitudes, actual participation in volunteer programs or

activities could not be predicted.—*Journal abstract*.

5016. Nowlin, John B. (Duke U, Medical School, Ctr for the Study of Aging & Human Development) **Physical changes in later life and their relationships to mental functioning.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5017. Pfeiffer, Eric. (Duke U, Ctr for the Study of Aging & Human Development) **Sexuality in the aging individual.** *Journal of the American Geriatrics Society*, 1974(Nov), Vol 22(11), 481-484.—Notes that sexual activity may continue to play a significant role in the life of the elderly person. At age 68 about 70% of men still regularly partake in sexual activity, and even at age 78 about 25% are sexually active. For men, the married state is not a necessary factor, whereas for women it makes all the difference. Very few unmarried older women report regular sexual activity because of the unavailability of a sanctioned sexual partner. Sexual expression requires privacy, an aspect of life often neglected for the aged. The physician should take these needs into consideration when counseling or when planning programs to improve the quality of life in the later years.—*Journal abstract*.

5018. Sheley, Joseph F. (U Massachusetts, Amherst) **Mutuality and retirement community success: An interactionist perspective in gerontological research.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 71-80.—Interviews with 40 male residents of a retirement community indicate that satisfaction with life in such a community is tied to the mutuality of background, life style, and interests operating within the community.

5019. Smith, Anderson D. (Georgia Inst of Technology, School of Psychology) **Response interference with organized recall in the aged.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 867-870.—Examined the effects of adult age on response interference with organized recall, using a total of 185 females in 3 age groups: 20-39, 40-59, and 60-80 yrs. Differential response interference was not found in this experiment. While the effect of response interference was found in all age groups and while age did produce differences in the overall level of recall performance, the Age  $\times$  Response Interference interaction failed to reach significance. Results are discussed in terms of several explanations of response interference both with discrete recall of single items and with organized recall.—*Journal abstract*.

5020. Thompson, Larry W. (Duke U, Medical School) **Psychological changes in later life.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

### Culture & Ethnology & Race Relations & Religion

5021. Bacon, Margaret K. (Rutgers State U, Livingston Coll, New Brunswick) **The dependency-conflict hypothesis and the frequency of drunkenness: Further evidence from a cross-cultural study.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 863-876.

—In a previous cross-cultural study by M. K. Bacon et al (1965), the extent of drinking and drunkenness in 110 preliterate societies correlated negatively with the degree of indulgence in infancy and tolerance of dependent behavior in adulthood and positively with pressures toward achievement and self-reliance in childhood. In a reanalysis of data from 53 societies a combined measure of pressures toward achievement in childhood and diffusion of nurturance (based on the number of adults available to care for the children's dependency needs) correlated positively with frequency of drunkenness. In 38 societies, the association between frequency of drunkenness and diffusion of nurturance, pressures toward achievement in childhood and dependence in adulthood accounted for 46% of the total variance. Findings support the dependency-conflict hypothesis that frequency of drunkenness is related to societal customs that limit the indulgence of dependence in infancy, emphasize demands for achievement in childhood, and limit dependent behavior in adulthood. (24 ref)—*Journal abstract*.

5022. Bahr, Howard M. & Chadwick, Bruce A. (Brigham Young U) **Conservatism, racial intolerance, and attitudes toward racial assimilation among whites and American Indians.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 45-56.—Explored the relationship between conservatism and attitudes of racial tolerance and acceptance among 122 native Americans and approximately 356 whites, using the Wilson-Patterson Conservatism Scale. Results show that conservatism was inversely related to educational attainment, directly related to age, somewhat more evident among females than males, and not related to income. Factor analysis revealed 4 readily interpretable dimensions of conservatism among the whites—family and motherhood, religious, racial, and radical counterculture factors—but only 2 clearly interpretable factors among the Indians—religious and radical counterculture factors. The anticipated greater conservatism of the Indians did not appear; their cumulative conservatism scores were comparable to those of whites. There was a racial difference in the relation between conservatism and racial intolerance; among whites the conservatives were most likely to give intolerant responses about Indians, but among Indians there was no relationship between conservatism and antiwhite sentiments. Results suggest that whites with intolerant feelings about Indians do want Indians to "join the mainstream" of American society, but reject the possibility of close association with Indians for their own children.—*Journal abstract*.

5023. Ball, Donald W. (U Victoria, British Columbia, Canada) **What the action is: A cross-cultural approach.** *Journal for the Theory of Social Behaviour*, 1972(Oct), Vol 2(2), 121-143.—Discusses the tendency of persons to deliberately seek out and immerse themselves in situations with an element of risk, uncertainty, gain or loss, and even injury and danger. The literature on decision-making, social psychology, and sociology is reviewed with reference to the relation between action and its sociocultural locations. The hypothesis is offered that the type of action in a sociocultural unit is a function of regularly perceived risk in the environment, and data are presented to support this idea. Campus activism, delin-

quency, and drugs and sex are discussed as social problems explicable in terms of this hypothesis. Thus, risk-taking is seen as one of the factors involved in these problems. (62 ref)—*R. S. Albin*.

5024. Berman, Alan L. (American U, Counseling Ctr) **Belief in afterlife, religion, religiosity and life-threatening experiences.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 127-135.—Administered demographic questionnaire and the Belief in Afterlife Scale to 396 undergraduates. Ss were also asked for estimates of current religiosity and whether they had ever faced an experience which threatened imminent or inevitable death. Findings show that the experience of a death threat had no effect on belief in a life after death. Such a belief was, however, related to an interaction among religion and religious activity. It is concluded that while religious activity does not serve as a defense against an experienced stress reaction at the time of stress, the later recall and report of life-threatening experiences occurs less frequently among religious than nonreligious Ss. (25 ref)—*Journal abstract*.

5025. Brand, Elaine S.; Ruiz, Rene A. & Padilla, Amado M. (Avila Coll) **Ethnic identification and preference: A review.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 860-890.—A review of the literature reveals that until recently, studies of ethnic identification and preference have usually found a preference for majority-group members by both majority- and minority-group Ss. Results have also shown a concomitant disparaging of minority-group members by Ss. The literature is reviewed by the major methodologies employed in ethnic preference research. These methodologies include the following: attitudes as measured by ranking scales, preferences for photographs or line drawings of individuals from various ethnicities, choices of dolls of varied skin and hair colors, cross-ethnic comparisons on personality assessment devices, analysis of sociometric interactions, observation of intergroup behavior, attitude bias in disguised measures, and measurement of automatic changes. The review also summarizes 9 variables (e.g., S's age and skin color) that appear to influence a respondent's identification and preference. It is concluded that (a) multiple measures of ethnic preference should be obtained from respondents, (b) a host of ethnicities besides whites and blacks should be investigated to determine ethnic specific and universal factors associated with ethnic esteem, and (c) description and/or control should be established for those factors that appear to influence strongly the respondent's ethnic identification and preference. (6 p ref)—*Journal abstract*.

5026. Brislin, Richard W. (East-West Ctr, Honolulu, Hawaii) **The Ponzo illusion: Additional cues, age, orientation and culture.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 139-161.—Tested the ecological hypothesis used to explain the Ponzo illusion, which states that because the converging lines indicate distance, there is an unconscious inference that "the top line must be longer since it is further away." 420 3-22 yr old Ss from Guam and Pennsylvania were administered various forms of the Ponzo illusion. Results generally support the ecological hypothesis, especially if the importance of various illusion forms and responses from specific age groups is accepted. The major plausible rival



hypothesis to the ecological explanation—the interpretation of 2-dimensional cues—is also discussed. (27 ref)—*Journal abstract.*

5027. Davidson, Graham R. (U Queensland, St Lucia, Australia) **Linguistic determinants of choice-reaction time among Aborigines and white Australians.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 199-211.—30 Aboriginal and 30 white Australian adolescent males (mean age = 15 yrs) classified stimuli along a specifically Aboriginal or a moiety dimension of dual organization and along a color dimension. A  $2 \times 2$  randomized factorial design was used with simple reaction time as the covariate. Results show that Aborigines had significantly greater choice matching-response times (CRTs) on both CRT tasks. A significant Culture  $\times$  Task interaction was found which was in the opposite direction to the suggestion that moiety classification would favor Aborigines in a CRT task. Codability was slightly related to CRT for the white Australian group. (28 ref) *Journal abstract.*

5028. Gluckman, Laurie K. **Transcultural consideration of homosexuality with special reference to the New Zealand Maori.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 121-125.—Postulates that homosexuality in both male and female was unknown in pre-European New Zealand but that it has become relatively common with increasing contact with European culture. The reasons for this are discussed, justifying the conclusion that such homosexuality is socially and culturally determined. (22 ref)

5029. Goodman, Felicitas D. (Denison U) **Disturbances in the Apostolic Church: A trance-based upheaval in Yucatán.** In F. D. Goodman, J. H. Henney & E. Pressel, *Trance, healing, and hallucination: Three field studies in religious experience*. New York, NY: John Wiley & Sons, 1974. xxiii, 388 p.—Describes the outbreak of a "crisis cult," events leading up to it, and its aftereffects from the viewpoint of a participant-observer. A new model is proposed to explain the culture change, trance behavior, and supernatural premise elements of the reported phenomena.

5030. Goodman, Felicitas D.; Henney, Jeannette H. & Pressel, Esther. (Denison U) **Trance, healing, and hallucination: Three field studies in religious experience.** New York, NY: John Wiley & Sons, 1974. xxiii, 388 p.

5031. Gorsuch, Richard L. & Aleshire, Daniel. (Texas Christian U, Inst of Behavioral Research) **Christian faith and ethnic prejudice: A review and interpretation of research.** *Journal for the Scientific Study of Religion*, 1974(Sep), Vol 13(3), 281-307.—Studies of the association between Christianity and ethnic prejudice indicate that moderately active church members were prejudiced, but highly active members were as tolerant as nonmembers. The more intrinsically religious, nonfundamentalistic, and theologically discriminating persons were also more tolerant. These conclusions held regardless of when the studies were conducted, from whom the data came, the region where the data were collected, or the type of prejudice studied. It appeared that holding a strong value position which allowed one to stand outside of the value traditions of society at large was crucial in adopting a nonprejudiced position and was typical of both nonreli-

gious and highly religious people. (112 ref)—*Journal abstract.*

5032. Hardy, Alister. (Manchester Coll, Religious Experience Research Unit, Oxford, England) **Anthropology, parapsychology and religion.** *Parapsychology Review*, 1974(Sep-Oct), Vol 5(5), 14-17.—Proposes that primitive religion, rather than being derived from magic or animism as some earlier anthropologists thought, may represent the discovery of an extrasensory power shared among mankind. In giving primitive man strength, religion would encourage him in a way of life with survival value. Based on the anthropological studies of R. R. Marett, it is suggested that the idea of the Holy may be parapsychological in nature. Anthropologists should be open to such possibilities and approach them experimentally.—P. F. Grim.

5033. Henney, Jeannette H. (Capital U) **Spirit-possession belief and trance behavior in two fundamentalist groups in St Vincent.** In F. D. Goodman, J. H. Henney & E. Pressel, *Trance, healing, and hallucination: Three field studies in religious experience*. New York, NY: John Wiley & Sons, 1974. xxiii, 388 p.—Discusses and analyzes phenomena among the Shakers and the Streams of Power, 2 religious cults, and compares them to similar religious groups in the Caribbean.

5034. Jeffries, Vincent & Tygart, Clarence E. (California State U, Northridge) **The influence of theology, denomination, and values upon the positions of clergy on social issues.** *Journal for the Scientific Study of Religion*, 1974(Sep), Vol 13(3), 309-324.—A study of 321 randomly selected pastors of 5 denominations in the Los Angeles metropolitan area revealed that theological position was a better predictor of opinions and activities concerning major social issues than denominational affiliation or extrareligious values. This finding is contrary to B. Johnson's (1967) speculative rejection of the theology as a major source of pastors' political commitments.

5035. Jones, John & Shea, John. (U Papua & New Guinea, Port Moresby) **Conservatism measures in Papua New Guinea.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 172-183.—Used a modification of Wilson and Patterson's Conservatism Scale, which uses a "catch-phrase" approach, to 97 university students in Papua New Guinea. Results were compared with data collected in 1968 by Wilson and Patterson in New Zealand. Problems of equating New Zealand and Papua New Guinea political affiliation in an effort to gauge Ss' conservatism led to the use of church attendance and divergent thinking abilities as external criteria. Degree of European contact, rapid social change, and homogeneity of religious experience may help account for the unexpected positive but nonlinear relationship obtained between high divergent thinking and high conservatism scores.—*Journal abstract.*

5036. Klaus, Rudi & Bass, Bernard M. (U Rochester) **Group influence on individual behavior across cultures.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 236-246.—Studied cultural differences in the effects of group conformity pressures on individual attitudes and behavior. The responses of managers from 13 different countries who participated in group management training programs around the world were analyzed. Results

indicate that West German and Swiss managers were particularly high in conformist-type response patterns, while British and Austrian managers ranked lowest in conformity among the countries represented. Japanese managers exhibited a complex pattern with a noticeable anticonformist tendency, a finding that has been reported in previous research.—*Journal abstract.*

5037. Korte, Charles. (Vassar Coll) **The role of racial information in the completion of interracial acquaintance chains.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 305-306.—C. Korte and S. Milgram (see PA, Vol 44:12489) previously found a high completion rate for acquaintance chains started by whites when the target person was white vs black. Results of the present study rule out the explanation that lower completion rate to blacks was due to lack of information as to the target person's race; in fact, white "starters" reached black targets more readily than white targets.

5038. Kugelmass, Sol; Liebllich, Amia & Bossik, Dorit. (Hebrew U, Jerusalem, Israel) **Patterns of intellectual ability in Jewish and Arab children in Israel.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 184-198.—Tested a total of 82 Arab children in kindergarten and Grade 1 on an Arabic translation of the Wechsler Preschool and Primary Scale of Intelligence. The subtest profiles were compared to those of a relevant subsample of the Israeli Jewish normative national sample. The pattern for the Arab rural samples was distinctly different from that of the Jewish ethnic subsamples. These findings, which were based on the mean score analysis, were supplemented by a more extensive analysis based on the total distribution of scores. Correlational configurations of the 2 samples, however, revealed a certain invariance of the structure. The findings are related to those of previous studies. (25 ref)—*Journal abstract.*

5039. Larsen, Knud S. (Oregon State U) **A scale measuring attitudes toward black and white integration.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 111-113.—Describes the development of a Likert-type scale measuring attitudes toward black-white integration. 100 items were selected from a larger pool, with the use of criteria for good attitude scale statements. After item analysis, 20 items were retained having part-whole correlations greater or equal to .56. The reliability and validity study showed a corrected split-half correlation coefficient of .85, and moderate validity coefficients.—*Journal abstract.*

5040. Lüscher, Kurt K.; Ritter, Verena & Gross, Peter. **Early child care in Switzerland.** *Early Child Development & Care*, 1973, Vol 3(2, Mono 4), 89-210.—Surveys Switzerland's child-rearing attitudes and practices from a sociological viewpoint. Among topics discussed are the training of child-care workers, the nature of the family, socialization techniques, and current child development research.

5041. May, Gerald G. **The psychodynamics of spirituality.** *Journal of Pastoral Care*, 1974(Jun), Vol 28(2), 84-91.—Clergymen and other psychotherapists have difficulty incorporating spirituality into their work and in dealing openly with it, perhaps because spirituality, considered as a basic human drive, is subject to psychodynamic influences which may be either healthy

or destructive. Evidences of society's need for increased spiritual experience, and "taboo" aspects of spirituality are discussed. Inadequate spiritual training for clergymen is seen as being a result of personal and societal defenses against spirituality. It is suggested that more honest, critical appraisal is needed to lay a groundwork for spiritual development.—*B. Smith.*

5042. Miller, Gary H. & Agnew, Neil. (York U, Counseling & Development Ctr, Downsview, Ontario, Canada) **The Ledermann model of alcohol consumption: Description, implications and assessment.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 877-898.—Examined the mechanics of the S. Ledermann model of the consumption of alcoholic beverages and its adequacy as a descriptive and predictive tool. The model may be useful to approximate consumption in different populations, but it is inadequate to predict changes within 1 population when mean consumption changes. Deficiencies of the model are discussed with statistics from France, Sweden, and Canada. (16 ref)

5043. Muir, Donald E. (U Alabama) **Through the school-house door: Trends in integration attitudes on a deep-South campus during the first decade of desegregation.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 113-121.—4 surveys of 3,586 white undergraduates' attitudes conducted at 3-yr intervals reflect an increasing acceptance of blacks and approval of desegregation in all areas. While blacks are accepted as political and economic equals, they are not accepted as roommates, social intimates, or dates. Results indicate a rapidly decreasing social distance between races and a rejection of racial roles once the setting has been politically neutralized.—*R. V. Heckel.*

5044. Pressel, Esther. (Colorado State U) **Umbanda trance and possession in São Paulo, Brazil.** In F. D. Goodman, J. H. Henney & E. Pressel, *Trance, healing, and hallucination: Three field studies in religious experience.* New York, NY: John Wiley & Sons, 1974. xxiii, 388 p.—Examines the behavior of individuals who are trance mediums. Case histories are presented and analyzed. An hypothesis is suggested that Umbanda represents a religious innovation related to socioeconomic changes in Brazil during the last 50 yrs.

5045. Pruyser, Paul W. (Menninger Foundation, Topeka, KS) **Between belief and unbelief.** New York, NY: Harper & Row, 1974. xvii, 301 p. \$10.—Presents a phenomenological analysis of religious belief, emphasizing how both religious belief and its rejection are states of alienation based on conflicting views of society. Various existential themes, including mystery, options, fantasy vs reality, and "Providence," are explored in relation to their function as ways of dealing with life themes. (14 p ref)

5046. Ramirez, Manuel & Price-Williams, Douglass R. (U California, Riverside) **Cognitive styles of children of three ethnic groups in the United States.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 212-219.—Administered the rod-and-frame test to 60 Anglo-American, 60 Mexican-American, and 60 black 4th graders attending Catholic parochial schools. Results show that blacks and Mexican-Americans scored in a significantly more field-dependent direction than Anglo-Americans. Females in all 3 groups were more field



dependent than males. Results confirm previous findings that members of groups which emphasize group identity and respect for family and religious authority, and which are characterized by shared-function family and friendship groups, tend to be field-dependent in cognitive style. In contrast, members of groups which encourage questioning of convention and an individual identity, and which are characterized by formally organized family and friendship groups, tend to be more field independent.—*Journal abstract.*

5047. Saffady, William. (Wayne State U) **Fears of sexual license during the English Reformation. *History of Childhood Quarterly: The Journal of Psychohistory*, 1973(Sum), Vol 1(1), 89-97.**—Argues that in 16th century England unconscious factors were involved in the resistance to Anabaptists and Sacramentarians which were based on the anxiety provoked by the threat of releasing repressed instincts. (48 ref)

5048. Solnit, Albert A. (Yale U, Child Study Ctr) **A summing up of the Dakar conference: "Care for your children as you wish them to care for your grandchildren."** In E. J. Anthony & C. Koupennik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Summarizes conference discussions on anthropological theories of family function and structure; world views of urbanization; biochemical cycles and linkages of biogenic amines; the child's resiliency, resources, vulnerabilities, and risks; and an awareness of ever-changing societal and cultural forces and patterns.

5049. Taylor, Donald M. & Jaggi, Vaishna. (McGill U, Montreal, Quebec, Canada) **Ethnocentrism and causal attribution in a south Indian context. *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 162-171.**—30 Hindu adults in India read paragraphs describing socially desirable or undesirable behavior performed by ingroup (Hindu) or outgroup (Muslim) members. Ss were then asked to attribute the behavior to internal or external causes. It was found that Ss made internal attributions when ingroup members performed socially desirable acts and external attributions for undesirable acts. The converse was true for attributions made when the same behavior was performed by Muslims. Results are discussed in terms of the importance of attribution theory principles for studying prejudice and the relationship between attitudes and behavior. (16 ref)—*Journal abstract.*

5050. Trivedi, Harshad R. & Malhotra, Prabha. **Magical significance of perinatal beliefs and practices in rural Delhi. *Indian Journal of Social Work*, 1974(Apr), Vol 35(1), 35-40.**—Presents folk beliefs and practices relating to childbirth, compiled from various agricultural and nonagricultural castes. Both pre- and postnatal customs are included. A theoretical framework is given, as are ways of analyzing some of the trends of the beliefs.

5051. Turnbull, Colin M. (Virginia Commonwealth U) **Normality and tribal society.** In E. J. Anthony & C. Koupennik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Describes the child-rearing practices of 2 African tribes to illustrate the hypothesis that cultural factors affect a society's concept of normality.

5052. Turner, Barbara F. & Turner, Castellano B. (U Massachusetts, Amherst) **Evaluations of women and men among black and white college students. *Sociological Quarterly*, 1974(Sum), Vol 15(3), 442-456.**—L. Rainwater's 1966 assertion that blacks have low self-evaluations because they receive more negative evaluations from other blacks than whites receive from other whites is challenged here by reference to P. Heiss and S. Owens's 1972 evidence that negative self-evaluation among blacks is limited to work-related traits. Substantial support was found for the major hypotheses that, compared to whites, blacks would report more negative evaluation of "most men" but not of "most women" (since the provider role is traditionally ascribed primarily to men), and that the more negative evaluation of "most men" by blacks would be limited to work-related traits. Data were obtained from 59 black and 82 white freshmen at a large university. (23 ref)—*Journal abstract.*

5053. Waters, John J. James Otis, Jr.: **An ambivalent revolutionary. *History of Childhood Quarterly: The Journal of Psychohistory*, 1973(Sum), Vol 1(1), 142-150.**—Discusses Otis's reactions to authority in childhood and their similarities to his reaction to British rule in the 1760s. (33 ref)

### Social Issues & Social Processes

5054. Abramowitz, Stephen I. (Vanderbilt U, Interuniversity Psychological & Counseling Ctr) **Personality, the sociocultural environment, and student political activism: Toward a field theory of social behavior. *Journal of Psychology*, 1974(Sep), Vol 88(1), 103-112.**—Assessed the suitability of a field-theoretical, social psychological model for understanding student political activism. 95 undergraduates provided information on their political involvements and also on certain personality dispositions and social environments which are implicated in the theoretical literature as conducive to them. Both the individual difference and the sociocultural predictor constellations explained an appreciable amount of variation in the political activity criteria. Evidence was then adduced to support the field-theoretical position that personality and social environment variables account for supplementary rather than overlapping segments of the variation in campus unrest. The results call into question the appropriateness of unidimensional or unidisciplinary approaches to understanding the activism phenomenon and suggest the likely futility of intervention programs based on them. They reinforce previous findings consistent with a field-theoretical explanation of complex social behavior. (29 ref)—*Journal abstract.*

5055. Adamek, Raymond J. (Kent State U) **Abortion, personal freedom, and public policy. *Family Coordinator*, 1974(Oct), Vol 23(4), 411-419.**—Discusses the recent success of the abortion "reform" movement in the US and its relationship to the American value system. A review of the arguments and data pro-abortionists have utilized to establish present policy suggests that this rather extreme solution to personal and social problems has been adopted without adequate evidence as to its necessity, efficacy, or desirability. Some alternate perspectives and solutions are suggested.—*Journal abstract.*

5056. Aldridge, Delores P. (Emory U) **Problems and approaches to black adoptions.** *Family Coordinator*, 1974(Oct), Vol 23(4), 407-410.—Discusses some misconceptions about the adoption of black children and adoptions by black families. It is considered that the real problem is not with the black children or the potential black parents, but rather with agencies in the field of adoption. Social agencies need to devise new and different approaches for becoming more responsive to the needs of black children. Policies and practices of these agencies should be refocused and combined with the reorientation and training of the staff members in the culture of black families. An economic investment in new approaches to adoption is vital.—*Journal abstract.*

5057. Babad, Elisha Y. (Hebrew U Jerusalem, School of Education, Israel) **SES differences in effects of brief social satiation.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 153-164.—2 previous studies which supported a cognitive interpretation of the social deprivation-satiation effect with middle-class children were replicated with lower-class Ss. In Exp I 40 middle-class and 40 lower-class 3rd graders were given a social deprivation or a satiation treatment, followed by a binary discrimination test given either by the same or by another E. In Exp II 74 middle-class and 74 lower-class Ss were given information about their E's "reinforcing habits" prior to the treatment, and both treatment and test were given by the same E. It was found that for middle-class samples, the deprivation-satiation effect was person-specific, not generalizable from one E to another; the informational input caused a deprivation-satiation-like effect and modified the effect of actual treatments on subsequent performance. The lower-class Ss reacted mostly to the most immediate, salient, and concrete aspects of the situation. The intangible reinforcing stimulus word "good" was an effective reinforcer for them, but only a nonsignificant trend toward a deprivation-satiation effect was observed, with no person-specificity. The informational input had no effect on the performance of the lower-class children. (26 ref)—*Journal abstract.*

5058. Bakshis, Robert et al. (Illinois State U) **"Meanings" toward death: A TST strategy.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 161-179.—Describes a new method for operationalizing attitudes toward death using the Twenty Statements Test format. A theoretical rationale and empirical data are presented. Responses to the "What is Death?" question were obtained from 79 nurses. 17 categories were generated from a content analysis of these responses. Coding reliability checks produced substantial agreement. Ss expressed varied and contradictory meanings toward death which included religious and nonreligious as well as favorable and unfavorable attitudes. The strategy appears appropriate for tapping the social, symbolic, and contradictory meanings of death. (38 ref)—*Journal abstract.*

5059. Barlett, Dorothy L.; Drew, Pamela B.; Fahle, Eleanor G. & Watts, William A. (U California, Berkeley) **Public exposure to a presidential campaign appeal.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 264-270.—Examines the hypothesis that during political campaigns people seek information that reinforces their own position and avoid dissonant or challenging information.

Explanations are offered for conflicting data in regard to the hypothesis, and results of a study conducted prior to the 1972 presidential election are reported.

5060. Bejerot, Nils & Maurice-Bejerot, Carol. (Inst Karolinska, Sweden) **[Methods of studying prevalence and incidence of drug abuse.]** (Fren) *Toxicomanies*, 1974(Apr-Jun), Vol 7(2), 123-134.—Briefly describes different methods used to study the frequency of drug abuse and discusses the advantages and disadvantages of each. The detection and interpretation of injection marks is a particularly useful method that can be employed to follow the course of an epidemic. (French summary) (55 ref)

5061. Brody, Eugene B. (U Maryland, Medical School, Baltimore) **Mental health and population control.** *MH*, 1974(Win), Vol 58(1), 12-14.—Proposes that clearly defined Federal science policies need to be integrated with clearly defined Federal responsibility for the public health if adequate and humane answers are to be found for curbing human population growth. Systematic examination of this issue by mental health leaders is urged.

5062. Brown, Don W. (U California, Riverside) **Adolescent attitudes and lawful behavior.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 98-106.—Tested the hypothesis that constrained orientation toward law is a function of individual salience toward law. A stratified sample of 261 adolescents (grades 7-12) responded to a salience toward law scale. Results show high negative correlations between criterion measures of salience toward law and noncompliance with the law, and vice versa. (18 ref)

5063. Brunswick, Ann F. & Tarica, Carol. (Columbia U, School of Public Health) **Drinking and health: A study of urban black adolescents.** *Addictive Diseases*, 1974, Vol 1(1), 21-42.—Data from a representative sample of 659 12-17 yr old black boys and girls indicate that drinkers were more likely to report 16 out of 51 health problems. The linkage between drinking and poor health was most notable among younger boys and older girls. Drinkers worried more and reported more sleep disturbance. In multivariate analysis, smoking was the strongest predictor of drinking for boys, and early pregnancy was the strongest predictor for girls. A combination of life-style behavior, psychosomatic problems, and worries explained 40% of the variance in boys' drinking and 30% in girls' drinking.—*Journal abstract.*

5064. Cairns, Leonard G. & Bochner, Stephen. (U Sydney, NSW, Australia) **Measuring sympathy toward handicapped children with the "lost-letter" technique.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 89-91.—300 stamped and addressed letters were "lost" in public places. The manipulation consisted of varying the addresses on the envelopes, there being 5 experimental and 1 control condition, each with an *n* of 50. In the experimental conditions, the letters were addressed to groups concerned with the welfare of handicapped children, whereas the control was simply the Children's Aid Group. The response rate in 4 of the 5 experimental conditions was greater than in the control condition, thereby providing evidence for the predictive validity of the "lost-letter" technique.—*Journal abstract.*



5065. Carlin, Albert S. & Post, Robin D. (U Washington) **Drug use and achievement.** *International Journal of the Addictions*, 1974, Vol 9(3), 401-410.—Interviewed 226 20-41 yr old Ss about their goals, educational experiences, and current occupational status. Ss were classified according to frequency of marihuana use and extent of experience with other hallucinogenic drugs. Data show that both marihuana use and hallucinogenic experience are inversely related to employment, successful completion of school, and present enrollment in school. Years of education completed varied inversely with the amount of marihuana used and previous psychedelic drug experience. Ss with no previous marihuana experience tended to express more achievement goals and fewer vague or absent goals than Ss who had used marihuana. Goal setting varied as a function of the decision to use drugs rather than the amount of drugs used. Implications for the existence of an "amotivational" syndrome in drug users are discussed.—L. Gorsey.
5066. Chapman, Clyde & Risley, Todd R. (U Kansas) **Anti-litter procedures in an urban high-density area.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 377-383.—Notes that in urban high-density areas, litter has become an increasingly obvious and pervasive problem. In the present study, repeated measures of the amount of litter on randomly selected yards in an urban low-income housing project were used to evaluate the effectiveness of a series of antilitter procedures directed at the 132 4-13 yr old children residing in the project. Paying children for volume of trash collected resulted in only a small decrease in the number of litter pieces present. Paying them for cleaning assigned yards markedly decreased the level of litter in all sampled yards. Thus, children can be employed to maintain a clean neighborhood in spite of the rapid accumulation of new litter in urban yards.—*Journal abstract.*
5067. Chaubey, Nageshwar P. & Sinha, Durganand. (U Allahabad, India) **Risk-taking and economic development.** *International Review of Applied Psychology*, 1974(Apr), Vol 23(1), 55-61.—Administered to 40 rural Ss Chaubey's (1962) opinion questionnaire, which consists of 8 risky situations in a rural context. Results substantiate the hypothesis of a close association between moderate risk-taking and rapid economic development. In a related study, a close relationship was found between achievement motivation and intermediate risk-taking; the same result has been obtained by others. In developing countries like India, a willingness to accept power, to use new things, to control population, and to take up challenging jobs are the most essential requirements of rapid economic development. However, caution is expressed against generalizing these results.—L. A. Ostlund.
5068. Clark, Terry N. **Community power and decision-making.** *Current Sociology*, 1972, Vol 20(2), 6-56.—Reviews recent trends in the study of community power and decision-making based on references in I. P. Leif's (1972) extensive annotated bibliography (see PA, Vol 53:Issue 2). An important tendency during the past decade has been to see the community in the context of more general theoretical frameworks and not as a closed system. (French summary)
5069. Connor, John W. (California State U, Sacramento) **Acculturation and changing need patterns in Japanese-American and Caucasian-American college students.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 293-294.—To assess the degree of acculturation among Japanese-Americans, Edwards Personal Preference Scale scores were compared for Japanese-American college students, Caucasian students, and Edwards's 1952 normative college sample. Results indicate that while some acculturation had taken place among the Japanese-Americans, their scores still expressed a significantly higher need for order, affiliation, abasement, and nurturance and a significantly lower need for intraception, change, and heterosexuality than those of the Caucasian student sample.
5070. Cormier, Dollard. (U Montreal, Quebec, Canada) **[Personal inhibitions in the transfer from cannabis to hard drugs.]** (Fren) *Toxicomanies*, 1974(Apr-Jun), Vol 7(2), 135-145.—Discusses similarities between users of hard drugs and users of soft drugs, such as cannabis, that would facilitate or prevent transfer from one kind of drug to the other. In particular, the social insecurity characteristic of cannabis users seems to inhibit the use of hard drugs. The relevance of the concepts of self-perception and self-actualization is also considered. Soft and hard drug users are not identical and only the more disturbed members of the 1st group turn towards hard drugs. (French summary)—*English summary.*
5071. Cunningham, William H.; Cunningham, Isabella C. & English, Wilke D. (U Texas, Graduate School of Business, Austin) **Sociopsychological characteristics of undergraduate marijuana users.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 3-12.—Studied 547 undergraduates to determine if marihuana users could be successfully differentiated from nonmarihuana users on the basis of 8 sociopsychological, 10 demographic, and 4 behavioral variables. Results indicate that marihuana smokers were less conservative, more cosmopolitan, more politically discontent, less dogmatic, less status conscious, less socially responsible, and less fundamental than nonsmokers of marihuana. Marihuana smokers also had fathers with higher-status occupations, families with higher social class positions in the community and more expensive homes, and mothers with less outside employment, and were less religiously oriented than nonsmokers. There was a positive relationship between the use of marihuana and the use of amphetamines, barbiturates, hallucinogens, heroin, and cocaine. It is suggested that individuals who have tried marihuana are more likely to experiment with stronger drugs than are individuals who have not tried the drug. (16 ref)—*Journal abstract.*
5072. Davidson, F.; Etienne, M. & Piesset, J. (INSERM, Medico-Social Research Div, Paris, France) **Medico-social survey of 662 drug users (April 1971-May 1972).** *Bulletin on Narcotics*, 1973(Oct-Dec), Vol 25(4), 9-32.—Studied 662 drug users as to their travels abroad, difficulty in contacting a treatment center, changes in drug usage, hospitalizations, suicide attempts, etc.
5073. Davies, Martin. **Social inquiry for the courts: An examination of the current position in England and Wales.** *British Journal of Criminology*, 1974(Jan), Vol 14(1), 18-33.—Argues that the growth of presence

social inquiry reporting has been associated with the concept of individualized sentencing. The use of such reports is seen as one of the most important penal developments of the 20th century, reflecting the increasing involvement of the probation service in the sentencing process. (22 ref)

5074. Erskine, Hazel. **The polls: Fear of violence and crime.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 131-145.—Reviews the 1965-1973 trends in public opinion about crime, social protest, and racial unrest. Data are presented according to geographic region, sex, education, age, family income, religion, political affiliation, size of community, occupation, polling organization, and other variables.

5075. Fillmore, Kaye M. (Rutgers State U, Ctr of Alcohol Studies, New Brunswick) **Drinking and problem drinking in early adulthood and middle age: An exploratory 20-year follow-up study.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 819-840.—Measured problem drinking and the quantity and frequency of drinking in a stratified sample of 109 men and 97 women 20 yrs after they were originally studied as undergraduates. It is concluded that although there is a strong tendency toward moderate drinking with increased age, early problem drinking is significantly associated with the existence of problem drinking 20 yrs later. (15 ref)

5076. Glenn, Norval D.; Ross, Adrean A. & Tully, Judy C. (U Texas, Austin) **Patterns of intergenerational mobility of females through marriage.** *American Sociological Review*, 1974(Oct), Vol 39(5), 683-699.—A comparison, based on data from 4 US national surveys (1966, 1968, 1970, and 1972), of female mobility through marriage with male mobility through occupational attainment indicates (a) no tendency toward hypergamy not explained by the favorable balance of upward over downward mobility among males, (b) a weaker relationship of origin to destination among females, (c) a pronounced male mobility advantage among middle-origin persons, and (d) substantially more downward mobility into the manual-farm class by females than by males. Although data indicate in general that the American status structure is more fluid than the male mobility data alone would indicate, there apparently is a condition of relative stasis among middle-origin females. (25 ref)—*Journal abstract*.

5077. Green, Robert L.; Smith, Gloria S.; Gunnings, Thomas S. & McMillan, Joseph H. (Michigan State U, Coll of Urban Development) **Black athletes: Educational, economic, and political considerations.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Oct), Vol 3(1), 38 p.—Discusses the history of black athletic protest, specifically the Big Ten Athletic Conference protest of 1972, the status of black athletes in recent college athletic programs, job and social discrimination against black athletes, and how this discrimination operates against black students in academic and interpersonal relationships. Implications for counseling blacks, the effectiveness of Equal Opportunity Employment and Affirmative Action programs, and data from a survey of black athletes in the Big Ten Conference are also examined.

5078. Greene, Bernard L.; Lee, Ronald R. & Lustig, Noel. (U Illinois, Abraham Lincoln School of Medicine) **Conscious and unconscious factors in marital infidelity.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 97-105.—Discusses some reasons given by patients for marital infidelity and some possible motivations for their behavior. Psychodynamics of the partner's reactions are also examined. 5 common motives that patients give when asked why they were unfaithful are identified and discussed: sexual frustration, curiosity, feelings of revenge or boredom, and a need for acceptance and recognition from another person. 3 major groups of unconscious motives are also considered: those involving severe psychiatric disturbance, those involving an immature personality, and those associated with neurotic conflicts. Cases are presented to illustrate these motivations, and suggestions for counseling and therapy are noted.—*L. Gorsey*.

5079. Grindstaff, Carl F. (U Western Ontario, London, Canada) **Public attitudes and court dispositions: A comparative analysis.** *Sociology & Social Research*, 1974(Jul), Vol 58(4), 417-426.—Compared attitudes toward sanctions for criminal offenses of 1,000 Canadian Ss with court sentences for personal crimes, property crimes, and crimes without victims. Results indicate that the public provides more severe punishment for crimes than are meted out by courts, suggesting a lack of value consensus between courts and public opinion.—*Journal abstract*.

5080. Grossman, Jan C.; Goldstein, Ronald & Eisenman, Russell. (Philadelphia State Hosp, North Unit, PA) **Undergraduate marijuana and drug use as related to openness to experience.** *Psychiatric Quarterly*, 1974, Vol 48(1), 86-92.—Administered a battery of tests (including the Personal Opinion Survey, the California F Scale, Manifest Anxiety Scale, the Crowne-Marlowe Social Desirability Scale, and an acquiescent response set test) to 316 college students who also reported their use of marihuana and other drugs. All reports and tests were anonymous. With increased frequency of marihuana usage, creativity and adventuresomeness scores increased significantly, while authoritarianism scores decreased significantly. Males were significantly heavier users than females, and Jews were heavier users than Protestants or Catholics. (16 ref)—*Journal abstract*.

5081. Hartnoll, Richard & Mitcheson, Martin. (Drug Research Project, Medical Research Council, London, England) **Attitudes of young people towards drug use.** *Bulletin on Narcotics*, 1973(Apr-Jun), Vol 25(2), 9-24.—Surveys studies of young people's attitudes toward drugs. Among school children a more positive attitude towards amphetamine, the most commonly used drug, is prevalent. However LSD and opiates are named as harmful by school children as well as by other users. Drug users think of themselves as "interesting" people and may look upon drugs as additional "enrichment." Users are seriously misinformed about drugs. Users are more precocious in their behavioral development. In general, the drug culture frowns upon "heavy" use. LSD and cannabis are favored in the "underground" culture and amphetamines are rejected. Drugs are part of modern life, and proper education, by credible authori-



ties, as part of the health curriculum in schools will help reduce drug abuse.—A. S. Kulkarni.

5082. Heimstra, Norman W. & McFarling, Leslie H. (U South Dakota) **Environmental psychology**. Monterey, CA: Brooks/Cole, 1974. 210 p. \$7.50.—Presents an overview of the major concepts, theories, and research concerns in environmental psychology, the relationship between man's behavior and his physical environment. Topics include aspects of the built environment (e.g., buildings, cities, and rooms), behavior and the natural environment, and the environment as a source of threat. (10 p ref)

5083. Heinrich, Hanns C. (Gesamthochschule Siegen, Huttental-Weidenau, W Germany) [Verbal attitudes and actual behavior.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 62-79.—Reviews the literature of attitude research with emphasis on empirical studies that contrast attitudes with actual behavior. Positive and negative correlations between attitudes and behavior are reported with approximately equal frequency in the literature. A number of variables are discussed which could interfere between attitudes and actual behavior. (English and French summaries) (43 ref)—W. J. Koppitz.

5084. Hirose, Hirotada. (U Tokyo, Inst of Journalism, Japan) **The structure of political culture in Japan**. *Japanese Psychological Research*, 1974(May), Vol 16(1), 8-21.—Results of a nationwide survey in Japan were used to examine the structure of political culture. 8 political scales were constructed, and several statistical techniques were applied to the data. 3 dimensions of Japanese political culture were identified—cognition toward the political system, behavioral and affective involvement with politics, and political ins-outs. 5 patterns of individuals in the structure of Japan's political culture were found: cognitive-normal, innovative, normal-somewhat-dissatisfied, conformist, and outsider types. (20 ref)—*Journal abstract*.

5085. Hood, Albert B. & Hodges, Richard T. (U Iowa, Div of Counselor Education) **The effect of a serious crime upon attitudes toward resident hall security**. *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 352-356.—Administered a questionnaire on residence hall security and security-related behavior (e.g., under what situations do students lock their doors) to 36 male and 38 female undergraduates before and 35 male and 33 undergraduates 2 wks after a brutal campus murder. Data indicate that students perceived the murder as an isolated event with little personal significance or implications. No significant differences in security attitudes and behaviors were found between Ss living in open visitation floors and those living in limited or closed floors or between residents of high and low traffic areas.—L. Gorsey.

5086. Inciardi, James A. & Newman, Sandy C. (U Miami, Medical School) **Adolescent attitudes towards drug use: A cross-sectional view of two generations**. *Addictive Diseases*, 1974, Vol 1(1), 117-130.—Discusses data on attitudes toward drug use obtained from statewide surveys conducted in 1973 with 15,400 persons above 14 yrs of age. Data were analyzed according to 5 specific age groups: 14-17, 18-24, 25-34, 35-49, and over 50 yrs. Data suggest that although contemporary

adolescents exhibit attitudes more liberal than those of society as a whole, somewhat higher proportions of positive orientations toward drug use are reflected by the young adults (18-24 yr olds) of the early 1970s. Statistics on the percentages of agreement-disagreement with 11 statements about drug usage are presented. Consensus estimates indicate that the population as a whole viewed the nonmedical use of drugs in a problematic context, although neither of the younger groups shared true positive consensus of opinion toward the use of drugs.—L. Gorsey.

5087. Inkeles, Alex & Smith, David H. (Stanford U) **Becoming modern: Individual change in six developing countries**. Cambridge, MA: Harvard University Press, 1974. xi, 437 p. \$15.—Conducted extensive interviews with over 6,000 men in 6 countries in an attempt to define what makes men modern and to assess the contribution of man's work experience to making him modern. The research design and sample structure, the development of an overall attitude-value-behavioral scale of modernity, data on the correlates and causes of modernization, and the social significance of individual modernization are discussed. (4½ p ref)

5088. Iyengar, Shanto. (Kansas State U) **Magnifying relationships between attitudinal variables using panel analysis**. *Public Opinion Quarterly*, 1974(Spring), Vol 38(1), 90-97.—Analyzed the advantages of panel research in identifying 2 types of respondents: stayers, who did not change over time, and movers, who changed randomly. Results of the 34-mo study comparing movers and stayers with regard to political criterion measures showed significant correlations between own stand and criterion measures of voting punctuality, age at which party identification took place, and index of political salience.—M. K. Phifer.

5089. Josephson, Eric. (Columbia U, School of Public Health) **Adolescent marijuana use, 1971-1972: Findings from two national surveys**. *Addictive Diseases*, 1974, Vol 1(1), 55-72.—Compared findings from 2 national surveys of 12-17 yr olds, one conducted with 498 Ss in May 1971 and the other conducted with 779 Ss in April 1972. Data show that there was no change between 1971 and 1972 in the proportions of adolescents reporting that they had ever used marihuana (15% in both years). There was also no change in the reported amount of past use. Ss from the West were twice as likely to have tried marihuana as Ss in the South; the West was the only region to have an increase in the proportion of users—from 23% in 1971 to 33% in 1972. Ss 16 and 17 yrs of age were in 1971 10 times and in 1972 7 times as likely to have used the drug as younger Ss (12 and 13 yrs old). Girls reported almost as much marihuana use as boys. More frequent users were more likely to live in metropolitan areas, to be from relatively high income families, and to have used other mood-altering drugs. Detailed data on these patterns and on the use of alcohol and cigarettes are also reported.—L. Gorsey.

5090. Kelley, Jonathan. (Yale U) **The politics of school busing**. *Public Opinion Quarterly*, 1974(Spring), Vol 38(1), 22-39.—Analyzed opinions of 1,352 non-Negro respondents toward school busing. Busing attitudes were correlated with racism, amount of education, geographic

region, socioeconomic status, and political preference. (43 ref)

5091. Kellum, Barbara A. (U Southern California) **Infanticide in England in the later Middle Ages.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Win), Vol 1(3), 367-388.—Examines new evidence on the causes and consequences of infanticide in late medieval England. It is contended that the motivation could not have been economic pressures alone; a widespread infanticidal component may have been present in the medieval personality. (6 p ref)

5092. Kirkpatrick, R. George. (U Oklahoma) **Moral indignation and repressed sexuality: The sociosexual dialectics of antipornography crusades.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 141-149.—Conducted structured and unstructured interviews with 85 leaders of antipornography crusades, 51 leaders of civil libertarian opposition to such activity, and 47 members of 2 control groups. Interview data support the hypotheses that antipornography crusaders are predominantly lower-middle-class; that crusaders are more nearly lower-middle-class than the other groups; and that crusaders are more highly suppressive of sexuality, more intolerant of deviant behavior, and more ready to inflict punishment than are comparison groups. Implications relevant to the Freudian-Marxist view of man are alluded to and the consequences for society inferred when the basic human functions of hunger and sex are suppressed. (22 ref)—B. Smith.

5093. Klein, Stanley. (Western Connecticut State U) **The final mystery.** Garden City, NY: Doubleday, 1974. 85 p. \$3.95.—Discusses the meaning of death in ancient times and in different cultures and how researchers, physicians, and surgeons have attempted to prolong life.

5094. Knoke, David. (Indiana U) **A causal synthesis of sociological and psychological models of American voting behavior.** *Social Forces*, 1974(Sep), Vol 53(1), 92-101.—Estimated a path model of the presidential vote involving social variables, party identification, issue orientations, and candidate evaluations using samples of voters from the 1964 ( $N = 1,571$ ) and 1968 ( $N = 1,673$ ) elections. Results show that social effects on voting behavior are channeled almost completely through party identification, which has the largest direct effect on the vote. Indirect effects of party identification through candidate evaluations are considerably larger than through issue orientations. The models for both years reveal similar effects, although issues and candidates were more important determinants of the vote in 1964.—*Journal abstract.*

5095. Knowles, Lyle & Poorkaj, Houshang. (Pepperdine U) **Attitudes and behavior on viewing sexual activities in public places.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 130-135.—Studied attitudes of 1,644 adults toward viewing sexually explicit activities in public entertainment facilities, and the relationship of these attitudes to the frequency with which the Ss reportedly attended such activities within the previous year. Although a positive association was found between permissiveness and viewing participation, inconsistent behavioral and attitudinal trends appeared with respect to more explicit activities and attendance. (16 ref)—*Journal abstract.*

5096. Kojak, George. (Harborview Community Mental Health Ctr, Group & Individual Treatment Section, Seattle, WA) **The American community in Bangkok, Thailand: A model of social disintegration.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1229-1233.—Suggests that the high prevalence of psychopathology (as measured by the number of marital problems and emotional problems of adolescents requiring professional care) noted in the American community in Bangkok, Thailand, during 1971-1972 was related to social disintegration. Comparison with a relatively integrated American community in Japan reveals a strikingly lower prevalence of psychopathology.

5097. Langer, William L. (Harvard U) **Infanticide: A historical survey.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Win), Vol 1(3), 353-365.—Traces the history of infanticide as a method of disposing of deformed or sickly infants and of population control. (4 p ref)

5098. Laplante, Jacques. (U Ottawa, Ontario, Canada) **[The use of drugs seen in the light of interaction.]** (Fren) *Toxicomanies*, 1974(Apr-Jun), Vol 7(2), 155-166.—Discusses transcultural studies showing that attitudes toward drug users depend on societal attitudes and customs. An objective approach to this problem would involve comparing the drug user to a normal man and assessing the extent of deviance. A subjective approach is recommended, involving description of the user as a person interacting with those around him. (French summary) (26 ref)—*English summary.*

5099. Lehnen, Robert G. & Koch, Gary G. (U Houston) **Analyzing panel data with uncontrolled attrition.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 40-56.—Analyzed 3-wave panel data collected during the 1968 presidential election campaign in Florida and North Carolina on the basis of partial candidate preference information available from some respondents and complete information obtained from others. A supplemented marginals model based on the general linear approach to categorical data analysis is extended to the situation involving incomplete time data. The final statistical models show no politically significant effects associated with the campaign (time) on the level of citizens' preferences for Hubert Humphrey, Richard Nixon, or George Wallace for 7 race and occupation classifications.—*Journal abstract.*

5100. Lemon, Nigel. (U Sussex, Brighton, England) **Training, personality and attitude as determinants of magistrates' sentencing.** *British Journal of Criminology*, 1974(Jan), Vol 14(1), 34-48.—Studied the sentencing behavior of 33 male and 22 female British magistrates, predominantly middle and upper class. The untrained group (26 Ss) were recently appointed and had about completed Stage 1 of training. The trained group (29 Ss) had completed Stage 2 training and had had at least 1 yr of experience on the bench. During a 2-hr interview each S listened to 3 tape-recorded simulated cases, indicated the sentence in each case, and gave the reasons for imposing it. Measures of the personality factor of concreteness/abstractness, and of attitudes to the law and punishment were also obtained. Results indicate various possible direct and indirect interlocking effects of personality, attitudes, and experience on the sentencing.



ing behavior of magistrates, and the implications of these findings are discussed with special reference to the 1-yr training program for magistrates.—D. R. Evans.

5101. Levenson, Hanna. (Texas A&M U) **Participation in antipollution activities and complexity of judgments about environmental degradation.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 147-148.—In 2 studies with 77 sociology students and 96 other adult Ss, C. Hovland and M. Sherif's research (1953) was replicated in investigating the hypotheses that (a) when given a fixed number of categories, people who are more involved in antipollution activities will concentrate their placement of items concerning pollution into a small number of categories and will be highly discriminating in accepting terms at their own end of the scale, and (b) when given an unrestricted number of categories, people who are more involved will sort issue statements into significantly fewer piles than less involved people. Results indicate that Ss spaced their items more evenly over the 11 categories and placed more items in the extreme categories; the 2nd hypothesis was not confirmed.—M. E. Pounsel.

5102. Liska, Allen E. (Central Michigan U) **Attitude-behavior consistency: Reply to Magura.** *American Sociological Review*, 1974(Oct), Vol 39(5), 762-763.—Responds to S. Magura's (see PA, Vol 53:Issue 3) criticisms of the author's suggestions for a classification of attitude-behavior research. Support for the 3 components of the classification is presented, and the forms used to present the various conceptualizations of consistency and interaction in attitude-behavior studies are clarified.

5103. Loftin, Colin & Hill, Robert H. (Brown U) **Regional substructure and homicide: An examination of the Gastil-Hackney thesis.** *American Sociological Review*, 1974(Oct), Vol 39(5), 714-724.—2 studies of regional variation in US homicide rates by S. Hackney (1969) and R. D. Gastil (1971) have been interpreted as verifying the hypothesis that high levels of interpersonal violence which characterize the Southern region result largely from cultural factors independent of situational variables. The present author argues that their estimates are based on poor measurement and are biased in the direction of the culture of violence hypothesis. (29 ref)

5104. Magura, Stephen. (Rutgers State U) **A comment on "attitude-behavior consistency . . ."** *American Sociological Review*, 1974(Oct), Vol 39(5), 761-762.—Considers that A. E. Liska's (see PA, Vol 52:10083) suggestion for a threefold classification of attitude-behavior research is actually composed of only 2 elements, since his consistency and interaction conceptualizations are identical. Liska's interaction model is nothing but an additive model with a negative sign.

5105. Mantell, David M. (Wheeler Affiliates, Plainville, CT) **Doves vs hawks: Guess who had the authoritarian parents?** *Psychology Today*, 1974(Sep), Vol 8(4), 56-62.—Interviewed 25 draft resisters and 25 Green Berets. The resisters came from higher socioeconomic class homes and had better educated parents than the Green Berets. The parents of the Green Berets demanded obedience and compliance while those of the resisters offered rational explanations of actions and views. The Green Berets tended to adopt their parents' views with

little thought while the resisters carefully considered their commitments. Other differences are described which further strengthen the conclusion that the willingness to use violence is a product of an authoritarian home life in childhood.—E. J. Posavac.

5106. Murtagi, P. K. (D. G. Ruparel Coll, Bombay, India) **Attitude change: Impact of training for democracy.** *Indian Journal of Social Work*, 1974(Apr), Vol 35(1), 47-56.—Administered a scale measuring antidemocratic and fascist tendencies, based on the California Fascism Scale, to 25 young adults 20-30 yrs old in a training in democracy program, both before and after training. Among the findings were that antidemocratic tendencies were lower after training. The influence of the training was greatest in reducing militancy, conservatism, and reactionary tendencies, moderate in reducing criminality, violence, and desire to suppress democratic ideas, and lowest in changing unfavorable attitudes towards minorities.—I. W. Kidorf.

5107. Nelson, Stephen D. (U Michigan, Inst for Social Research) **Nature/nurture revisited I: A review of the biological bases of conflict.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 285-335.—Considers that biologically oriented approaches to the study of human conflict have thus far been limited largely to the study of aggression. A sample of the literature on this topic is reviewed, drawing upon 4 major approaches: comparative psychology, ethology, evolutionary-based theories, and human physiology. More sophisticated relationships between so-called "innate" and "acquired" determinants of behavior are discussed, along with the proper relevance of animal behavior studies for human behavior. Unless contained in a comprehensive theory which includes social and psychological variables, biologically oriented theories (although often valid within their domain) offer at best severely limited and at worst highly misleading explanations of complex social conflicts. A list of several positive contributions of these biological approaches is presented. (5 p ref)—*Journal abstract*.

5108. Nutt, Roberta L. & Sedlacek, William E. (U Maryland, Counseling Ctr) **Freshman sexual attitudes and behavior.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 346-351.—Administered an anonymous questionnaire to 752 college freshmen on sexual behavior and attitudes. Data were analyzed according to sex and whether Ss had had sexual intercourse. Results show less of a gap between behavior and attitudes than in previous studies. Ss who had had sexual experience had more liberal personal and ideal sexual codes and held stronger beliefs that contraceptive availability does not increase promiscuity and that abortions should be available without parental consent than Ss with no sexual experience. Males held more liberal personal and ideal codes, were less likely to know any homosexuals, and were more likely to think that homosexuals need psychological help than females. There were no significant Sex  $\times$  Sexual Experience interactions. Factor analysis yielded 2 factors accounting for 85% of the variance, one which loaded with items dealing with S's sexual identity and the other dealing with sexual codes and personal expectations.—L. Gorsey.

5109. O'Keefe, Timothy. (Florida Technological U) **Sometime allies: The mass media and drug abuse**

education.] (Fren) *Toxicomanies*, 1974(Apr-Jun), Vol 7(2), 91-121.—Discusses the role of mass communication in drug abuse education. The usefulness of mass media in controlling drug abuse and suggestions for more effective use of such approaches are considered. The chief influence of the media appears to be reinforcement of attitudes previously acquired through the other, more persuasive, methods of communication. (French & English summaries) (38 ref)—R. L. Cook.

5110. O'Leary, Virginia E. (Oakland U) **Some attitudinal barriers to occupational aspirations in women.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 809-826.—Presents a review of the literature on those attitudinal barriers which may interact to inhibit the woman worker from engaging in the kinds of achievement-directed behavior necessary to ensure her promotion into managerial positions. Some of these factors (e.g., societal sex role stereotypes and attitudes toward competency in women) are external to the woman herself but may create barriers to her job-related aspirations. Internal factors include fear of failure, low self-esteem, and role conflict as well as perceived consequences and incentives for engaging in achievement-related behaviors. Implications for further research and application of these findings are discussed. (122 ref)—*Journal abstract*.

5111. Olshavsky, Richard W. & Summers, John O. (Indiana U, Graduate School of Business) **A study of the role of beliefs and intentions in consistency restoration.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 63-70.—Studied the relationships among beliefs, knowledge, intentions, and behavior of 108 undergraduate and graduate cigarette smokers. Ss were administered a 3-part questionnaire: Section 1 contained 103 beliefs which could serve as reasons for continued smoking; Section 2 consisted of 25 questions on various characteristics of the smoker, his smoking pattern, and his future intentions regarding smoking; and Section 3 tested the Ss' knowledge of the specific health dangers of cigarette smoking. Results suggest that consistency was restored by stating an intention to quit or by espousing beliefs, some of which evidenced factual or reasoning distortions. (19 ref)—*Journal abstract*.

5112. Osborne, J. Grayson; Powers, Richard B. & Anderson, Emmett G. (Utah State U of Agriculture & Applied Science) **A lottery to stop littering.** *Psychology Today*, 1974(Aug), Vol 8(3), 65-66.—Compared the effectiveness of moral exhortations against littering with 2 incentive programs: (a) payment of \$.25 per filled litter bag and (b) one chance per filled litter bag to win \$20. While only .4% of the visitors to the experimental site participated in the programs, both programs significantly decreased the litter. The lottery approach is cheaper than the payment plan, is easily administered, and could help keep parks clean inexpensively.—E. J. Posavac.

5113. Pierce, Charles H. & Risley, Todd R. (U Waterloo, Faculty of Human Kinetics & Leisure Studies, Ontario, Canada) **Recreation as a reinforcer: Increasing membership and decreasing disruption in an urban recreation center.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 403-411.—It is presumed that recreation activities have a variety of functions for people, from tension reduction to citizenship development; however, a recreation activity's most empirically

obvious function is as a reinforcer. The present 2 experiments with black 7-25 yr olds demonstrate how 2 recurrent problems of urban recreation programs—recruitment of members and reduction of disruptive behaviors within the program—can be handled simply by contingently adjusting the amount of time the recreation activities are available. When extra time in the recreation center was provided to those youths who brought new members, dramatic increases in membership were achieved. When the closing time for each evening's recreation program was publicly moved forward by a few minutes for each offense, disruptive behaviors were nearly eliminated. It is concluded that recreation used as a reinforcer can improve the basic operation of a recreation center and might similarly enhance other presumed and desired functions of recreation. (21 ref)—*Journal abstract*.

5114. Pizer, Stuart A. & Travers, Jeffrey R. (Harvard U) **Psychology and social change.** New York, NY: McGraw-Hill, 1975. ix, 180 p. \$4.95.—Presents a discussion of the processes and effects of social change in individuals, small groups, institutions (specifically, prisons and mental hospitals), and society (emphasizing contemporary socialization practices and their effects on children). (7½ p ref)

5115. Plant, Martin A. & Reeves, Charles E. (U Southampton, England) **The group dynamics of becoming a drug taker.** *Interpersonal Development*, 1973-1974(Aug), Vol 4(2), 99-106.—2 independent British studies examined the group dynamics of drug use in 2 geographical areas. The 2 respondent samples of 122 and 200 Ss, respectively, were located by a nonrandom method called "snowballing." Many of those interviewed were young, unmarried, and living away from their parental homes. Some were females, and most had used several types of drugs. Evidence indicates that most of those observed and interviewed became drug takers through group processes (i.e., by peer pressure and the encouragement of close associates) rather than as a result of individual pathology. Users became drug takers as a positive affirmation of values and behavior. Again, as influenced by group forces and social roles, membership of drug-taking coteries was often temporary or sporadic. (15 ref)—*Journal abstract*.

5116. Podmore, David & Chaney, David. (U Aston, Management Ctr, Birmingham, England) **Educational experience as an influence on "modern" and "traditional" attitudes: Some evidence from Hong Kong.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 139-140.—On 11 attitude statements, it was hypothesized that young people in Hong Kong with (a) some secondary education would be relatively "modern" compared with those without secondary education, (b) some higher education would be relatively "modern" compared with those without higher education, and (c) an education exclusively in Anglo-Chinese schools would be relatively "modern" compared with those with an education exclusively in Chinese schools. Results confirm hypotheses.

5117. Rokeach, Milton. (Washington State U) **Change and stability in American value systems, 1968-1971.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 222-238.—Employed the Rokeach Value Survey to measure the



values in an area probability sample of 2,839 adult Americans over the 3-yr period 1968-1971. Most values remained stable, but some underwent significant change. Increasing in importance were values of world peace, beauty, equality, mature love, and a logical approach to problem solving. Declining in importance were the values of a comfortable life, personal accomplishment, family security, social recognition, and cleanliness. To determine whether the changes were manifested in all segments of American society, the value rankings were broken down on the basis of sex, race, income, education and age. (19 ref)—*M. K. Phifer.*

5118. Rosen, R. A.; Werley, H. H.; Ager, J. W. & Shea, F. P. (Wayne State U) **Health professionals' attitudes toward abortion.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 159-173.—Presents results of a 1971 survey of attitudes toward abortion of 20,000 health professionals. Medical students and social work professionals were most favorable toward abortion; nursing faculty members and Catholic health professionals were least favorable. The chief reason given for favoring abortion was protection of the health of the mother; those not in favor stressed the importance of preserving life after conception.—*M. K. Phifer.*

5119. Rosenberg, Janis S.; Kasl, Stanislav V. & Berberian, Rosalie M. (Yale U) **Sex differences in adolescent drug use: Recent trends.** *Addictive Diseases*, 1974, Vol 1(1), 73-96.—Identified sex differences in preferred illicit drugs and trends in use over time for large samples of junior and senior high school students ( $N = 8,700$ ). Current use and lifetime prevalence were anonymously reported by 2 comparable samples 1 yr apart. Between survey years the number of females who "ever used" a drug increased significantly for 9 out of 11 drug categories while the number of males increased in only 3 categories. "Current" usage remained fairly stable for both sexes. Although the females' overall use was more similar to the males' in 1971-1972 than in 1970-1971, the more recent data suggest the following preferences for certain drugs by sex: (a) More males than females had either "ever used" or were current users of alcohol, marihuana, hashish, glue, and heroin. (b) More females were current users of amphetamines and barbiturates. Variations due to grade in school, race, and school type are also reported. (25 ref)—*Journal abstract.*

5120. Ruitenbeek, Hendrik M. **The new sexuality.** New York, NY: New Viewpoints, 1974. 174 p. \$10.—Traces changing attitudes toward sexuality from Victorian times to the present. The idea that the so-called "perversions" belong to the wide variety of legitimate sexual experiences, the weakened role of the male in the American family, and the need for more research on sexuality and sexual behavior are discussed. (11 p ref)

5121. Sanders, Mark; Gustanski, Jerry & Lawton, Mike. (California State U, Northridge) **Effect of ambient illumination on noise level of groups.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 527-528.—Varied the ambient illumination level in a natural setting. Unobtrusive measures of the noise produced by groups of people gathering in the area revealed a significant ( $p < .001$ ) reduction in noise under the low-illumination condition.

5122. Schonberg, William B. (Muskingum Coll) **Modification of attitudes of college students over time:**

1923-1970. *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 107-117.—Reports results of the 6th administration of the Pressey X-O Test (1927, Form B) to students at a midwestern university. This administration was designed to measure the effects that cultural events have had on modifying attitudes regarding wrongs, worries, and interests of college students from 1962 to 1970. The increasing liberalization in terms of "wrongs" that earlier investigators found continued to prevail, primarily for the younger classes. Also prevalent was the decreasing number of words marked as "wrongs" from freshman to senior year. Unlike earlier studies using this test, there was a consistent increase in the average number of items worried about for all of the 1970 groups. A downward trend was also observed from freshman to senior year. It is suggested that today's college students are more accepting regarding personal shortcomings, while at the same time are more demanding of society as a whole. They also felt more helpless and lonely than other generations tested and were more fearful of the actions of others.—*Journal abstract.*

5123. Schubert, Glendon. (U Hawaii) **The judicial mind revisited: Psychometric analysis of Supreme Court ideology.** New York, NY: Oxford University Press, 1974. xv, 183 p. \$9(cloth), \$4.95(paper).—Presents an analysis of policy development by the US Supreme Court from 1946 to 1969 in terms of the similarities, continuities, and differences in policies of the individual judges. Detailed comparisons of statistical analysis procedures (principal components, oblique factor, and smallest space analyses) for the same data matrices are presented, along with a proposed theory of political ideology based on psychological concepts, and representations of judicial ideal-points derived from multivariate computer analyses in a set of physical (Euclidean) models.

5124. Segal, Bernard. (Murray State U) **Drug use and fantasy processes: Criterion for prediction of potential users.** *International Journal of the Addictions*, 1974, Vol 9(3), 475-480.—Attempted to predict drug use by using a set of 14 predictor variables, derived from responses to B. Segal and G. Feger's Drug Use Survey and Imaginal Process Inventory, against 2 discrete criteria—ever used vs never used drugs. Ss were 330 undergraduates, 185 of whom had never used drugs and 145 who reported the use of drugs 1 or more times. Significant differences were found between the 2 groups on all 14 variables. Drug users revealed a greater frequency of daydreaming, frightened reactions to daydreams, visual imagery and thinking about the past in daydreams, curiosity in impersonal-mechanical events, and a greater interest in talking about fantasies. Nondrug users showed fewer of these tendencies, but reported more hostile daydreams and more daydreams dealing with interpersonal events. An analysis of hits and misses obtained by the discriminant equations indicated that 129 (70%) of the nondrug users were correctly predicted as to group membership.—*L. Gorsey.*

5125. Smart, Reginald G. & Whitehead, Paul C. (Addiction Research Foundation, Toronto, Ontario, Canada) **The uses of an epidemiology of drug use: The Canadian scene.** *International Journal of the Addictions*, 1974, Vol 9(3), 373-388.—Presents a review of the uses and findings of epidemiological studies of Canadian



drug use patterns. 6 purposes of epidemiological studies are identified: (a) to diagnose the health of the community, (b) to identify the workings of health services, (c) to determine the individual risks, (d) to depict the clinical picture and natural history of a medical problem, (e) to identify certain syndromes, and (f) to search for causes. Findings from studies conducted for each of these purposes are reviewed, and methodological issues are discussed. (40 ref)—*L. Gorsey.*

5126. Smart, Reginald G. & Whitehead, Paul C. **The prevention of drug abuse by lowering per capita consumption: Distributions of consumption in samples of Canadian adults and British university students.** *Bulletin on Narcotics*, 1973(Oct-Dec), Vol 25(4), 49-55.

5127. Smith, Thomas S. (U Rochester) **Aestheticism and social structure: Style and social network in the dandy life.** *American Sociological Review*, 1974(Oct), Vol 39(5), 725-743.—Discusses the dimensions of social aestheticism as part of a case study of the Regency milieu of Beau Brummell, the main figure of the dandy movement. To account for this pattern, the relationship between style and social structure is treated in terms of a theory of structural crystallization and decrystallization. (49 ref)

5128. Sorrentino, Richard M. & Vidmar, Neil. (U Western Ontario, London, Canada) **Impact of events: Short- vs. long-term effects of a crisis.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 271-279.—Examined short- and long-term effects of sudden, unexpected crisis events on public opinion. A 4-mo survey was conducted after a Canadian political crisis in 1970. Results indicate that (a) no conclusions regarding long-term effects of an event can be drawn unless long-term surveys are conducted, (b) opinions given during a crisis may not reflect underlying attitudes, and (c) variables such as sample fluctuation and extraneous events may influence the results.—*M. K. Phifer.*

5129. Souleff, M. I. (Cairo U, Arab Republic of Egypt) **Cannabis ideology: A study of opinions and beliefs centering around cannabis consumption.** *Bulletin on Narcotics*, 1973(Oct-Dec), Vol 25(4), 33-38.

5130. Strickland, Charles. (Emory U) **A transcendentalist father: The child-rearing practices of Bronson Alcott.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1973(Sum), Vol 1(1), 4-51.—Discusses the educational theories of Bronson Alcott and their application to the rearing of Anna and Louisa May. (175 ref)

5131. Thompson, Kenrick S.; Clarke, Alfred C. & Dinitz, Simon. (Ohio State U) **Reactions to My-Lai: A visual-verbal comparison.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 122-129.—Contrasted the impact of photographic imagery with descriptive paragraphs in communicating information on the killing of civilians at My-Lai. Visual imagery produced more negative reactions. Among the 947, Ss Reserve Officer Training Corps respondents were less critical, except those Ss who viewed photographs who were more critical. Sex differences in judgments were also observed.—*R. V. Heckel.*

5132. Topper, Martin D. (Southern Methodist U) **Drinking patterns, culture change, sociability and Navajo "Adolescents."** *Addictive Diseases*, 1974, Vol 1(1), 97-116.—Discusses social and economic factors which account for considerable changes evident in

Navajo Indian drinking patterns since 1960. Many of these changes have occurred among young adults and adolescents. Drinking changes appear to have been caused by changes in agency towns on the reservation which occurred because of long-term developments in the reservation economy stemming from the 1920s, and from sharp increases in the amount of spending by all levels of government and private industry on the reservation. The cultural conflict between Navajo and white societies and between the young people and their parents are thought to account for many of the frustrations and pressures expressed in drinking. (24 ref)—*L. Gorsey.*

5133. Ulrich, Roger E. (Western Michigan U) **Toward experimental living.** *Behavior Modification Monographs*, 1973, Vol 2(1), 75 p.—Describes an experimental community established in Kalamazoo, Michigan, in 1968. Its negative and positive aspects are discussed and compared with conventional society. A questionnaire study among community members on such factors as the ownership of property and the sharing of duties is reported. The formation of cliques, stratification of the community, and various practical problems are discussed. Faults of the initial effort are summarized. Experiments with alternative life-styles are continuing.—*R. Hall.*

5134. Unger, Rhoda & Raymond, Beth. (Montclair State Coll) **External criteria as predictors of values: The importance of race and attire.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 295-296.—To determine whether the appearance of youth reflects their value system, the Rokeach Value Survey was given to a total of 30 black and white young men classified as conventional or deviant on the basis of attire and hairstyle. Results show that appearance was related to value systems, although value differences occurred more as a function of race than attire.

5135. Veevers, J. E. (U Western Ontario, London, Canada) **Voluntary childlessness and social policy: An alternative view.** *Family Coordinator*, 1974(Oct), Vol 23(4), 397-406.—A review of research on voluntary childlessness suggests that there are at least 3 kinds of situations wherein social policies are formulated and enacted: the relationship between citizens and politicians in which pronatalist policies are expounded, the relationship between clients and professional counselors in which parenthood is advocated, and the relationship between patients and physicians in which access to fertility control is restricted. Involuntary parenthood contributes to population problems and may have deleterious consequences for the mental health of both parent and child. Some suggestions are outlined for counteracting pronatalist policies with alternative strategies for manipulating fertility decision-making. (37 ref)—*Journal abstract.*

5136. Wagner, Nathaniel N. (Ed.). (U Washington) **Perspectives on human sexuality: Psychological, social and cultural research findings.** New York, NY: Behavioral Publications, 1974. x, 517 p. \$14.95(cloth), \$6.95(paper).—Presents a collection of 23 empirical and discussion papers on sex differences and the development of sexuality, psychological factors in sexual behavior, cross-cultural perspectives on sexual behavior,



and sexual behavior in various populations (e.g., pregnant women and the elderly).

5137. Weiss, Carol H. (Columbia U, Bureau of Applied Social Research) **Where politics and evaluation research meet.** *Evaluation*, 1973, Vol 1(3), 37-45.—Describes constraints on program evaluation research arising from its political context. Typical differences in viewpoints between decisionmakers and researchers are discussed, and the implicit political attitude of evaluation research itself is analyzed. Several specific proposals for reform are offered.

5138. WHO Expert Committee on Drug Dependence. (Geneva, Switzerland) **WHO Expert Committee on Drug Dependence: Report.** *World Health Organization, Technical Report Series*, 1974, No 551, 89 p.—Presents the proceedings of the 1973 meeting of the World Health Organization (WHO) Expert Committee on Drug Dependence. Topics include the types of work performed by international bodies concerned with drug dependence, methods of prevention of problems associated with drug use, and recommendations for the international control of individual drugs.

5139. Wilson, Glenn D. & Lee, Hyun Soo. (Inst of Psychiatry, London, England) **Social attitude patterns in Korea.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 27-30.—Investigated the structure of social attitude patterns of 356 Koreans and examined the appropriateness of the Wilson-Patterson Conservatism Scale to a non-European population. Principal components analysis revealed a general factor of Conservatism similar to that identified in various European cultures, although slightly diminished in importance. The subfactor pattern was sufficiently similar to previous results to allow meaningful scoring according to the standard scales. Low occupational status was associated with conservative attitudes of 4 major kinds—militarism—punitiveness, antihedonism, ethnocentrism, and religiosity. Females were more religious than males but less ethnocentric. Results confirm the universality of social attitude patterns and their associations with demographic variables.—*Journal abstract*.

5140. Winett, Richard A. (U Kentucky) **Behavior modification and social change.** *Professional Psychology*, 1974(Aug), Vol 5(3), 244-250.—Describes behavior modification techniques such as contingency systems, token economies, and behavioral analyses that can be effective instruments of social change. Practical applications are proposed for regulation of natural resources, traffic problems, effective school integration, environmental design, and study of comparative economies. A methodology for studying programs on the community level is proposed, with sequential rather than concurrent implementation of social programs providing the necessary multiple-baseline design. It is noted that such programs must be under citizen control to avoid possibility of coercion. (41 ref)—C. Wright.

5141. Yacenda, John A. (California State U, San Jose) **Knowledge and attitudes of college students about venereal disease and its prevention.** *Health Service Reports*, 1974(Mar), Vol 89(2), 170-176.—Developed a questionnaire on venereal disease (VD) and administered it to 156 men and 136 women undergraduates. The chief source of information about VD for this sample

appeared to have been the schools, along with various channels of self-learning (newspapers, radio, pamphlets, etc). Respondents who had had VD had considerable knowledge concerning it, but were confused about specific later complications. Divergent opinions about prevention and preventive methods were expressed, depending on sexual experience, current sexual activity, sex group, and knowledge of or experience with the disease. Results are given in detail, and the implications for VD education, clinics, and prevention programs are discussed. (16 ref)—R. S. Albin.

5142. Yorburg, Betty. (City Coll, City U New York) **Psychoanalysis and Women's Liberation.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 71-77.—Examines psychoanalytic theories of penis envy and womb envy within the social context of the contemporary women's liberation movement. A Freudian theory of sexuality is seen to develop within the context of culture and under the influence of ideology and economic need.

5143. Zanna, Mark P. & Del Vecchio, Steven M. (Princeton U) **Viewer's political orientation and the appropriateness of TV newscaster behavior.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 311-312.—Attempted to delineate the role of the TV newscaster from the viewers' perspective and to determine whether viewers' political orientations affect their definitions. Results show that liberals perceived criticizing and calling for change of governmental policy as more appropriate for newscasters than did conservatives. The impact on results of having a conservative administration in office is considered.

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

5144. Argyle, Michael & Little, Brian R. (U Oxford, England) **Do personality traits apply to social behavior?** *Journal for the Theory of Social Behavior*, 1972(Apr), Vol 2(1), 1-35.—Describes theories of social behavior as they apply to persons vs situations and the variability between and among individuals. Personality is discussed as a constant pattern of behavior, as trait dispositions, as a person's cognitive system, as a series of unrelated stimulus-response links, and as the sum of role performances. The evidence is reviewed on whether or not social behavior can be usefully understood in terms of traits. The practice of ascribing characteristics such as assertiveness, sociability, hostility, etc, to an individual instead of to a sample of his behavior is questioned. The various models of personality are discussed from this viewpoint. (57 ref)—R. S. Albin.

5145. Middlebrook, Patricia N. (Central Connecticut State Coll) **Social psychology and modern life.** New York, NY: Alfred A. Knopf, 1974. xi, 626 p.—Presents a textbook in social psychology aimed at giving a research-oriented approach to contemporary, real-life problems. Among the topics included are social determinants of the self, personal experience and attitude formation, communication and social contact, aggression and social learning, altruism, patterns of interaction, and group functioning. (36 p ref)

5146. Rogers, Rosemarie. (Tufts U, Fletcher School of Law & Diplomacy) **Normative aspects of leisure time behavior in the Soviet Union.** *Sociology & Social Research*, 1974(Jul), Vol 58(4), 369-379.—Used an analysis of research reports by Soviet sociologists to identify norms on leisure behavior in the USSR. Preferred activities included reading, theater, concerts, literature readings, exhibits, museums and sports or art activities. Less popular were radio, TV, and movies. There appears to be recognition of what ought to be watched on TV, although there is some suggestion that, as in the US, actual behavior may not conform to this awareness. (22 ref)—R. V. Heckel.

5147. Saltzstein, Herbert D.; Klausner, Alene & Schiavo, R. Steven. (Herbert H. Lehman Coll, City U New York) **Social influence on perceptual judgments and responses.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 123-135.—Tested the hypothesis that social modification of perceptual processes has occurred when the original social influence effect transfers to a different task, with a different E and in the absence of the influence agents. Such transfer was demonstrated with cross-modal-matching tasks. 41 female Ss produced relative magnitudes in the response modality to match relative magnitude in the stimulus modality. It was the judged distances between stimuli which were influenced. The original and transfer tasks shared the same stimulus modality (heaviness of weights) but differed in the response modality (duration of a tone and visual length). The transfer across response modalities suggests that it was the judgmental process rather than the overt response habit which was modified.—*Journal abstract*.

5148. Schoner, Bertram; Rose, Gerald L. & Hoyt, G. C. (Simon Fraser U, Burnaby, British Columbia, Canada) **Quality of decisions: Individuals versus real and synthetic groups.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 424-432.—Compared the quality of decisions on 3 economic problems for individuals, 2 forms of real 5-person groups, and 3 synthetic group-decision rules. A total of 185 undergraduates first made decisions as individuals or as group members and then participated in the opposite condition. Real groups with no previous exposure to the problems made better decisions than did groups whose members had previously made individual decisions on the same tasks, and made decisions superior to a plurality synthetic decision rule, but inferior to the "best man" or I. Lorge and N. Solomon's Model A rule (1955). Both types of real groups outperformed individuals. The relationship between decision quality and riskiness of decision alternatives varied in the 3 decision tasks. Real groups with no prior exposure to the task responded to the suggested risk norm more appropriately than did other decision-making units. (22 ref)—*Journal abstract*.

5149. Shotter, John. (U Nottingham, England) **Prolegomena to an understanding of play.** *Journal for the Theory of Social Behaviour*, 1973(Apr), Vol 3(1), 47-89.—Defines the activity called "play" and elucidates it as a concept. A framework of philosophical thought about man within which play is intelligible is provided. The classical stimulus-response theory of play is examined. The importance of rule-following as a part of human behavior is noted. It is concluded that whether an

activity is play or not depends on a retrospective evaluation i.e., on whether that activity is thought necessary to the conduct of life or not. Forms of play, games, play-therapy, and animal play are discussed. (47 ref)—R. S. Albin.

5150. Sutcliffe, Claud R. (U of the South) **Eliminating the biasing effects of social distance in cross-cultural survey research projects.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 141-142.—Tested the hypothesis that the presence of an outside O in an interview would not lead to interview bias. Results of an interview with Arab peasants during which an American professor was present confirm the hypothesis.

5151. Watkins, Charles E. (U Texas, Austin) **An analytic model of conflict.** *Speech Monographs*, 1974(Mar), Vol 41(1), 1-5.—Presents a symbol set and mathematical notation for the representation of the terms of conflict theory ("message," "promise," "threat," etc) within an analytical model.

5152. Wheaton, Blair. (U Wisconsin, Madison) **Interpersonal conflict and cohesiveness in dyadic relationships.** *Sociometry*, 1974(Sep), Vol 37(3), 328-348.—Attempted to identify types and sources of conflict to illustrate how conflict can have both positive and negative effects on group cohesiveness. 2 types of interpersonal conflict, principled and communal (depending on the state of an assumed consensus over basic principles), and 2 sources of issues of conflict, internal and external, were studied using 102 female undergraduate dyads (roommates). Ss completed a questionnaire containing items from Seashore's Group Cohesiveness Index and 30 issues for which S gave her own opinion (agree-disagree on a 9-point scale) and estimated her roommate's opinion. Results suggest that principled conflict has a negative effect on cohesiveness and that communal conflict has a positive effect, producing higher levels of cohesiveness if there is not conflict at all. The predicted intensifying effect of the use of issues internal to a relationship did not generalize to both types, however, suggesting differences between principled and communal conflict. (15 ref)—*Journal abstract*.

### Group Dynamics & Interpersonal Communication

5153. Alcock, James E. (McMaster U, Hamilton, Ontario, Canada) **Cooperation, competition, and the effects of time pressure in Canada and India.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 171-197.—Studied the effects of time limitations on bargaining behavior in 3 experiments with 20 male and 20 female dyads of Canadian undergraduates (Exp I), 20 male and 18 female dyads of Indian undergraduates (Exp II), and 24 dyads of Canadian male undergraduates (Exp III). Findings indicate that Canadian males reacted to time limits imposed by one of the bargainers in a manner consistent with the way North American males typically react to threat—by becoming very competitive and resisting yielding. When the time limits were imposed by E, however, this same group reacted cooperatively. Canadian females and Indians of both sexes were all relatively cooperative, regardless of the source of time limitation. Indian females, however, were more passive than the other groups. (37 ref)—*Journal abstract*.



5154. Alevy, Daniel et al. (Yale U) **Rationale, research, and role relations in the Stirling workshop.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 276-284.—Criticisms of theory, design, and research connected with a workshop involving Catholics and Protestants from Belfast are assessed by the organizers and consultants responsible for the project. Differences in role and commitment are advanced as partial explanations for divergent assessments of the workshop.

5155. Altman, Irwin. (U Utah) **Reciprocity of interpersonal exchange.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 249-261.—Discusses, as a central issue in the development of interpersonal relationships, the process by which people reciprocally reveal information and feelings to one another. The empirical and theoretical literature is reviewed, and a conceptual framework of the reciprocity phenomenon is proposed. Factors hypothesized to affect level of reciprocity include (a) stage of a social relationship, (b) level of topical intimacy, (c) situational considerations such as degree of commitment to a social relationship, and (d) personal and group composition factors. Further research is needed to analyze the underlying mechanisms, and to study shifts in reciprocity as a function of different antecedent conditions. (27 ref)—R. S. Albin.

5156. Barthol, Richard P. & Berry, Lilly. (U California, Los Angeles) **OB strikes out OD: An application of organization development in sports.** *Interpersonal Development*, 1973-1974(Aug), Vol 4(2), 85-98.—Describes the testing of an Organizational Development (OD) model with a college baseball team. Some suggested changes in the game violated Organized Baseball (OB) traditions and were rejected, but open communication and decision-making in T groups and meetings were viewed as personally valuable.

5157. Boehringer, G. H.; Zeruolis, V.; Bayley, J. & Boehringer, K. (Open U, Belfast, Northern Ireland) **Stirling: The destructive application of group techniques to a conflict.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 257-275.—Presents a critique of 2 articles by L. W. Doob and W. J. Foltz (see PA, Vol 51:9724 and Vol 53:Issue 2) describing the conception and execution of a group dynamics workshop for Belfast inhabitants which took place in Scotland in 1972. The theoretical background, practical execution, and subsequent social and political impact of the workshop are assessed, and it is concluded that the goals of the exercise were ill-defined and mutually contradictory.

5158. Boles, Jacqueline & Garbin, Albino P. (Georgia State U) **The strip club and stripper-customer patterns of interaction.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 136-144.—Studied the social organization of the strip club by relating the effects of environmental and spatial factors on stripper-customer relationships. Data were derived from observations at 9 strip clubs in a large southeastern city, and interviews with 51 strippers at these clubs. Findings illuminate and support the idea that the interactions between strippers and customers are characterized by a counterfeiting of intimacy based on inauthentic relations. (17 ref)—*Journal abstract*.

5159. Bordow, Allan. (U New South Wales, Graduate School of Business, Kensington, Australia) **Aggression and support levels in the dyad: Clarification of a**

**balanced effect.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 299-300.—Found a balanced effect between aggression and support usage when same-sex dyads played "Twenty Questions," supporting findings by E. F. Lundgren (see PA, Vol 49:1434) and C. N. Zimet and C. Schneider (1969). However, in opposition to the previous findings, there was an overall higher ratio of aggressive to supportive activity in the pairs.

5160. Buckley, W.; Burns, T. & Meeker, L. D. (U New Hampshire) **Structural resolutions of collective action problems.** *Behavioral Science*, 1974(Sep), Vol 19(5), 277-297.—Considers the general problem of achieving cooperation in human groups and in higher levels of social systems. Social situations are considered where cooperation is problematic because self-interest contradicts group or collective interest: the Prisoners' Dilemma game, the commons' problem, the collective action problem, and the problem of competitive panics. A structural framework and methodology using social system level concepts is introduced to characterize and analyze such problems. It is shown that the various cases have a common underlying structure. In the analysis emphasis is placed on the social context of the problematic situations and the social processes that structure human interaction and collective behavior. The social structuring and restructuring in groups of perceptions and evaluations, action possibilities, decision procedures, and likely interaction patterns of those involved are discussed. (37 ref)—*Journal abstract*.

5161. Burgoon, Judee K. & Burgoon, Michael. (U Florida, Div of Communication Studies) **Unwillingness to communicate, anomia-alienation, and communication apprehension as predictors of small group communication.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 31-38.—Created a new 26-item scale to measure a construct labeled "unwillingness to communicate." The scale was used in conjunction with Dean's Alienation Scale, Srole's Anomia Scale, and the Personal Report of Communication Anxiety for College Students to predict small group interaction behavior. Ss were 283 college students. The scale was the best predictor of tension in the small group. The reliability, criterion-related validity, and potential utility of the scale are discussed. (16 ref)—*Journal abstract*.

5162. Cooper, Lee G. & Thomas, Kenneth W. (U California, Los Angeles) **Divergent perceptions of disagreement.** *Behavioral Science*, 1974(Sep), Vol 19(5), 336-343.—Disagreement in opinions is frequent among individuals in a group, as well as among parties at other levels of living systems. This often becomes evident during decision-making processes, as well as at other times. Such disagreement is predominately viewed as a single homogeneous construct and is used as such in a wide variety of research and action settings in the behavioral sciences. The present study, however, used multivariate individual differences analysis with data from 31 graduate management students to demonstrate that disagreement had systematically varying meaning for different individuals. Results underscore the distinction between disagreement as polarization and disagreement as evenly dispersed opinion. (17 ref)—*Journal abstract*.

5163. Doob, Leonard W. & Foltz, William J. (Yale U) **The impact of a workshop upon grass-roots leaders in Belfast.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 237-256.—9 mo after 56 persons from the various communities of Belfast had attended a modified Tavistock National Training Laboratory (NTL) Workshop in Scotland, 40 of them were interviewed to determine the effect of that experience. Emphasis was placed upon the changes they had observed within themselves, the organizations they had planned during the workshop, and their own general effectiveness back in Belfast. Results are not clear-cut, but for everyone the workshop itself was an impressive event. Many reported that they had been helped as persons. For some participants the workshop facilitated elaboration or subsequent carrying out of plans of their own devising in spite of intimidation and the difficulties inherent within Northern Ireland. —*Journal abstract.*

5164. Gatton, Michael J. & Tyler, John D. (U North Dakota) **Nonverbal interview behavior and dependency.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 303-304.—Observed the nonverbal responses of autonomous and dependent undergraduates to positive and negative interviewer-emitted nonverbal cues. Although Ss maintained more eye contact and smiled more during positive cues, the hypothesis that dependent Ss would be more sensitive to the interviewer's shift from positive to negative nonverbal cues was not supported.

5165. Gormally, James & Hill, Clara E. (American U, Counseling Ctr) **Guidelines for research on Carkhuff's training model.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 539-547.—Discusses several methodological issues related to R. R. Carkhuff's human relations training model with an emphasis on developing research guidelines. The problems of unclear treatment and control procedures and the lack of placebo controls are presented, followed by measurement issues concerning the proper choice of response measures, limitations of present measures, and the use of rating scales. The issues of individual vs group assessment and training-group follow-up are considered. Each discussion of an issue is accompanied by research guidelines for evaluating the present literature and conducting further research. Several research suggestions are offered which might resolve logical gaps as well as extend the model. (53 ref)—*Journal abstract.*

5166. Greenwood, James G. (Ohio State U) **Opportunity to communicate and social orientation in imaginary reward bargaining.** *Speech Monographs*, 1974(Mar), Vol 41(1), 79-81.—Studied the effect of social orientation (cooperative or competitive) and communication opportunity (restricted, moderate, unrestricted) on bargaining. 84 undergraduates were paired, 7 pairs being assigned to each combination of conditions. The pairs, "row" and "column," were to reach agreement in selecting a cell in a  $2 \times 3$  matrix, representing a dollar sum. The optimum cell for row and column was different unless agreement was reached on splitting the pay-off of a selected cell. Agreement was reached significantly ( $p < .05$ ) more often when cooperative social orientation and unrestricted communication were combined. No other combinations or interactions were significant. —C. A. Sherrard.

5167. Grzelak, Janusz & Tyszk, Tadeusz. (Inst for Educational Research, Warsaw, Poland) **Some preliminary experiments on cooperation in N-person games.** *Polish Psychological Bulletin*, 1974, Vol 5(2), 81-91.—Conducted 4 preliminary experiments with high school students as Ss on cooperation in N-person (6-10) nonconstant-sum games to determine whether the frequency of cooperative actions (Strategy C) depended on the profitability of the choices involved, on information about outcome after each choice, on communication between partners, and on the mutual attitude of the partners; Ss were also able to use individual action strategy (Strategy D). Results show that (a) opportunities for communication between players increased the frequency of choices only in games of the Prisoner's Dilemma type in which the formation of a 2-3 person coalition made the C choice profitable, (b) cooperation level was higher in groups comprising Ss favorably disposed to each other than in groups with Ss without such disposition, and (c) level of cooperation did not affect information about the outcomes of each game. One of the weaknesses of the preliminary is that the payoff matrices did not create a clear-cut conflict of interest (too-low payoffs, not sufficiently differentiated). (21 ref)—*Journal abstract.*

5168. Harris, Thomas E. & Smith, Robert M. (Rutgers State U) **An experimental verification of Schelling's tacit communication hypothesis.** *Speech Monographs*, 1974(Mar), Vol 41(1), 82-84.—Tests explicit predictions of Thomas C. Schelling's tacit communication hypothesis (1960). Without using verbal communication, 142 undergraduates in "real partner" and "hypothetical partner" groups tried to match the partner's responses to multiple-choice questions. Specific responses were as predicted, regardless of group and of previous interaction with partners.

5169. Hogan, Daniel B. **Encounter groups and human relations training: The case against applying traditional forms of statutory regulation.** *Harvard Journal on Legislation*, 1974(Jun), Vol 11(4), 659-701.—Examines the purposes, goals, and legal implications of encounter groups. Recommendations on how encounter groups should be regulated are presented. It is suggested that encounter groups should not be regulated through psychology laws or statutory regulations because (a) the groups cannot be defined precisely enough to satisfy constitutional requirements, (b) the evidence of danger and risk is insufficient to warrant governmental interference, (c) standards and criteria for competency of encounter group leaders have not been adequately developed, and (d) adequate methods of measuring competence have also not been developed. Instead of statutory regulation, emphasis should be placed on educating the public, further research, and the development of nongovernmental accrediting organizations to study the effects and potential values of encounter groups.—*Author abstract.*

5170. Johnson, David W. (U Minnesota, Twin Cities) **Communication and the inducement of cooperative behavior in conflicts: A critical review.** *Speech Monographs*, 1974(Mar), Vol 41(1), 64-78.—Reviews conflict studies from the viewpoint of the types of communication used, concluding that the lack of an operational



definition of "communication" common to all studies has impeded progress in the field.

5171. Katz, David. (Washington U) **An automated system for eliciting and recording self-observations during dyadic communication.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 689-697.—Describes an electromechanical system in which Ss are trained to avoid the onset of a cue light by reporting moment-to-moment self-observations at a predetermined high rate. Videotape and event recorders provide a sequential record of self-report responses in correct temporal relationship with other interaction variables.

5172. Kervin, John B. (U Toronto, Ontario, Canada) **Extending expectation states theory: A quantitative model.** *Sociometry*, 1974(Sep), Vol 37(3), 349-362.—Expectation states theory has been developed to account for observed power and prestige structures in small, task-oriented groups. An extension of the theory to permit quantitative predictions of status-related behavior is described. Terms of the theory are reinterpreted as probabilities, and a function for combining probabilities is derived. The resulting path probabilities are combined with a decision-theory framework to provide a model for predicting the proportion of self-responses when disagreements occur in a binary choice group task. Support for the model was obtained when applied to 2 sets of data from past experiments. (17 ref)—*Journal abstract*.

5173. Kidder, Louise H. & Stewart, V. Mary. (Temple U) **The psychology of intergroup relations: Conflict and consciousness.** New York, NY: McGraw-Hill, 1975. xv, 128 p. \$4.95.

5174. Levin, Ellen M. & Kurtz, Robert R. (Illinois State Psychiatric Inst, Chicago) **Structured and non-structured human relations training.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 526-531.—Investigated participant perceptions following structured and nonstructured human relations training. The design included 3 structured and 3 nonstructured groups and 3 leader teams with each team conducting 1 group under each of the 2 formats. 21 male and 21 female graduate students were Ss. The Group Opinion Questionnaire was administered to participants at the 12th (final) session. Participants in structured groups reported greater ego involvement in their groups, more self-perceived personality change since joining the group, and greater group unity than did participants in nonstructured groups. Evidence suggests that greater leader experience is associated with more favorable participant perceptions. (22 ref)—*Journal abstract*.

5175. Lorber, Nell M. (Newark State Coll) **Interpersonal feelings and their perception: A review of research.** *Handbook of International Sociometry*, 1973, Vol 7, 60-70.—Surveys research on the relationships among interpersonal feelings and perceptions of them. Most of the studies involve elementary school children. No consistent pattern of research results regarding the extent of mutuality in individuals' feelings towards each other was found. Most individuals tend to perceive others' feelings toward them with at least a moderate degree of accuracy. Individuals tend to feel the same way about others as they perceive others to feel about them. This congruency tendency is independent of both

accuracy in the perception of feelings and the mutuality of feelings. (79 ref)—*R. J. Ambrosino*.

5176. Martin, J. David; Williams, J. Sherwood & Gray, Louis N. (Lakehead U, Thunder Bay, Ontario, Canada) **Norm formation and subsequent divergence: Replication and variation.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 261-269.—Administered to 12 dyads of high-school-age Canadians a dot-counting estimation task in 6 trials, each containing 50 judgments. The 1st, 4th, 5th, and 6th trials were individual response trials in which Ss were not aware of one another's estimates; the 2nd and 3rd trials were group trials in which judgments were announced aloud. Convergence of judgments was observed between the 1st and 3rd trial, and divergence between the 3rd and subsequent trials. Divergence did not produce disparities equal to those present at the 1st (baseline) trial. Similar results were obtained in a pretest involving 60 American undergraduates tested in triads; these results were not as clear-cut, presumably owing to the smaller number of judgments per trial and resulting instability of the averages. It is concluded that some divergence is normal after a short-term, norm-formation experiment. The question of when to call a behavioral uniformity a "norm" is discussed. (17 ref)—*Journal abstract*.

5177. Miller, N. & Baron, R. S. (U Southern California) **On measuring counterarguing.** *Journal for the Theory of Social Behaviour*, 1973(Apr), Vol 3(1), 101-118.—Outlines problems in measuring counterarguing and establishing its causal role in the persuasion process. Counterarguing is the silent dialogue engaged in by people listening to an attitude change message in order to help them resist persuasion. The hypothesis that this phenomenon helps reduce change is examined. Typical measures of counterarguing and their inadequacies are discussed. The causal relationship between counterargument and change is questioned. Suggestions are made for establishing construct validity for counterarguing. (30 ref)—*R. S. Albin*.

5178. Patterson, David L. & Smits, Stanley J. (Georgia State U) **Communication bias in black-white groups.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 9-25.—Defined prejudice as a statistically significant bias in the direction of verbal statements in T groups whose membership was balanced by race and sex. 3 major hypotheses were tested with a total of 16 white and black male and female graduate students. Results are discussed in relation to the nature of prejudice and communication dynamics. 2 T-group methodologies were contrasted as an exploration of potential intervention strategies. Results indicate that both race and sex contributed to significant biases, although race seemed to be the more substantive contributor. (22 ref)—*Journal abstract*.

5179. Perry, Raymond P. & Boyd, J. Edwin. (U Manitoba, Winnipeg, Canada) **Language differences and message length as determinants in communicating personality judgments between people.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 83-94.—2 experiments examined how inter-S language differences and message length influenced the accuracy with which people communicate their personality judgments to other individuals; Ss were a total of 90 students. An interper-

sonal communication paradigm was used in which an encoder made personality judgments of object persons based on videotaped interviews. A decoder viewed the object person videotapes and attempted to match each judgment with the intended referent. Exp I, which tested the effect of reducing inter-S language variability on impression communication accuracy, found that efficiency improved and that too much control interfered with responding and produced an increased communication error rate. Exp II, which investigated the effect of 10, 20, and 30 word messages on communication accuracy, indicated that increasing information did not facilitate communication accuracy (15 ref)—*Journal abstract*.

5180. Pluckhan, Margaret L. (U Denver) **An investigation of sociometric choices in various behavioral settings.** *Handbook of International Sociometry*, 1973, Vol 7, 43-51.—Sociometric tests are used to assess group structure and reveal member choices, but tell nothing about the reasons for the choices. An attempt was made to identify some of these reasons by using the personality dimensions of the Fundamental Interpersonal Relations Orientation, Behavior (FIRO-B). 73 professional nurses were divided into 7 groups of 9-11 members, and each group was assigned a task-oriented activity. 3 hypotheses were advanced based on the fact that the Ss were to make a task-oriented sociometric choice and on the assumption that inclusion (or togetherness) and control (or decision making) are work or task functions and factors, but that affection is not. All hypotheses were rejected. There was no significant difference between the most chosen group and the least chosen group as it related to expressed or wanted inclusion and control. A significant difference between the 2 groups was observed with regard to expressed and wanted affection.—R. J. Ambrosino.

5181. Rodrigues, Aroldo & Ziviani, Cilio R. (Pontificia U Católica, Rio de Janeiro, Brasil) **A theoretical explanation for the intermediate level of tension found in nonbalanced P-O-X triads.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 47-56.—Previous empirical evidence has abundantly demonstrated that people report an intermediate level of tension for triadic interpersonal relations of the classical P-O-X type identified by F. Heider (see PA, Vol 33:971) when the P-O link is negative. Low tension is found in balanced triads and high tension in imbalanced ones when the P-O bond is positive. It is postulated that the opposing forces of balance and of agreement found in all 4 P-O-X triads in which the P-O bond is negative, in addition to T. M. Newcomb's lack of engagement hypothesis, may also account for the intermediate level of tension found in practically all experiments in this area. In the present study 32 undergraduates were grouped as high or low conformists according to the Comrey Personality Scale, and were later asked to rate hypothetical triads with a negative P-O bond. Results confirm the hypotheses that high conformists, who supposedly value agreement with others more than low conformists (or are less bothered by disagreement than the latter), report significantly less tension and less willingness to change P-O-X triads with agreement than those with disagreement when such triads have a negative P-O bond. (30 ref)—*Journal abstract*.

5182. Street, Warren R. (Central Washington State Coll) **Brainstorming by individuals, coacting and interacting groups.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 433-436.—36 3-person groups of undergraduate volunteers worked in 3 different settings to produce answers to 3 brainstorming problems. Ss worked independently in separate rooms (individual condition), independently in the same room (coaction condition), and cooperatively in the same room (interaction condition). Conflicting theories predicted lower productivity (a) either in the interaction and coaction conditions, where co-workers were physically present (social facilitation theory); or (b) only in the interaction condition, where group norms could be formed. Results show that the independent and coaction conditions produced the same number of solutions and the interaction condition was significantly ( $p < .001$ ) inferior to both. This suggests that public action, not physical proximity, is responsible for individual-group differences in brainstorming. (16 ref)—*Journal abstract*.

5183. Westen, T. Edward & Buckley, James J. (U South Carolina) **Toward an explanation of experimentally obtained outcomes to a simple, majority rule game.** *Journal of Conflict Resolution*, 1974(Jun), Vol 18(2), 198-236.—Examined the problem of many solutions to  $n$ -person games, using a 4-person simple, majority rule game. 97 experimental trials are employed to demonstrate that 3 different solutions (symmetric, inflated, and partitioned solutions) can be differentially predicted as one varies the structural characteristics of otherwise strictly identical games in characteristic function form. Findings indicate that systematic theory construction about the structure of conflict is a fruitful area for inquiry. (25 ref)—*Journal abstract*.

### Social Perception & Motivation & Attitudes

5184. Asher, Nancy W. (U Illinois, School of Social Work) **Manipulating attraction toward the disabled: An application of the similarity-attraction model.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 156-164.—Obtained from 81 female Ss ratings of able-bodied and disabled persons who were attitudinally similar or dissimilar to the Ss. Results indicate that similarity increased the attraction of both able-bodied and disabled. Similar disabled were liked as much as similar able-bodied, and able-bodied and disabled were rated equally unattractive when presented as dissimilar. Findings are considered in terms of their implications for modifying attitudes towards the disabled. (24 ref)—*Journal abstract*.

5185. Audi, Robert. (U Texas) **On the conception and measurement of attitudes in contemporary Anglo-American psychology.** *Journal for the Theory of Social Behaviour*, 1972(Oct), Vol 2(2), 179-203.—Discusses the concept that reliable prediction of a person's behavior does not depend only on knowledge of person's attitudes. Suggestions are made for improvements in attitude measurement aimed at maximum relevance to the prediction of behavior. Contemporary views on the nature of attitudes are summarized. A commonsense approach to attitude conception is detailed. These new definitions in turn suggest a different emphasis in the measurement of attitudes. The new concept of attitude and measurement is described in Lewinian terms and



suggestions are made for evaluating them experimentally. (31 ref)—R. S. Albin.

5186. Austin, William & Walster, Elaine. (U Virginia) **Participants' reactions to "equity with the world."** *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 528-548.—Tested 4 hypotheses derived from equity theory to investigate how people react when they discover that their partners are sacrificing the equity of their relationships to maintain "equity with the world" (i.e., equity with others in general). It was predicted and found that whether a person focuses on "person-specific equity" or equity with the world depends on whether he feels accountable for his behavior. In an experiment with 135 female undergraduates, when participants knew they could not be held accountable for their actions, they routinely sacrificed person-specific equity to maintain equity with the world. However, when they knew they would have to confront their 2nd partner eventually, they rarely sacrificed person-specific equity. Results show that such pessimism (by persons desiring to restore equity with the world) is not justified, since inequitably-treated partners' dissatisfaction and hostility were markedly blunted when individuals thought their "unfair" partner was trying to restore equity with the world. (35 ref)—*Journal abstract*.

5187. Baglioni, L.; Nencini, R. & Meschieri-Belcacci, M. V. (CNR Inst di Psicologia, Rome, Italy) **[Group Influence on the phenomenon of destructive obedience: A study with hypothetical subjects.]** (Ital) *Archivio di Psicologia, Neurologia e Psichiatria*, 1974(Jan), Vol 35(1), 26-35.—Divided 363 students into 4 groups according to the 4 factors that may influence aggressivity manifestations: public vs private reactions, and money rewarded in proportion to 2 levels of electric shock. Results show that a dragging effect (higher aggressivity) was exerted by the public situation only when a descending voltage from 50 volts to 0 volts was present. Money also proved to be an effective reward as well.—L. L'Abate.

5188. Balzer, Hans G.; Schümer-Kohrs, Anke & Schümer, Rudolf. (U Mannheim, W Germany) **[Effects of context upon the formation of impressions.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 25-38.—Tested several hypotheses derived from N. H. Anderson's model of formation of impressions. 72 students rated character traits of a fictitious person on a 21-step scale. Analysis of variance of the results indicated that component ratings tended to be influenced by the context in which they were presented. This effect is called assimilation or positive context effect. Other hypotheses which, according to the model, should increase the context effect could not be confirmed by the experimental results. (English & French summaries) (30 ref)—W. J. Koppitz.

5189. Banikiotes, Paul G. & Banikiotes, Florence G. (U Notre Dame, Inst for Studies in Education) **Male and female perceptions of liberated vs conventional sex roles.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 111-112.—30 male and 30 female undergraduates read attitudinal statements of 2 male and 2 female hypothetical persons indicating preference for liberated or conservative sex roles. Ss then rated the persons on Byrne's Interpersonal Judgment Scale. No differences were found between male and female Ss in their

perception of the 4 persons. The liberated female was seen as the most intelligent of the 4 persons and was also considered to be less moral and more aware of current events than the conservative female. The liberated male was seen as more intelligent, less moral, and more attuned to current events than the conservative male. —A. Olson.

5190. Bragg, Barry W. & Allen, Vernon. (U Toronto, Ontario, Canada) **The role of public and private support in reducing conformity.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 81-82.—In a study with 80 undergraduates, a Crutchfield-type conformity apparatus was used to give each S public social support, private social support, or subsequent public social support after appearing to have been the first person to dissent publicly from a simulated group. All 3 types of social support were equally effective in reducing conformity relative to a unanimous group. Results suggest that interpersonal factors are not crucial in explaining independence produced by a social supporter; rather, effectiveness of the social supporter may lie in his providing an independent confirmation of social and physical reality.—*Journal abstract*.

5191. Buckhout, Robert et al. (Brooklyn Coll, Ctr for Responsive Psychology, City U New York) **Determinants of eyewitness performance on a lineup.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 191-192.—A simulated crime was staged before 64 undergraduate witnesses in order to generate eyewitness reports to be analyzed for accuracy. 48 of the witnesses attempted to pick out the suspect from 2 videotaped lineups—one with and one without the suspect. Successful witnesses showed significantly fewer errors of commission than those who picked the suspect but impeached their identification with another choice. There were 13.5% positive identifications, 13.5% impeached, 40.3% mistaken identifications, and 19.2% nonidentifications. An analysis is made of the differences between successful and unsuccessful eyewitnesses.—*Journal abstract*.

5192. Crawford, Jeffrey L. & Williams, Daniel C. (Walter Reed Army Medical Ctr, Washington, DC) **Contingent reinforcement and response constraints as confounding factors in attitude attribution.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 95-102.—Investigated the roles of contingent reinforcement and response constraints in attitude attribution in 2 experiments. Ss were a total of 492 students. Exp I indicated that behavior observed to be highly constrained in terms of alternative available behaviors was no more informative to Ss than behavior observed to be under the control of a rather powerful reinforcement contingency. Only when both constraint and reinforcement control ceased to be discriminated was attribution possible. Exp II showed that the effectiveness of multiple observations of behavior was seriously attenuated by the presence of contingent reinforcement. Observed behavioral consistency led to an increase in Ss' agreement or disagreement with a statement of attributed attitude only when contingent reinforcement was not observed.—*Journal abstract*.

5193. Dillman, Don A. & Christenson, James A. (Washington State U) **Toward the assessment of public values.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 206-221.—Discusses improved techniques for assessing

public values in light of inadequacies of single economic indicators. A particular conceptualization (the value framework) was applied in conjunction with a methodological procedure (factor analysis) to provide a description of the hierarchical nature of public values. Factor analysis was effective in identifying homogeneous factors in some value areas. Factor loadings and groupings are presented in tabular form. (24 ref)—M. K. Phifer.

5194. DiMatteo, Maryanne R. (Tufts U) **The effects of perceived deviancy on interpersonal evaluation.** *Psychonomic Science*, 1972(Oct), Vol 29(2), 97-99.—60 male and 60 female high school students read a fictitious transcript from an interview for a study-abroad program. During the interview, a male college student applicant (a) revealed that he had experienced either a happy or an unhappy childhood; and (b) presented himself as normal, previously mentally ill, or as having suffered a serious physical illness. Ss evaluated the stimulus person less favorably when he reported either an unhappy childhood or a serious physical illness. The predicted dislike and derogation of the mentally ill stimulus person was not evidenced, and the Ss rated him as the most interesting. Consistent sex differences emerged, as female Ss evaluated the stimulus person in more favorable terms and indicated that if they were to meet him they would like him significantly more than did male Ss.—*Journal abstract*.

5195. Edwards, David J. (Rhodes U, Grahamstown, South Africa) **The use of orientation asymmetry as a cue in the interpretation of schematic social configurations.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 219-228.—Prepared descriptions of 4 dyadic social encounters in which one interactor was expected to have greater need for or tolerance of direct gaze than the other. 80 Ss (mostly undergraduates) listened to one of the descriptions and were shown a set of figure pairs mounted on cards in asymmetrical orientation patterns. They were asked to identify one of the interactors described to them with one of the figures on the stimulus card. It was predicted that if they were asked to identify the high eye-contact interactor they would select the more directly facing of the 2 figures, but if asked to select the low eye-contact interactor they would select the less directly facing figure. Although responses were to some extent determined by the characteristics of the figures themselves, the cue furnished by the asymmetrical orientation patterns also proved to be a powerful determiner of choices, in accordance with prediction. It is argued that results provide a basis for the interpretation of figure placements obtained with the doll placement technique. (20 ref)—*Journal abstract*.

5196. Fisher, Jeffrey D. (Purdue U) **Situation-specific variables as determinants of perceived environmental aesthetic quality and perceived crowdedness.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 177-188.—Hypothesized that relevant situation-specific variables may act along with objective physical conditions to determine environmental perception, and that the exclusive use of the physical level of an environmental stimulus to predict behavior may, therefore, be inadequate. A  $2 \times 4$  between-Ss design was employed in which an attitudinally similar or dissimilar confederate interacted with S at 1 of 4 distances. Ss were 129

undergraduates. As hypothesized, Ss who interacted with a similar confederate judged the environment to be of higher aesthetic quality, perceived themselves to be less crowded, and felt affectively more positive than Ss who interacted with a dissimilar other. (45 ref)—*Journal abstract*.

5197. Frauenfelder, Kenneth J. (Western Illinois U) **A cognitive determinant of favorability of impression.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 71-81.—Investigated the relationship of integrative complexity to the favorability of impressions in 115 Ss. It was hypothesized that (a) favorability of impressions of Ss of high integrative complexity would be less affected by a positive or negative set than the favorability responses of Ss low in integrative complexity and (b) when no set was induced, Ss of high integrative complexity would form more favorable impressions of an inconsistently behaving target person than Ss of low integrative complexity. The hypotheses were basically supported for female Ss but not for male Ss. (30 ref)—*Journal abstract*.

5198. Galbreath, Judith & Feinberg, Lawrence B. (Pennsylvania State U, Div of Counseling) **Ambiguity and attitudes toward employment of the disabled: A multidimensional study.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 165-174.—Exposed 240 undergraduates who scored high and low on the Budner Scale for Tolerance-Intolerance of Ambiguity to 1 of 12 vignettes describing a disabled job applicant and a potential employment situation in varying degrees of ambiguity. Ss were then asked to respond to an "attitude toward employment of disabled persons" scale. Findings confirm the existence of more negative attitudes among Ss intolerant of ambiguity. While intolerant Ss were not significantly affected by variations in situational and focal stimulus (disability type) ambiguity, tolerant Ss' responses were affected by variation in focal stimulus ambiguity. Implications for rehabilitation and job placement of the disabled are discussed. (28 ref)—*Journal abstract*.

5199. Hamner, W. Clay & Harnett, Donald L. (Michigan State U) **Goal setting, performance and satisfaction in an interdependent task.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 217-230.—Determined the effects of goals on performance and the effect of performance on reported levels of satisfaction in a competitively structured interdependent bargaining task. Ss were 160 male undergraduates. Satisfaction was assessed by the W. E. Scott et al semantic differential satisfaction questionnaire. Results support E. A. Locke's 1969 theory that the most immediate, direct motivational determinant of task performance is S's goal, and D. R. Ilgen and B. W. Hamstra's 1972 theory that satisfaction with one's performance is a function of both the difference between actual performance and performance goals, and of the difference between actual performance and performance of a reference person. Satisfaction and performance were strongly related only up to the point where a person exceeded his goal or his reference person's outcome. (37 ref)—*Journal abstract*.

5200. Harris, Mary B. (U New Mexico) **Mediators between frustration and aggression in a field experiment.** *Journal of Experimental Social Psychology*,



1974(Nov), Vol 10(6), 561-571.—320 male and female 18-yr-old Ss were assigned to 1 of 32 experimental conditions in a  $2 \times 2 \times 2 \times 2 \times 2$  factorial design. Either a male or female E, saying "Excuse me" or not, dressed in high or low status clothing, cut in line in front of the S, who was standing near the front or back of the line. Verbal and nonverbal aggressiveness were coded and summed to measure total aggression. Ss near the front of the line or interacting with a low status E were more aggressive than those at the back of the line or seeing a high status E. Less aggression was directed against the female E or one who said "Excuse me," and there was a strong tendency for Ss to be more aggressive to a same-sex E. (26 ref)—*Journal abstract*.

5201. Hautala, Jacob E. & Spungin, Helene. (Colorado State U) **Effects of initiation severity and interest on group attitudes.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 245-259.—Examined some conditions of the generality of the finding that a severe initiation leads to liking for a group, using 28 male and 28 female undergraduates as Ss. Sex, interest in joining a group, and severity of initiation were included in a  $2 \times 2 \times 2$  design. It was found that females liked the group members most following a severe initiation, but this was not true for males. Males had the least interest in continuing with a group following a severe initiation, while the females' interest was almost unaffected by their initiations. Ss who were most interested in joining in the beginning perceived the initiation as most severe. The perception of the meaningfulness of the initiation was influenced by all 3 independent variables in a triple interaction.—*Journal abstract*.

5202. Himmelfarb, Samuel & Arzai, Daniella. (Tel-Aviv U, Israel) **Choice and source attractiveness in exposure to discrepant messages.** *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 516-527.—Investigated the effects of choice, source attractiveness, and discrepancy size on the acceptance of a message about a tuition increase under high involvement conditions. Ss were 280 undergraduates. In keeping with dissonance theory predictions, results show that when Ss chose to expose themselves to the discrepant message, the message from an unattractive source produced the most opinion change. Under no-choice conditions, more change was produced by the message from the attractive source. However, this effect only occurred at the highest message discrepancy level. (20 ref)—*Journal abstract*.

5203. Hutton, Geoffrey. (Bath U of Technology, School of Management, Bristol, England) **Assertions, barriers and objects: A conceptual scheme for the personal implications of environmental texture.** *Journal for the Theory of Social Behavior*, 1972(Apr), Vol 2(1), 83-98.—Discusses the psychological ideas arising from the need to consider how an apparently similar physical and social environment can present itself in contrasted forms to different individuals. The subjective definition of environment of each person is presented. The identification of environmental goals and noxious is viewed as a function of the needs of the individual organism. The environment is described in Lewinian terms with boundaries to be closed or opened to persons who can act upon it. Assertion is represented as movement towards the environmental boundary; degree

of distance is distance between organism and boundary; and degree of complexity is complexity of environmental action towards the organism.—*R. S. Albin*.

5204. Iwawaki, Saburo & Lerner, Richard M. (Chukyo U, Japan) **Cross-cultural analyses of body-behavior relations: I. A comparison of body build stereotypes of Japanese and American males and females.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 75-81.—Intercultural continuity of body build-behavior stereotypes was assessed by asking Japanese students to attribute 30 behavioral descriptions to pictures of male endomorphs, mesomorphs, and ectomorphs. Ss were 90 males and 90 females 18-21 yrs old; none had ever taken a psychology course. Both sexes attributed predominantly positive evaluations to the mesomorphs, and predominantly negative evaluations to the other 2 types. The students reversed American stereotypes by showing a stronger negative reaction to the ectomorph.—*R. D. Nance*.

5205. Izzett, Richard R. & Leginski, Walter. (State University Coll New York, Oswego) **Efficacy of associative links in impression formation: A test of the information hypothesis.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 297-298.—Replicated R. Izzett and W. Leginski's (see PA, Vol 48:11497) finding that associative links (e.g., "is") are more effective in producing extreme evaluations of stimulus persons than dissociative links (e.g., "is not") using an extended sampling base. This effect was due to the greater information-conveying properties of associative links.

5206. Izzett, Richard R. & Leginski, Walter. (State University Coll New York, Oswego) **Group discussion and the influence of defendant characteristics in a simulated jury setting.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 271-279.—Groups of undergraduates ( $N = 50$ ) ranging in size from 4 to 6 read D. Landy and E. Aronson's (1969) hypothetical case concerning negligent automobile homicide. Each S within each group received an identical version of the case involving either an attractive or unattractive defendant. Ss were asked individually to sentence the defendant after reading the case. Then each S was asked to make public his sentence to fellow group members, as well as a brief statement of the reasons for his sentence. Following this, all Ss were asked to discuss the case. Each S then rendered a postdiscussion sentence. Results indicate that (a) prior to group discussion Ss in the unattractive defendant treatment sentenced the defendant to a significantly longer prison term than Ss in the attractive defendant treatment; (b) after group discussion there was a significant shift toward leniency in the unattractive defendant treatment, while there was no significant change in the attractive defendant treatment; and (c) the postdiscussion sentences of Ss in the unattractive defendant treatment did not significantly differ from those in the attractive defendant treatment.—*Journal abstract*.

5207. Johnson, Charles D. (Michigan State U) **Competence motivation and interpersonal evaluation.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 199-200.—Examined interpersonal attraction in a face-to-face setting in relation to attitude similarity-dissimilarity and accomplice liking for 80 undergraduate Ss. In

contrast to D. Byrne and W. Griffitt's (see PA, Vol 41:539) previous research, attraction scores in the dislike range were observed. Ss reciprocated the stranger's evaluation and attraction toward them regardless of the degree of attitude similarity. Both reciprocal attraction and similarity attraction effects are discussed in terms of Byrne and G. L. Clore's (see PA, Vol 41:13536) competence-reinforcement theory of attraction.—*Journal abstract.*

5208. Johnson, Ronald W. & MacDonnell, Joan. (St Francis Xavier U, Antigonish, Nova Scotia, Canada) **The relationship between conformity and male and female attitudes toward women.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 155-156.—Presents results of a study of 60 male and female students that support the hypothesis that sex differences in conformity behavior are less pronounced than reported in earlier studies and that there is a negative relationship between attitudes toward the role of women and conformity.

5209. Kaplan, Martin F. (Northern Illinois U) **Context-induced shifts in personality trait evaluation: A comment on the evaluative halo effect and meaning change interpretations.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 891-895.—Evaluative responses to personality traits are affected by the particular context of other traits ascribed to the stimulus person. One interpretation has invoked a denotative change in trait meaning, which then mediates evaluative change. A second interpretation has proposed that meaning is invariant across contexts, but that the response to the trait is an amalgamation of evaluative response to both person and trait. A review of the literature shows that research has employed stimulus substitution, denotative ratings, and trait evaluative variability as strategies in comparing these formulations, but no one test has proven crucial. The evidence, however, is shown to be more consistent with an evaluative halo influence than with a denotative meaning-change process.—*Journal abstract.*

5210. Karpienia, Joseph & Zippel, Bert. (Hunter Coll, City U New York) **Ethnicity and helping behavior.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 31-32.—Investigated the extent to which ethnicity of persons needing help influences helping behavior in others of the same or a different ethnic group where all participants are of the same social class. Telephone calls were made by an E assuming either an Irish or Italian surname to 50 randomly selected respondents with an Irish and 50 with an Italian surname. Ss were asked to help by filling out a questionnaire, which would be mailed to them, about the problems of living in New York City. There were no significant differences among the groups of Ss, indicating that social class, not ethnicity, of caller and respondents may account for earlier group differences found in helping behavior.—*Journal abstract.*

5211. Kimball, Richard K. & Hollander, Edwin P. (State University Coll New York, Fredonia) **Independence in the presence of an experienced but deviate group member.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 281-292.—Provided 3 possible alternatives in response to social influence: agreement with a majority, agreement with a minority, or independence from both. 40 female undergraduates, in groups of 5, initially made

perceptual judgments of unambiguous stimuli in a modified Crutchfield apparatus with 3 response alternatives. In the 1st response position, S received apparent agreement from either 3 or from only 1 of the other 4 during the initial phase. In each group the deviate from the majority judgment had been described as either experienced or inexperienced at the task. In a 2nd phase, all Ss were placed in the last response position for judgments of highly ambiguous stimuli. For 15 critical trials, they saw the majority continue to pick one alternative, and the deviate another. On these trials the S could agree with the majority, with the deviate, or with neither. Results show no major effect for the majority vs minority agreement. However, the presence of an experienced deviate did lead to decreased agreement with the majority, but without more agreement with the deviate. Instead, the presence of an experienced deviate significantly increased independence from all the others. (17 ref)—*Journal abstract.*

5212. La Fave, Lawrence; Haddad, Jay & Marshall, Nancy. (U Windsor, Ontario, Canada) **Humor judgments as a function of identification classes.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 184-194.—Tested a modified version of Hobbes' superiority theory of humor in relation to identification classes (i.e., a vicarious superiority theory of humor). "Joke content" concerned a sit-in which occurred at a Canadian university. Ss were 25 undergraduates in favor of and 25 opposed to the sit-in. Consistent with prediction, each group found that permutation of jokes funnier in which the positive identification class was victorious and the negative class the butt, rather than the opposite permutation. Reasons for preferring the identification classes construct to that of reference group are discussed. (21 ref)—*Journal abstract.*

5213. Mahoney, E. R. (Western Washington State Coll) **Compensatory reactions to spatial immediacy.** *Sociometry*, 1974(Sep), Vol 37(3), 423-431.—Within the setting of a college library, a spatial invasion experiment was conducted to test for the relationship between degree of spatial invasion, sex of S, and specified compensatory behaviors. 10 male and 10 female undergraduates who were seated in the library were Ss; 2 categories of motor responses (flight reactions and cross-glancing, leaning, or blocking) were observed when a female invader occupied 1 or 4 levels of spatial immediacy—seated adjacent to S, directly across from S, or 2 or 3 seats adjacent to S. Results indicate that certain spatial arrangements previously designated as invasion conditions may not be invasions. The previously reported compensatory relationship between spatial immediacy and other immediacy behaviors was not supported. Ss decrease, rather than increase, motor responses. Data further suggest sex differences in the nature of the compensatory reactions to spatial invasion.—*Journal abstract.*

5214. Mann, J. Fraser & Taylor, Donald M. (McGill U, Montreal, Quebec, Canada) **Attribution of causality: Role of ethnicity and social class.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 3-13.—Attempted to determine whether processes involved in trait attribution also operate in the attribution of causality for behaviors of members representing different ethnic and social class groups. 100 middle class English Canadian and 64



French Canadian Ss judged the relative importance of the internal traits of actors in causing them to behave in certain ways. The actors were described as belonging to 1 of the 2 ethnic groups the middle or lower class or some combination of the 2. Ss judged actors' behavior as either socially desirable or socially undesirable. Results provide partial support for the expected relationships between ethnocentric attitudes and stereotypes and degree of perceived internality for behavior. Thus, Ss tended to make more favorable attributions to members of their own social groups than for members of "outgroups," and to attribute causality in ways consistent with social stereotypes. Results also demonstrate that other principles operated in the complex process of causal attribution in a cross-cultural context. (18 ref)—*Journal abstract*.

5215. Mantell, David M. *True Americanism: Green Berets and war resisters: A study of commitment*. New York, NY: Teachers Coll Press, 1974. viii, 285 p. —Reports a study of family relationships, patterns of social and sexual development, personality traits, academic attitudes, relation to authority figures, and reactions to situations involving violence among groups of 25 Green Berets and 25 Vietnam war resisters. The role of early training and environment in shaping the attitudes of these 2 opposing groups is emphasized. (50 ref)

5216. Michellini, Ronald L. & Meant, Lawrence A. (State University Coll New York, Brockport) *Reactions to threat as a function of equity*. *Sociometry*, 1974(Sep), Vol 37(1), 412-419. —Investigated the influence of the norm of equity on affective reactions to receiving either a threat or a suggestion. After working on a pretask, 60 male undergraduates were given \$6 to divide between themselves and another worker who sent them a threat, a suggestion, or no message. Affective reactions to the messages, which attempted to influence reward allocation, were related to the fairness of the requested distribution. Although the source of a threat was evaluated somewhat less favorably than the source of a suggestion (or no message), this difference was seldom significant and never as large as the differences resulting from the manipulation of equity. Results suggest that affective reactions to coercive influence attempts differ as a function of whether or not the desired behavior violates a norm. —*Journal abstract*.

5217. Mikula, Gerald & Egger, Josef. (U Graz, Inst of Psychology, Austria) *[The acquisition of positive and negative attitudes while facing previously neutral persons.]* (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 132-145. —Investigated the acquisition of positive and negative attitudes toward unknown and neutral persons during agreeable and disagreeable situations. 60 male students were confronted with different problem-solving tasks. In addition to the E, a silent O was present during the sessions. Afterwards, Ss were asked to evaluate the O who had left the room, with the help of scales of personality characteristics. Ss who had experienced successes during the problem-solving session evaluated the absent O as more sympathetic than did Ss who had experienced failure. Rejection of the O was particularly strong when the apparent "disorganization" of the E had

clearly caused S's failures. (English & French summaries) (19 ref)—*W. J. Koppitz*.

5218. Mishara, Brian L. et al. (Socio-technical Systems Assn, Boston, MA) *Encroachments upon the body buffer zones of the young and old woman: A naturalistic study*. *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 3-5. —Adapted the methodology of body buffer zone research to explore intergenerational spatial proximity behavior in 30 young women (18-25 yrs) and 30 old women (over age 60) whose body buffer zones were violated by another old or young person. Results suggest that people tend to tolerate longer intrusions on their body buffer zones when the intruder is of the same generation than when the person moving into "their space" is of a different generation. —*A. J. Traxler*.

5219. Newman, Graeme R. (State U New York, School of Criminal Justice, Albany) *Acts, actors, and reactions to deviance*. *Sociology & Social Research*, 1974(Jul), Vol 58(4), 434-440. —Determined whether the actor or the act is crucial in establishing reactions to deviance. Reactions to several kinds of deviant behavior were studied by questionnaires given to 79 undergraduates. Descriptions of acts were varied to show "good," "bad," or "unspecified" actors. The acts of taking marijuana, incest, and evading taxes were not affected by actor characteristics, while the acts of homicide, homosexuality, and pollution were affected, although these differed according to the kind of reaction measured. —*R. V. Heckel*.

5220. Nowicki, Stephen; Nelson, Don A. & Estinger, Ronald F. (Emory U) *The role of need for social approval in initial attraction*. *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 149-150. —Ss completed the Marlowe-Crowne Social Desirability Scale (MCSD) which measured the need for approval and provided the stimulus for proportion of similarity. Results show that the degree of MCSD score significantly affected attraction when the proportion of item agreement (PIA) was 75% but not 50%. High and low MCSD scores were more attracted to strangers who expressed 75% PIA than were middle scorers.

5221. Poivyac, Emil J. & McKillop, Jack. (Loyola U, Chicago) *The set size effect and confidence in reports of behavioral intentions*. *Psychonomic Science*, 1972(Oct), Vol 29(2), 94-96. —Explored the generality of the principles of impression formation, using marital and employment behavioral intentions of 186 undergraduates in a design controlling 4 levels of description (politeness and 3 levels of set size). In addition, several hypotheses were tested relating confidence in the behavioral intention rating to polarity and amount of information presented. In general, findings parallel those obtained when standard evaluative judgments are requested. The reports of confidence increased as polarity and amount of information increased. Some differences in marital and employment behavioral intentions were noted. —*Journal abstract*.

5222. Quarachi, M. Y.; Leggio, Anne H. & White, Frederick W. (Marquette U) *Some biosocial determinants of interpersonal perception*. *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 229-244. —Judgments of 14 stimuli (self and 13 prominent others) on a

personality dimensions were secured from 144 Ss, equally divided between the sexes, 2 age levels (17 and 20 yrs) and 2 IQ groups. Multivariate analysis of variance indicated that (a) there were significant ( $p < .001$ ) age differences in esteeming others, (b) persons of high intelligence generally held others in low esteem, (c) females had a tendency to rate others favorably, (d) females tended to be more discriminating than males in judging others' unhappiness, and (e) when variance-covariance matrices were used to index perceptual differentiation, significant differences ( $p < .05$ ) existed between the age groups and high- and low-IQ Ss for a number of persons judged. (28 ref)—*Journal abstract*.

5223. Rees, David W.; Williams, Lynn & Giles, Howard. (University Coll. Cardiff, Wales) Dress style and symbolic meaning. *International Journal of Symbolic Interaction*, 1974(Mar), Vol 5(1), 1-8. Conducted a study with 60 British undergraduates to determine the symbolic meaning of the tie. A male student (the stimulus person) was observed by Ss, wearing or not wearing a tie, supposedly proceeding either to an interview or to a tutorial. Ss were then unexpectedly asked to evaluate this person along certain personality dimensions. It was found that when the stimulus person was wearing a tie, he was rated significantly as more intelligent, ambitious, serious, and conservative but less open-minded than when he did not wear a tie; social situation also had an influence on Ss' evaluations. Results suggest that the symbolic nature of dress styles may be multidimensional, dynamic, and dependent on the specific social group concerned. *Journal abstract*.

5224. Reich, John W. (Arizona State U) Involvement and response language effects in attitude scaling. *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 572-584. Developed an analytic procedure for separating the effects of involvement from the number of response language categories S employs in judging a set of sentence stimuli. The procedure treats category usage as an independent variable and an aspect of S's response language. In 2 experiments with a total of 60 undergraduates, category usage was shown to have significant influence on several attitudinal judgment processes including informational complexity, mean judgment functions, and a successive intervals analysis testing I. I. Thurstone's assumption of the effect of involvement on equal category spacing. The decrement in scale responding typically associated with involvement depended on category usage operating either singly or in interaction with involvement. (24 ref)—*Journal abstract*.

5225. Rodin, Miriam. (California State U, San Diego) A further look at social desirability. *Psychonomic Science*, 1972(Oct), Vol 29(2), 103-105. Suggests that although the pervasiveness of social-desirability (SD) responding on self-report instruments has been apparently demonstrated, the generality of this finding may be partly an artifactual result of the methodology used. Studies directed to this question have used self-report instruments with 2 characteristics in common, personal-social adjustment content and 2-choice formats. Both of these characteristics would be expected to heighten SD responding, since adjustment items are explicitly coded for SD in the culture, and since in 2-choice formats Ss cannot readily disclaim the (higher) SD alternative

without incriminating themselves. In the present study with a total of 45 Ss, the instrument used differed in both respects. The item format was multiple choice, and the item contents were situationally defined behaviors shown to be not explicitly coded for SD in the culture. 21 Ss were asked to make "typical," SD, and actual behavior judgments for each of the items and to indicate their confidence in the judgments. The findings were replicated with independent sets of both Ss and items. It is concluded that previous work has overestimated the extent of SD responding over self-report instruments in general. The present items may offer a promising direction for constructing self-report instruments less likely to be affected by the SD set.—*Journal abstract*.

5226. Ryckman, Richard M. & Sherman, Martin F. (U Maine, Orono) Locus of control and perceived ability level as determinants of partner and opponent choice. *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 103-110.—The effects of individual differences in locus of control orientation and perceived ability level on the selection of partners or opponents with superior, equal, or inferior abilities for cooperative or competitive task efforts were examined in 80 female Ss. Results indicate that internals were willing to relinquish much of their personal control over their outcomes by selecting superior partners for cooperative ventures, but only after they had become thoroughly convinced of their own lack of ability on the task. Where they perceived themselves as having good ability, in contrast, internals tended to select partners of equal ability for the anticipated cooperative activities, even though selection of superior-ability partners would have enhanced their teams' chances for success. Some externals tended to select inferior-ability partners under the same conditions thus virtually ensuring defeat for their teams. *Journal abstract*.

5227. Schultz, Charles B. (Trinity Coll, Hartford, CT) The effect of confidence on selective exposure: An unresolved dilemma. *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 64-69.—Tested L. Festinger's (1964) hypothesis that confident individuals will seek discrepant information in an attempt to reduce dissonance. Dissonance was induced by presenting 90 Ss with evidence which contradicted their beliefs as well as evidence which lent support to them. Behavioral measures of selective exposure to and acquisition of discrepant information were obtained. Dogmatism was examined as a variable which may offset some of the effect of confidence on selective exposure. Although confidence was successfully induced, it had no effect on selective exposure. A tendency was obtained for high dogmatism to seek more discrepant information in the "low confidence" condition than in the "high confidence" condition.—*Journal abstract*.

5228. Sechrest, Lee & Flores, Luis. (Florida State U) Surplus and sharing in a prison sample. *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 33-44.—Attempted to determine the relationship between an experimentally produced surplus of a commodity and the willingness of an individual to share that commodity with someone less fortunate. Prison inmates participated in an "experiment" in which they won varying numbers of cigarettes for the same effort, the 3 levels of "surplus" being



approximately 10, 50, or 150 cigarettes. They were then solicited by either a high- or low-status inmate for a donation of cigarettes on behalf of inmates in solitary confinement. Results show that the mean number of cigarettes donated increased with the number available, but the trend was not linear; rather it was decelerated. With number of cigarettes donated considered as a proportion of supply, it was shown that the group with the largest surplus donated a significantly smaller proportion. There was also some evidence that a high-status solicitor produced a higher proportion of donated cigarettes. Results are consistent with other findings and as responsive to reality constraints on giving.—*Journal abstract*.

5229. Sharan M. B. & Karan, Leela W. (Bhagalpur U, Hosp for Mental Diseases, India) **Relationship between prejudice and adjustment.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 99-102.—Formulated 2 hypotheses: (a) Prejudice and adjustment are negatively correlated; (b) Individuals who are poorly adjusted score higher in prejudice than those who are well adjusted. Ss were 50 male and 50 female college students. All were given the Revised Prejudice Scale and a 90-item Hindi adjustment inventory. A significant correlation of  $-.33$  was obtained between prejudice and adjustment. The 24 best adjusted and the 24 most poorly adjusted Ss differed significantly in their prejudice scores, confirming the 2nd hypothesis. It is felt that these findings are consistent with psychoanalytic theory.—*R. D. Nance*.

5230. Singh, Ramadhar & Memering, Melinda. (Indian Inst of Technology, Kanpur) **Trait repetition and interpersonal judgement.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 151-152.—Investigated the effect of trait repetition and size of descriptive sets on impression judgment in 44 Ss. Results suggest that repetition of a trait adds a negative meaning to both the positive and negative sets and that trait repetition affects interpersonal judgment in a way different from trait-redundancy and trait-relatedness.

5231. Snyder, Melvin & Jones, Edward E. (Duke U) **Attitude attribution when behavior is constrained.** *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 585-600.—Conducted 5 experiments with a total of 374 undergraduate who were asked to attribute attitudes to target persons on the basis of opinion statements written under high constraints (i.e., the target persons were instructed to prepare the statements but were given no choice concerning the position to be endorsed). The statements were those actually written by other Ss in response to no-choice instructions. Even though the Ss as attributors were well aware of these instructions, and had complied to the same instructions as target persons, attitudes in line with expressed opinions were attributed. In the final experiment, constraints were strengthened even further by the provision of specific arguments that had to be included in the opinion statements. Here the "over attribution effect" finally fell below significance. Results provide further evidence that people tend to make dispositional attributions to "explain" behavior, underestimating the role of environmental constraints.—*Journal abstract*.

5232. Switkin, Linda R. & Gynther, Malcolm D. (St Louis U) **Trust, activism, and interpersonal perception in black and white college students.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 153-154.—An analysis of variance of the trust scores of 69 active and nonactive students on the Rotter's Interpersonal Trust Scale shows that blacks obtained lower trust scores than whites, active blacks obtained significantly lower trust scores than nonactive blacks, and active whites' trust scores were essentially the same as those of inactive whites. Race was also a significant factor in scores of trust attributed to the opposite race.

5233. Thomas, Margaret H. & Tell, Phillip M. (Florida Technological U) **Effects of viewing real versus fantasy violence upon interpersonal aggression.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 153-160.—Of 96 male undergraduates, 32 Ss saw a violent film which they were told represented a real event, 32 saw the same film presented as a fictional event, and the remaining Ss saw no film. 16 Ss in each group had been attacked previously by a confederate while the others had not. Each S was then given an opportunity to aggress against the confederate by administering shocks to him as punishment in a learning task. Results indicate that Ss who observed real violence delivered stronger shocks to the confederate than Ss who viewed fantasy violence or saw no film. Ss who were angered and saw the real film were the most punitive toward the confederate.—*Journal abstract*.

5234. Topalova, Velina. (U Warsaw, Inst of Psychology, Poland) **Credibility of information source.** *Polish Psychological Bulletin*, 1974, Vol 5(2), 73-80.—Tested the influence of 3 factors on communicator credibility—communicator's attractiveness, communicator's expertness, and discrepancy between communicator's and recipient's opinions—upon change of the latter's opinion and upon his assessment of communicator's expertness and attractiveness. Communicator's attractiveness was manipulated by describing communicator as either very similar or very dissimilar to the Ss, 160 Polish female undergraduates. On each of 4 conditions half of the Ss were confronted with a large discrepancy in opinion and the other half with a small discrepancy. Results show that a greater change in recipient's opinion toward communicator's opinion occurred with a marked initial discrepancy in opinion and with recipient's recognition of communicator's expertness. The same 2 variables influenced recipient's assessment of communicator's credibility. (24 ref)—*Journal abstract*.

5235. Touhey, John C. (Florida Atlantic U) **Situated identities, attitude similarity and interpersonal attraction.** *Sociometry*, 1974(Sep), Vol 37(3), 363-374.—Studied the attitude similarity-interpersonal attraction paradigm from the standpoint of C. N. Alexander's situated identity theory. 180 undergraduates acting as Os predicted P's attraction to 0 for 3 proportions of similar attitudes and ascribed personality traits as explanations of 5 orthogonally varied ratings of P's attraction to 0. Findings of the attraction paradigm were accurately simulated. In addition, Ss' ratings of their own attraction to P and the favorability of P's situated identity were highest for the predicted outcomes. Comparisons among the most frequently ascribed traits revealed 2 internally

consistent sets of undesirable personality attributions to P's who displayed inappropriately high or low ratings of attraction for specific proportions of similar attitudes. (21 ref)—*Journal abstract.*

5236. Truzzi, Marcello. (New Coll) **The problem of relevance between orientations for cognitive dissonance theory.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 239-247.—Critiques balance theories (i.e., cognitive consistency theories) of attitude change because they fail to seriously consider a theoretical issue before model construction: the problem of relevance between attitudes. Since determination of whether objects of orientation will or will not be covered by a dissonance or cognitive consistency model depends on first ascertaining whether they are relevant or irrelevant to one another, this constitutes a central problem for any such formulations. 3 types of relevance are discussed: logical, cultural, and instrumental relevance. These forms are considered to be both psychological and sociocultural and should be applied to both fields of study. (22 ref)—*R. S. Albin.*

5237. Turner, Barbara F. & Turner, Castelleno B. (U Massachusetts, Amherst) **The political implications of social stereotyping of women and men among black and white college students.** *Sociology & Social Research*, 1974(Jan), Vol 58(2), 155-162.—Administered semantic differential scales on the concepts "most women are . . ." and "most men are . . ." to 28 black female, 31 black male, 45 white female, and 37 white male undergraduates. White females were the only group to rate the opposite sex significantly more positively than their own sex. Black females rated men as more unreliable than did the other groups and were the only group to rate men as significantly more unreliable than they rated women. Otherwise, black females' evaluations of men did not differ from male evaluations. (16 ref)—*Journal abstract.*

5238. Westbrook, Mary. (Macquarie U, North Ryde, NSW, Australia) **Sex differences in the perception of emotion.** *Australian Journal of Psychology*, 1974(Aug), Vol 26(2), 139-146.—While overall sex differences in sensitivity to emotion have rarely been found, it has been proposed that Ss' sex may be a significant interactional variable. 9 hypotheses were tested, examining sex differences in (a) accuracy of judgment of emotion, (b) attention paid to emotional cues, and (c) type of error made when incorrectly judging emotions, when these variables are related to (d) the emotions being expressed and (e) the sex of the expressor. Little evidence of sex differences was found from testing 49 male and 51 female 18-50 yr old Ss. Males made more evaluative errors when judging positive and negative emotions as expressed by females. Continued research emphasis on sex differences in the perception of emotion is questioned.—*Journal abstract.*

5239. Worchel, Stephen & Arnold, Susan E. (U North Carolina, Chapel Hill) **The effect of combined arousal states on attitude change.** *Journal of Experimental Social Psychology*, 1974(Nov), Vol 10(6), 549-560.—67 undergraduates either were given a choice or no choice to listen to a counter-attitudinal communication. For half the Ss (Interrupt condition) the tape of the communication broke during the concluding sentence of the speech.

The other half (No Interrupt condition) heard the speech in its entirety. A recall measure indicated that Ss in the Interrupt condition recalled significantly more arguments made in the communication than Ss who heard the complete speech. Consistent with dissonance theory, greater attitude change toward the position of the speech occurred in Ss given a choice than in Ss given no choice. Significantly greater change occurred in the Choice-Interrupt condition than any of the other conditions. (21 ref)—*Journal abstract.*

## COMMUNICATION AND LANGUAGE

5240. ———. **Conference on cutaneous communication systems and devices.** Austin, TX: Psychonomic Society, 1974. vi, 112 p.

5241. Ainsworth, W. A. (U Keele, England) **Performance of a speech synthesis system.** *International Journal of Man-Machine Studies*, 1974(Sep), Vol 6(5), 493-511.—Describes a system for synthesizing speech from a phonetic input. A string of phonetic symbols representing the sentence to be uttered is transformed into the control signals required by a parametric speech synthesizer using a small digital computer. Performance tests with 20 listeners resulted in ready identification of vowels, less identification of fricatives, and 90% identification of words.

5242. Arnheim, Rudolf. (Harvard U) **Art and visual perception: A psychology of the creative eye.** (New version). Berkeley, CA: University of California Press, 1974. x, 508 p. \$15.

5243. Baran, Stanley J. & Meyer, Timothy P. (Cleveland State U) **Imitation and identification: Two compatible approaches to social learning from the electronic media.** *AV Communication Review*, 1974(Sum), Vol 22(2), 167-179.—Compares the learning theory of A. Bandura (a stimulus-stimulus contiguity nonreinforcement view) with that expressed by H. B. and J. L. Gewirtz (a stimulus-response instrumental learning approach). A synthesis of the 2 theories (identification and generalization beyond specific acts) is proposed and the importance of this synthesis for the field of educational technology and mass communication research is examined. (25 ref)

5244. Blau, Judith R. (Baruch Coll, City U New York) **Patterns of communication among theoretical high energy physicists.** *Sociometry*, 1974(Sep), Vol 37(3), 391-406.—Used data from an international sample of theoretical high energy physicists to study similarities and differences in individual and contextual characteristics of pairs of consultants. Except for country, the attribute most likely to be shared by a consulting dyad is speciality. Communication links across and within specialties and across status differences are described, and it is suggested that the minute division of labor is the source of universalism in science. (16 ref)

5245. Blumberg, Herbert H.; Fuller, Carolyn & Hare, A. Paul. (U London, Inst of Psychiatry, England) **Response rates in postal surveys.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 113-123.—Considers a variety of recommendations for improving low return rate on mail surveys. Several procedures are evaluated



for their effectiveness: guaranteed return postage, format of cover letter, prestige of sponsor, length of survey, anonymity, premiums or gifts for return of the survey, and reminders. (30 ref)

5246. Cairns, Helen S.; Cairns, Charles E. & Williams, Fredrick. (City U New York) **Some theoretical considerations of articulation phenomena.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 160-173.—Articulation substitutes in the speech samples of American 1st-6th graders, representing standard American English, Black English, and Spanish-influenced English ( $n = 198, 192$ , and  $192$ , respectively), were analyzed using a distinctive features approach. Results indicate that beyond variations due to dialect and 2nd-language influences, most substitutions could be predicted from phonemic complexity criteria developed from phonological theory. Markedness theory is demonstrated as a basis of predicting the phonetic feature characteristics of substitutions.—*Journal abstract*.

5247. Callary, R. E. (Northern Illinois U) **Status perception through syntax.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 187-192.—Previous studies have indicated that untrained judges are able to assign correct social status to a speaker on the basis of a very short sample of speech. However, it is unknown if the linguistic features upon which these decisions are based are to be found in the syntactic, phonological, or morphological components of the grammar. The present study held phonology and morphology constant and examined status judgments of 76 undergraduate Ss, based entirely upon syntax. Findings indicate that judges were consistently able to assign correct social status on the basis of syntax alone.—*Journal abstract*.

5248. Chebat, Jean-Charles. (U Québec, Montréal, Canada) **Symbol: Towards a definition.** *International Journal of Symbolism*, 1974(Mar), Vol 5(1), 31-39.—Argues that the term "symbol" has been outrageously misused and that it would be useful to distinguish it by opposition to concepts with which it has been confused (e.g., allegory, myth, metaphor, and sign). Psychological, linguistic, and historical differences in these terms are cited, and the idea that symbolic communication characterizes society's tolerance level for individuals and its ability for abstract representation is examined. (French abstract)

5249. Crowley, Francis E. (State U New York, Buffalo) **Epiphany in Phoenix Park: A psychoanalytic look at a Dubliner.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 63-70.—An analysis of Duffy, the character in J. Joyce's "A Painful Case," points to the identification of sex, sin, and death in Duffy's relation with Mrs. Sinico.

5250. de Villiers, Peter A. (Harvard U) **An effect of the definite article on the salience of a noun.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 135-141.—Asked 62 English-speaking undergraduates to correct the meaning of semantically anomalous sentences in which a noun, either the subject or object, or the verb could be considered anomalous. Increased specificity of reference led to an increase in the salience of the nouns in the meaning of the sentences. A noun was significantly more likely to be retained in the corrections and the verb considered anomalous if that noun was definite than if it was indefinite. Subject nouns were also more likely to be retained than were object nouns when they broke the

selection restrictions of the verb. This finding is discussed in terms of other studies showing the importance of the subject noun in sentence comprehension.—*Journal abstract*.

5251. Dever, Richard B. (Indiana U) **Discussion summary: Nonspeech communication.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p; \$14.50.—Critically reviews articles by D. Premack (see PA, Vol 53:Issue 3) and D. F. Moore (see PA, Vol 53:Issue 3) on nonvocal language. (18 ref)

5252. Eisinger, Richard A.; Janicki, W. Peter; Stevenson, Robert L. & Thompson, Wendel L. **Increasing returns in international mail surveys.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 124-130.—Reports on studies undertaken to increase the response and lower the cost of international mail surveys. The procedures discussed are the use of registered mail, sending advance postcards, rewards, and follow-up mailings.

5253. Francis, Hazel. (U Leeds, England) **Social class, reference and context.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 193-198.—In samples of 96 5-7 yr old children of social class 1-3 and 96 of social class 4-5, no significant differences were found in the use of nominal group items nor in exophoric reference in a story reproduction task. Results, which appear to contradict P. R. Hawkins's (1969) findings in a picture description task, are discussed with reference to B. Bernstein's (1972) notions of restricted and elaborated codes and W. Labov's (1966) studies of language in social contexts. It is concluded that different codes are available and used for reference in different contexts and that this has particular significance for education.—*Journal abstract*.

5254. Friedrich, Lynette K. & Stein, Aletha H. (Pennsylvania State U) **Aggressive and prosocial television programs and the natural behavior of preschool children.** *Monographs of the Society for Research in Child Development*, 1973, Vol 38(4, Serial No 151), 63 p.—93 children in a 9-wk nursery school session were shown 1 of 3 types of TV programs each day during the middle 4 wks of the session: aggressive cartoons, prosocial programs, and neutral films. The effects of the programs were assessed by the changes in behavior that occurred from the baseline period to the periods during and after exposure to the programs. Ss who saw the aggressive programs showed a decline in tolerance of delay and rule obedience. Aggressive programs increased aggressive behavior only in Ss who initially ranked higher in aggression. Ss exposed to the prosocial programs showed higher levels of task persistence and somewhat higher levels of rule obedience and delay tolerance than those in the neutral condition. These differences were especially pronounced for children with above-average intelligence. Prosocial behavior increased after exposure to the prosocial program for Ss of lower socioeconomic status, but not for those of higher status. Neither attention to the programs nor knowledge about their content was consistently related to behavior change. Home viewing patterns did not predict baseline behavior.—A. Barclay.

5255. Gilbert, Harvey R. & Weismer, Gary G. (Pennsylvania State U, Speech & Hearing Clinic) **The**

**effects of smoking on the speaking fundamental frequency of adult women.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 225-231.—Results of a study of 30 30-54 yr old women indicate that, in the reading condition, speaking fundamental frequency for the smokers was significantly lower than fundamental frequency for the nonsmokers. 87% of the smokers examined by an otolaryngologist exhibited some abnormality in appearance of the vocal folds. Results also suggest that menopause may contribute to a lowering of the speaking fundamental frequency of adult women. (22 ref)—*Journal abstract*.

5256. **Goldberg, Marvin E. & Gorn, Gerald J.** (McGill U, Montreal, Quebec, Canada) **Children's reactions to television advertising: An experimental approach.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 69-75.—Examined both the effects of a child's expectancy of receiving a toy and the number of TV commercials he sees for the toy. In a  $3 \times 3$  factorial design, 133 8-10 yr old boys were presented with low, moderate, or high expectancies of obtaining a toy, followed by 0, 1, or 3 exposures to a TV commercial for the toy. Results indicate that seeing a single commercial for a valued toy produced more favorable reactions to the toy and increased motivated behavior to obtain it, but further exposure to commercials did not increase these effects. As hypothesized, both the value of the product and persistence behavior were a function of exposure to the commercial. Data confirm the hypothesis that the effect of commercials on attitude and behavior is most pronounced with 1 exposure and is consistent with empirical and theoretical findings of satiation effects. (25 ref)—*L. Gorsey*.

5257. **Harman, Gilbert (Ed.)**. (Princeton U) **On Noam Chomsky: Critical essays.** Garden City, NY: Anchor, 1974. xii, 348 p. \$4.95.—Presents a collection of 17 papers on N. Chomsky's theories of language. Contributors include specialists in the fields of philosophy, linguistics, psychology, and anthropology.

5258. **Henderson, Alan I.** (U Southampton, England) **Time patterns in spontaneous speech: Cognitive stride or random walk? A reply to Jaffe, et al (1972).** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 119-125.—Argues that on-off time patterns may serve to identify speech encoding units. An explanation in terms of random processes is best regarded as a null hypothesis. It is not in itself sufficient grounds for rejecting an encoding processes interpretation, as in J. Jaffe et al (see PA, Vol 49:2409). (19 ref)

5259. **Hensley, Wayne E.** (U Indiana) **Increasing response rate by choice of postage stamps.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 280-283.—Examined the technique of increasing response rate to mail surveys by using multicolored commemorative postage stamps. It is concluded that this does increase the return when certain combinations of stamps are used. Results are explained on the basis of the novelty hypothesis.

5260. **Jacoby, Jacob.** (Purdue U) **The construct validity of opinion leadership.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 81-89.—Applied 3 basic techniques of measuring opinion leadership (self-designating, sociometric, and key informant) to 4 cohesive groups in an effort to establish the construct validity of opinion

leadership with respect to clothing, alcoholic beverages, long-playing records, cosmetics, and room decorations. Results show that overlap in opinion leadership did exist across product categories, and that there was a substantial degree of "observational" construct validity for the notion of opinion leadership for the 3 measures selected. (26 ref)—*M. K. Phifer*.

5261. **Jones, Pauline A.** (Memorial U Newfoundland, St John's, Canada) **Elaborated speech and hesitation phenomena.** *Language & Speech*, 1974(Apr-Jun), Vol 17(2), 199-203.—Examined speech characteristics of 2 groups who were discrepant in verbal ability and who were from families differing in press for language development. The sample consisted of 25 pairs of male 5th graders who were matched for general intelligence. Transcripts of Ss' oral responses to stimulus pictures were analyzed, yielding 13 speech variables. High-verbal as compared with low-verbal Ss used more and longer communication units, had a higher index of subordination, and used more tentative statements. Ss having higher verbal ability and using more elaborated speech nevertheless had a shorter mean pause duration and paused less frequently than low-verbal Ss. Findings raise questions concerning the relevance of hesitation phenomena for verbal planning activity accompanying speech.—*Journal abstract*.

5262. **Kent, Raymond D.; Carney, Patrick J. & Severeid, Larry R.** (U Wisconsin, Madison) **Velar movement and timing: Evaluation of a model for binary control.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 470-488.—Used cinefluorographic analyses of the articulatory movements of 2 speakers to evaluate a binary model of velar control. It is argued that the binary control model does not survive rigorous empirical test because (a) it makes some predictions that are inappropriate for American English and (b) the confirmation criteria used in previous reports were applied inconsistently. It is suggested that if binary control models are used in making predictions about the timing of articulations, the binary feature values should be interpreted by means of a systematic phonetics or an elaborated speech production model. Sequences of articulatory movements may be organized in a hierarchical fashion, such that neuromotor instructions from the motor command system often are issued simultaneously for the tongue, velum, lips, and jaw, even though the commands may not always apply to the same phonetic segment. (16 ref)—*Journal abstract*.

5263. **Leifer, Aimee D.; Gordon, Neal J. & Graves, Sherryl B.** (Harvard U, Graduate School of Education, Ctr for Research in Children's Television) **Children's television: More than mere entertainment.** *Harvard Educational Review*, 1974(May), Vol 44(2), 213-245.—Reviews the literature regarding the effects of TV content on children's aggressive and prosocial behavior and on their social attitudes. It is indicated that TV does appear to influence attitudes, and this socializing power should be used constructively. However, examination of the structure of the American TV industry indicates that economic factors outweigh public concern in the choice of programming. The beneficial effects of TV could be enhanced by greater diversity of televised content and by more parental direction of children's exposure to this



content, but it is unknown to what extent, and with what outcome parents try to teach children to evaluate TV critically. (76 ref)—C. M. Franks.

5264. Lester, David. (Richard Stockton State Coll) **Symbolism in the Chinese language.** *International Journal of Symbolology*, 1974(Mar), Vol 5(1), 18-21.—Determined whether evidence could be obtained for graphic and tonal symbolism in the Chinese language in addition to the evidence obtained in previous studies for phonetic symbolism. Data from 44 undergraduates show no evidence of graphic or tonal symbolism, indicating that the symbolic aspects of language may be limited to phonetic aspects.

5265. Levelt, W. J. **Formal grammars in linguistics and psycholinguistics: I. An introduction to the theory of formal languages and automata.** The Hague, Netherlands: Mouton, 1974. x, 143 p.

5266. Levelt, W. J. **Formal grammars in linguistics and psycholinguistics: II. Applications in linguistic theory.** The Hague, Netherlands: Mouton, 1974. viii, 194 p.

5267. Lindauer, Martin S. (State University Coll New York, Brockport) **The psychological study of literature: Limitations, possibilities, and accomplishments.** Chicago, IL: Nelson-Hall, 1974. xiii, 254 p. \$11.

5268. Markiewicz, Dorothy. (Northern Illinois U) **Effects of humor on persuasion.** *Sociometry*, 1974(Sep), Vol 37(3), 407-422.—Used an information-processing framework to review the literature on the effects of humor on the attitude change process. Findings show that (a) humor integral to or adjacent to a persuasive message does not influence persuasion significantly, (b) humor's effects on comprehension and source evaluations are inconsistent, and (c) retention does not appear to be altered by humor usage. Severe methodological problems with prior research include inadequate control messages, questionable humor manipulations, inappropriate settings for receipt of humor, limited S populations, and blatant demand characteristics. Many of these problems plague persuasion research in general. 2 theoretical approaches, learning theory and distraction effects, offer requisite guidance for future investigators. (45 ref)—*Journal abstract*.

5269. Matsuoka, Takeshi & Ono, Tamaki. [A study of aspects of the historical changes in the present senior and junior high school student's way of cognition and feeling.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 177-180.—Administered the color Symbolism Test to 200 middle and high school Ss and compared the responses with those obtained from similar age groups 20 yrs ago, to find difference in affective meaning between the 2 generations. Results show that the younger generation preferred brighter colors.

5270. Matteson, Michael T. (U Houston) **Type of transmittal letter and questionnaire color as two variables influencing response rates in a mail survey.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 535-536.—Mailed questionnaires to 2,123 members of a national professional organization. A significantly greater number ( $p < .001$ ) of returns were received from groups receiving a semipersonal letter than groups receiving a form letter. Among the groups receiving the

form letter a significantly greater number ( $p < .05$ ) of colored questionnaires were returned than white questionnaires.

5271. McDowall, Joseph J. (U Queensland, St Lucia, Australia) **The reliability of ratings by linguistically untrained subjects in response to stress in speech.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 247-259.—To determine the reliability with which untrained raters could identify stress in the speech of a single person, 2 forms of the same material, speech broken into short utterances and speech in its conversational context, were presented to 40 linguistically naive psychology students who were asked to underline those syllables that they perceived as stressed. High reliabilities were obtained from both interrater measures ( $r = 0.96$  for each treatment) and a test-retest estimate ( $r = 0.88$ ). However, significantly larger total stress scores were recorded under the short utterance presentation than under the context condition. It is suggested that this result occurred because each of the few syllables in short utterances received greater attention than did the stream of syllables in context. Subsequent regression analysis led to the prediction that, for a short passage to attain a mean score equal to that which it would receive if rated in context, it should contain approximately 40 syllables. (26 ref)—*Journal abstract*.

5272. Miller, Gerald R. & Simons, Herbert W. (Eds.). (Michigan State U) **Perspectives on communication in social conflict.** Englewood Cliffs, NJ: Prentice-Hall, 1974. xiii, 257 p.

5273. Moores, Donald F. (U Minnesota, Research, Development & Demonstration Ctr in Education of Handicapped Children) **Nonverbal systems of verbal behavior.** In R. L. Schiefelbusch & L. L. Lloyd (Eds.), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Suggests that the resilience and endurance of manual communication systems are indications that they are meeting an unmet need. Experience with deaf children and adults is cited in support of this view. (3 p ref)

5274. Ochsman, Robert B. & Chapanis, Alphonse. (U Arkansas, Little Rock) **The effects of 10 communication modes on the behavior of teams during co-operative problem-solving.** *International Journal of Man-Machine Studies*, 1974(Sep), Vol 6(5), 579-619.—60 teams of 2 male undergraduates each solved credible "real world" problems cooperatively. Conversations were carried on in 1 of 10 modes of communication: typewriting only, handwriting only, handwriting and typewriting, typewriting and video, handwriting and video, voice only, voice and typewriting, voice and handwriting, voice and video, and a "communication-rich mode." Performance was assessed on 3 classes of dependent measures: time to solution, behavioral measures of activity, and linguistic measures. Significant and meaningful differences among the communication modes were found in each of the 3 classes of dependent variable. Behavior was recorded in 21 different categories from which 3 additional composite categories were formed. The analyses of the behavioral data yielded 51 statistically significant terms. Data support the conclusion that the single most important decision in the design of a telecommunications link

should center around the inclusion of a voice channel.  
—*Journal abstract.*

5275. Papich, George & Rainbow, Edward. (North Texas State U) **A pilot study of performance practices of twentieth-century musicians.** *Journal of Research in Music Education*, 1974(Spr), Vol 22(1), 24-34.—Carried out graphic analyses of recordings of 4 violin, 4 cello, and 5 double bass students. Pitch vibrato was present in the initial attack of all tones. When each performer used vibrato, the speed of the vibrato and pitch width were the same in solo playing as in ensemble playing. Pitch vibrato appeared to be an oscillation in an upward direction from conceived pitch rather than above and below it. When performers erred in going from a lower pitch note to a higher note, the error tended to be an overestimation of the interval. Comparisons of solo with ensemble performances indicate that solos tended to be slightly sharper in pitch, and that pitch adjustments in ensemble performances tended to be downward.—D. S. Higbee.

5276. Power, Joseph P. (Moreno Inst, New York, NY) **The theatre of the Catholic Church, its roots and relationship to psychodrama.** *Handbook of International Sociometry*, 1973, Vol 7, 55-59.—Presents a historical summary of the use of the dramatic medium by the Catholic Church since the early Middle Ages. The Church is criticized because it has chosen to focus on the conserved product or completed script to promulgate the Christian message and has provided little opportunity for the creative and spontaneous contributions of those persons who strive to live out that message. 10 ways in which the Church might redefine its use of the dramatic medium and utilize creativity and spontaneity are listed, each within a sociometric framework.—R. J. Ambrosino.

5277. Ramsey, Craig A. & Wright, E. N. (Board of Education, Toronto, Ontario, Canada) **Age and second language learning.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 115-121.—Describes a study of 5th, 7th, and 9th grade "new Canadians" on the relationship between age on arrival and achievement in English language skills. Results show that Ss who arrived at 6-7 yrs or younger performed close to average, and that there was no relationship between age on arrival and performance. The average scores for Ss who arrived at an older age progressively dropped, and correlations indicated a modest relationship between age on arrival and test scores. Thus while all recent arrivals have initial difficulties in learning the language, it appears that over time age on arrival is the critical variable. This provides indirect support for the position that there is a critical age for optimum instruction in a 2nd language. The evidence is less clear for 1 of the 7 language measures—intonation.—*Journal abstract.*

5278. Ramstad, Vivian V. & Potter, Robert E. (Richmond Unified School District, CA) **Differences in vocabulary and syntax usage between Nez Perce Indian and white kindergarten children.** *Journal of Learning Disabilities*, 1974(Oct), Vol 7(8), 491-497.—Through the use of the Peabody Picture Vocabulary Test and the Northwestern Syntax Screening Test, this study sought to determine if there were significant differences between 21 Nez Perce Indian and 21 white kindergartners in their use of receptive vocabulary and receptive and expressive

syntax. The study also attempted to determine if there were any significant differences between receptive vocabulary and receptive syntax and between receptive and expressive syntax within each population. Significant differences were found between the 2 populations in all 3 tasks measured. It is suggested that this investigation has implications for educational strategy, as well as for further language evaluational and instructional considerations. (20 ref)—*Journal abstract.*

5279. Robertson, Thomas S. & Rossiter, John R. (U Pennsylvania, Wharton School) **Children and commercial persuasion: An attribution theory analysis.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 13-20.—Studied children's levels of understanding of TV commercials and the associated effects upon attitudes and purchase request tendencies. Attribution theory, with its focus on perception of intent, was the research framework. Results suggest that when a child attributes persuasive intent to commercials, he believes them less, likes them less, and is less likely to want the products advertised. (19 ref)—*Journal abstract.*

5280. Rosenbaum, Bent. (Bispebjerg Hosp, Dept of Psychiatry, Copenhagen, Denmark) **[Semiotics and psychiatry.]** (Danh) *Nordisk Psykiatrisk Tidsskrift*, 1974, Vol 28(2), 83-94.—Discusses the relation between linguistics and psychiatry. Both disciplines concern human communication, but they have remained apart. The linguistic analyses of P. Aa. Brandt are well suited to bridge the gap between the theory of language and psychodynamics. The dual nature of personality is reflected in a dualism of spoken messages; only the latter can be subjected to direct and objective study. A theoretical analysis of schizophrenic language is presented.—R. G. Wikmark.

5281. Rothschild, Michael L. & Ray, Michael L. (Stanford U) **Involvement and political advertising effect: An exploratory experiment.** *Communication Research*, 1974(Jul), Vol 1(3), 264-285.—Data from a laboratory experiment on the relationship among awareness, attitude formation, and intent to behave over several levels of election races and several levels of advertising show that in lower-level elections behavior is easily influenced by a high repetition level of innocuous advertising; this phenomenon does not occur in the higher-level races. Ss were 161 self-selected persons in a shopping center. This change in behavior was accomplished without an accompanying shift in attitude. The shift occurred equally among those Ss who were evaluated as having high involvement with the political process and those evaluated as having low involvement. (34 ref)—*Journal abstract.*

5282. Scherer, Klaus R. (U Giessen, Fachbereich Psychologie, W Germany) **Voice quality analysis of American and German speakers.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 281-298.—Investigated voice-personality relationships and sociocultural and attributional factors affecting voice. 6 phoneticians rated the voices of 26 American and 22 German speakers on 9 voice quality parameters which were discussed and illustrated by tape-recorded examples before the rating sessions. A reliability analysis shows highly significant interrater agreement on most parameters. Intercorrelations of the expert ratings and correlations with lay



ratings of voice are reported and discussed. (29 ref)  
—*Journal abstract.*

5283. Siegel, Arthur I.; Lambert, Joseph V. & Burkett, James R. (Applied Psychological Services, Science Ctr, Wayne, PA) **Techniques for making written material more readable/comprehensible.** *US AFHRL Technical Report*, 1974(Aug), No 74-47, 24 p.—Outlines the application of psycholinguistic and intellectual concepts to enhance the readability and comprehensibility of written materials. Guidelines for making the reader's task easier are provided, and several readability measurement procedures—including use and comprehension tests, the cloze procedure, and element-counting and rating-by-experts techniques—are discussed.—*Journal abstract.*

5284. Sivik, Lars. **Measuring the meaning of colors: Reliability and stability.** *Göteborg Psychological Reports*, 1974, Vol 4(12), 14 p.—Discusses 2 kinds of reliability estimates concerning semantic differential measurements of color connotations: (a) test-retest for the same groups and (b) consistency between groups. Data on stability are presented from a number of different studies. The stability of color connotations seems to depend on the relevance of the scale to the color judged. As a particular scale differs in relevance to different colors, this implies that interaction between scales and concepts affects the reliability. Another interacting factor—interindividual differences in stability of judgment—is demonstrated.—*Journal abstract.*

5285. Spencer, H.; Reynolds, Linda & Coe, B. (Royal Coll of Art, Readability of Print Research Unit, London, England) **Typographic coding in lists and bibliographies.** *Applied Ergonomics*, 1974(Sep), Vol 5(3), 136-141.—Compared the effectiveness of 10 systems of typographical-spatial coding suitable for use in the presentation of highly structured information such as bibliographic material. Results show that the most effective system was a 2-unit left extension of the 1st line of each entry.

5286. Staats, Arthur W. (U Hawaii) **Behaviorism and cognitive theory in the study of language: A neopsycholinguistics.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Proposes a method of rapprochement between learning approaches and cognitive approaches to the study of language. The background of the schism is reported and central issues are discussed. (3 p ref)

5287. Totman, Richard. (University Coll, London, England) **An approach to cognitive dissonance theory in terms of ordinary language.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 215-238.—Responds to a major critique of cognitive dissonance theory: that it is difficult to specify the necessary and sufficient conditions for the occurrence of dissonance and hence the means by which unambiguous predictions can be made. It is suggested that dissonance occurs whenever there is an unresolved "why" question either articulated or implied in a situation. Dissonance theory is seen as having its conceptual roots in the philosophical thesis of the "compatibilism" of free will with determinism. Rules and structure, and the search for them, form the basis for dissonance reduction. (33 ref)—*R. S. Albin.*

5288. Twitchell, James. (U Florida) **"Desire with loathing strangely mixed": The dream work of Christabel.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 33-44.—The unfinished poem of Coleridge, *Christabel*, is interpreted as conveying the Oedipal conflict of the author. This theme accounts for the "desire with loathing strangely mixed" and for Coleridge's inability to complete the poem.

5289. Van de Bogart, Erik. (U Maine, Maine Public Broadcasting Network, Orono) **Viewer-active television.** *Educational Technology*, 1974(Mar), Vol 14(3), 37-42.—Describes a series of 5 television programs during which viewers' opinions were employed to modify the program content. The programs dealt with a hypothetical controversial ecology issue regarding a proposed cannery. The programs were broadcast to home viewers and school classes, and supplementary materials were provided to teachers and the public. The specific content of the programs was contingent upon viewers' votes which were solicited after each program in the series.—*C. B. Kreitzberg.*

5290. Wakefield, James A.; Doughtie, Eugene B. & Yom, Byong-Hee Lee. (U Houston) **The identification of structural components of an unknown language.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 261-269.—18 undergraduates attempted to identify structures (words and constituents) in sentences of a foreign language. Ss heard each sentence twice—once with a pause interrupting a structural component and once with a pause separating different structural components. Ss were asked to choose the version that sounded more natural. An experimental group of Ss who had been previously exposed to a spoken passage in the same language as the test sentences was more successful in identifying structures of the sentences than was the control group with previous exposure to another language. This result was interpreted as demonstrating that language structure may be partially acquired during a brief exposure without reliance on meaning. It was also noted that the experimental group identified constituents more accurately than words, suggesting that constituents, more than words, function as acquisitional units of language.—*Journal abstract.*

5291. Ward, Charles D.; Seboda, Barbara L. & Morris, Vernon B. (U Maryland) **Influence through personal and nonpersonal channels of communication.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 135-140.—Conducted a city-wide campaign involving various channels of communication to obtain high school seniors for a survey of occupational decision-making. Of the 102 seniors who telephoned to make appointments, 56 later attended their assigned questionnaire session. The rate of attendance differed for the communication channels. Newspaper advertisements attracted the most telephone calls but had the lowest attendance rate; notices on bulletin boards in city recreation centers produced the fewest telephone calls but had the highest attendance rate. Other channels, including personal contact, were intermediate in effectiveness. Additional findings were that nonpersonal channels differed in influence and that exposure through multiple channels resulted in more influence than exposure through only one channel.

Implications of the findings, especially for conceptualizations of channel influence, are noted.—*Journal abstract.*

5292. Waryas, Carol & Stremel, Kathleen. (U Kansas, Parsons Research Ctr) **On the preferred form of the double object construction.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 271-280.—2 groups of 15 adults participated in 2 preference rating tasks for written sentence forms. Pairs of sentences were presented to the Ss which differed only in the grammatical form used to express the double object construction (one which has both a direct and an indirect object). Several hypotheses were formulated regarding the nature of Ss' preferences for various combinations of grammatical form and "pronominalization." Results indicate that Ss showed clear preferences for one grammatical form in most instances and that rules could be formulated for these preferences. The relevance of these results for the examination of current language assessment tests and the development of language training programs is discussed.—*Journal abstract.*

5293. Weiss, Carol H. (Columbia U, Bureau of Applied Social Research) **What America's leaders read.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 1-22.—Studied the material read by 545 executives of industrial and nonindustrial corporations, government, labor unions, and mass media during 1971-1972. Sizable percentages of all groups read leading newspapers daily as well as weekly news magazines. Professional magazines and trade journals were read regularly by executives in the professions concerned. Media executives and intellectuals read more outside their special interest range. Reading publications with liberal or conservative orientations correlated significantly with executives' attitudes towards civil liberties, foreign policy, social radicalism, economic reform, and economic redistribution.—*M. K. Phifer.*

5294. Welsh, George S. (U North Carolina, Chapel Hill) **Symbolic color/form relationships.** *International Journal of Symbolology*, 1974(Mar), Vol 5(1), 9-17.—Tested the color-form associations postulated by F. Birren (1955) and H. Dreyfuss (1972): square-red, rectangle-orange, inverted triangle-yellow, hexagon-green, circle-blue, oval-purple, diamond-brown, convex-lens-gold, concave-lens-silver, semicircle-white, hourglass-gray, and trapezoid-black. Ss were 220 undergraduates who were either asked to draw forms for 12 given colors or to give colors for 12 given forms. 34 Ss matched colors and forms. Only the triangle-yellow association was supported; this was explained as an association to the traffic "yield" sign. It is suggested that, on the basis of other relatively frequent associations, there may be personality differences in color-form associations and symbolization.—*Journal abstract.*

5295. Woelfel, Joseph; Woelfel, John; Gillham, James & McPhail, Thomas. (Michigan State U) **Political radicalization as a communication process.** *Communication Research*, 1974(Jul), Vol 1(3), 243-263.—Data from 412 adult education students in Canada showed that attitudes toward French Canadian separatism can be accounted for by differential communication processes; attitudes were well explained by a weighted average of the information received from interpersonal and media sources. The resultant attitude showed substantial effects

on behaviors related to separatism for the same respondents. (33 ref)

5296. Wright, Peter L. (U Illinois) **Analyzing media effects on advertising responses.** *Public Opinion Quarterly*, 1974(Sum), Vol 38(2), 192-205.—Analyzes many aspects of media effects on attitudinal responses of audience members. Responses by 160 housewives 25-55 yrs old, from a heterogeneous educational and socioeconomic background, to various types of media presentation supplied data on the following variables: extent of cognitive activity, counterargument, source derogation, supporting argument, message retention, and acceptance of the advertising message.—*M. K. Phifer.*

5297. Ziff, Ruth. **The role of psychographics in the development of advertising strategy and copy.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Discusses the limitations of demographics in advertising and the type of psychographic input most useful in developing an advertising strategy. A communications model of advertising is described, and 2 examples of how life-style and psychographic techniques can assist the creative process are presented.

## PERSONALITY

5298. Abramson, Paul R.; Abramson, Linda C.; Wohlford, Paul & Berger, Stephen E. (Connecticut Coll) **The multidimensional aggression scale for the structured doll play interview.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 436-440.—Constructed a multidimensional aggression scoring system for preschool children's responses to the structured doll-play interview. The system, which incorporates previous investigators' findings, scales doll-play responses along 3 dimensions of aggression: intensity, agent, and directionality. Data were analyzed from responses of 123 black Head Start preschoolers aged 4 yr 9 mo to 5 yr 6 mo. A Spearman rank-order correlation of .92 was obtained with a previous scoring system, while interscorer reliability ranged from .838 to 1.0. The intercorrelative structure of the present scoring system is presented. (16 ref)—*Journal abstract.*

5299. Ansbacher, Heinz L. (U Vermont) **Goal-oriented individual psychology: Alfred Adler's theory.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Examines the background and nature of Adlerian theory and its relationship to Freudian theory. Terminology and definitions are discussed. The theory is applied to the case of Marilyn Monroe to illustrate its concepts and describe a hypothetical treatment. (3½ p ref)

5300. Antonovsky, Aaron. (Ben Gurion U of the Negev, Regional Ctr for Health Sciences, Beer-Sheva, Israel) **Conceptual and methodological problems in the study of resistance resources and stressful life events.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5301. Apfeldorf, Max et al. (VA Ctr, Martinsburg, WV) **A method for the evaluation of affective associations to figure drawings.** *Journal of Personality Assessment*



ment, 1974(Oct), Vol 38(5), 441-449.—Usual scoring systems for figure drawing techniques are based on structural and content aspects of the drawing and ignore the affectively toned associations that occur when an O first sees a drawing. A system for measuring 2 components of judgment—emission of affective associations and evaluation of affective associations—was developed and tested with 19 female undergraduates who had represented in their drawings an image that corresponded to their actual physical appearance. Results suggest that the evaluation component of judgment may contribute more to discrimination than the emission component.—*Journal abstract.*

5302. Battista, John & Almond, Richard. (Langley Porter Neuropsychiatric Inst, San Francisco, CA) **The development of meaning in life.** *Psychiatry*, 1973(Nov), Vol 36(4), 409-427.—Presents an operational definition of the term "meaningful life." 2 previous tests for meaningfulness in life—the Personal Orientation Inventory and the Purpose in Life Test—are evaluated, a 3rd—the Life Regard Index (LRI)—is described. Validation of the LRI is presented. 5 theoretical approaches to the development of positive life regard are discussed: philosophical, relativistic, psychological, transactional, and phenomenological. The LRI appears to be a useful preliminary measure and the phenomenological model most descriptive. The LRI is presented in an appendix. (44 ref)—*E. M. Uprichard.*

5303. Boor, Myron. (Ft Hays Kansas State Coll) **Dimensions of internal-external control and marital status, sex, age, and college class.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 145-146.—Data obtained from 366 Ss indicate that unmarried Ss scored significantly higher on items on Rotter's Internal-External Control Scale (I-E) that pertain to relatively immediate, personally relevant environmental events and on the total I-E scale.

5304. Braun, John R. & Calandro, Patricia A. (U Bridgeport) **Effects of different instructions on consistency of personality inventory responses.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 459-461.—A novel feature of the Edwards Personality Inventory (EPI) is that the S responds to the items as he believes those who know him best would answer if asked to describe him. The present study tested the EPI hypothesis that reliability would be higher for these instructions vs the more conventional ones to "describe yourself directly as you see yourself." 60 undergraduates were tested in each of 3 conditions: Booklet IA (test-retest), Booklet IB (test-retest), and Booklets IA and IB (alternate forms reliability). Within each condition, approximately half responded under EPI novel instructions and half responded under conventional instructions. Directly contrary to the prediction, the proportion of conventional instruction correlations which were higher than the corresponding novel instruction correlations was significantly greater than chance ( $p < .01$ ).—*Journal abstract.*

5305. Brown, Marilyn; Jennings, Jim & Vanik, Vickie. (California State U, Humboldt) **The motive to avoid success: A further examination.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 172-176.—Replicated and extended M. S. Horner's 1968 "fear of success"

study. 177 high school and college students wrote stories in response to the following cues: "After first-term finals, John (Anne) finds himself (herself) at the top of his (her) medical-school class." Results indicate similarity of response of high school men and women and college men, all of whom expressed more fear of success imagery in response to the Anne cue than to the John cue. College women did not conform to this pattern.—*Journal abstract.*

5306. Bruch, Hilde. (Baylor U) **Interpersonal theory: Harry Stack Sullivan.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Outlines the influence of Sullivan's principles and practices on modern psychiatry. The psychotherapeutic implications are discussed.

5307. Burton, Arthur (Ed.). (Private practice, Sacramento, CA) **Operational theories of personality.** New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.

5308. Burton, Arthur. (Private practice, Sacramento, CA) **Existential and humanistic theories: I. Ludwig Binswanger.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Discusses Binswanger's role in the influence of phenomenology and existentialism on classical psychoanalysis. It is noted that the existential analyst is more of a process model than the Freudian analyst. (23 ref)

5309. Burton, Arthur. (Private practice, Sacramento, CA) **The nature of personality theory.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Examines the various elements involved in personality theory and notes their relationship to the healing of anxious or non-normative personalities. The elements include growth and deficit, symbolism, the unconscious, change, and morality. The nature of a personality theory is outlined.

5310. Burton, Arthur. (Private practice, Sacramento, CA) **Existential and humanistic theories: II. Ronald D. Laing.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Describes Laing's approach to psychiatry as existential phenomenology. The concepts of phenomenology are defined and discussed.

5311. Crawford, Charles B. (Simon Fraser U, Burnaby, British Columbia, Canada) **A canonical correlation analysis of cortical evoked response and intelligence test data.** *Canadian Journal of Psychology*, 1974(Sep), Vol 28(3), 319-332.—Notes that there has recently been considerable interest in the use of averaged cortical evoked responses for the measurement of intelligence. To the clinical or educational psychologist they may provide a more objective assessment of intelligence. To the researcher interested in the nature and development of intelligence they may provide a means of investigating the biological substrate of intelligence. The present canonical correlation analysis of evoked response and intelligence test data from a previous study seems to indicate that, while evoked response data may have some value for research, it may not be so useful for individual prediction. (French summary) (25 ref)—*Journal abstract.*

5312. de Bonis, Monique. (Clinique des Maladies Mentales et de l'Encéphale, Lab de Psychologie Médicale, Paris, France) **Content analysis of 27 anxiety**

inventories and rating scales. In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5313. **de Grâce, Gaston-René** (U Laval, Quebec, Canada) **The compatibility of anxiety and actualization.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 566-568.—While traditional personality theories view anxiety and actualization as mutually exclusive, some more recent ones consider the possible positive role of anxiety in actualization. The present study hypothesized that there would be no significant difference in terms of level of anxiety between a group of actualized (EG) and another group of nonactualized (CG) Ss. The Ss, 18 for the EG and 12 for the CG, were selected among male forestry majors in a junior college by means of the Personal Orientation Inventory. Ss were administered the Institute for Personality and Ability Testing Anxiety Scale (French version). Results, which confirm the hypothesis, are discussed in relation to existing theories and experimental data.—*Journal summary*.

5314. **Diamond, Michael J. & Bond, Michael H.** (U Hawaii) **The acceptance of "Barnum" personality interpretations by Japanese, Japanese-American, and Caucasian American college students.** *Journal of Cross-Cultural Psychology*, 1974(Jun), Vol 5(2), 228-235.—A total of 34 native Japanese, 32 Japanese-American, and 24 Caucasian American students at universities in Japan and Hawaii were compared on their acceptance of "Barnum" personality statements (i.e., personality descriptions worded in very general and ambiguous terms). The Barnum descriptions were presented to the Ss as having been interpreted by "several clinical psychologists" from the Ss' Rorschach protocols. Results indicate that all 3 groups were equally and highly likely to endorse these descriptions as being true of themselves even when attempts were made to control for compliance effects. Findings are discussed with reference to similar acculturation influences in terms of mass media and course content self-concept learning experiences among university students. The utility of intra- and intercultural personality assessment is considered in terms of the high base-rate Barnum statement acceptance. (15 ref) —*Journal abstract*.

5315. **Dohrenwend, Bruce P.** (Columbia U, Coll of Physicians & Surgeons) **Problems in defining and sampling the relevant population of stressful life events.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5316. **Durand, Douglas & Shea, Dennis.** (U Missouri, School of Business Administration, St Louis) **Entrepreneurial activity as a function of achievement motivation and reinforcement control.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 57-63.—Gave reinforcement control and achievement motivation measures (Rotter's Internal-External Control Scale and the Thematic Apperception Test, respectively) to 22 male and 7 female black adults engaged in operating small businesses. Level of business activity was assessed 18 mo later. Ss with a high need to achieve were found to be significantly more active than those whose achievement motivation was low. Activity scores of internal locus of control Ss were

significantly higher than those of externals. Internals with a high need to achieve were significantly more active than all others. Data suggest that thoughts are most successfully translated into action when the individual feels in control of his fate and recognizes the steps that are instrumental in reaching goals.—*Journal abstract*.

5317. **Eggert, Dietrich.** [**Eysenck-Persönlichkeits-Inventar: E-P-I: Handanweisung für die Durchführung und Auswertung.** (Eysenck Personality Inventory (EPI): Directions for its implementation and evaluation.)] (Germ) Göttingen, W Germany: Verlag für Psychologie, Dr C. J. Hogrefe, 1974. 32 p.

5318. **Eiduson, Bernice T.** (U California, Medical School, Los Angeles) **10-year longitudinal Rorschachs on research scientists.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 405-410.—Administered the Rorschach test to 40 male Caucasian research scientists in 1959 and in 1969, as part of a battery of projective and objective measures and depth interviews in a 10-yr study of changes in and factors influencing Ss' career development. Results show (a) Ss' personalities were remarkably stable over time; (b) pre- and posttest changes were evident only in the area of content; (c) Ss showed a lessened interest in sexuality and less originality in thinking at the 2nd session; (d) work remained a basically strong motivating factor, although there was less involvement in work from the point of view of satisfaction; and (e) none of the changes measured were related to changes in career lines.—*B. McLean*.

5319. **Ekstein, Rudolf.** (Reiss-Davis Clinic, Childhood Psychosis Project, Los Angeles, CA) **Psychoanalytic theory: Sigmund Freud.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Examines the assumptions and structure of psychoanalytic theory. Various models of the analytic process are analyzed. A case illustration is presented in detail. Speculations on the future of psychoanalysis are included.

5320. **Exner, John E.** (Long Island U) **The Rorschach: A comprehensive system.** New York, NY: John Wiley & Sons, 1974. xx, 488 p. \$27.50.—Based on several approaches to the Rorschach test developed between 1935 and 1957, an integrated system is presented which includes methods of administration and scoring, the working tables necessary for scoring and interpretation, and principles of interpretation. 12 sample protocols are presented to show how the test may be used.

5321. **Felj, J. A. & Orlebeke, J. F.** (Vrije U, Amsterdam, Netherlands) **Spiral aftereffect duration as a correlate of impulsiveness.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 189-197.—Data from a correlational analysis show that impulsiveness, assessed in 40 male undergraduates using a questionnaire concerned with speed of judgment and decision making, was negatively correlated with spiral aftereffect (SAE) duration. However, this relationship was present only in Ss with high neuroticism scores (assessed with a Dutch modification of the Maudsley Personality Inventory). In Ss with high neuroticism scores, SAE was also positively related to debilitating anxiety. A parallel was suggested between impulsiveness and G. Heyman's concept of "secondary function," a personality dimension which



was similarly operationalized in a visual aftereffect experiment. Some other SAE correlates are discussed, including heart rate and galvanic skin response amplitude. (23 ref)—*Journal abstract*.

5322. Fisher, Harwood. (City Coll, City U New York) **Logic and language in defences.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 157-214.—Explores the concept of defense mechanisms with particular respect to the logic of defensive beliefs, the syntax of defensive language, and the semantic issues affected. A descriptive model is presented that attempts to clarify issues such as personality development and functioning (especially distortions of personal and social reality), ways of knowing facts, and accessibility to dialog about beliefs. It is concluded that (a) defenses can be studied carefully in terms of verbal language; (b) linguistic analyses of dialogs in therapy, education, and law may be made; and (c) these analyses may be helpful in discovering syntactic dimensions of superficial as well as "deeper" structures to the things people say. (16 ref)—*R. S. Albin*.

5323. Frodi, Ann. **On the elicitation and control of aggressive behavior.** *Göteborg Psychological Reports*, 1974, Vol 4(8), 16 p.—Summarizes the main contents of 4 articles, including (a) a review of recent theoretical and empirical work in the field of aggression, (b) the effects of exposure to aggression-eliciting and aggression-inhibiting stimuli on subsequent aggression, (c) hostility catharsis revisited, and (d) alternatives to aggressive behavior for the reduction of hostility. Several theories of aggression are examined. The importance of stimuli in the environment for the elicitation of aggressive behavior is discussed as well as cognitive restructuring as a means for reducing hostility. The notion of demand characteristics is discussed, as well as the ecological validity of laboratory research. (61 ref)—*Journal abstract*.

5324. Garfield, Charles A. (U California, Berkeley) **A psychometric and clinical investigation of Frankl's concept of existential vacuum and of anomia.** *Psychiatry*, 1973(Nov), Vol 36(4), 396-408.—Differentiates between the concepts of existential vacuum and anomia. The former refers to the failure to experience a sense of meaning which provides a self-identity. Anomia is a personal state in which social cohesion is minimal or nonexistent. To study the differences 222 Ss from 5 groups given the Purpose-In-Life Test (PIL), 2 anomia scales, and the California Psychological Inventory (CPI). Ss were ghetto residents, engineers, graduate psychology students, inhabitants of a rural commune, and graduate students in religion. The PIL did not correlate with either the anomia scales or the CPI, but the 2 anomia scales did correlate with each other. A further interview was conducted with high and low anomic Ss from each group. The different groups were found to have different interpretations of the phenomenon of existential vacuum.—*E. M. Uprichard*.

5325. Gjesme, Torgrim. (U Oslo, Norway) **Goal distance in time and its effects on the relations between achievement motives and performance.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 161-174.—Based on N. E. Miller's theoretical model, it was predicted that (a) pupils high in motive to approach success and low in motive to avoid failure (approach-

oriented) would increase and (b) those with the opposite motive constellation (avoidance-oriented) would decrease their level of performance as a distant future goal approaches in time. Ss were 411 Norwegian 6th graders who completed the Achievement Motives Scale. These hypotheses were supported when number of problems solved correctly was used as measure of level of performance, while only the first hypothesis received support when number of problems attempted was employed. The hypothesis that avoidance-oriented pupils would have a steeper slope of goal gradient for performance than the approach-oriented pupils received no support. (24 ref)—*Journal abstract*.

5326. Gonzalez-Tamayo, Eulogy. **Dogmatism, self-acceptance, and acceptance of others among Spanish and American students.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 15-25.—Assessed the extent to which open societies produce open-minded persons and closed societies close-minded persons. Male and female Catholic high school students, from Spain and from the US, were compared on dogmatism scores (DS), acceptance of self (SA), and of others (AO). Results indicate that the 3 variables were significantly related in both countries and for both sexes. Spanish Ss scored significantly higher in DS and lower in AO than American Ss. Girls scored significantly higher than boys in AO in both countries; boys scored significantly lower in DS and higher in SA than girls in Spain, but the opposite was the case in the US. Ss from higher socioeconomic class scored lower in DS (in both countries) and higher in SA and AO (only in Spain) than Ss from lower classes. The more yrs the father had gone to school, the lower the children scored on DS in the US and the higher they scored on SA in Spain. Results suggest that society is a source of differences in attitudes and the relationship between beliefs organization and attitudes toward self and others.—*Journal abstract*.

5327. Haan, Norma & Day, David. (U California, Inst of Human Development, Berkeley) **A longitudinal study of change and sameness in personality development: Adolescence to later adulthood.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 11-39.—The life span from early adolescence to later adulthood, with assessments at 4 time periods, was described by means of Q-sort items and analyzed according to processes of personality change and maintenance of sameness. Change was determined by analysis of variance with repeated measures, and sameness was indexed by intraclass product movement correlation coefficients. A replicative design was used with a total of 136 longitudinally studied participants in 4 different samples: male and female participants in the Oakland Growth Study and the Guidance Study. The preservation of sameness was the most frequently observed phenomenon, but 2 different kinds of systematic change were identified: transpositions within the participants' maintenance of internal consistency across time, and emergent changes for samples with marked discontinuities among individuals. The pattern of results is consistent with the view that development during adulthood involves reorganization, and the content of the findings is compatible with E. Erikson's description

of the stages of identity formation, intimacy, generativity, and integrity. (16 ref)—*Journal abstract.*

5328. Harshbarger, Thad R. (City Coll, City U New York) **Differential desirability.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 535-540.—18 items from the Edwards Personal Preference Schedule were administered to 42 male and 69 female undergraduates for self-report and for judgments of desirability "in others," "in men," and "in women." Male and female Ss had similar masculine and similar feminine desirability stereotypes; but both groups used a different set of standards for men and women. Self-reports of the males tended to conform to the masculine desirability stereotype, and self-reports of the females tended to conform to the feminine desirability stereotype. It is concluded that desirability "in others," used by Edwards, is inadequate to match statements in the items examined, and probably is inadequate to match many other statements in items throughout the test. The results suggest that, if the concept of social desirability is to describe adequately Ss' judgments of other people, it must be articulated more finely than it has been in the past.—*Journal summary.*

5329. Hay, Nancy M. & Stewart, Norman R. (U Missouri, Counseling Service, St Louis) **Reliability coefficients from two administrations of the Willoughby Personality Schedule.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 581-582.—Determined internal consistency and test-retest reliability coefficients for the Willoughby Personality Schedule (WPS), currently used as an outcome measure in research and in clinical practice. The WPS was administered twice to 285 undergraduates from 2 universities with a 3-wk interval between testings. The Hoyt analysis of variance procedure yielded an internal consistency reliability coefficient of .90 on the 1st testing. The test-retest reliability coefficient was .89.—*Journal abstract.*

5330. Hayashi, Tamotsu & Yamauchi, Hirotsugu. (Kyoto U of Education, Japan) **Causal attributional judgments for achievement-related events.** *Japanese Psychological Research*, 1974(May), Vol 16(1), 40-49.—Classified 18 male undergraduates in high- and low-need-achievement groups and asked them to rate the degree to which a task outcome of a to-be-judged person was attributable to each of 4 causal elements. Some information about the task outcome and the expectation of success or failure at a task were given to Ss prior to their causal attributional judgments. Attribution scores on each of the causal elements for each condition of outcome were analyzed separately. Analyses of the data yielded 2 interesting findings—attributional cognitive patterns were a function of the level of achievement motivation and were also a function of the degree of discrepancy between expectation and outcome.—*Journal abstract.*

5331. Hekmat, Hamid; Khajavi, Farrokh & Mehryar, Amir. (U Wisconsin, Stevens Point) **Psychoticism, neuroticism, and extraversion: The personality determinants of empathy.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 559-561.—R. Hogan's empathy scale together with Eysenck's Psychoticism-Extraversion-Neuroticism Inventory were given to 475 undergraduates. Results indicate that empathy correlated negatively with psychoticism and neuroticism. There was a significant

positive correlation between empathy and extraversion. Results support the conclusion that propensity toward psychological disturbances lowers empathy significantly for both sexes.

5332. Hillman, James. (C. G. Jung Inst, Zurich, Switzerland) **Archetypal theory: C. G. Jung.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Examines the therapeutic implications of the theories of archetypal psychology. Jung's terminology and definitions are discussed. A case history is presented to illustrate application of the theories in analysis. (29 ref)

5333. Hüneke, Henrich & Hoeth, Friedrich. (U Heidelberg, Social Psychiatric Clinic, W Germany) **[Set and dimensions in the evaluation of personality characteristics.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 80-102.—Gave a personality questionnaire to 2 groups of education students. Group 1 ( $n = 87$ ) was instructed to answer truthfully; Group 2 ( $n = 107$ ) was urged to make a good impression. Neuroticism scores were significantly lower for Group 2; all other scores were higher. Factor analysis yielded 5 factors for Group 1 and only 3 for Group 2. The 1st 4 factors for Group 1 were similar to Neuroticism, Rigidity, Extraversion, and a Lie factor. The 5th factor was interpreted as Social Desirability dimension. (English & French summaries)—*W. J. Koppitz.*

5334. Iacino, Linda W. & Cook, Patrick E. (Florida State U) **Threat of shock, state anxiety, and the Holtzman Inkblot Technique.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 450-458.—To study the relationship of selected Holtzman Inkblot Technique (HIT) scores and anxiety, 38 experimental and 38 control undergraduates were matched on the basis of Anxiety-Trait (A-Trait) scores on the State-Trait Anxiety Inventory (STAI). The HIT was administered under neutral and threat-of-shock conditions. State anxiety was monitored by means of the A-State scale of the STAI. None of the HIT variables reflected changes in A-State due to the experimental conditions. HIT anxiety correlated significantly with STAI A-Trait. Results are discussed in terms of Trait-State Anxiety theory and previous research. (32 ref)—*Journal abstract.*

5335. Jacobson, Jacob G. **Reliving the past, perceptual experience and the reality-testing functions of the ego.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 399-413.—Presents a case history to illustrate 4 component functions of the ego which participate in reality testing: (a) perception of the differentiation of self from object and the broader distinction of internal from external, (b) perception of differentiated objects, (c) perception of differentiated states of the self, and (d) perception of affective experiences in the inner world. When any one of these fails, the past intrudes into the present; but when these functions can be exercised, a fifth rises from their synthesis, i.e., the ability to differentiate the present from the past. The conceptual and developmental issues involved in the 4 functions are discussed, including the historical development of concepts of reality testing. (44 ref)—*C. T. Sullivan.*



5336. Jardim, Anne. **The first Henry Ford: A study in personality and business leadership.** Cambridge, MA: MIT Press, 1970. ix, 278 p. \$3.95.

5337. Joe, Victor C. (Idaho State U) **Personality correlations of conservatism.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 309-310.—Attempted to provide additional construct validation for the Conservatism Scale developed by G. D. Wilson and J. R. Patterson by administering it and other tests (e.g., the California F Scale—Fascism) to American college students. Conservatism was significantly related to 20 of the 25 variables studied, supporting Wilson and Patterson's (1968) description of a conservative.

5338. Kakar, Sudhir. **Frederick Taylor: A study in personality and innovation.** Cambridge, MA: MIT Press, 1970. xi, 221 p. \$3.45.

5339. Kline, Paul & Mohan, Jitendra. (U Exeter, England) **Cultural differences in item endorsements in a personality test—Ai3Q—in India, Ghana, and Great Britain.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 137-138.—Administered a 30-item personality questionnaire, measuring the anal character or obsessional personality, to 181 female Indian students. A comparison with similar tests conducted in Ghana and Britain indicates that there were large differences in the endorsement of items in each culture, it was possible to discern how differing cultural factors produce these differences; certain items were not affected as was expected, while others changed for no obvious reason.

5340. Klopfer, Walter G. (Portland State U) **The Rorschach and old age.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 420-422.—Discusses studies which used the Rorschach technique with aged individuals, focusing on administration and evaluation problems encountered in early studies and on interpretation of Rorschach responses of the elderly. These responses show that older persons (a) tend to be intellectually slower and more unproductive than younger persons, (b) are emotionally unstable and have restricted thought contact, (c) are more efficient in dealing with practical than with theoretical problems, and (d) tend to feel inferior and react well to support. It is suggested that the future of the use of the Rorschach with the elderly depends on the degree to which clinicians can refrain from stereotyping the aged as they have stereotyped other heterogeneous groups (e.g., alcoholics, homosexuals, and schizophrenics).—B. McLean.

5341. Kroy, M. (Tel Aviv U, Israel) **The conscience: A structural theory.** New York, NY: John Wiley & Sons, 1974. xv, 228 p.—Presents an analysis and discussion of the structural aspects of moral judgment and their relations to other mental phenomena. Programs for representational systems of conscience, structural theories of the imagination, and empirical applications of the theories to moral arguments and emotions, moral development and pathology, and optimal value systems are examined. (180 ref)

5342. Lee, Robert & Piercy, Fred P. (U Florida) **Church attendance and self-actualization.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 400-403.—Administered the Personal Orientation Inventory and a questionnaire on the frequency of church attendance to 61 undergraduates at a large nondenominational state

university and 40 undergraduates at a Baptist-related university. Twice as many Ss at the church-related university attended services on a regular basis than Ss at the state college (60 vs 30%). Significant differences were found on the Inner-Directed scale, and the Existentiality, Feeling Reactivity, and Capacity for Intimate Contact subscales between regular and infrequent attenders, with infrequent attenders scoring higher. There was also a significant Sex  $\times$  Attendance interaction, with female attenders and male and female infrequent attenders scoring significantly higher than male attenders.—L. Gorsey.

5343. Mack, John E. (Harvard U, Medical School, Boston) **Nightmares & human conflict.** Boston, MA: Houghton Mifflin, 1974. xxiii, 258 p. \$3.45.—Presents a general survey of theory and research on nightmares, emphasizing why they occur and the various determinants of the anxiety experienced during nightmares. Topics include characteristics of nightmares, the clinical occurrence of nightmares in children and adults, and the relationship of nightmares to creativity, aggression, and psychoses.

5344. Mahoney, E. R. (Western Washington State Coll) **Body-cathexis and self-esteem: The importance of subjective importance.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 27-30.—Research investigating the relationship between body cathexis and self-esteem has frequently dealt with the problem of the use of body-cathexis scores weighted by the S's rating of the personal importance of body aspects. Since the original research in this area, 2 studies have presented contradictory data when testing the hypothesis that the greater the importance of body aspects to the individual, the greater the correlation between self-esteem and body cathexis. This hypothesis was tested in the present study with 227 undergraduates, using several approaches to the question. Data clearly indicate that there was no relationship between Ss' subjectively stated importance of body aspects and statistical importance in the form of correlations between body cathexis and self-esteem.—*Journal abstract.*

5345. McGilligan, Robert P. & Barclay, Allan G. (U Missouri, St Louis) **Sex differences and spatial ability factors in Witkin's "differentiation" construct.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 528-532.—Compared the scores of 20 male and 20 female 9th graders on H. Witkin's rod-and-frame test (RFT), the California Psychological Inventory (CPI), and the Primary Mental Abilities Test Spatial Relations subtest. No sex difference on Spatial Relations was obtained, nor was there a significant difference in RFT scores found which could be attributed to Spatial Relations. Contrary to the expectations derived from one of the criticisms of Witkin's construct, however, a sex difference in favor of males was found on RFT. Analyses of CPI scores yielded a significant main effect for RFT on 13 of the 18 CPI scales, but on only 4 scales when Spatial Relations was controlled as well as IQ. There was a significant correlation between RFT and Spatial Relations, suggesting that Spatial Relations does interact in some manner with both differentiation and personality. (15 ref) —*Journal summary.*

5346. Meyer, Mortimer M. (Reiss-Davis Child Study Ctr, Los Angeles, CA) **Rorschach symposium in memory of Bruno Klopfer: Introduction.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 403-404.—Briefly reviews the 3 topics included in the Rorschach symposium. Each deals with research findings related to the understanding of personality as it reflects specific aspects of the coping process: progressing in professional life, the normal process of aging, and the abnormality seen in a breakdown of the coping process.

5347. Miller, F. T.; Bentz, W. K.; Aponte, J. F. & Brogan, D. R. (U North Carolina, Chapel Hill) **Perception of life crisis events: A comparative study of rural and urban samples.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5348. Mohan, Jitendra & Rajinder, Miss. (Punjab U, Chandigarh, India) **A study of personality correlates of psychomotor performance.** *Indian Journal of Psychometry & Education*, 1973(Dec), Vol 4(2), 54-58.—Assessed relationships between the extroversion-introversion and neuroticism-emotionality dimensions of the Eysenck Personality Inventory (EPI) and psychomotor tasks of word substitution and inverted alphabets. 40 female Ss out of 55 (average age 18 yrs) were selected on the basis of EPI scores. Ss scoring high on the Lie scale were excluded. Ss were then given the tasks. Results indicate significant positive relationships between the tasks themselves and between neuroticism and inverted alphabet writing. It is concluded that Eysenck's personality theory does not explain simple psychomotor performance well.—J. B. Francis.

5349. Neman, Ronald S.; Brown, Thomas S. & Sells, S. B. (Texas Christian U, Inst of Behavioral Research) **Language and adjustment scales for the Thematic Apperception Test for children 6-11 years old.** *Vital & Health Statistics, Series 2*, 1973(Dec), No 58, 70 p.—Summarizes results of 2 studies on the development of objectively scored language and emotionality scales for a 5-card, orally administered and tape-recorded version of the Thematic Apperception Test (TAT) used in the Health Examination Survey (HES) of 6-11 yr old children conducted in 1963-1965. Study 1 involved the development of scoring manuals, criterion measures, and TAT scales, in addition to validation studies in which TAT scales were used as independent variables and the criteria as dependent variables. Study 2 involved cross-validation and refinement of Study 1 and the development of national norms. The development of 5 criterion scales (school adjustment, poor health, intellectual development, social adjustment, and emotional disturbance), their relationship to age, sex, and race, and the development of the 6 TAT scales (Verbal Productivity, Dysphoric Mood, Conceptual Maturity, Narrative Fluency, Emotionality, and Verbal Fluency) are discussed in detail. The structural and thematic scoring manuals are included.—L. Gorsey.

5350. O'Gorman, J. G. (U New England, Armidale, NSW, Australia) **A comment on Koriati, Averill and Malmstrom's "Individual differences in habituation."** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 198-202.—Discusses some theoretical and methodologi-

cal issues raised by the article by A. Koriati et al (see PA, Vol 51:5214) concerning the consistency and reliability of measures of habituation currently used in personality research. It is argued that the problem of reliability is not as serious as Koriati et al proposed and that specificity of measures of habituation is a theoretical rather than a methodological problem. It is proposed that ambiguity in the literature on the personality correlates of habituation is more likely to be due to the failure to consider the effects of stimulus conditions on habituation than to the problems of reliability and specificity. (17 ref)—*Journal abstract*.

5351. Orpen, Christopher & Lisus, Glyn. (U Cape Town, South Africa) **Self-esteem and the relationship between need-fulfilment and job satisfaction.** *Journal of Social Psychology*, 1974(Aug), Vol 93(2), 307-308.—Contrary to expectations, a lower correlation between self-rated need-fulfilment and job satisfaction was obtained for high self-esteem than low self-esteem South African white professionals. Results do not support A. Korman's (1970) hypothesis of the importance of self-esteem in work behavior.

5352. Ramos, Edith. (U Federal de Rio de Janeiro, Brazil) **[Personal image of the Nisei adolescent.]** (Port) *Revista Latinoamericana de Psicologia*, 1974, Vol 6(2), 229-234.—Administered the Adjective Check List to 100 adolescent Nisei (Brazilians of Japanese origin). Results were analyzed in terms of the self-image of this group, who represent a "bridge between 2 cultures." The main variable was self-esteem, and high scores were obtained by both males and females.

5353. Rand, Per. (U Oslo, Norway) **Curvilinear relationship between motive strength and performance: A possible explanation based on J. W. Atkinson's model.** *Scandinavian Journal of Educational Research*, 1973, Vol 17(3), 83-94.—Predicted an S-shaped relationship between motive strength and performance based on (a) J. W. Atkinson's 1957 model; and (b) the assumption that, given motive to seek success ( $M_s$ ) and motive to avoid failure ( $M_f$ ) of unequal strength, there is a correspondence between magnitude and direction of motive dominance ( $M_s-M_f$ ) and amount and direction of distortion of subjective probability of success relative to objective probability of success. An empirical check involving 595 6th-grade Ss supported the predicted relationship in the results from 3 out of 6 tasks employed (anagrams, synonyms, and antonyms given in easy and hard forms).—*Journal abstract*.

5354. Rim, Y. (Technion-Israel Inst of Technology, Israel) **The validation of a new disturbance test.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 91-93.—Describes a validation of the McQuitty Disturbance Test (MDT). Ss were 124 job applicants 18-30 yrs old (mean age 25 yrs) at 2 banks in Israel. About 30% were males. It was hypothesized that highly disturbed Ss on the MDT would have high scores on other tests of disturbance and on certain correlates. Results confirm the hypotheses and are viewed as a validation of the MDT.—R. D. Nance.

5355. Rodstein, Manuel. (Jewish Home & Hosp for Aged, New York, NY) **Accident proneness.** *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(11), 1495.—Discusses indicators of accident-



prone individuals, factors affecting vulnerability, and possible psychiatric mechanisms underlying the occurrence of accidents in these persons. Several characteristics have been described as high in incidence among accident-prone persons, including youth, early exposure to injury, violence, authoritarian parents, childless marriages, and sexual conflicts. Boredom, loneliness, anxiety, and frustration are also among factors which make these people more vulnerable to accidents, particularly in cases of increased physical strain. It is emphasized, however, that the personality type found in accident-prone persons often occurs in those without a history of frequent accidents, although they may exhibit other diseases with strong psychosomatic components.—*L. Gorsey.*

5356. Rogers, T. B. (U Calgary, Alberta, Canada) **An analysis of two central stages underlying responding to personality items: The self-referent decision and response selection.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 128-138.—Used S. Sternberg's 1969 technique for isolating substages in a processing sequence to examine 2 central stages in a postulated model of responding to personality items. The Self-Referent Decision (SRD) stage, where item content is compared to stored memory elements, and the Response Selection Stage, where the output of the SRD is mapped into available response alternatives, were analyzed to determine if they could be seen as separate stages. Data from 24 undergraduates who responded to 56 controversial or noncontroversial items in Likert-type or true-false formats indicate that a modular model that viewed these 2 stages as separate is valid. Results are also discussed in relation to existing models of item responding processes and the dichotomous/Likert response format issue. (22 ref)—*Journal abstract.*

5357. Sachs, Lisbeth J. (New York U, Medical Ctr) **On crying, weeping and laughing as defenses against sexual drives, with special consideration of adolescent giggling.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 477-484.—Suggests that crying, weeping, and laughing can be employed as defenses against sexual drives, especially in females, with illustrative material from 4 case histories of adolescents and young adults. The concomitant discharge of body fluid is considered as a possible "break" in such defenses. (22 ref)

5358. Saunders, Thomas R. & Gravitz, Melvin A. (Walter Reed Army Medical Ctr, Washington, DC) **Sex differences in the endorsement of MMPI critical items.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 557-558.—Based upon the MMPI critical items, data from 6,686 male and 4,717 female job applicants reveal little support for a "repression" interpretation of personality inventory test-taking style among females. Females were more likely than males to endorse critical items, especially those that deal with such internal psychological discomforts as generalized anxiety and sex-role acceptance.

5359. Schlesheim, Chester & Kerr, Steven. (Ohio State U, Coll of Administrative Science) **Psychometric properties of the Ohio State leadership scales.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 756-765.—Reviews evidence concerning the validity, reliability, and scaling adequacy of 4 versions of the Ohio State

leadership scales. A number of shortcomings are noted, due either to the lack of relevant data (e.g., with respect to construct validity) or actual inadequacies of the scales (e.g., item response skewedness). The 4 versions are shown to be substantially different psychometrically; although suffering from some deficiencies and requiring further refinement, one version of the scales appears sounder than the others. (48 ref)—*Journal abstract.*

5360. Schwartz, Marilyn M. & Gaines, Lawrence S. (U Maryland) **Self-actualization and the human tendency for varied experience.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 423-427.—Investigated whether self-actualization may be conceptualized as an expression of the human need for varied stimulation. Self-report assessment was made of 120 undergraduates' level of self-actualization (as measured by the Personal Orientation Inventory) and preferences for kinds (cognitions and sensations) and sources (interoceptive and exteroceptive) of varied stimulation (Novelty Experiencing Scale). Self-actualizing Ss differed from non-self-actualizing Ss in the amount of total stimulus-seeking behavior but not in their preference for source or kind of stimulation. Discussion of results focuses upon an active-passive aspect of the need for varied experience. (29 ref)—*Journal abstract.*

5361. Seaman, Jerrol M. & Koenig, Frederick. (Loyola U, New Orleans) **A comparison of measures of cognitive complexity.** *Sociometry*, 1974(Sep), Vol 37(3), 375-390.—To allow investigation of the effects and/or sources of different forms of cognitive complexity in the same research design, the Grid Form of the Role Construct Repertory Test (RCRT) is proposed as a format from which to obtain different measures of complexity at the same time using the same response data. Using positive and negative person objects as stimuli, 3 types of complexity measures are derived from the Grid Form of the RCRT: 3 measures based on tied ratings, the Fiedler most preferred coworker, least preferred coworker, and assumed similarity of opposites scores, and the Information measures. Factor analysis of these measures which were given to 146 undergraduates supports previous results that the different measures are multidimensional. 3 factors were obtained, all of which reflect differences in the way Ss construe persons of positive and negative affect. Several possible sources of the differing cognitive styles are discussed, and evidence is presented which suggests that males are harsher and more discriminating judges of others than females. (15 ref)—*Journal abstract.*

5362. Sikes, Sydnor & Singh, Devendra. (U Texas, Austin) **Obesity and compliance.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 176.—64 obese and 62 normal-weight undergraduates were tested to determine whether obese and normal-weight people differ in motivational strength, self-esteem, and compliance. Results show no differences between obese and normal-weight Ss on any of the measures. Findings suggest that psychological disturbances associated with obesity are not pronounced in young university populations.

5363. Smitson, Walter S. (U Cincinnati, Medical School, Central Psychiatric Clinic) **The meaning of emotional maturity.** *MH*, 1974(Win), Vol 58(1), 9-11.—Suggests that emotional maturity is the basis for inner security, for understanding oneself and others, and for

full and effective interpersonal relationships. It is viewed as an elusive process, yet attainable by those who gain self-insight or seek professional help.

5364. Snyder, C. R. (U Kansas) **Why horoscopes are true: The effects of specificity on acceptance of astrological interpretations.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 577-580.—63 female undergraduates were given an identical general horoscope interpretation but were assigned randomly to 1 of 3 specificity conditions in which they were told the interpretation was (a) generally true of people, (b) derived for them on the basis of the year and month of their birth, or (c) derived for them on the basis of the year, month, and day of their birth. Results show that the more specific birth time referent the S ascribed to the astrological interpretation, the more the interpretation was accepted as an accurate description of the S's personality ( $p < .0001$ ). A discussion is made of how horoscopes may achieve "verification" or acceptance because of situation factors alone, rather than any actual relationship between astrological interpretations and an individual's observed personality. (22 ref)—*Journal summary*.

5365. Staats, Sara et al. (Ohio State U, Newark) **Internal versus external locus of control for three age groups.** *International Journal of Aging & Human Development*, 1974(Win), Vol 5(1), 7-10.—Administered Rotter's Internal-External Scale to a noncollege population of males and females in 3 age groups: 5-15, 16-25, and 46-60 yrs. Internal locus of control expectations increased with age. A trend was observed for males to be more internal in their beliefs than females.—*Journal abstract*.

5366. Tiedeman, David V. (Northern Illinois U) **Putting the backbone in self: Overview of a symposium.** *Character Potential*, 1974(Oct), Vol 7(1), 9-11.—Introduces a symposium which dealt with career, choice, and the self, and gives expression to Tiedeman's overarching interest as philosopher and educator in placing self in its own hierarchical self-reconstruction. The development of his concepts over 25 yrs is traced. Brief descriptions of the other 3 papers in the symposium are provided, indicating their interarticulation of theory and practice in the areas of decision making and self-development (see PA, Vol 53:Issue 3). (15 ref)—L. W. Barber.

5367. Vaillant, George E. (Cambridge Hosp, MA) **Antecedents of healthy adult male adjustment.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974, x, 383 p.

5368. Viney, Linda L.; Altkin, Murray & Floyd, Joan. (Macquarie U, Sydney, NSW, Australia) **Self-regard and size of human figure drawings: An interactional analysis.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 581-586.—Measures from a sample of figure drawings by women who were pregnant wives, unmarried and pregnant, or neither pregnant or married ( $n = 15, 32$ , and 30, respectively) were analyzed. Membership of these groups, sex of 1st-drawn figure, number of erasures, and nature of clothing and mood of female figure were tested as predictors of the size of the female figure (height, waist size, breast size, and ratio of height and waist sizes to those of the male figure). Results

indicate that the mood of the figure alone predicted its size, as measured by height, waist, and breast. Number of erasures predicted the male-female height ratio, while sex of 1st-drawn figure predicted male-female waist ratio. Group was important only insofar as it interacted with sex of 1st-drawn figure to predict male-female height. (16 ref)—*Journal summary*.

5369. Waugaman, Richard. (Sheppard & Enoch Pratt Hosp, Towson, MD) **The intellectual relationship between Nietzsche and Freud.** *Psychiatry*, 1973(Nov), Vol 36(4), 458-467.—Analyzes F. Nietzsche's influence on Freud and compares their theories of human motivation.

5370. Zillmann, Dolf; Johnson, Rolland C. & Day, Kenneth D. (Indiana U) **Provoked and unprovoked aggressiveness in athletes.** *Journal of Research in Personality*, 1974(Aug), Vol 8(2), 139-152.—In a factorial design with 60 male undergraduates, athletic involvement (no varsity sport, varsity noncontact sport, or varsity contact sport) was varied with induced disposition (unprovoked or provoked). Under conditions of no provocation, no significant differences in aggressiveness (deliverance of noxious stimuli to an opponent) were observed between nonathletes and athletes, or between noncontact- and contact-sport athletes. In contrast, under conditions of provocation, nonathletes displayed more aggressiveness than athletes. Non-contact-sport athletes behaved significantly less aggressively than both nonathletes and contact-sport athletes. Contact-sport athletes failed to behave significantly less aggressively than nonathletes. Findings suggest an acquired superior ability in athletes to cope with provocation under competitive circumstances, which is partially counteracted in contact-sport athletes by their aggressiveness habits and disinhibition training. (16 ref)—*Journal abstract*.

## PROFESSIONAL PERSONNEL

5371. ———. **Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower.** Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974, xxx, 606 p.

5372. ———. **Standards for the preparation of counselors and other personnel services specialists.** *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 133-144.—Presents guidelines for the graduate training of counselors and personnel services specialists in the areas of program objectives, curriculums and supervised experiences; the program sponsor's responsibilities for information, selection, retention, endorsement, placement, and evaluation; and support for the counselor education program, administrative relations, and institutional resources.

5373. Alston, Paul P. (East Carolina U) **Multidiscipline group facilitation training: An aid to the team approach.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 21-25.—In rehabilitation settings that use a number of professionals to assist the client, the communication and cooperation existing among these groups is an important factor in the program's effectiveness. A procedure for teaching facilitative communication in



small groups whose membership included staff members from 4 professional groups (rehabilitation staff, academic school staff, correctional staff, and technical school staff) is described. Ss completed a Carkhuff communication index, a sociogram to measure perceptions of others in the groups, and semantic differential ratings of attitudes toward other professions before and after the 15-wk communication training program. Results show that staff members experienced significant improvement in communication skills and perceptions of each other, while their perceptions of the various professionals represented in the groups were unchanged.—*Journal abstract.*

5374. Azam, R. **The role of the educational psychologist: Some basic strategies.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 19-26.—Describes the work of trained educational psychologists in England and Wales. The psychologist divides his time between the child guidance clinic, where he serves as a team member focusing on assessment, and the School Psychological Services, where he functions as director and deals with all the problems arising within the schools.

5375. Barkin, Roger M. (U Colorado, Medical Ctr, Denver) **Need for statutory legitimation of the roles of physician's assistants.** *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 31-36.

5376. Barlow, David H. (U Mississippi, Medical Ctr, Jackson) **Psychologists in the emergency room.** *Professional Psychology*, 1974(Aug), Vol 5(3), 251-256.—Describes a training innovation in which clinical psychology interns are on 24-hour-a-day call to an emergency room in rotation with psychiatric residents. The psychology intern is called in by the medical intern, checks the chart, interviews the patient, formulates the problem, and makes a disposition. Interns benefit by learning to deal with crises, becoming aware of possible physical contributions to emotional problems, and coordinating efforts of many individuals. Trainees report increased self-confidence and rate the program favorably.—C. Wright.

5377. Beisser, Arnold R.; Shahan, John M. & Olander, Helen L. **Assessing educational need: A resurvey of need for education among community mental health professionals.** *California Mental Health Research Monograph*, 1973, No 15, 70 p.—Describes a 1969 survey which followed up and extended one conducted in 1966, both designed to ascertain the educational needs of mental health professionals in southern California. In 1966, 1,000 questionnaires were sent out and 389 replies were received. In 1969, 544 forms were sent and 458 answers were elicited. 1969 replies are reported and analyzed in detail, and compared with those given in 1966 as a guide to trends in this rapidly changing field. Continued interest in educational courses was expressed, although actual participation was sometimes prevented by problems of time, distance, and course schedules. All categories of respondents expressed interest in clinically oriented courses except administrators, who showed greater interest in administrative courses. Most respondents wished to spend more time in activities involving direct, active delivery of services, less time in organizational work. Suggestions are made for improving future

surveys: selection of a more representative sample, development of a shorter questionnaire, and use of a preliminary pilot study.—G. E. Zimmerman.

5378. Berlin, Irving N. (U Washington) **Minimal brain dysfunction: Management of family distress.** *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(11), 1454-1456.—Considers that the diagnosis and adequate treatment of minimal brain dysfunction (MBD) requires very early identification of neurophysiologic and behavioral disturbances. Comprehensive care of this disorder requires early involvement of parents in understanding the diagnosis and its implications and in learning about infant management. It is stressed that whether stimulant medication works or not, the very early socialization patterns which govern reactions to discipline, learning, and interpersonal relations, once acquired, are difficult to change and affect the child's entire life. It is suggested that the physician should help parents with the frequent feelings of blame and serve as a model of how the child's problems can be openly and honestly discussed with him. (17 ref)—*Journal abstract.*

5379. Blockstein, William L. (U Wisconsin, Extension, Health Sciences Unit) **Groping toward a national policy involving regional efforts for improved health-service delivery.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Discusses selected elements in the evolving national health strategy and relates these to regional approaches to improving health service and continuing education for health manpower. Ongoing attempts at regionalized health-care programs are examined, and the experiences of the Wisconsin Regional Medical Program are described in detail. The concepts of health maintenance and the area health education and service center are also considered.

5380. Bolton, Brian. **Three verbal interaction styles of rehabilitation counselors.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 34-40.—Attempted to identify empirically patterns of verbal interview behavior in a national sample of rehabilitation counselors. Obverse factor analysis of the subrole profiles (using the Rehabilitation Counseling Interview Subrole Behavior Scale by B. K. Richardson et al) of 54 counselors produced 3 interaction styles: (a) information providers, who provide general administrative information, specific details about services, and information tailored to the client's needs; (b) therapeutic counselors, who listen, explore, reflect, and provide support to their clients; and (c) information exchangers, who solicit information from clients, provide educational and occupational information, discuss various topics, and offer advice. The 3 groups of counselors were compared on 50 self-report variables and 3 interpersonal skills (empathy, respect, and genuineness) to further define the styles. Results provide evidence of relationships among counselor training, job function, and verbal interaction style.—*Journal abstract.*

5381. Bonk, Edward C. & Jansen, David G. (North Texas State U) **Correlations between the Guilford-Zimmerman Temperament Survey and rankings of counseling competency.** *Journal of Counseling Psychology*

gy. 1974(Nov), Vol 21(6), 575-576.—Studied the relationships between Guilford-Zimmerman Temperament Survey raw scores and supervisor and peer rankings of competency for 107 male and 103 female master's degree practicum counselors. Correlations of .45 for males and .50 for females between supervisor and peer rankings were observed. 4 of the 10 scales correlated .40 or more with the supervisor rankings of competency for both male and female Ss. Overall, the scales correlated significantly better with supervisor rankings than with peer rankings for both sexes. Computation of multiple correlations between selected scales and the criteria suggested that even the best 2-scale combinations were only minimally more predictive of either supervisor or peer rankings than the best individual scale predictors. —*Journal abstract.*

5382. Bornstein, Philip H. & Spitzform, Marianne. (U Montana) **Institutional sources of research in major behavioral journals: 1970-1973.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 661-664.—In a survey of 4 major behavioral journals, no institution clearly dominated the field, and a wide variety of settings and facilities were apparently engaged in behavioral research. Institutions previously identified as having placed emphasis upon training in behavior therapy-behavior modification are examined in light of the above findings.

5383. Bryson, Seymour; Renzaglia, Guy A. & Danish, Steven. (Southern Illinois U, Rehabilitation Inst) **Training counselors through simulated racial encounters.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jul), Vol 2(4), 218-223.—Presents a tentative model for training individuals to become more aware of their racial attitudes and to develop more effective behaviors in working with blacks. Based on the hypothesis that many white counselors would experience some feelings of uneasiness with emotional reactions of blacks, the training program revolves around a stimulus film, which consists of a series of simulated emotional vignettes, in each of which a black youngster role-plays a prescribed reaction to the helping other. After viewing the film, trainees focus on (a) identifying the emotions expressed by the role-players; (b) identifying their feelings and reactions to the simulated clients; and (c) expressing, either in written form or orally, their responses to the vignette player. Illustrations of other exercises in the training program are provided.—*M. E. Pounsel.*

5384. Canning, Curt; Kane, Robert & Gray, Robert. (Fort Logan Medical Health Ctr, Denver, CO) **Attitudes and electives: Predicting enrollment and measuring effects.** *Journal of Medical Education*, 1974(Oct), Vol 49(10), 986-988.—Used sociological scales to measure the attitudes of 2 cohorts of medical students at the beginning of an elective freshman curriculum in community and family medicine and again 1 yr later. Analysis of the data showed that students who did not elect courses in these areas tended to be more authoritarian, more dogmatic, and more cynical than students who did.

5385. Charters, Alexander N. & Blakely, R. J. (Syracuse U) **The management of continuing learning: A model of continuing education as a problem-solving strategy for health manpower.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower.* Rockville,

MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Presents a model in a sequence of steps for the management of continuous education for health manpower, based on the view that this education is a problem-solving process. Problems in planning and teacher training for health manpower education are considered as well as the impact of continuing education on health care. (64 ref)

5386. Crawley, Lawrence Q.; Malfetti, James L. & Bartholomew, F. E. (Lenox Hill Hosp, New York, NY) **Sex education for school physicians: Follow-up of an inservice training course.** *Family Coordinator*, 1974(Oct), Vol 23(4), 359-364.—Reports the results of a follow-up survey of 32 physicians who had 1 yr earlier participated in an inservice course for school physicians involved in sex education programs. At the end of the course, 29 physicians had said they would participate in sex education programs; however, 1 yr later, only 12 reported actual involvements. The largest gap between intention and actual participation occurred in the area of parent and community relationships and activities; although 21 Ss had intended to do something in this area, only 2 reported any subsequent activity. Factors influencing involvement were identified, including preoccupation with other issues and the controversial nature of sex education programs in general. The need for more objective attitudes and more actual involvement in sex education programs is stressed. (17 ref)—*L. Gorsey.*

5387. Dawidoff, Donald J. **Legal advice for psychiatrists.** *MH*, 1974(Win), Vol 58(1), 24-25.—Discusses some of the more common risks involved in the practice of psychiatry. These include civil malpractice, drug therapy, commitment, undue influence, transference, and criminal conduct. Suggestions are offered for avoiding or mitigating these risks.

5388. de la Torre, Jorge & Appelbaum, Ann. (Meninger Clinic, Topeka, KS) **Use and misuse of clichés in clinical supervision.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 302-306.—Considers that beginning psychiatrists use technical jargon as a defense against the anxiety stirred by their new tasks. Jargon is a special case of the cliché, an empty truth replacing genuine understanding with an affectively neutral pseudounderstanding. At the outset of training, clichés provide a false sense of knowledgeableness, help the resident to feel like a member of the institutional group and of his discipline, and serve as a substitute for clear thinking. As a temporary defense, as well as an early stage of identification with psychiatry, the use of clichés should be respected. They serve as indicators of the resident's progress, being used with increasing sophistication by those who are growing professionally. Persistent confrontation helps arouse curiosity about clichés and promotes their transformation into concepts. (20 ref) —*Journal abstract.*

5389. Dickinson, Gary & Verner, Coolie. (U British Columbia, Vancouver, Canada) **The provision of inservice education for health manpower.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower.* Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Discusses the functions, organization, and tasks of



inservice education for health manpower in health-service institutions. Tasks include determination of learning needs, specification of goals and objectives, selection of instructional processes, organization of learners, and evaluation.

5390. **Fleisher, Daniel S.** (U of the Pacific, School of Medical Sciences, Pacific Medical Ctr) **Priorities and data bases: Their relationship to continuing education.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Describes a 13-step process by which an individual or a group of health-care providers can make systematic decisions regarding the identification and possible remedy of deficiencies in the care of patients. The need to set priorities and to rely on objective data is stressed. The model has been shown to improve decision-making and cooperation in health-care delivery.

5391. **Florander, Jesper.** [The school psychologist's possibilities for research in education.] (Danish) *Skolepsykologi*, 1974, Vol 11(5), 364-373.—Describes a realistic and workable model for training school psychologists in educational research through a 2-yr membership in the local research and development team. To support this plan it is suggested that the Danish Institute for Educational Research should offer postgraduate training and assistance.

5392. **Fry, Lincoln J. & Miller, Jon P.** (U California, Camarillo Neuropsychiatric Inst Research Program, Los Angeles) **The impact of interdisciplinary teams on organizational relationships.** *Sociological Quarterly*, 1974(Sum), Vol 15(3), 417-431.—Based upon research in an alcoholism treatment organization, the impact of interdisciplinary team treatment on organizational participants and structure was studied. Ss were 15 social service aides, 35 professional team members, and 8 administrative and supervisory personnel. Findings suggest that alternate organizational arrangements are necessary for organizations which use the team method. The implications of team treatment for professionals were confounded because of power relationships within the organization. Role bargaining between professionals was virtually nonexistent because of the dominance of a single discipline. A surprising finding was the extent to which supervisory personnel were disadvantaged in the study. Caution is suggested for those organizations most likely to adopt the team method (i.e., large public health organizations). (17 ref)—*Journal abstract*.

5393. **Goroll, Allan H.; Stoeckle, John D. & Lazare, Aaron.** (Massachusetts General Hosp, Boston) **Teaching the clinical interview: An experiment with first-year students.** *Journal of Medical Education*, 1974(Oct), Vol 49(10), 957-962.—Describes and evaluates an experimental clinical course in history-taking for 1st-yr medical students. Results of this small-scale experiment suggest that preclinical students can learn to interview ambulatory patients effectively without compromising patient care.

5394. **Grace, Mary J.** (Sequoia Hosp, Redwood City, CA) **The psychiatric nurse specialist and medical-surgical patients.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 481-483.—Presents case illustra-

tions of the role of the psychiatric nurse specialist in a hospital medical-surgical area in relation to 3 groups: (a) patients facing major life adjustments, (b) families confronted with a relative's health problem, and (c) nursing staff having difficulty with particular patient situations. Psychiatric nursing skills in assessment, communication, and liaison functions are discussed.

5395. **Greenblatt, Milton.** (U California, Los Angeles) **Psychopolitics.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1197-1203.—Discusses the political and power conflicts that occur in the fields of psychiatry and mental health, the particular vulnerability of human service agencies to political pressure in funding and staffing, the role of the press in "creating" news, and the need for regulating the media and insuring its accountability.

5396. **Grzegorek, A. E. & Kagan, N.** (Kent State U, Consultation & Training Services) **A study of the meaning of self-awareness in correctional counselor training.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 99-122.—Determined the effects of affective and cognitive approaches to counselor training on the subsequent counseling behaviors of 44 correctional counselors. The affective approach emphasized counselors' feelings and personal growth, while the cognitive approach emphasized only the learning of client feelings and dynamics and the development of counseling skills. 4 types of tasks were used in the 10-day training programs: lectures and discussions of facilitative counseling as defined by C. B. Truax and R. R. Carkhuff, simulated confrontation, the videotaped Interpersonal Process Recall (IPR) procedure, and group reviews and discussions of individual videotaped client contacts. Criterion measures included the Affective Sensitivity Scale by N. Kagan et al, the Counselor Verbal Response Scale, and the Empathic Understanding in Interpersonal Process Scale. Only the trainees in the affective training groups had significantly higher scores (pre- to posttest) on the 3 criterion measures, particularly in areas related to counselor performance. There were no major differences between groups in skills related to the perception of client feelings and reactions.—*L. Gorsey*.

5397. **Henderson, Harold L.** (Bowling Green State U) **Using the helping relationship inventory for assessing and developing counselor response styles.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 60-63.—Describes a method to assist counselor trainees in assessing and developing their counseling styles. The emphasis is away from indoctrination toward any one approach to counseling and toward facilitating the trainees' achievement of their own goals. Particular attention is given to the incongruencies that occur between expressed, inventoried, and manifest counseling behavior, and some possible explanations and trainer intervention are discussed. The usefulness of Jones's Helping Relationship Inventory in achieving these goals is also examined.—*Journal abstract*.

5398. **Holden, Constance.** **Sex therapy: Making it as a science and an industry.** *Science*, 1974(Oct), Vol 186(4161), 330-334.—Discusses the rapid growth of sex research, sex training, sex education, and sex therapy programs in the US and the consequent problems in accrediting and certifying the competence of the thera-

pists involved and the procedures they use. Several major programs are described (e.g., Masters and Johnson), and plans to organize, train, and possibly license sex therapists are discussed.

5399. **Howe, Herbert F.** (U Nebraska) **An empirical description of a community-clinical training program.** *Professional Psychology*, 1974(Aug), Vol 5(3), 277-285. —Proposes a model for empirical description of community-clinical psychology programs that was tested with 7 faculty and 28 graduate students. Data indicate that the majority of time was spent in purely clinical work. Students spent more than 1/2 of their time on academic and professional activities, and they also spent more time at the clinical end of a clinical-community psychology continuum. It is concluded that use of the model is feasible, it did reflect major changes in the program as they occurred. Wide application of this model is suggested as a way to enable applicants to make more informed educational decisions.—C. Wright.

5400. **Hutchison, Dorothy J.** (U Wisconsin, Extension) **The process of planning programs of continuing education for health manpower.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Discusses criteria for planning, implementing, and evaluating continuing education programs for health science professionals on a regional basis. Curriculum content, format, and learning techniques are described. (33 ref)

5401. **Ingram, Gilbert L.** (Federal Correctional Inst, Tallahassee, FL) **Graduate training in a correctional setting.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 162-169.—Discusses the need for graduate programs in correctional psychology and criminology and some common problems encountered by graduate students who study correctional techniques and/or judicial administration procedures. An example of a graduate program in correctional psychology at Florida State University is presented, emphasizing the portion of the program which is actually conducted in a correctional facility.

5402. **Jason, Hilliard.** (Michigan State U, Office of Medical Education) **The health-care practitioner as instructor.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Focuses on the responsibilities of health-care practitioners as instructors of others and the ways in which they can fulfill these responsibilities. Major topics include the instructional process from planning to evaluation; the rationale, goals, and techniques used by the practitioner as teacher of students and patients; and the development of the practitioner-instructor. (84 ref)

5403. **Karpatschof, Benny.** (U Copenhagen, Denmark) **[The psychologist and the statistician.]** (Danish) *Skolepsykologi*, 1974, Vol 11(5), 418-422.—Discusses the 3 roles that may be played by the statistician in psychology: technician, midwife, or collaborator participating in all decisions. It is noted that statistical models are simplified

representations of reality and should be critically tested in every case.

5404. **Katchadourian, Herant A.** (Stanford U) **The psychiatrist as university ombudsman.** *Psychiatry*, 1973(Nov), Vol 36(4), 446-457.—Discusses personal experiences as a university ombudsman and the implications for a psychiatrist in terms of traditional roles.

5405. **Knox, Alan B.** (U Illinois) **Life-long self-directed education.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Presents guidelines for health science professionals to become more self-directed in continuing their education. 5 components of the "mentor" role in this context are identified, strategies for alternating between action problems and knowledge resources are described, and examples of ways to use the proposed self-directed approach are presented. (62 ref)

5406. **Lessinger, Leon M.** (U South Carolina, Coll of Education) **Effective caring: An approach to a rational scheme for financing continuing education for health manpower.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Uses a systems approach to discuss the objectives and financing of continued education programs for health manpower. Focus is on accountability and humanism as subsystems of effective caring. The cost and effectiveness of continued education programs are considered.

5407. **Lewis, Ann.** (Regional Medical Programs, Area VII, La Jolla, CA) **The use of analytical techniques to determine health manpower requirements for educational planning: or How do I find out what skills and knowledges to teach?** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Suggests that in order to plan the teaching of health workers, the educator needs to know (a) the kinds of occupations currently engaged in similar work, (b) the number of persons that need to be trained, and (c) the exact knowledge and skills required by the group of workers in the function under consideration. Methods for analyzing each of these factors are discussed, and research findings are outlined. (23 ref)

5408. **Lickorish, John R.** (Ipswich Hosp, Inst of Family Psychiatry, England) **Helping the helpers.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 27-31.—Outlines the kind of training scheme which might enable nonprofessionals to become "helpers" (paraprofessionals) and work alongside professionally qualified members of the social services in counseling. The selection process could utilize any suitable technique currently used by psychologists. The 9-mo training program would involve the following stages: (a) reading and seminars in general and abnormal psychology, (b) discussion to assimilate and integrate the knowledge acquired, (c) observation of the



counseling process, and (d) participation.—*I. L. Zimmerman.*

5409. McRee, Christine; Corder, Billie F. & Haizlip, Thomas. (Dorothea Dix Hosp, Regional Child Psychiatry Residency Training Program, Raleigh, NC) **Psychiatrists' responses to sexual bias in pharmaceutical advertising.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1273-1275.—Of the psychiatrists responding to a questionnaire, 45% perceived pharmaceutical advertisements from a randomly selected issue of a professional journal as showing sexual bias that might negatively influence physicians' perceptions of women. Respondents' perceptions of the predominance of women "patients" and sexually biased advertising copy in drug advertisements are reported.

5410. Milan, Mikuláš. (Research Inst of Pedagogy, Bratislava, Czechoslovakia) **[The set and process of learning.]** (Czech) *Jednotná Škola*, 1974(Jun), Vol 26(6), 539-553.—Discusses the activity of the Georgian school of psychology (founded in 1921 by N. Uznadze) and its emphasis on the experimental investigation of unconscious psychological processes. Attention is drawn to the frequent use of the term "subconscious mind" in current literature and discussion, and experimental results of Georgian and other researchers are noted. The author's research into the processes of the unconscious mind is explained, and mathematical methods are used to evaluate documented observations, a method found only sporadically in the works of Georgian psychologists. It is emphasized that discovering factors of the unconscious means broadening the impact of conscious self-knowledge and of the possibility of consciously controlling behavior. (Russian summary)—*English summary.*

5411. Miller, Michael H. (Vanderbilt U, School of Nursing) **Work roles for the associate degree graduate.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 468-470.—Studied the relationship of postgraduate nursing roles to training of associate degree nurses. Questionnaires were mailed to 190 graduates of associate degree nursing programs in Tennessee, and 49% were returned. The respondents were white, married, female nurses 20-27 yrs old. The questionnaire focused upon the nurses' training and their employment after graduation. Respondents also completed the Nursing Attitude Scale developed by M. H. Miller (unpublished paper, 1973). Results indicate that nurses with associate degrees were working in supervisory roles without previous management training. Almost 93% were working in hospitals, with 66% in charge nurse and nursing supervisory roles. General attitudes toward nursing were positive but only 15% desired supervisory roles. Only half reported that they would again choose associate degree programs. Implications of the results are discussed in relation to associate degree nursing programs and to the future of such programs.—*R. G. Gibson.*

5412. Morris, Richard J. (Syracuse U) **An inexpensive, easily built "bug-in-the-ear"/intercom system for training therapists in behavior modification techniques.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 685-686.

5413. Moser, Adolph J. (Indiana Youth Ctr, Plainfield) **A systematic model for therapists and trainers.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 170-182.—Presents a systematic step-by-step problem-

solving model for trainers and therapists for increasing professional accountability for client change. Effecting change in the direction of various therapeutic goals is viewed as a process involving 3 primary therapist functions—understanding the patient's problem, executing intervention therapy, and evaluating treatment.

5414. Nash, Michael M. (Florida State U) **Parameters and distinctiveness of psychological testimony.** *Professional Psychology*, 1974(Aug), Vol 5(3), 239-243.—Clarifies legal expectations of the psychologist as expert witness in order to reduce anxiety in the profession regarding this role. 3 levels of judgment in testimony are described: (a) statistical—explaining empirical data to jury, (b) clinical—presenting opinions validated by the clinician's training and experience, and (c) sanity judgments—aiding juror interpretation of (a) and (b). The necessity for confining testimony to the individual psychologist's realm of competence and the instructive function of the expert witness are stressed.—*C. Wright.*

5415. Orcutt, Ted L. & Williams, George A. **Toward a facilitative ethic in the human potential movement.** *Interpersonal Development*, 1973-1974(Aug), Vol 4(2), 77-84.—Renewed criticism of alleged irresponsibility in the human potential movement indicates a need for an explicit valuational basis upon which to construct a humanistic facilitative ethic for group facilitators and therapists. Moving toward a facilitative ethic is complicated by professional demands for standards of ethical behavior. Objective, subjective, and imperative valuing processes are discussed. Verificational criteria, exploring reasons underlying values by facilitator and participant (client) in the training situation itself, are required for authentic facilitation in the existential encounter. (21 ref)—*Journal abstract.*

5416. Ossorio, Peter G. (Ctr for Behavioral Studies, Boulder, CO) **Never smile at a crocodile.** *Journal for the Theory of Social Behaviour*, 1973(Oct), Vol 3(2), 121-140.—Suggests ways to increase the success of interaction between psychologists and philosophers. The appropriate model is seen as that of assimilation rather than of simple exchange. A conceptualization of behavior together with elaborations and heuristic distinctions is presented. The historical relationship between psychology and philosophy is discussed. The methodological roles of observer-describer and critic are outlined. A call is made for psychology to study the domain of behavior itself as a major prerequisite of going beyond technology and superstition toward a scientific understanding of behavior.—*R. S. Albin.*

5417. Panyan, Marion C. & Patterson, Earl T. (Lubbock State School, TX) **Teaching attendants the applied aspects of behavior modification.** *Mental Retardation*, 1974(Oct), Vol 12(5), 30-32.—Conducted 2 experiments to assess whether modeling was more effective than videotape feedback in developing proper behavior modification reinforcement procedures in 18 paraprofessionals. Results indicate that modeling was a more effective training technique than instructions or videotape feedback and that groups exposed to a film or live model performed better on subsequent training tasks than control Ss.—*Journal abstract.*

5418. Pavenstedt, Eleanor. (Tufts U, Columbia Point Health Ctr, Dorchester) **Training program for specializ-**

ed outreach workers and caretakers of high risk infants and toddlers. *Psychosocial Process*, 1974(Spring), Vol 3(1), 43-52.—Describes a training program for individuals recruited from the poverty sector of the population for the purpose of working with young children. Attempts were made to interest this population in child-rearing concepts that were essentially strange to them. The process of imitation followed by identification with the staff was used to involve the trainees with each infant or toddler assigned to them. Results of the training program were (a) trainees' control of children's aggression became more adaptive and flexible, (b) trainees came to view the child as capable of social responsiveness, and (c) trainees became more sensitive to the development of mother-infant reciprocity.—J. M. Kleinman.

5419. Pearl, Arthur. (U California, Santa Cruz) **The psychological consultant as change agent.** *Professional Psychology*, 1974(Aug), Vol 5(3), 292-298.—Discusses the roles and functions of the psychological consultant as an agent of change, proposing the following descriptive categories: (a) organizational man, (b) facilitator, (c) organizer of the powerless, and (d) leader with a goal. The difficulty of evaluating the consultant's effectiveness as a change agent is noted, and a method of self-study is suggested in which the consultant must make initial predictions about change. These are later compared with actual occurrences, and staff and client analyze the discrepancies that emerge.—C. Wright.

5420. Petersen, Rona. [Information about youth research.] (Danish) *Skolepsykologi*, 1974, Vol 11(5), 403-409.—Describes a plan sponsored and funded by 2 of the 6 national research councils in Denmark. Researchers with plans for studies of adolescence are invited to discuss with the secretariat of the 2 councils questions of coordination and economic and other support.

5421. Rhodes, William C. (U Michigan) **Principles and practices of consultation.** *Professional Psychology*, 1974(Aug), Vol 5(3), 287-292.—Proposes that consultation is a form of intervention that may occur at any of 5 specified levels common to all groups and systems: The organizational goals of the major consumers of consultant services (behavior regulating agencies at national and local levels) impact significantly on consultant activities. The mission of the consultee system and the orientation and personal dynamics of consultants are seen as important determinants of outcome. The consultant is a "constant student" who must keep abreast of societal and organizational developments.—C. Wright.

5422. Roemer, Ruth. (U California, Inst of Government & Public Affairs, Los Angeles) **Social regulation of health manpower.** In *Fostering the growing need to learn: Monographs and annotated bibliography on continuing education and health manpower*. Rockville, MD: Health Resources Administration, DHEW Pub No (HRA) 74-3112, 1974. xxx, 606 p.—Discusses governmental and voluntary mechanisms for regulating the qualifications of health-service personnel. The current situation, problems and issues, and proposed improvement strategies are discussed for the following topics: accreditation of educational programs and institutions; licensure; regulation of work settings; registration and certification; and requirements of payment programs. (4 p ref)

5423. Scharfetter, Christian. (Psychiatrische Universitäts-klinik, Zurich, Switzerland) **AMP system: Report on a system of psychiatric documentation used in some Continental countries.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5424. Seth, George. (Queen's U, Belfast, Northern Ireland) **Psychologists in education services: Some basic principles of professional training.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fall), Vol 3(2), 4-18.—Reviews the history of psychological services to children in the United Kingdom, tracing the 2 different traditions, one almost exclusively educational in orientation, the other more explicitly incorporating mental hygiene concepts and motivations. Differences in the ways in which psychologists have become qualified to enter the educational services have been relevant to the concept and practice of the different psychological services that grew up. The way into school psychology has consisted of an ill-considered process of accretion of qualifications. By now psychologists should have achieved the necessary wisdom, through experience, to be able to establish their own 1st principles of training. (20 ref)—I. L. Zimmerman.

5425. Slawson, Paul F.; Flinn, Don E. & Schwartz, Donald A. (U California, Neuropsychiatric Inst, Emergency Services, Los Angeles) **Legal responsibility for suicide.** *Psychiatric Quarterly*, 1974, Vol 48(1), 50-64.—Notes that suicide is a frequent basis for malpractice actions in psychiatry. A review of pertinent court decisions between 1927 and 1962 shows a distinct trend toward greater accountability for both doctors and hospitals. Recent cases in California are cited which support this trend. It is argued that stricter liability may thwart treatment by compelling a conservative posture with primary emphasis on safe custody. Court decisions which threaten or punish the agency of treatment may do so at the patient's expense. (29 ref)—*Journal abstract*.

5426. Sieger, Joseph M. (State U New York, Buffalo) **A multidisciplinary model for undergraduate education in rehabilitation.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 12-20.—Argues that rehabilitation education should be based on relatively formal models that justify content and objectives in terms of some analysis of rehabilitation functioning. An undergraduate program oriented to developing multidisciplinary team competence in members of a variety of rehabilitation specialties is presented as an illustration of how such a model can be implemented. 8 categories of skills that should be included in such a program are identified—multidisciplinary collaboration, communication skills, problem-solving techniques, use of resources, and knowledge of the individual, social variables, effects of disability, and rehabilitation. A major advantage of formalizing this model is the identification of objectives which suggest necessary and appropriate evaluation and development strategies.—*Journal abstract*.

5427. Tucker, Robin C. & Snyder, William U. (U Richmond) **Ambiguity tolerance of therapists and process changes of their clients.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 577-578.—Investigated the relationships between 18 student-therapists'



tolerance for ambiguity in visual perception tasks and (a) the positive affect displayed toward them by their 22 student clients, (b) changes in proportions of clients' self-reference statements, and (c) measures of improvement in clients' "adjustment." Results show an increase in clients' positive affect toward the therapists but no relationship between changes in clients' affect toward their therapists or the number of their self-reference statements and the therapists' tolerance for ambiguity. Clients of ambiguity-tolerant therapists described themselves more negatively, but all but 2 clients described themselves more favorably later in therapy. No positive correlation was obtained between client and therapist affect toward each other.—*Journal abstract.*

5428. Vander Kolk, Charles J. (State U New York, Albany) **The relationship of personality, values, and race to anticipation of the supervisory relationship.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 41-46.—Assigned 41 white and 9 black graduate counseling students to 2 groups according to whether they anticipated the supervisory relationship to be more or less facilitative. It was found that those who expected the supervisor to be more empathic, respectful, and congruent did not differ on personality or value dimensions (measured by the Edwards Personal Preference Schedule and the Allport-Vernon-Linzey Study of Values) from those who expected a lower level of facilitation. Students anticipated that the relationship would be even more negative than was found in a previous study. Blacks differed from whites on how they anticipated the supervisory relationship.—*Journal abstract.*

5429. Weber, John J.; Moss, Leonard M.; Bradlow, Paul A. & Elinson, Jack. (Columbia U, Coll of Physicians & Surgeons, Psychoanalytic Clinic for Training & Research) **Predictions of outcome in psychoanalysis and analytic psychotherapy.** *Psychiatric Quarterly*, 1974, Vol 48(1), 117-149.—The written records of 1,348 patients treated at Columbia University's Psychoanalytic Clinic were studied, and clinical and diagnostic items were coded by 9 graduate psychoanalysts for electronic processing at the beginning of treatment. A follow-up questionnaire was completed by the therapists on 74 of 271 patients who continued in analysis after the therapists' graduation, to relate clinical change with predictions of outcome made at the time of the patients' admission. Predictions were associated with the type of treatment offered, with the function of the O, and with the completion of long-term analysis. (21 ref)—*Journal abstract.*

5430. Williams, Ellen W. **The current role of the psychologist in the criminal justice system.** *Corrective & Social Psychiatry & Journal of Behavior Technology Methods & Therapy*, 1974(Sum), Vol 20(3), 25-27.—Describes the role of the woman psychologist in a correctional institution as basically 3-fold. (a) She must earn the trust of the inmate population so that individual and group therapy can effectively operate. (b) She must develop a strong yet informal relationship with fellow employees in order to facilitate staff development programs. (c) Working as the liaison between the custodial officers and the inmates, she must try to instill in each the knowledge that understanding oneself rather

than hating one another is the key to rehabilitation.—*Journal summary.*

5431. Zimmerman, Thomas F. (U Illinois, Medical Ctr, Chicago) **Is professionalization the answer to improving health care?** *American Journal of Occupational Therapy*, 1974(Sep), Vol 28(8), 465-468.—Discusses the impact and potential of professionalization on health care service and education. It is questioned whether the increasing energy expended on becoming professionals and being "professions" is really serving the best needs of the patient, the student, and society; the possibility that the increasing stress on professionalism is actually compounding problems of health care delivery is examined. Professionalization may foster negative traits and behavioral patterns, including insularity within disciplines, an inability to respond to change, and a loss of personal self-esteem and motivation. It is concluded that if society's demands for health care are to be met, the medical professions must reevaluate their philosophies and become more realistic about roles and responsibilities.—*Journal abstract.*

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

5432. Benfari, Robert C. et al. (Harvard U, School of Public Health, Boston) **The manifestation of types of psychological states in an urban sample.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 471-483.—From a survey of 237 males and 293 females in 6 urban census tracts, different levels of integration of people working out the business of life in the world are concluded to be represented by 6 types of populations. Each type is a form of existential manifestation of specific critical incidents and the integrative capacities of the person. The combination of the factorial study of psychological states plus the definition of types of person clusters is a means to bring the organism back into the picture. Results agree with F. C. Thorne's (1970) position that the longitudinal assessments of introspection, direct observations, streams of life history, and assessment of critical incidents are necessary to obtain a valid picture of the person's existential situation in "here and now." (15 ref)—*Journal summary.*

5433. Brown, George W. (U London, Bedford Coll, England) **Meaning, measurement, and stress of life events.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5434. Cobb, Sidney. (Butler Hosp, Providence, RI) **A model for life events and their consequences.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5435. de Grèce, Gaston-René (U Laval, Quebec, Quebec, Canada) **Disequilibrium as an essential component of psychological health.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 65-70.—Presents "the positive aspect" of psychological disequilibrium as viewed by 4 major North American theorists: E. Erikson, E. Shostrom, R. May, and V. Frankl. The core idea of this theory is gaining

momentum in North American psychology. A new definition of psychological health is offered.

5436. Dohrenwend, Barbara S. & Dohrenwend, Bruce P. (City Coll, City U New York) **A brief historical introduction to research on stressful life events.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5437. Dohrenwend, Barbara S. & Dohrenwend, Bruce P. (Eds). (City Coll, City U New York) **Stressful life events: Their nature and effects.** New York, NY: John Wiley & Sons, 1974. xi, 340 p.—Groups of papers describe (a) research programs on the relations between stressful life events (SLE) and episodes of physical illness, (b) clinical research on SLE as related to types of physical and psychiatric disorder, (c) community research on SLE and psychiatric symptomatology, and (d) methodological research on SLE.

5438. Gersten, Joanne C.; Langner, Thomas S.; Eisenberg, Jeanne G. & Orzeck, Lida. (Columbia U, School of Public Health) **Child behavior and life events: Undesirable change or change per se?** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5439. Hinkle, Lawrence E. (Cornell U, Medical School, New York) **The effect of exposure to culture change, social change, and changes in interpersonal relationships on health.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5440. Holmes, Thomas H. & Masuda, Minoru. (U Washington, Medical School) **Life change and illness susceptibility.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5441. Katcher, Avrum L. (Hunterdon Medical Ctr, Flemington, NJ) **The neurologically based pediatrician and deviant development.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

5442. Kellam, Sheppard G. (Woodlawn Mental Health Ctr, Chicago, IL) **Stressful life events and illness: A research area in need of conceptual development.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5443. Lettieri, Dan J. & Nehemkis, Alexis M. (National Inst for Drug Abuse, Rockville, MD) **A socio-clinical scale for certifying mode of death.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5444. Plutchik, Robert & DiScipio, William J. (Albert Einstein Coll of Medicine, Program Development & Clinical Research, Yeshiva U) **Personality patterns in chronic alcoholism (Korsakoff's syndrome), chronic schizophrenia, and geriatric patients with chronic brain syndrome.** *Journal of the American Geriatrics Society*, 1974(Nov), Vol 22(11), 514-516.—Obtained the personality profiles of 3 groups of long-term hospital patients by means of the Emotions Profile Index, a personality

test designed to measure 8 basic traits. The study groups included (a) 10 patients with severe chronic alcoholism who showed definite evidence of Korsakoff's syndrome, (b) 30 patients with chronic schizophrenia, and (c) 20 geriatric patients with chronic brain syndrome (CBS). The Korsakoff-alcoholic patients appeared to be gregarious, obedient, timid, and poorly self-controlled. Their profile was different from those of normal Ss and of patients with schizophrenia. However, their profile was similar to that of geriatric patients with chronic brain syndrome who were not alcoholic. The basic similarity between Korsakoff-alcoholic patients and geriatric-CBS patients suggests that a unique alcoholic personality does not exist.—*Journal abstract*.

5445. Rahe, Richard H. (US Navy Medical Neuropsychiatric Research Unit, Biomedical Correlates Div, San Diego, CA) **The pathway between subjects' recent life changes and their near-future illness reports: Representative results and methodological issues.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5446. Simon, Robert J.; Fleiss, Joseph L.; Fisher, Bernice & Gurland, Barry J. (Biometrics Research, New York, NY) **Two methods of psychiatric interviewing: Telephone and face-to-face.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 141-146.—Studied the effects of telephone and face-to-face interviews on the quantity and quality of historical information obtained from informants of psychiatric patients. Whenever possible the closest available relative of 105 consecutive admissions between the ages of 20 and 34 yrs was interviewed by a social scientist using a semistructured psychiatric interview consisting of 88 questions. A total of 85 informants were interviewed, 50 face-to-face and 35 by telephone. The 2 groups of informants were similar in all characteristics possibly associated with knowledge of the patient and willingness to provide information. It was found that the information elicited by one method was not significantly different from the information elicited by the other in either quantity or quality.—*Journal abstract*.

## Mental Disorders

5447. Achenbach, Thomas M. (Yale U) **Developmental psychopathology.** New York, NY: Ronald Press, 1974. vii, 726 p. \$13.95.—Presents a comprehensive overview of the historical context, major theories, research, and treatment of childhood psychopathology, emphasizing the need to view it as separate and distinct from adult psychopathology. Treatment approaches and research on their effectiveness are presented, along with the theories and descriptions of each type of disorder. (66 p ref)

5448. Aitken, R. C. (U Edinburgh, Scotland) **Assessment of mood by analogue.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.—Discusses the reliability, validity, and potential usefulness of a method of measuring mood in depressed patients with graphic bipolar rating scales—Visual Analogue Scales (VAS). The diurnal variations noted in the moods of depressed patients and the effects of drugs on mood and



sleep EEGs are noted. The effectiveness of the VAS in measuring the extent of these changes is discussed, and a case example is presented.

5449. Albert, Joel S. (Yale U, Child Study Ctr) **Sociocultural determinants of personality pathology.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses certain sociocultural aspects of the pathogenesis, diagnosis, and treatment of character disorders, based on the thesis that sociocultural factors do have significant effects in determining personality pathology. It is suggested that the recent increase in the incidence and prevalence of character pathology may be due to an increasingly anomic American society. (41 ref)

5450. Allen, Martin G.; Cohen, Stephen; Pollin, William & Greenspan, Stanley I. (Georgetown U, Medical School) **Affective illness in veteran twins: A diagnostic review.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1234-1239.—Systematically reviewed diagnoses in the Veteran Twin Registry and found 62 pairs of twins (69 individuals) in which one or both had affective illness, a frequency of .22% (monozygotic [MZ] concordance = 33%, dizygotic [DZ] concordance = 0%, and MZ/DZ ratio  $\geq 11.5$ ). In 40 of the 62 pairs, one or both twins had unipolar depression (MZ concordance = 40%, DZ concordance = 0%, and MZ/DZ ratio  $\geq 8$ ). Bipolar depression was present in 22 pairs (MZ concordance = 20%, DZ concordance = 0%, MZ/DZ ratio  $\geq 3.2$ ). Data indicate that both environmental and genetic factors are important in the etiology of affective illness and that unipolar and bipolar illness are separate entities. (49 ref)—*Journal abstract*.

5451. Anthony, E. James. (Washington U, Medical School) **A risk-vulnerability intervention model for children of psychotic parents.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Presents a model which indicates that when children of psychotic and nonpsychotic parents are compared, the former show a greater tendency to become clinically disturbed during childhood and adolescence and are more likely to develop psychiatric disorders and psychoses as adults.

5452. Anthony, E. James. (Washington U, Medical School) **Introduction: The syndrome of the psychologically vulnerable child.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Reviews the research on environmental, hereditary, and physical factors in the development of psychological disorders in the "vulnerable child." It is suggested that these disorders begin in infancy and have a snowballing effect through adult life. (22 ref)

5453. Antunes, George; Gordon, Chad; Gaitz, Charles M. & Scott, Judith. (Rice U) **Ethnicity, socioeconomic status, and the etiology of p...** *Sociology & Social Research*, 1974(Jul), Vol 58(4), 361-368.—Used a research design which contrasts distress levels of Anglos, Negroes, and Mexican-Americans for 2 levels of socioeconomic status (SES) to identify mechanisms responsible for the inverse association between social class and psychological distress. Data

were obtained from 1,441 Ss representing the above 3 groups who completed a 22-item screening scale. Results suggest that social stress associated with SES is not the cause of ethnic differences in number of symptoms of distress. (25 ref)—R. V. Heckel.

5454. Asuni, Tolani. (U Ife, Neuro-Psychiatric Hosp, Nigeria) **Sociopsychological aspects of the vulnerable child, risk and mastery: Children of the modern elite in Nigeria.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Suggests that the vulnerability displayed by elite Nigerian children is due partly to the dissimilar rearing patterns of the parents and foreparents. Problems arising from this conflict include poor school performance, drug abuse, identity and religious crises, and psychosis.

5455. Azcarate, Carlos. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Schizoid, asthenic, and inadequate personalities.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Describes problems in the differential diagnosis of schizoid, asthenic, and inadequate personalities, emphasizing the need to distinguish carefully between the presenting symptoms of low energy levels, lack of enthusiasm, ineffectual responses to social demands, and seclusiveness in each case. Caution is also advised in diagnosing members of particular social movements (e.g., bohemians or hippies) as cases of personality disorder. (57 ref)

5456. Bach-y-Rita, George. (U California, Medical School, San Francisco) **Personality disorders in prisons.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses social influences (e.g., socioeconomic status) on the diagnosis of personality disorders in prison, the types of disorders most often found (e.g., explosive, passive-aggressive, and antisocial personalities), the effects of imprisonment on already existing disorders, and the treatment of these disorders within the limitations of a prison environment. (30 ref)

5457. Balthazar, Earl E. & Stevens, Harvey A. (U Wisconsin, Waisman Ctr on Mental Retardation & Human Development, Central Wisconsin Colony & Training School) **The emotionally disturbed, mentally retarded: A historical and contemporary perspective.** Englewood Cliffs, NJ: Prentice-Hall, 1975. xiv, 333 p.

5458. Barolo, Enrico. (U Milan, Medical School, Inst of Psychology, Italy) **[Social autism and Andersen's fables.]** (Ital) *Rivista di Psicologia*, 1972(Jan), Vol 66(1-2), 35-46.—Reviews literature treating autism as "the organization of cognitive processes in the direction of need satisfaction" (G. Murphy). Selected fables by H. C. Andersen are interpreted as illustrations of this behavior. Group pressure provides information to an individual and restructures his point of view; the outcome is group conformity. Sympathetic reactions to the fables suggest the general understanding of the principle by society. (68 ref)—J. W. Black.

5459. Barrett, Edwin T. & Logue, Patrick E. (Florida State U) **The use of the Spiral After-effect Test to differentiate chronic schizophrenics from chronic organics.** *Journal of Clinical Psychology*, 1974(Oct), Vol

30(4), 513-516.—Administered the Spiral Aftereffect Test to 35 matched pairs of male schizophrenic inpatients (each pair consisting of one chronic and one organic S). Results show that the test significantly differentiated between the 2 diagnostic groups. Although the test in this study did not have the predictive power demonstrated in previous research, it was able to improve upon the population base rates. The contributive significance of such an instrument is accentuated when the minimal time and effort needed for its administration is considered.—*Journal summary*.

5460. Beck, Aaron T. & Beamesderfer, Alice. (Philadelphia General Hosp, PA) **Assessment of depression: The depression inventory.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5461. Beck, Aaron T.; Laude, Richard & Bohnert, Michael. (Philadelphia General Hosp, PA) **Ideational components of anxiety neurosis.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 319-325.—Studied the relationship between cognitions and anxiety in 32 18-40 yr old patients with anxiety neurosis. The thoughts and fantasies associated with the arousal and intensification of anxiety were mainly anticipation of physical harm and of psychosocial trauma, ranging from humiliation or rejection in certain circumstances to complete ostracism. The patients' idiosyncratic ideation involved unrealistically heightened expectations of harm; the degree of anxiety was related to the degree of credibility of the fears (to the patient) and severity of the anticipated adversity. Of 24 patients specifically questioned about having visual images, 22 reported having typical fantasies of being in danger prior to and concomitant with their anxiety attacks. Verbal cognitions related to danger were reported in all cases. (15 ref)—*Journal abstract*.

5462. Bedoret, J. M.; Destombes, A. & Warot, P. **Psychotic episode in an anorexia nervosa: The role of isolation.** (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 437-447.—Presents the case of a 17-yr-old girl with anorexia nervosa, who experienced a psychotic episode after being hospitalized. The importance of separation from the family is emphasized, both in the development of psychotic symptoms and in the recovery process. (Dutch, English, German, Italian, & Spanish summaries) (16 ref)

5463. Björnsson, Sigurjón. (U Iceland, Reykjavik) **Enuresis in childhood: Its incidence and association with intelligence, emotional disorder, and some social and educational variables.** *Scandinavian Journal of Educational Research*, 1973, Vol 17(3), 63-82.—In 1,098 5-15 yr old children, the morbidity risk of enuresis was 12.5% and the incidence was 7.5%. Enuresis was positively associated with emotional disorder, thumb-sucking, undisciplined and negativistic behavior, adjustment and behavior problems in school, lower socioeconomic status, large families, cold and inconsistent maternal behavior, and frequent father absences. 10-15 yr old enuretics had lower IQs than nonenuretics. (29 ref)

5464. Bloch, Dorothy. (Manhattan Ctr for Advanced Psychoanalytic Studies, NY) **Fantasy and the fear of infanticide.** *Psychoanalytic Review*, 1974(Spring), Vol 61(1), 5-31.—Describes, through a case study, a child's fear of

being killed by parents and of killing them in return. In children, this fear is matched by the child's need for the parents' love. Unconscious fantasy in which self-deception plays a major role is used to defend against the knowledge that his parents may wish to kill him. The child frequently construes that it is he who makes them hate him, in order to repress his perception of how his parents really feel. He displaces the source of his fear from his parents on to monsters and imaginary creatures to allow him to maintain a loving image of his parents.—*B. Smith*.

5465. Bogdanova, E. D.; Vostrikova, S. A. & Kurilova, I. I. [In vitro determination of nucleic acids in lymphocytes of schizophrenic patients.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1183-1188.—Found that the amount of RNA in lymphocytes of 27 schizophrenic patients after a 1-hr culture had significantly increased compared to that in the lymphocytes of 20 healthy donors. DNA in 48- and 72-hr S cultures also increased. The addition of phytohemagglutinin (PHA) to S cultures did not cause an increase in RNA as it does in lymphocytes of normals. PHA added to 2- to 3-day S cultures demonstrated a decreased synthesis of RNA and DNA compared to the reaction of lymphocytes in normals. (English summary) (16 ref)—*J. Larsen*.

5466. Bosma, Willem. (U Maryland, Medical School, Baltimore) **Alcoholism and personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Reviews some recent findings on alcoholism and some theories about its etiology and the prealcoholic personality. Characteristics of alcoholic personality subgroups—neurotic, psychotic, and addictive drinkers—are described, and suggested treatments for each type are discussed. (25 ref)

5467. Boyar, R. M. et al. (Montefiore Hosp & Medical Ctr, Inst for Steroid Research, Bronx, NY) **Anorexia nervosa: Immaturity of the 24-hour luteinizing hormone secretory pattern.** *New England Journal of Medicine*, 1974(Oct), Vol 291(17), 861-865.—8 17-23 yr old women with anorexia nervosa associated with amenorrhea showed age-inappropriate luteinizing-hormone secretory patterns that resembled those found in prepubertal and pubertal children. This finding suggests that a regression or an arrest of the luteinizing-hormone secretory program occurs in this disorder. The finding of a relation between body weight and the maturity of the luteinizing-hormone pattern supports the hypothesis that a critical body weight is an important factor in the initiation of menarche. (24 ref)

5468. Bösörményi, Z. & Villeneuve, A. (Central State Hosp for Nervous & Mental Diseases, Budapest, Hungary) **A comparative study of psychoses following childbirth in Hungary and Quebec.** *Confinia Psychiatrica*, 1974, Vol 17(2), 111-121.—Studied the records of 2 groups of 100 women each, one from a Budapest hospital and one from a Quebec hospital, who in 1953-1969 experienced psychotic episodes during the 1st 6 mo after childbirth. 30% of the Hungarians and 33% of the French-Canadians were diagnosed as manic-depressive, and 42% of the former group and 41% of the latter were diagnosed as schizophrenic. Average age of the Hungarians was 26 yrs, of the French-Canadians 29 yrs. 56% of



the Hungarians had onset of the psychosis after the 1st childbirth and 3% after 5 or more children, compared with 18% and 27% respectively for the French-Canadians. It is suggested that a history of previous mental disorder, with or without childbirth, identifies a pregnant patient as a psychiatric risk.—I. N. Mensh.

5469. Braff, David L. & Beck, Aaron T. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Thinking disorder in depression.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 456-459.—Administered the Shipley-Institute of Living Scale for Measuring Intellectual Impairment, the Beck Depression Inventory, and the Gorham Proverbs Test to 24 schizophrenics, 19 depressives, and 24 normals (age range for patient groups, 18-65 yrs). Depressives and schizophrenics showed a clear abstraction deficit compared with normals, and schizophrenics exhibited a greater deficit than depressives. When degree of depression was correlated with abstraction deficit, an important overall relationship was observed; however, this relationship did not hold consistently within the 3 groups, making this finding difficult to interpret. The need to further characterize a "cognitive profile" of patients along both diagnostic lines and dimensions (e.g., degree of depression) is stressed; this has implications for nosology and differential diagnosis, and may lead to indexes for monitoring drug effects. (24 ref)—*Journal abstract*.

5470. Busse, Ewald W. & Pfeiffer, Eric (Eds.). (Duke U, Medical School) **Mental illness in later life.** Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.—This book is a 2-part treatment of mental health problems of the aged. Part 1 contains 12 chapters that discuss various aspects of the problem; Part 2 includes questions and responses of physicians and health professionals on theories and processes of aging, brain function and mental illness, treatment and rehabilitation, nutrition and vitamins, longevity and rejuvenators, perceptual changes, social aspects and habits, living arrangements and adaptation, and work and retirement.

5471. Carney, Francis L. (Patuxent Inst, Jessup, MD) **Psychological testing of the personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the value of psychological tests in the differential diagnosis and prediction of behavior and prognosis in therapy of personality disorders. Several major tests used in cases of character pathology (e.g., the Rorschach, WAIS, and Bender Gestalt Test) are described. It is stressed that the testing of severe personality disorders is no different from any other group; the difference lies in the results and their interpretation. (15 ref)

5472. Chiland, Colette. (U René Descartes, Paris, France) **Some paradoxes connected with risk and vulnerability.** In E. J. Anthony & C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Results of a longitudinal study of children suggest that the critical factor determining vulnerability or resilience to risk is not the risk itself but the relationship between the risk and the person's psychological makeup, past history, individual characteristics, and similar factors.

5473. Cohen, Donald J. (Yale U, Child Study Ctr) **Competence and biology: Methodology in studies of infants, twins, psychosomatic disease, and psychosis.** In E. J. Anthony & C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Presents 12 components of a multivariate model that emphasize the interaction between biological and psychosocial factors in studying the vulnerable child. (102 ref)

5474. Cronholm, Börje; Schalling, Daisy & Asberg, Marie. (Karolinska Hosp, Stockholm, Sweden) **Development of a rating scale for depressive illness.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5475. Crown, Sidney. (London Hosp, England) **The Middlesex Hospital Questionnaire (MHQ) in clinical research: A review.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5476. Davids, Anthony (Ed.). (Brown U) **Child personality and psychopathology: Current topics: I.** New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.

5477. de M'uzan, Michel. **A case of masochistic perversion and an outline of a theory.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 455-467.—Presents in detail one of the rare psychoanalytic cases which involve physical punishment rather than masochistic fantasies or other substitutes. The patient's submission to abuse and humiliation is viewed as screening excessive pride, but its constructive function, from a theoretical standpoint, may be the recovery of narcissistic integrity.

5478. del Rey Calero, J.; Otero Puime, A. & del Carmen González Rodríguez-Salinas, M. (Facultad de Medicina Autonoma, Madrid, Spain) **[Study of the immunological aspects of catatonia and other forms of schizophrenia, using the M. I. T. (Migration Inhibition Test).]** (Span) *Archivos de Neurobiología*, 1972(May), Vol 35(3), 225-248.—Reviews prior research on catatonic schizophrenia, and describes a study of immunological alterations in the disorder. The Migration Inhibition Test (MIT), originally developed by M. George and J. H. Vaughan, was applied to white cells from 124 schizophrenics. Immunological alterations, due to cellular hypersensitivity for the antigens of the central nervous system, were found in 36.4% of the patients. Clinical applications of the MIT are pointed out. (English & French summaries) (75 ref)—R. Ardila.

5479. Derogatis, Leonard R. et al. (Johns Hopkins U, Henry Phipps Psychiatric Clinic) **The Hopkins Symptom Checklist (HSCL): A measure of primary symptom dimensions.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5480. Dracoulides, N. N. **[Deviations of the maternal instinct.]** (Fren) *Annales Médico Psychologiques*, 1974(Apr), Vol 1(4), 485-494.—Presents a typology of common deflections of the maternal instinct, with comments on their etiology and ultimate psychosocial repercussions. The 5 forms of variation of the maternal role most often observed are (a) tecnomania (strong

desire to have many babies, unaccompanied by a continuing interest in them); (b) tecnophobia (fear of procreation); (c) aphilectenia (indifference to procreation); (d) missotecnia (hate for procreation and children generally); and (e) parthenotecnia (desire to have many children, without sexual contact). Psychoanalytic treatment is recommended, aided in certain cases by a specific hormonal therapy.—H. E. King.

5481. Dzivaltovskii, S. A. [Some varieties of residual states in depressive paranoid schizophrenia.] (Russ) *Zhurnal Nevropatologii i Psikhatrii*, 1972, Vol 72(8), 1230-1235.—Studied residual states following depressive paranoid attacks in 50 schizophrenic patients. Clinical observations pointed to the possibility of gross mental regression, a development that may be reversed. In most cases this regression results from incomplete cessation of active symptoms. The most stable symptom in such residual states is reduced mental activity, which may be ameliorated somewhat by rehabilitative measures. (English summary) (28 ref)—J. Larsen.

5482. Edinger, Jack D. & Weiss, William U. (Virginia Commonwealth U) The relation between the altitude quotient and adjustment potential. *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 510-513.—Conducted a study with 15 male college students and 15 male process schizophrenics. Intercorrelations among IQs, altitude quotients (AQs), AQ-IQ discrepancies, Rorschach Prognostic Rating Scale scores, and psychiatric status of the Ss were computed. Results suggest that AQ was no better as a measure of adjustment potential than was IQ and that IQ was a much better indicant of functional efficiency as measured by the psychiatric status of the Ss than were AQ-IQ discrepancy scores. These data seem to indicate that J. A. Jastak's AQ measure (1949) adds little prognostic value to measures of IQ.—*Journal summary*.

5483. el Sendiony, M. F. (Teachers Coll, Goulburn, NSW, Australia) The problem of cultural specificity of mental illness: The Egyptian mental disease and the Zar ceremony. *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 103-107.—Questions whether there are, in Egypt, mental sicknesses which are the specific production of the Egyptian cultural setting. The literature is reviewed and supplemented by the author's anthropological observations and Egyptian psychiatric reports. It is concluded that the psychopathological manifestations expressed in the *Rabt* and *Zar* cult phenomena which reflect the specific cultural content of the victim's society are simply local varieties of a common disease process to which human beings in general are vulnerable.—*Journal abstract*.

5484. Eron, Leonard D.; Lefkowitz, Monroe M.; Walder, Leopold O. & Huesmann, L. Rowell. (U Illinois, Chicago Circle) Relation of learning in childhood to psychopathology and aggression in young adulthood. In A. Davids, *Child personality and psychopathology: Current topics*. 1. New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.

5485. Esmiol, Pattison. (Harvard U, Medical School, Boston) Personality disorders in private practice. In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the types of personality

disorders most often handled by the psychiatrist in private practice (e.g., obsessive-compulsive, passive-aggressive, and paranoid) and the need for flexibility in choosing the most effective treatment modality. Problems of alliance and leverage in therapy (e.g., ego-syntonic and ego-dystonic behaviors, reality distortion, disturbed object relations, transference, and narcissism) are examined, and methods of assessing the extent of these problems are described. (22 ref)

5486. Feldmann, Harald. (U Göttingen, Germany, Psychiatric Clinic) [Hypochondria: Relation to body, risk-taking behavior, development.] (Germ) *Monographien aus dem Gesamtgebiete der Psychiatrie*, 1972, Vol 6, 118 p.—Discusses the phenomenology and psychodynamics of hypochondria. Experimental studies are also reported. (115 ref)

5487. Felitti, Vincent J. (Southern California Permanente Medical Group, San Diego) Hysterical blindness due to hyponatremia. *Psychosomatics*, 1974, Vol 15(3), 115-116.

5488. Fischer, Margit. (Statshospitalet, Risskov, Denmark) [Environmental factors in schizophrenia: Intrapair comparisons in monozygotic twins.] (Germ) *Nervenarzt*, 1972(May), Vol 43(5), 230-238.

5489. Gallahorn, George E. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) The borderline personality. In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the diagnosis, psychodynamics, and treatment of borderline personalities, including the differential diagnosis of borderline personality vs organic syndromes, functional psychoses, or schizophrenia, and the relative effectiveness of individual or group psychotherapy, hospitalization, and medication. (19 ref)

5490. Garnezy, Norman. (U Minnesota) The study of competence in children at risk for severe psychopathology. In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Describes Minnesota studies of competence as illustrations of a 4-stage research sequence for exploring the correlation between the behaviors of children presumed to be vulnerable to psychopathology, and a criterion of their qualities of competence. (30 ref)

5491. Gibson, Robert W. (Sheppard & Enoch Pratt Hosp, Towson, MD) Insurance coverage for treatment of mental illness in later life. In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5492. Glebov, V. S. [Clinical and immunological correlations during development of remissions in continuous forms of schizophrenia.] (Russ) *Zhurnal Nevropatologii i Psikhatrii*, 1972, Vol 72(8), 1191-1195.—Studied the brain antigens and antibrain antibodies in the serum of 83 schizophrenic patients during the period from relapse through discharge from the hospital. A drop in immunological blood activity which occurred parallel to an improvement in the mental state, was usually prognostically favorable and was connected with subsequent good remissions. Stable or increased immunological blood activity usually corresponded to poorer remissions. (English summary)—J. Larsen.



5493. **Gorwitz, Kurt.** (Michigan State Office of Health & Medical Affairs, Lansing) **Census enumeration of the mentally ill and the mentally retarded in the nineteenth century.** *Health Service Reports*, 1974(Mar), Vol 89(2), 180-187.—Reports statistics on the mentally ill and mentally retarded that appeared in the 6 US censuses 1840-1890. Inclusion of these categories was part of a new social consciousness emerging in those decades. The figures are analyzed and their limitations considered. Factors leading to elimination of these categories after 1890 are discussed.

5494. **Gottlieb, Edward & Stone, George C.** **Psychosomatic aspects of orality and anality.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 182-190.—Studied possible relationships between patterns of bowel behavior and anal character traits and between certain patterns of mouth-related activity and oral character traits by administering a 186-item questionnaire to 30 male patients in each of the following diagnostic categories: ulcer, proctology, passive-dependent, obsessive-compulsive, and control. The distributions of scores on an oral trait scale and an anal trait scale approximated the normal curve for the entire sample and for each of the 5 clinical groups of patients so that neither individuals nor groups could be characterized as having or not having oral or anal tendencies but rather as having more or less of them. The passive-dependent and obsessive-compulsive patients, as expected, received the highest scores on the oral and anal trait scales, respectively; however, the mean differences were not large and there was a great deal of overlap from group to group. Many mouth and bowel habit and personal history items did not correlate with the 2 trait scales nor did they differentiate the 5 groups. (21 ref)—*Journal abstract*.

5495. **Grand, Henry G.** **The masochistic defence of the "double mask": Its relationship to imposture.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 445-454.—Reconstructs the development of individuals who become masochistic in later life. Early dependence leads to simulated incompetence (the mask of childhood) and later to the belief that actual competence is a pretence (the mask of adulthood), as illustrated by 3 psychoanalytic case histories. It is suggested that imposture, a more severe character disturbance, has similar origins.—*C. T. Sullivan*.

5496. **Gross, Herbert S.** (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Depressive and sadomasochistic personalities.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses problems in the differential diagnosis of depressive and sadomasochistic personalities (vs depressive neurosis). The psychodynamic functions of dysphoria, the "compromise function," deficiencies in the sense of self, and the effects of these mechanisms on both the diagnosis of a characterological condition and on the management of the case are examined.

5497. **Haggard, Ernest A.** (U Illinois, Abraham Lincoln School of Medicine, Chicago) **A theory of adaptation and the risk of trauma.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at*

*psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Uses a behavioral system as the basis for discussing aspects of adaptation and trauma, including a consideration of effects of changes in the individual's life cycle and status. Suggestions for preventing maladaptive states are presented. (31 ref)

5498. **Hamilton, Max.** (U Leeds, England) **General problems of psychiatric rating scales (especially for depression).** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5499. **Hauri, Peter; Chernik, Doris; Hawkins, David & Mendels, Joseph.** (Dartmouth Coll, Medical School) **Sleep of depressed patients in remission.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 386-391.—A group of 14 23-63 yr old remitted patients, formerly hospitalized with unipolar depression, was matched individually with a group of normal controls. All Ss slept in the laboratory for 5 consecutive nights. Although remitted patients and controls slept for about the same length of time (6½ hrs), remitted patients suffered from delayed sleep onset, showed more Stage 1 and less delta sleep, and had a slower sleep cycle. Night-by-night variability was much greater in remitted patients than in controls for practically all sleep measurements. Findings indicate that sleep was still disturbed more than 6 mo after substantial clinical recovery from depression. Finally, variability among individuals was greater for remitted patients than for controls in some sleep measurements, suggesting less homogeneity among formerly depressed patients than among controls. (35 ref)—*Journal abstract*.

5500. **Henderson, Scott.** (U Tasmania, Royal Hobart Hosp, Australia) **Care-eliciting behavior in man.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 172-181.—Suggests that the concept of care-eliciting behavior is an essential part of the phenomenon of attachment. The origins of this behavior in man are examined in terms of both ontogenesis and phylogenesis. The relevance of the behavior for species advantage is considered. Finally, it is suggested that morbid manifestations of care-eliciting constitute a number of psychiatric disorders previously considered to be unrelated. (51 ref)—*Journal abstract*.

5501. **Hogan, William M.; Huerta, Enrique & Lucas, Alexander R.** (Mayo Clinic, Section of Child & Adolescent Psychiatry, Rochester, MN) **Diagnosing anorexia nervosa in males.** *Psychosomatics*, 1974, Vol 15(3), 122-126.—Reports 18 typical cases of anorexia nervosa in males and reviews in detail 13 of these who were seen consecutively since 1969. Diagnostic criteria, clinical features, and laboratory findings are presented. (17 ref)

5502. **Holberg, Anne; Hysham, C. J. & Berry, N. H.** (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **The neuropsychiatric implications of illiteracy: 20 years later.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 533-535.—Hypothesized that a study of the illiteracy problem in the present US Navy would reflect the innovative changes in education, psychiatry, and the military which have occurred since W. A. Hunt and C. L. Wittson conducted their study (1951) of the psychiatric implications of illiteracy, specifically in the Navy. In the present study, data were

collected on 1,518 recruits who were assigned to the Naval Academic Remedial Training (ART) Division in an effort to raise their literacy level. 1,520 literate recruits served as a control sample. First-year discharge information was collected for both samples. Results show that 17.98% of the ART sample had been discharged for neuropsychiatric and disciplinary reasons, compared to 1.7% of the controls. Comparison of attrition rates with those from Hunt and Wittson's study show that the rates are very similar (18.83 and 4.60% for illiterates and controls, respectively). It is reasoned that Hunt and Wittson's conclusions are still valid today—that individuals who need academic remedial training are a greater neuropsychiatric risk to the military than are literates.—*B. McLean.*

5503. Honigfeld, Gilbert. (Sandoz Pharmaceuticals, Hanover, NJ) **NOSIE-30: History and current status of its use in pharmacopsychiatric research.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5504. Ismailov, T. I. [Study of autoantibodies to DNA in schizophrenia and other neuropsychiatric disorders.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1188-1191.—Determined the presence of the autoantibodies in the blood of 156 schizophrenic patients, 104 patients with other neuropsychiatric disorders, and a control group. A modified passive hemagglutination reaction was used. 81.5% of the schizophrenics showed a positive reaction, as did 37.5% of the chronic alcoholics and alcoholic psychotics, 26.7% of the neurotics and psychopaths, and 29.6% of the normals. (English summary) (27 ref)—*J. Larsen.*

5505. Ives, L. A. (U Manchester, England) **Infantile autism: Some notes on recent research studies.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 47-52.—Reports the findings of a study group held under the auspices of the Institute for Mental Retardation. (22 ref)

5506. Jerotić, Vladeta. (Dragisa Misovic Hosp. Neuropsychiatric Div, Belgrade, Yugoslavia) [Psychosomatic disturbances in gynecology.] (Socr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 85-91.

5507. Kecmanović, Dušan. (Neuropsychiatric Clinic, Sarajevo, Yugoslavia) [The public attitude toward mental patients and some factors underlying it.] (Socr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 27-35.

5508. Klein, Donald F. (Long Island Jewish—Hillside Medical Ctr, Glen Oaks, NY) **Endogenomorphic depression.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 447-454.—Reviews conflicts in delineating the phenomena of depression with an emphasis on the central criterion role of the symptomatic pattern of the nonprecipitated (endogenous) depression. Depressions with similar symptomatology, regardless of precipitator or severity, are labeled endogenomorphic. A specific causal model is presented that has testable consequences in drug treatment and maintenance studies. This is a mixed model, combining both categorical and dimensional constructs. It is concluded that the terms "endogenous vs reactive" and "neurotic vs psychotic" should be used as qualifying adjectives rather than as category-defining terms, and that the behavioral syndromal appellation

should be based on the symptom complex (i.e., retarded, agitated, and dysphoric).—*Journal abstract.*

5509. Klein, Hillel. (Eitanim Government Psychiatric Hosp, Jerusalem, Israel) **Child victims of the holocaust.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 44-47.—Discusses the oppression suffered during the holocaust, consisting of a long series of traumatic experiences aimed against the life and physical integrity of the individual. The cumulative traumatization was likely to shake the emotional basis of the individual's existence and led to a raised stimulus barrier. The return to peacetime conditions often failed to lower that barrier. The survivors suffered irrational fear of the future, subjective feelings of loneliness, and survival guilt toward murdered family members. These guilt feelings were positive in that the survivor could identify with the lost world of early childhood, protect against overwhelming anxiety and remorse, and regain his sense of a just universe.—*A. Krichev.*

5510. Koller, K. M. & Williams, W. T. (U Tasmania, Hobart, Australia) **Early parental deprivation and later behavioural outcomes: Cluster analysis study of normal and abnormal groups.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 89-96.—Notes that, despite high figures recorded from the normal population, early parental deprivation is commoner in psychiatric and deviant populations. This deprivation and its aftermath is qualitatively different when normal and abnormal samples are contrasted. Suicidal, delinquent, criminal, alcoholic, neurotic, socially deviant, and normal groups from earlier studies were analyzed on variables related to early parental deprivation and other family characteristics. Using cluster analysis, 3 abnormal and 2 normal groups were generated. It is concluded that the vulnerability of selected individuals in certain families is compounded when these individuals are exposed to the unique specific effects of the various types of parental deprivation. (65 ref)—*Journal abstract.*

5511. Kopp, Sheldon B. **Person envy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 154-156.—Briefly describes the case of an harassed married woman with children who fantasizes becoming the recipient of a penis organ-transplant. It is concluded that the fantasy represented a culturally-determined misleadingly symbolic expression of her legitimate human longing to fulfill her own purposes, i.e., "person envy."

5512. Kupfer, David J. et al. **First night effect revisited: A clinical note.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 205-212.—Notes that it has been a nearly universal practice among sleep researchers not to use the 1st 1 or 2 nights' recordings because of "adaptational artifact." The present study examined the records of the 1st 2 nights and compared them with records obtained in subsequent recordings (3rd and 4th nights). 35 psychiatric inpatients from various diagnostic groups were studied for 4 consecutive nights. Results indicate a striking constancy in nearly all sleep parameters when Nights 1 and 2 were compared to Nights 3 and 4 for the entire sample. Of the 26 sleep parameters investigated, only sleep latency differed significantly on the latter 2 nights. Similarly, no significant differences were found in comparing Nights 1



and 2 to Nights 3 and 4 in any of the diagnostic subgroups.—*Journal abstract.*

5513. Kupfer, David J.; Foster, F. Gordon & Detre, Thomas P. (Yale U, Medical School) **Sleep continuity changes in depression.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 192-195.—Examined the significance of sleep fragmentation in 25 depressed inpatients by making continuous nightly EEG, horizontal electro-oculogram, and submental electromyogram recordings. Time spent asleep was significantly less for Ss with considerable fragmentation of sleep than for Ss with little sleep fragmentation. Both types of patients showed a prominent reduction in delta sleep fragmentation. Both types of patients showed a prominent reduction in delta sleep and a shortened REM latency. REM sleep was also rearranged, with a much greater percentage occurring in the 1st 3rd of the night than would normally be expected. Results indicate that fragmented sleep is not an obligatory feature of depression. (16 ref)—A. Olson.

5514. Kurashov, A. S. [Affective states in the early stages of progressive paroxysmal schizophrenia with onset in adolescence.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1224-1229.—Studied 56 adult patients, 26 male and 30 female, diagnosed as paroxysmal schizophrenia, with depression and mania. Onset had been in adolescence. The disorders were atypical, with a tendency to protracted development and disguise by so-called pubertal crises. Clinical and psychopathological characteristics of the main types of depression and mania, precipitating factors, and their relationship to age and the course of the disease are described. (English summary)—J. Larsen.

5515. Lambo, T. Adeoye. (WHO, Geneva, Switzerland) **The vulnerable African child.** In E. J. Anthony & C. Koupennik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses child-rearing practices in major African cultures as a means of identifying the vulnerable child and the total influences that affect the development of the mother-child relationship in those cultures.

5516. Leaff, Louis A. (Medical Coll Pennsylvania, Philadelphia) **Psychodynamic aspects of personality disturbances.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses childhood patterns and characteristics of persons with character or personality disorders (e.g., passive-aggressive, sociopathic, or explosive personalities). Psychodynamic factors in symptoms of depression, impulsiveness, narcissism, ego weakness, and defensive behaviors are identified, and implications for treatment (particularly psychoanalysis) are examined. (18 ref)

5517. Lebovici, Serge & Diatkine, René (U Paris, France) **Normality as a concept of limited usefulness in the assessment of psychiatric risk.** In E. J. Anthony & C. Koupennik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Evaluates the use of "normality" as a primary basis for evaluating the psychiatric risks that threaten children. Doubts are raised about the correctness of gauging these risks according to standards used for assessing pathology where the part played by so-

called cerebral factors are often overstressed, and it is suggested that psychiatric risk is not definable in terms of simple maturational problems that generate pathology.

5518. Lehmann, Laurent S. (US Air Force Medical Ctr, Wilford Hall, San Antonio, TX) **Depersonalization.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1221-1224.—Describes 3 cases that demonstrate the phenomenon of depersonalization as a psychological defense in both neurotic and psychotic clinical situations. Organic, general psychiatric, and psychoanalytic theories of the etiology of depersonalization are discussed, along with suggestions for treatment and future research. Depersonalization is viewed as an indicator of intrapersonal processes in a variety of clinical situations rather than being pathognomic for a particular diagnosis. (21 ref)—*Journal abstract.*

5519. Lewis, Helen B. **Shame and guilt in neurosis.** New York, NY: International Universities Press, 1974. 525 p. \$4.95.—Analyzes the relationships between shame, guilt, and neurosis in 3 areas—the phenomenology of shame and guilt, the relationship between perceptual style and proneness to shame and/or guilt, and implications for therapeutic techniques. Case studies are included to illustrate the possibility of sex differences in the experience of shame and guilt and how the therapy for these feelings can be modified according to the patient's style. (11½ p ref)

5520. Lifton, Robert J. (Yale U, Medical School) **"Death imprints" on youth in Vietnam.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 47-49.—Comments upon the psychological predicament of the Vietnam war veteran.

5521. Lion, John R. (Ed.). (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Personality disorders: Diagnosis and management.** Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.

5522. Lion, John R. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Diagnosis and treatment of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Describes various symptom admixtures which complicate the clinician's differential diagnosis of personality disturbances and recommendations for specific treatment strategies. Specific problems which affect treatment (e.g., hostility, paranoia, the inability to achieve intimacy, and the effects of some psychoactive medications) are also examined. (23 ref)

5523. Lorr, Maurice & Youniss, Richard P. (Catholic U of America) **The interpersonal styles of outpatient neurotics and prison inmates.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5524. Lorr, Maurice. (Catholic U of America) **Assessing psychotic behavior by the IMPS.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5525. Lowenstein, L. F. **A comparative study obtained from some objective and projective personality**

**methods.** *British Journal of Projective Psychology & Personality Study*, 1974(Jun), Vol 19(1), 21-27.—Compared objective and projective methods of personality assessment. 10 psychiatric patients were tested before and after treatment with 2 projective techniques—Thematic Apperception Test (TAT) and Sentence Completion Test (SCT)—and 3 objective scales—Maudsley Personality Inventory (MPI), Edwards Personal Preference Schedule (EPPS), and Lumdi Test (LT). Parental and self-description data were obtained. Results of these projective and objective methods agreed closely, especially the TAT, LT, EPPS, and MPI. Parental and self-assessment data and SCT results were less dependable than scores on the other tests. The parental and self-assessment data of obsessional patients agreed with objective and projective test results more closely than that of other patients. A case study an 18-yr-old male psychiatric patient, who was administered the same assessment techniques before and after treatment, illustrates further correspondences between objective and projective tests.—J. Adams-Webber.

5526. Marcus, Joseph. (Jerusalem Mental Health Ctr, Israel) **Neurological findings in children of schizophrenic parents.** In E. J. Anthony & C. Koupemnik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p. —Compared the incidence and characteristics of genetically determined vulnerability in a total of 100 urban and kibbutz school-age children. Urban Ss showed a greater degree of motor overflow than kibbutz dwellers and were also significantly more pathological on an overall score of nonoptimal functioning.

5527. Markush, Robert E. & Favero, Rachel V. (NIMH, Div of Extramural Research Programs, Ctr for Epidemiologic Studies, Rockville, MD) **Epidemiologic assessment of stressful life events, depressed mood, and psychophysiological symptoms: A preliminary report.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5528. Marsella, Anthony J. & Murray, Michael D. (U Hawaii) **Diagnostic type, gender and consistency vs. specificity in behavior.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 484-488.—Investigated consistency in conforming behaviors across a perceptual judgment and an attitude-change conformity task among male and female Ss classified as normal, manic-depressive, and paranoid schizophrenic ( $n = 22$  in each group). It was speculated that diagnostic and gender variables would reveal differences in consistency of conformity behavior. Results indicate that normals and manic-depressives evidenced significantly greater consistency in conformity behaviors across the 2 tasks than paranoid schizophrenics but did not differ from each other. No gender differences were found. Findings are discussed in terms of the use of moderator variables in consistency research. The need for emphasis on organismic-environment interactional research is noted.—*Journal summary*.

5529. Mastrovito, Rene C. (Cornell U, Medical School) **Psychogenic pain.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 514-519.—Discusses the etiology and treatment of psychogenic pain. Pain is made up of both psychological and organic factors with individual

variations. A distinction is made between hysterical neuroses with an onset of body dysfunctions or psychogenic loss and hysterical personality disorder with historical predisposition toward psychophysiological overreactions. The communicative meaning of an organic stressful situation through the individual's perception and interpretation provide a psychological overlay for understanding pain. Guidelines for medical and nursing management of psychological overlays to pain are reviewed.—R. G. Gibson.

5530. McKinney, William T. (U Wisconsin, Medical School, Madison) **Animal models in psychiatry.** *Perspectives in Biology & Medicine*, 1974(Sum), Vol 17(4), 529-541.—Reviews the history of the use of animal models of psychopathologic states and discusses their intrinsic validity. Models of psychosis and depression, socially-induced and biologically-induced models, and rehabilitation models for primates and other organisms are considered. (66 ref)

5531. McNeil, T. F. & Kaji, L. (Malmö General Hosp, Sweden) **Reproduction among female mental patients: Obstetric complications and physical size of offspring.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(1), 3-15.—Found no significant differences when rates of obstetric complications, deviations in prenatal development, and predischARGE neonatal disturbances were compared for 171 reproductions to female psychiatric patients and 171 reproductions to demographically matched controls. Significantly fewer of the offspring of endogenous psychotics were markedly preterm compared to controls. (30 ref)

5532. Meltzer, Herbert Y.; Sachar, Edward J. & Frantz, Andrew G. (U Chicago, Pritzker School of Medicine) **Serum prolactin levels in unmedicated schizophrenic patients.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 564-569.—Studied whether prolactin levels in newly admitted, unmedicated schizophrenic patients might be diminished to reflect increased dopaminergic activity in the tuberoinfundibular tract or the increases associated with psychological stress. Mean serum prolactin concentration was within the normal range in 22 patients but elevated in 2 manic patients and 1 patient with a severe anxiety state. (40 ref)

5533. Miller, Lovick C.; Barrett, Curtis L. & Hampe, Edward. (U Louisville, Medical School) **Phobias of childhood in a prescientific era.** In A. Davids, *Child personality and psychopathology: Current topics: I*. New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.

5534. Monroe, Russell R. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **The problem of impulsivity in personality disturbances.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the concept of episodic dyscontrol as a subgroup of episodic behavioral disorders (i.e., any precipitously appearing maladaptive behavior, usually intermittent and recurrent, which interrupts the individual's life-style). The phenomenological and psychodynamic aspects of episodic dyscontrol are discussed, along with the relationship between brain dysfunction and dyscontrol behavior, the differential diagnosis of neuropathophysiological and motivational



factors in dyscontrol, and various treatment strategies. Case examples of dyscontrol are presented.

5535. **Morić-Petrović, Slavka; Jojić-Milenković, Milica & Marinkov, Milica.** (Mental Health Inst, Belgrade, Yugoslavia) [Mental hygiene problems of children evacuated after catastrophic earthquake in Skopje.] (Srrc) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 53-64.—Reports on child behavior patterns following a 1963 earthquake in Skopje, Yugoslavia. 632 children 6-16 yrs old, in 3 groups, were temporarily housed in 3 towns for several months after the catastrophe. Data on behavior patterns were collected by direct observation and by survey among teachers and counselors. The observed behavior (e.g., fear of starvation and subsequent increase in food intake, use of pacifier by 12-16 yr old girls, destructiveness, enuresis, and decline in school performance) reflected a high degree of anxiety and emotional insecurity. It was estimated that almost 70% of these children showed some form of disturbed behavior. It is suggested that many of these problems could have been alleviated had there been more organized care concerning daily activities, communication with parents, and staff counseling.—*P. Vrtunski.*

5536. **Murphy, Dennis L.; Beigel, Allan; Weingartner, Herbert & Bunney, William E.** (NIMH, Lab of Clinical Sciences, Bethesda, MD) The quantitation of manic behavior. In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5537. **Myers, Jerome K.; Lindenthal, Jacob J. & Pepper, Max P.** (Yale U) Social class, life events, and psychiatric symptoms: A longitudinal study. In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5538. **Nastović, Ivan.** (Neuropsychiatric Clinic, Belgrade, Yugoslavia) [Cain's complex and its influence on neuroses formation.] (Srrc) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 93-99.

5539. **Natalevich, E. S.** [Some clinical and genetic correlations in schizophrenia.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1203-1209.—Studied the distribution of manifest schizophrenic psychoses in the families of 270 long-term schizophrenic patients. Of 3,572 relatives, 319 suffered from schizophrenia. 3 groups of families could be distinguished: (a) those characterized by secondary psychoses in the parents and siblings, in each generation in a direct line; (b) those with psychoses only in the sibs and in the side lines; and (c) those with no schizophrenia in the relatives. Clinical analysis of the development of schizophrenia in these 3 groups allows the disorder to be interpreted as dominant, recessive, or without proved heredity. On the basis of these interpretations, some differences between these groups could be established. (English summary) (46 ref)—*J. Larsen.*

5540. **Neu, Jerome.** (U California, Santa Cruz) Fantasy and memory: The aetiological role of thoughts according to Freud. *International Journal of Psychoanalysis*, 1973, Vol 54(4), 383-398.—Traces the development of Freudian ideas about the etiology of neurosis, particularly hysteria, and about the therapeutic goals of psychoanalysis. Within that context, it is argued that

"thoughts," broadly defined, play an important role in the genesis of hysteria. Theoretical excerpts and clinical examples are used in the discussion of basic concepts such as cause and effect, reality, idea and affect, memory and fantasy, wish-fulfillment, impulse, insight and abreaction, and "cure." (33 ref)—*C. T. Sullivan.*

5541. **Nussbaum, Kurt.** (US Social Security Administration, Bureau of Disability Insurance, Washington, DC) **Psychiatric disability determination under Social Security in the United States.** *Psychiatric Quarterly*, 1974, Vol 48(1), 65-73.—The Social Security Act provides disability benefits to those insured who are prevented from working by a severe medically determinable impairment. Under the Act, psychiatric impairment is assessed on the basis of demonstrable clinical manifestations including mental status examination and, where needed, by standardized psychological tests yielding quantifiable results. The total function of the person in daily living, both in the social and work spheres, is taken into consideration in the assessment process. The use of the Psychiatric Review Form is discussed, and research which aims at obtaining further progress in the classification of psychiatric concepts and arriving at greater objectivity in psychiatric decision-making is described.—*Journal abstract.*

5542. **Oberdalloff, H. E.** (U Göttingen, Psychiatrische Klinik, W Germany) [Matricide in a schizophrenic psychosis: Case report.] (Germ) *Confinia Psychiatrica*, 1974, Vol 17(2), 122-131.—Recounts the case of a 50-yr-old retired teacher who killed his 77-yr-old mother on the eve of his birthday. Family background included a schizophrenic cousin, the suicides of 2 great-uncles, and depression experienced by his mother and one of her cousins. The mother had raised him and an older brother strictly and religiously, sexuality and its discussion was taboo, and the patient had returned, after his father's death, to live with his mother. It is concluded that his upbringing prevented any attachment to other women and that he may have had to become psychotic in order to form any relationship with a woman other than his mother. This inference was suggested by the patient's statement, 6 mo after the murder that he was considering marriage.—*I. N. Mensh.*

5543. **Ohi, Masami.** (Nagoya U, Japan) [Neurotic behavior disorders in childhood.] (Japn) *Japanese Journal of Child Psychiatry*, 1972(Sep), Vol 13(5), 295-316.—Used therapeutic interviews with mothers to analyze the dynamic mother-child relationship of 10 children with problem behaviors—aggression, violence, restlessness, and rebelliousness. The child-rearing attitude of the mothers was generally one-sided, selfish, and rigid. These children, after a period of temporary neurotic regression, became selfish, stubborn, unyielding, and extremely sensitive to interpersonal relationships resulting in an increased rigidity of the mother's attitude. Since the change from "good child" to "bad child" in these cases was an expression of self-assertion, these problem behaviors should be interpreted as a developmental step in the child's personality. Play therapy with their children led the mothers to set a higher value on their role as mothers, to understand how their attitudes affected the children, and to create better relationships. (English summary) (27 ref)—*S. Ohwaki.*

5544. Ornitz, Edward M.; Brown, Morton B.; Mason, Anne & Putnam, Nicholas H. (U California, Ctr for the Health Sciences, Los Angeles) **Effect of visual input on vestibular nystagmus in autistic children.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 369-375.—Reports that a stimulus to oculomotor fixation in the absence of light and a retinal stimulation in the absence of ocular fixation caused greater suppression of postrotatory nystagmus in 21 36-69 mo old autistic children than in 25 38-90 mo old normal children. The former confirmed earlier reports of suppressed vestibular nystagmus in autistic children under conditions permitting optic fixation. The latter suggests a more profound interaction of visual and vestibular systems underlying the suppression of postrotatory nystagmus in autistic children than can be explained by their enhanced ability to use ocular fixation to suppress vestibular nystagmus. Data are consistent with a vestibular dysfunction theory underlying their disordered sensorimotor integration. This is further supported by a less constant time course of the vestibular response of autistic children in darkness. (37 ref)—*Journal abstract*.
5545. Palmore, Erdman B. (Duke U, Medical School) **Social factors in mental illness of the aged.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.
5546. Pao, Ping-Nie. (Chestnut Lodge, Rockville, MD) **Notes on Freud's theory of schizophrenia.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 469-476.—Reviews 3 chronological phases in Freud's theorizing about schizophrenia, the latest (1923-1939) being that of the "structural" reformulation, and offers a conjectural version of what Freud might have said after that, in the light of more recent elaborations of ego psychology. (36 ref)
5547. Pasternack, Stefan A. (Georgetown U, Medical School) **The explosive, antisocial, and passive-aggressive personalities.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Presents detailed descriptions of the general clinical features and developmental dynamics of explosive, antisocial, and passive-aggressive personalities based on the American Psychiatric Association's 1968 Diagnostic and Statistical Manual of Mental Disorders (DSM-II) and discusses some differences between these 3 types of disorders. Case examples of each type and recommendations for treatment are presented. (48 ref)
5548. Paykel, E. S. (St George's Hosp, London, England) **Life stress and psychiatric disorder: Applications of the clinical approach.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.
5549. Pearson, Paul R. & Sheffield, Brian F. (Victoria Hosp, Blackpool, England) **Purpose-in-Life and the Eysenck Personality Inventory.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 562-564.—In a study of 144 outpatient neurotics, the correlations between the Purpose-in-Life Test and the Eysenck Personality Inventory (Form A) indicated that patients with a higher purpose in life are less neurotic and more sociable.
5550. Penna, Manoel. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Classification of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses models of and the rationale for the classification of personality disorders, methods of diagnosis, and the morphology, temperament, and typological approaches to classification. Research methodologies for categorizing these disorders and the clinical approach and the standard diagnostic system are described, and problems in the applicability of the medical model and type theory to personality classification are noted. (44 ref)
5551. Pfeiffer, Eric & Busse, Ewald W. (Duke U, Medical School) **Mental disorders in later life: Affective disorders; Paranoid, neurotic, and situational reactions.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.
5552. Plante, Elizabeth. (Huxley Inst for Biosocial Research, Westchester Branch, NY) **René: The biography of a schizophrenic.** New York, NY: Vantage Press, 1974. 37 p. \$4.50.
5553. Rapoport, Jonas R. (U Maryland, Medical School, Baltimore) **Personality disorders in the court.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Based on the author's experience, the role of the psychiatrist in dealing with personality disorder in relation to the criminal justice system is examined and differences between this role and that of the psychiatrist in private practice or in a state hospital are discussed. Procedures in the determination of the ability to stand trial, criminal responsibility, and dangerousness are considered, and the implications of the American Law Institute's Model Penal Code Test are examined. (21 ref)
5554. Ricks, David F.; Thomas, Alexander & Roff, Merrill (Eds.). (City Coll, Psychological Ctr, City U New York) **Life history research in psychopathology: III.** Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.
5555. Rimland, Bernard. (Inst for Child Behavior Research, San Diego, CA) **Infantile autism: Status and research.** In A. Davids, *Child personality and psychopathology: Current topics: I*. New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.
5556. Rodnick, Eliot H. & Goldstein, Michael J. (U California, Los Angeles) **A research strategy for studying risk for schizophrenia during adolescence and early adulthood.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Describes a schizophrenic risk-identification research strategy that (a) identified conditions that may contribute to the onset and course of development of schizophrenic behavior, (b) studied a cohort of high-risk adolescents, (c) conducted a prospective study of the high-risk cohort, and (d) completed retrospective studies of adult schizophrenics to cross-validate the predictive significance of those precursors identified in the prospective study. (18 ref)



5557. Roff, Merrill. (U Minnesota, Inst of Child Development) **Childhood antecedents of adult neurosis, severe bad conduct, and psychological health.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III.* Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5558. Rosenthal, David. (NIMH, Lab of Psychology, Bethesda, MD) **Issues in high-risk studies of schizophrenia.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III.* Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5559. Rutter, Michael. (Inst of Psychiatry, London, England) **Epidemiological strategies and psychiatric concepts in research on the vulnerable child.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III.* New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses 5 epidemiological research strategies for determining causes of vulnerability: background variables, particularly parental mental illness; factors in the child, such as organic brain pathology; studies of the general population; comparative studies of 2 populations; and cross-generational studies. (34 ref)

5560. Schaefer, Charles. (Children's Village, Dobbs Ferry, NY) **Sociometric status and altruistic friendship in emotionally disturbed boys.** *Journal of Social Psychology*, 1974(Oct), Vol 94(1), 143-144.—Examined the relationship between altruistic friendship and sociometric status for 65 preadolescent boys, using the Shipwreck Test (see PA, Vol 51:11315). An analysis of the sociometric data reveals that there were 10 "stars" and 12 "isolates." 9 of the 12 isolates chose to save the friend figure on the test by assigning him a lifeboat, while only 2 of the stars chose to save the friend figure.

5561. Schatzman, Morton. **Paranoia or persecution: The case of Schreber.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1973(Sum), Vol 1(1), 62-88.—Criticizes Freud's analysis of Schreber as neglectful of the father's practices of child rearing. Based on the father's writings, similarities between some of the son's strange experiences and the father's methods are discussed and a theory is proposed which views paranoia as a transformation of persecution. (78 ref)

5562. Schmidt, Chester W.; Meyer, Jon K. & Lucas, Jane. (Johns Hopkins U, Medical School) **Sexual deviations and personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management.* Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Based on the view that all sexual deviates have some sort of character pathology, definitions of several forms of sexual deviations are presented, the etiology of sexually deviant behavior is discussed in terms of psychodynamic and physiological factors, and evidence of the relative effectiveness of various treatment modalities for sexual deviation (e.g., psychotherapy, behavior modification, or hormonal therapy) is examined. (24 ref)

5563. Schopler, Eric. (U North Carolina, Medical School, Chapel Hill) **Changes of direction with psychotic children.** In A. Davids, *Child personality and psychopathology: Current topics: I.* New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.—Discusses recent changes in thinking about research and theory in childhood psychosis or autism, emphasizing the shift from theoretic

cal to empirical thinking in the areas of classification, theories of causation, role of parents, treatment interventions, and social and ecological considerations. The need for openness to new clinical data and research findings is stressed. (2 p ref)

5564. Schubert, Josef & Bergman, Anita J. (U Saskatchewan, Regina Campus, Canada) **Developmental changes in Rorschachs of emotionally disturbed children.** *British Journal of Projective Psychology & Personality Study*, 1974(Jun), Vol 19(1), 1-8.—Compared the Rorschach protocols of 248 emotionally disturbed children with those of 650 normal children, using 14 scoring categories. Disturbed children exhibited normal age trends in most scores; however, their median scores in most categories were significantly different from those of normal children. Disturbed children exhibited significantly more extreme scores than normals. Differences between normal and disturbed children were greater than differences among disturbed children of varying ages. Normal and disturbed children differed significantly in all 14 scoring categories. (21 ref)—*Journal summary.*

5565. Schuckit, Marc A. et al. (U California, Medical School, San Diego) **Drug use and psychiatric problems on the campus: I. Methods and drug use at outset.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III.* Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5566. Schwartz, Carol C.; Myers, Jerome K. & Astrachan, Boris M. (Columbia U, Coll of Physicians & Surgeons) **Psychiatric labeling and the rehabilitation of the mental patient: Implications of research findings for mental health policy.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 329-334.—A study of social distance reactions to mentally ill persons among 124 relatives of former mental patients found that psychiatric treatment per se was less important in determining rejection of the mentally ill than the ex-patient's level of impairment. Although 51% of family members expressed some negative attitudes toward the mentally ill, the policy of masking the psychiatric identity of treatment services is probably most appropriate when services are addressed to groups most vulnerable to the nefarious effects of psychiatric labeling, chiefly lower-class whites. Data also suggest the need for reevaluation of short-term hospital treatment of the disturbed in which the family is relied on to support the patient in the community. (35 ref)—*Journal abstract.*

5567. Schwartz, M. A.; Aikens, A. M. & Wyatt, R. J. (NIMH, Lab of Clinical Psychopharmacology, St Elizabeths Hosp, Washington, DC) **Monoamine oxidase activity in brains from schizophrenic and mentally normal individuals.** *Psychopharmacologia*, 1974, Vol 38(4), 319-328.—Previous findings indicate that chronic schizophrenics have reduced platelet monoamine oxidase (MAO) activity when compared as a group to individuals without mental disorder. In this study, an attempt was made to establish whether this difference reflects a similar difference in brain MAO activity. Postmortem brain specimens from 9 schizophrenic patients and 9 normal controls were obtained and assayed for MAO activity using a liquid scintillation technique with ("C) tryptamine as substrate. There was no significant

reduction in MAO activity in tissues from the schizophrenic group. (22 ref)—*Journal abstract*.

5568. Schwartz, Michael A.; Wyatt, Richard J.; Yang, Hsiu-Ying T. & Neff, Norton H. (NIMH, Lab of Clinical Psychopharmacology, St Elizabeths Hosp, Washington, DC) **Multiple forms of brain monoamine oxidase in schizophrenic and normal individuals.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 557-560.—Identified 2 forms of monoamine oxidase in 15 regions of the brain. Enzyme activity was rather uniformly distributed in the brain. There were no significant differences of enzyme activity when compared in 3 regions of the brain from mentally normal and chronic schizophrenic Ss. (17 ref)

5569. Scorza, Giorgio & Carta, Italo. (U Milano, Istituto di Clinica Psichiatria, Italy) **[The psychopathology of married couples: Psychogenic aspects revealed by the ill partner.]** (Ital) *Rivista di Psichiatria*, 1973(Nov-Dec), Vol 8(6), 599-632.—Studied 5 married couples in which the wife had neurotic symptoms. The following pathogenic dynamics were observed within the conjugal relationship: (a) narcissism motivating one or both partners in the choice of a kind of "second-self partner"; (b) unconscious choice of "substitutive partners" who were expected to satisfy frustrated infantile drives; (c) negation of pathological features by one of the partners and the projection of these traits on to the other partner, thus developing the model of a "negative partner;" (d) something resembling the model of "marital schism" with its features of contention and the dominated woman; and (e) reciprocal or one-sided idealization, masking aggressive forces due to infantile frustrations. (43 ref)—*Journal abstract*.

5570. Seligman, Roslyn; Gleser, Goldine; Rauh, Joseph & Harris, Leonard. (U Cincinnati, Coll of Medicine) **The effect of earlier parental loss in adolescence.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 475-479.—In a retrospective study of 85 adolescents, referred for psychiatric evaluation from the adolescent medical services of a general hospital, 36.4% had suffered an earlier parental loss. In unscreened samples of 179 Ss from schools in the area, 11.6% had suffered a similar loss; in unscreened clinic samples of 186 Ss, 16.6% had a similar loss. There were no significant differences related to sex or race. The difference between referral and contrast groups is significant ( $p < .001$ ). In all groups "father loss" occurred with about twice the frequency of "mother loss." A review of the literature revealed little about earlier parental loss in an adolescent population who came with illnesses to a medical service. The importance of a developmental dimension in studies of early parental loss is noted. (20 ref)—*Journal abstract*.

5571. Shakow, David. (NIMH, Bethesda, MD) **Some thoughts about schizophrenia research in the context of high risk studies.** *Psychiatry*, 1973(Nov), Vol 36(4), 353-365.—Reviews the history of high-risk studies of schizophrenia. It is suggested that high-risk studies are beginning to include studies of schizophrenogenic environments as well as genetic studies. (34 ref)

5572. Sharma, V. P. (BM Inst of Mental Health, Ahmedabad, India) **Identification: Its relationship with the perceiver.** *British Journal of Projective Psychology &*

*Personality Study*, 1974(Jun), Vol 19(1), 9-15.—Studied the relationship between personality and perceptual identification of human figures. U. Kragh's defense mechanism technique was applied to 13 men and 14 women in individual psychotherapy, using pictures containing a central figure (CF) and a peripheral figure (PF) of the same sex. Data concerning psychopathology, and personal and family histories were obtained from each patient's therapist. Results support 6 hypotheses: (a) Incorrect opposite sex identification of CF indicates abnormal, prolonged dependence on and attachment to the opposite-sex parent. (b) Incorrect opposite sex identification of PF indicates disturbed relations with the same-sex parent. (c) Marked variation in age and sex identification indicates lack of object constancy in familial experience. (d) Identifying CF as too young indicates avoidance of adult role. (f) Identifying CF as too old indicates preoccupation with and dependence on parents. (g) Identifying PF as too young indicates excessive preoccupation with sexual fantasy.—*Journal summary*.

5573. Sheffield, Brian F. & Pearson, Paul R. (Victoria Hosp, Blackpool, England) **Purpose-in-life in a sample of British psychiatric out-patients.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 459.—Administered the Purpose-in-Life (PIL) Test to 363 male and female psychiatric outpatients, representing anxiety state, neurotic depressive, other neurotic, endogenous depressive, and personality disorders. Except for the category "other neuroses," the data indicate a general tendency for males to have higher PIL scores than females. The group with lowest PIL scores was that of females with personality disorder.—B. McLean.

5574. Shenderova, V. L. [Personality traits of parents of adolescent schizophrenics.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1195-1203.—Interviewed 60 parents of adolescent schizophrenics. The prevalent personality in families of Ss with malignant schizophrenia was a type of psychopathy consisting of a whole but inadequate personality with certain forms of deficiency. In families of Ss with benign schizophrenia, the parents may be considered schizoid psychopaths. The differences and similarities of the psychopathies are discussed, as well as the necessity of clinical classification through genetic analysis. (English summary) (42 ref)—J. Larsen.

5575. Shield, Paul H.; Harrow, Martin & Tucker, Gary. (U Pittsburg, Medical School) **Investigation of factors related to stimulus overinclusion.** *Psychiatric Quarterly*, 1974, Vol 48(1), 109-116.—Studied the experiential state of stimulus overinclusion (SOI) in 109 consecutively hospitalized, acutely ill psychiatric patients. The SOI phenomenon has been cited in theoretical formulations of the schizophrenic defect. However, schizophrenics did not experience significantly more SOI than other patients. Specific relationships to diagnosis, emotional states, and altered states of consciousness (particularly psychomimetics) were studied, and etiological implications are discussed.—*Journal abstract*.

5576. Shmaonova, L. M. [Epidemiological studies of some intermediate and atypical variants of paroxysmal schizophrenia.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1209-1217.—Studied the most



frequent types of intermediate and atypical cases of schizophrenia in a schizophrenic population in a Moscow district. 4 such types were distinguished: (a) malignant variants, including Ss with progressive paroxysmal schizophrenia, whose syndromes and rate of development were nearer to continuous malignant schizophrenia (this type constituted only 1% of the cases studied); (b) the paranoid variant (5.6% of the population), characterized by a transition in subsequent stages from a paroxysmal course to continuous development of the paranoid schizophrenic type; (c) the sluggish variant (6.7%), in which development and rate of progression were similar to continuous sluggish schizophrenia; and (d) the paroxysmal variant (9.3%), occupying an intermediate position between progressive paroxysmal and periodic schizophrenia. (English summary) (17 ref)—J. Larsen.

5577. Shneidman, Edwin S. (U California, Lab for the Study of Life-Threatening Behavior, Los Angeles) **Suicide notes reconsidered.** *Psychiatry*, 1973(Nov), Vol 36(4), 379-394.—Finds suicide notes to be dull and "poignantly pedestrian." It is suggested that a person who could write a meaningful suicide note would not be in the position of committing suicide. Different types of notes are outlined and examples given.

5578. Shows, W. Derek; Gentry, W. Doyle & Wyrick, Linda C. (Duke U, Medical Ctr) **Social constriction in psychiatric patients: A normative study.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1287-1288.—Administered the Bates-Zimmerman Social Constriction Scale and the MMPI to 132 psychiatric inpatients. Neurotic patients evidenced a higher level of social constriction than did patients with psychophysiological disorders; no significant differences were found among the other diagnostic groups. Social constriction was positively related to scores on the MMPI Hypochondriasis, Depression, Psychasthenia, Schizophrenia, Social Introversion, Anxiety, Repression, and F scales; constriction was negatively related to scores on the L, K, Mania, and Ego Strength scales. It is suggested that social constriction is specifically related to behavioral traits, irrespective of diagnostic labels, and that the Bates-Zimmerman Scale should be given wider use in diagnostic consultation.—*Journal abstract*.

5579. Simonds, John F. (U Missouri) **Relationship disorders at a mental health clinic.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 450-458.—Classified 114 10-13 yr old mental health center clients according to the prominence of emotional or learning symptoms. 3 clinical groups were identifiable: prominent learning symptom, prominent emotional symptom, and equally prominent learning and emotional symptom. Age, sex, WISC scores, Wide Range Achievement Test (WRAT) scores, diagnostic testing, and historical data were used to determine the appropriate categorization. It is suggested that the WISC and WRAT tests enable the educator and clinician to screen for learning disorders and help in the analysis of the effects of emotional symptoms on the learning process. An evaluation of the degree of emotional and learning disability and recognition of the interrelations between the 2 disorders is essential for effective remediation and treatment.—*Journal summary*.

5580. Sternberg, E. & Moltschanova, J. K. (Academy of Medical Sciences, Psychiatric Inst, Moscow, USSR) **[Interepisodic schizophrenias with unusually long remissions.]** (Germ) *Nervenarzt*, 1972(May), Vol 43(5), 253-257.

5581. Strange, Robert E. (US Dept of the Navy, Bureau of Medicine & Surgery, Washington, DC) **Personality disorders in the military service.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Proposes reasons for the high incidence of personality disorders in the military service and describes several types of commonly occurring syndromes (e.g., emotionally unstable, passive-aggressive, and passive-dependent personalities). The type of personality disorders found in older personnel, the incidence of suicidal gestures and drug abuse, personality disorders in combat, and the role of the military psychiatrist are also examined.

5582. Sugerman, A. Arthur; Goldstein, Leonide; Marjerrison, Gordon & Stoltzfuss, Nell. (New Jersey Bureau of Research in Neurology & Psychiatry, Princeton) **Recent research in EEG amplitude analysis.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 162-166.—A review of recent research confirms the authors' previous hypothesis that the invariability of EEGs in schizophrenics indicates a cortical overarousal or "information input overload." Other studies indicate that field dependent schizophrenics worsen under perceptual deprivation, while field independent schizophrenics improve. Results of research with normals and schizophrenics on left-right hemisphere EEG activity in sleep and awake states are also reported. (19 ref)—A. Olson.

5583. Takagi, Ryuro. (Kyoto U, Medical School, Japan) **[Language developmental disorder as the primary disturbance of childhood autism.]** (Jpn) *Japanese Journal of Child Psychiatry*, 1972(Sep), Vol 13(5), 285-294.—Reviews recent theories of infantile autism, and endorses the hypothesis by M. Rutter, J. K. Wing, and L. Wing that language-cognitive impairment is a primary symptom and stereotype behaviors are secondary ones. To examine the hemispheric malfunctioning, the dexterity of autistic children was compared with that of retarded children. The incidence of left-handedness was about the same below age 5 but above age 6 was greater in autistic children, suggesting the possibility of minimum brain damage in the left hemisphere of older autistic children. Clinical observation of early behavior problems supported the above hypothesis. Mutism and autistic behaviors after age 3 need special attention and early treatment. (English summary) (36 ref)—S. Ohwaki.

5584. Teoh, Jinn-Inn. (U Malaya, Kuala Lumpur, Malaysia) **Psychological problems among university students in an area of rapid socio-cultural change.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 109-120.—Conducted a 12-mo study of all students at the University of Malaya referred with psychological problems and symptoms. Data from 308 students treated show that (a) the proportion of students from different ethnic groups agreed with that of the total student population; (b) diagnoses did not differ among students from urban as opposed to rural origins; (c) 56%

suffered from symptoms prior to university admission, and a majority of clients were seen during the 1st term of 1st- and 2nd-yr courses; (d) Chinese students had more personality and family problems and more severe acculturation-gap differences from their parents than did Malay students; and (e) 51% of the clients suffered from neuroses and 13% from schizophrenic psychosis. (33 ref) —*Journal abstract.*

5585. Timsit, M.; Dugardin, J. C.; Adam, A. & Sabatier, J. (U Liege, Belgium) [What does a diagnosis of hypochondriacal neurosis mean?] (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 458-483.—Examined 37 cases diagnosed as hypochondriacal neurosis and compared them with other cases taken from a larger statistical study. It is concluded that hypochondriacal neurosis is a distinct diagnostic category marked by emotional immaturity, repressed aggressivity, and somatic complaints concentrated on the muscular and gastrointestinal systems. (Dutch, English, German, Italian, & Spanish summaries) (23 ref)

5586. Tupin, Joe P. (U California, Medical School, Davis) **Hysterical and cyclothymic personalities.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Describes characteristics, life history patterns, psychodynamics, and diagnostic criteria for hysterical and cyclothymic personalities. General information on the incidence, presenting complaints, prognosis, and complications for each disorder is also included, and various organic and psychogenic etiological models are reviewed. (33 ref)

5587. Tyrer, Peter J. & Lader, Malcolm H. (Southampton General Hosp, England) **Tremor in acute and chronic anxiety.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 506-509.—Measured finger tremor between 2 and 32 Hz in frequency in 2 groups of anxious Ss. In one study 32 normal Ss were made acutely anxious by experimental stressors, and their tremor was measured and compared with rest conditions. In a 2nd study, tremor was measured in 28 chronically anxious psychiatric patients and in 28 control Ss matched for age and sex. No differences were found in the peak frequency of tremor in any of the groups, but the amount of tremor was greater in the anxious Ss. The differences were greatest at tremor in the frequency range between 6 and 17 Hz. Results support the view that the differences between normal and anxious tremors are those of degree, not of nature. (17 ref)—*Journal abstract.*

5588. Uspenskaya, L. Ya. [Some characteristics of an atypical course of progressive paroxysmal schizophrenia: An epidemiological study.] (Russ) *Zhurnal Nevropatologii i Psikiatrii*, 1972, Vol 72(8), 1218-1224.—Studied the course of development of types of schizophrenia in a patient population in a Moscow district. The data indicate that the replacement of paroxysmal schizophrenia by the type which shows a continuous course may occur more often in males than in females. Analysis of paroxysmal and continuous schizophrenics revealed the prognostic validity of such factors as sex, age, manner of onset of the disease, form of the psychotic attacks, and duration of the first remission. At the continuous stage the tendency to development of the paroxysmal form appears rudimenta-

ry, which gives hope for positive results from adequate and systematic therapy. (English summary)—*J. Larsen.*

5589. von Zerssen, D.; Strian, F. & Schwarz, D. (Max-Planck-Inst für Psychiatrie, München, W Germany) **Evaluation of depressive states, especially in longitudinal studies.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5590. Watt, Norman F. (U Massachusetts, Amherst) **Childhood and adolescent routes to schizophrenia.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5591. Weintraub, Walter. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Obsessive-compulsive and paranoid personalities.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the rationale for considering obsessive-compulsive and paranoid personalities together, and reviews psychoanalytic theories of their etiology, characteristic defense mechanisms, response to medication, differential diagnosis, and treatments.

5592. Weiss, William U. & Edinger, Jack D. (Lafayette Coll) **Perceptual and verbal correlates of the Rorschach Prognostic Rating Scale.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 574-576.—15 male process schizophrenic inpatients and 15 male college students were employed in a correlational study that involved the Rorschach Prognostic Rating Scale (RPRS) and measures of visual-spatial organizational ability and verbal ability adapted from the WAIS. Verbal ability was more significantly related to RPRS performance than was visual-spatial ability, even though the Rorschach is a perceptual organizational task. Results are interpreted in light of the ability of the RPRS to predict therapy prognosis.—*Journal summary.*

5593. Wittenborn, J. R. (Rutgers State U, Interdisciplinary Research Ctr, New Brunswick) **The WPRS: A quantification of observable psychopathology.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5594. Wurmser, Leon. (U Maryland, Medical School, Baltimore) **Personality disorders and drug dependency.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Describes a phenomenological approach to the study of personality factors in drug abuse, emphasizing the problem of compulsion, symptom equivalence, and their effects on life-style. The question of whether certain personality traits are indicative of a predisposition to drug addiction (e.g., object dependency or affect defense), the long-range effects of drugs on personality, and implications for treatment are also examined. (67 ref)

5595. Young, Rhodes C. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Profile generalizability in the use of the MMPI with psychiatric inpatients.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 552-557.—28 participating clinical psychologists matched a series of single MMPI profiles to target sets of



3 profiles produced by the same 55 inpatients tested recurrently on specified, clinically indicated occasions. The matching task was performed in terms of a priori defined statistical indices of profile similarity. Results show the statistical indices to be fully as sensitive as were the clinicians to S individuality. Using a geometric definition of profile similarity, estimates of profile generalizability were obtained by a components-of-variance analysis of the 40 profiles of the 10 male Ss and, separately, of the 180 profiles of the 45 female Ss. The stability of individual differences varied as a function of the definition of the universe of testing occasions, whether inclusive of all testing within the hospital setting or limited to a particular episode or phase of the S's disturbance.—*Journal summary.*

5596. Zung, William W. (Duke U, Medical Ctr) **The measurement of affects: Depression and anxiety.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

### Behavior Disorders

5597. Adams, Kathryn A. (U Alabama) **The child who murders: A review of theory and research.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 51-61.—Reviews the literature on child murderers: their characteristics, modeling, victim precipitation, reactions to stress as causes of homicide by children, legal considerations, and prediction and prevention procedures. The variety of backgrounds from which child murderers come is emphasized, and the importance of early socialization experiences in forming behavior patterns is discussed. An early exposure to violence in childhood may lead the child to either consciously or unconsciously view violence as a means of interpersonal control. The possibility that a child is substituting for his or her parent or society in the role of murderer is examined and related to the effects of tension and frustration accumulations. Suggestions for the development of theoretical frameworks to further study this infrequent but significant problem are presented. (23 ref)—*L. Gorsey.*

5598. Alexander, Jerry. **Protecting the children of life-threatening parents.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 53-54.—Presents some of the statistics of child abuse and comments on how professionals can help to overcome this rapidly increasing problem.

5599. Andrew, June M. (San Diego County Mental Health Services, Probation Div, CA) **Violent crime indices among community-retained delinquents.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 123-130.—Evaluated the extent and degree of violent crime in a group of 172 delinquent adolescents referred for psychological evaluation in an attempt to develop program which gives the county probation department funds for sending fewer offenders to state penal institutions. It was hypothesized that male delinquents would have higher scores on a specially-developed Violence Scale than females, and that non-Anglo delinquents would score higher than Anglos. Results support the hypothesis for males and females but not for Anglos and non-Anglos. Differences were found between a group of Ss measured

in an 8-mo period in 1973 and a 2nd group measured in 1971-1973, indicating an increase in violent crimes by Caucasian females. The use of the Violence Scale for other studies of delinquency and implications of the findings for community treatment and evaluation programs and diagnostic procedures are discussed.—*L. Gorsey.*

5600. Argeriou, Milton. (Services for Traffic Safety Project, Boston, MA) **The Jellinek estimation formula revisited.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 1053-1057.—Discusses the rationale of the Jellinek formula for estimating the prevalence of alcoholism. With the formula, it was estimated that there were 354,422 male and 64,663 female alcoholics alive in Massachusetts in 1970; using a variation of the method, a previous study reported estimates of 179,300 and 31,700. The limitations of the Jellinek formula are noted.

5601. Ash, Phillip. (U Illinois, Chicago Circle) **Convicted felons' attitudes toward theft.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 21-29.—Administered the Reid Report Inventory (RRI), which yields measures of punitiveness (i.e., attitudes toward punishment of theft), projected attitudes toward theft, and total scores, to 187 prisoners in a state penitentiary. Data were compared with scores of 1,030 male employment applicants. Results show that convicted felons scored significantly lower than "not recommended" employment applicants on both the punitiveness and projective measures, although this discrepancy was greater for the projective than for the punitiveness measure. Convicts were significantly less punishment-oriented than employment applicants and were much more prone to have attitudes favorable to the commission of crimes. Implications for the validity of the RRI and its resistance to "faking good" are discussed.—*L. Gorsey.*

5602. Beck, Aaron T.; Resnik, Harvey L. & Lettleri, Dan J. (Eds.). (U Pennsylvania) **The prediction of suicide.** Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5603. Beck, Aaron T.; Schuyler, Dean & Herman, Ira. (U Pennsylvania) **Development of suicidal intent scales.** In A. T. Beck, H. L. Resnik & D. J. Lettleri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5604. Buikhuisen, W. & Hoekstra, H. A. (U Groningen, Inst of Criminology, Netherlands) **Factors related to recidivism.** *British Journal of Criminology*, 1974(Jan), Vol 14(1), 63-69.—Compared univariate and multivariate statistical approaches to predicting recidivism in imprisoned male offenders. Ss were 451 male offenders sentenced to imprisonment between 1962 and 1964. On the basis of a 5-yr follow-up, the sample was divided into 310 recidivists and 141 nonrecidivists. Data on 22 dependent variables for each S were tabulated. Univariate analysis revealed that 10 variables discriminated between the 2 groups. The multiple correlation coefficient for these variables was .41, accounting for only 17% of the variance. Factor analysis of the 22 variables resulted in 3 factors accounting for 30% of the variance. Ss were divided into 12 groups; movers (ex-convicts who leave the neighborhood they used to live in) and nonmovers who were high or low on each of the 3

factors. The recidivism rates for each group were calculated. It is concluded that moving has a positive effect on the way ex-convicts develop, and that the magnitude of this effect depends on environmental and individual factors.—D. R. Evans.

5605. Butts, Stanley V. & Chotlos, John. (U Kansas, Medical Ctr, Kansas City) **Closed-mindedness in alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 906-910.—Administered the Rokeach Dogmatism Scale to 74 22-59 yr old male alcoholics, 34 nonalcoholic 23-46 yr old men in a vocational training class, and 29 21-58 yr old male schizophrenics. Alcoholics had significantly higher dogmatism scores than nonalcoholics ( $p < .001$ ). Although schizophrenics were significantly more dogmatic than the nonalcoholics, there was no significant difference between the alcoholics and the schizophrenics. Implications for treatment are discussed.—*Journal abstract*.

5606. Corrigan, Ellen M. (Rutgers State U, Graduate School of Social Work, New Brunswick) **Women and problem drinking: Notes on beliefs and facts.** *Addictive Diseases: An International Journal*, 1974, Vol 1(2), 215-222.—Presents a review of the literature on the magnitude of female alcoholism, life situations and the onset of problem drinking, sexual adjustment, troubles due to drinking, and treatment outcome. The lack of descriptive data on female alcoholics compared to that available for male alcoholics is stressed, and some distinct sex differences in alcoholic behaviors are noted. (37 ref)

5607. Delteil, P.; Stoesser, F. & Stoesser, R. [Ether addiction.] (Fren) *Annales Médico Psychologiques*, 1974(Mar), Vol 1(3), 329-340.—Reviews the history of ether intoxication, certain chapters of which are well known because ether was important in the development of anesthetics. Although rare, ether-dependency states continue to occur; 3 new case histories are described. Although withholding the drug does not produce marked withdrawal symptoms, psychological dependency on its use is so powerful (e.g., the user will sometimes ignore important nonintoxicating effects, such as convulsions) that it might well be classed with the physiologically addicting drugs. (40 ref)—H. E. King.

5608. Diggory, James C. (Chatham Coll) **Predicting suicide: Will-o-the-wisp or reasonable challenge?** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5609. Ercegovic, Dragoslav; Marković, Milan & Jević-Todorović, Jasmina. (Mental Health Inst, Belgrade, Yugoslavia) [Electroencephalographic aspects of psychopathic syndrome.] (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 65-77.

5610. Farberow, Norman L. (VA Central Research Unit Suicide Prevention Ctr, U Southern California, Medical School) **Use of the Rorschach in predicting and understanding suicide.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 411-419.—Presents an overview of studies which have attempted to use the Rorschach in identifying, evaluating, and predicting the suicidal person. It is noted that results of these efforts have been almost uniformly negative due to temporal, definitive, psychodynamic, motivational, and intentional problems

in conceptualizing suicide. Studies are reviewed which concentrated on configurational, single-sign, and multiple-sign approaches to uncover significant aspects of suicidal behavior. Recommendations are discussed for making the Rorschach a more useful measure in the identification and prediction of the suicidal person. (42 ref)—B. McLean.

5611. Favazza, Armando R. & Pires, Jeannine. (U Missouri, Medical School) **The Michigan Alcoholism Screening Test: Application in a general military hospital.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 925-929.—Scores on the Michigan Alcoholism Screening Test given to 183 active-duty Navy enlisted men indicated alcoholism in 97% of diagnosed alcoholics, in 31% of men hospitalized on medical wards and 33% on surgical wards, and in 22% of hospital corpsmen. Results are comparable to those of a 1973 Department of Defense study which classified 39% of enlisted men as problem drinkers.

5612. Feuerlein, Wilhelm. (Max Planck Inst für Psychiatrie, Munich, W Germany) [The alcohol withdrawal syndrome.] (Germ) *Nervenarzt*, 1972(May), Vol 43(5), 247-253.

5613. Force, Elizabeth E. & Millar, Jack W. (National Academy of Sciences—National Research Council, Div of Medical Sciences, Washington, DC) **An epidemiological and ecological study of risk factors for narcotics overdose: I. Retrospective study of psychosocial factors.** *International Journal of the Addictions*, 1974, Vol 9(3), 481-487.—Interviewed 50 14-36 yr old narcotics addicts (94% black) to test the hypotheses that there is a relationship between specific social variables (e.g., addict attitudes and behaviors) and narcotics overdose and between previous overdose experience and precautionary behavior in drug use. Results indicate that fear of withdrawal and narcotics craving are strong motivating factors for narcotics use in spite of the addicts' clear understanding of the dangers of overdose and death. Previous overdose experience did not modify drug use. Attitudinal and behavioral risk factors associated with overdose were a failure to exercise precautionary behavior, alcohol consumption together with narcotics use, and a greed for drugs. The need to teach addicts proper self-help methods for treating overdose prior to hospitalization is noted.—L. Gorsey.

5614. Freund, Kurt et al. (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **The phobic theory of male homosexuality.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 495-499.—Tested a particular version of the phobic theory of male homosexuality—that homosexuality is based on an aversion to heterosexual intercourse. In 20 19-48 yr old androphilic men and 16 19-28 yr old heterosexual men, penile volume changes to verbal and written descriptions of the Ss' involvement in the various phases of heterosexual interaction were measured. Prior to each exposition of a verbal representation of such a phase, Ss were prearoused by pictures of male nudes. Descriptions of involvement in the situation of locating a prospective female partner and of involvement in heterosexual pretactile interaction were responded to with penile detumescence that did not differ significantly from that to descriptions of involvement in sexually neutral situations. There was a further increase in penile



volume of the prearoused Ss on descriptions of their involvement in heterosexual tactile interaction and intercourse. Results contradict the hypothesis, whereas the Ss' verbal ratings of the various stimulus configurations on a disgust scale were in agreement with the phobic theory.—*Journal abstract.*

5615. Halikas, James A. & Rimmer, John D. (Washington U, Medical School) **Predictors of multiple drug abuse.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 414-418.—In a previous interview study, 100 regular marihuana users and their use of other drugs were analyzed. 48 Ss had used 1 or 2 other drugs, and 52 had used more than 2 other drugs (mean 7.5). Early antecedent and concomitant behavioral events significantly associated with polydrug use were then used to describe a possible syndrome. Childhood discipline contacts, truancy and dropout, age of first illicit drug use, first illicit drug not being marihuana, poor high school socialization, inordinate parental conflicts, poor adolescent adjustment, antisocial behavior, police contacts, homosexual experiences, and self-defeating behavior in adolescence predicted later polydrug use from among this population. The methodologic pitfalls of distinguishing antecedents from concomitants are discussed. (15 ref)—*Journal abstract.*

5616. Johnson, James H. (U Minnesota) **A cross-validation of seventeen experimental MMPI scales related to antisocial behavior.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 564-565.—2 groups of applicants for psychiatric outpatient care were compared on 17 MMPI experimental scales designed to measure control, hostility, or social maladjustment. One of the groups consisted of 23 individuals known to have been arrested posttest for a felony. The other group consisted of 24 individuals who were not known to have been arrested. None of the 17 special scales distinguished between the 2 groups.—*Journal summary.*

5617. Kelly, Delos H. (State University Coll New York, Geneseo) **Track position and delinquent involvement: A preliminary analysis.** *Sociology & Social Research*, 1974(Jul), Vol 58(4), 380-386.—Hypothesized that track position, independent of social class, will be inversely related to self-report delinquent involvement. Questionnaire data from 173 male and female seniors attending 2 high schools in western New York State support the tracking hypothesis. Track position, relative to both sex and social class, was the strongest predictor of self-report delinquent involvement.—*Journal abstract.*

5618. Keuhnie, John C.; Anderson, William H. & Chandler, Emily. (McLean Hosp, Alcohol & Drug Abuse Research Ctr, Belmont, MA) **First drinking experience in addictive and nonaddictive drinkers.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 521-523.—Reports that 20 28-56 yr old addictive drinkers showed a substantially greater ability to report details of their 1st drinking experience than did 20 22-62 yr old matched controls interviewed under blind conditions. The hypothesis is advanced that this difference in recall may be the consequence of a difference in limbic response to challenge with alcohol and may thus provide an anatomic focus for investigation. The difference in recall may also permit the identification of a group at risk to alcoholism. (20 ref)—*Journal abstract.*

5619. Kipperman, Allan & Fine, Eric W. (U Wisconsin, Medical School, Madison) **The combined abuse of alcohol and amphetamines.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1277-1280.—Interviewed 15 men (age range 19-45 yrs) who had used both alcohol and amphetamines. Clinical histories indicated the existence of 2 abuse patterns—one primarily concerned with the effects of alcohol (Type A) and the other with the effects of amphetamines (Type B). Results of a battery of psychological tests (e.g., Lanyon Psychological Screening Inventory, Taylor Manifest Anxiety scale, and the Beck Depression Inventory) show that both types of patients were moderately depressed and had significantly higher than normal anxiety levels; differences between the 2 types were also observed, including a greater anxiety level in Type B Ss. It is suggested that the management of this combination syndrome will be different from that for separate alcohol and drug abuse syndromes. (19 ref)—*Journal abstract.*

5620. Korolenko, Ts. P. & Dikovskiy, A. A. (Novosibirsk Medical Inst, USSR) [The clinical classification of alcoholism.] (Srcr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 5-10.—Reviews and modifies E. M. Jellinek's classification of various forms of alcoholism. In order to maintain behavior and social consequence criteria of the classification, Jellinek's beta form—which originally covered organic disturbances—was eliminated. 4 new forms of behaviorally defined alcoholism are introduced. To account for toxic and organic aspects of alcoholism, 3 stages in ascending order of severity are suggested: cerebrastronic, encephalopathic, and partial dementia. Although any combination of the form and the stage is theoretically possible, clinical experience provides a set of likely patterns in alcoholic syndrome development.—*P. Vrtunski.*

5621. Köhler, Wolfgang. (Heiligenhafen State Hosp, W Germany) [Criteria for intellectual performance loss of chronic alcoholics on the HAWIE intelligence test.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 103-114.—Tested 171 chronic alcoholics with the German form of the WAIS. Insufficiency was particularly marked for the performance tests: digit-symbol substitution, picture arrangement, and object assembly. 61 Ss did not show any deterioration in spite of 15 yrs of alcohol abuse. Ss over 50 were damaged most severely; their loss was probably complicated by disturbances of the involution period. (English & French summaries)—*W. J. Koppitz.*

5622. Lester, David. (Richard Stockton State Coll) **Demographic versus clinical prediction of suicidal behaviors: A look at some issues.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5623. Lettieri, Dan J. (National Inst for Drug Abuse, Rockville, MD) **Suicidal death prediction scales.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5624. Levenson, Marvin & Neuringer, Charles. (Luzerne-Wyoming County Mental Health Ctr, KS) **Suicide and field dependency.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 181-186.—Used records regarding the Picture Completion, Block Design, and Object

Assembly subtests of the WAIS to assess field dependence in 84 male veterans who had committed suicide and in 84 nonsuicidal male psychiatric patients. The suicide group was significantly more field dependent ( $p < .05$ ) than the nonsuicide group. It is suggested that field dependent persons have a cognitive style which presents them with a highly undifferentiated and global world view which may predispose them to suicide. (24 ref) —*Journal abstract.*

5625. Levin, Mark M. & Sarri, Rosemary C. (U Michigan) **Juvenile delinquency: A study of juvenile codes in the U.S.** Ann Arbor, MI: University of Michigan, National Assessment of Juvenile Corrections, 1974. xi, 75 p.

5626. Litman, Robert E.; Wold, Carl I.; Farberow, Norman L. & Brown, Timothy R. (Suicide Prevention Ctr, Los Angeles, CA) **Prediction models of suicidal behaviors.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5627. Lönnqvist, J. & Achte, Kalle A. (Helsinki U, Central Hosp, Lapinlahdentie, Finland) **Witchcraft, religion and suicides in the light of *The Witch Hammer* and contemporary cases.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 115-125.—Compares case histories of witchcraft described in *The Witch Hammer* (1487) and contemporary clinical cases. The church's attitude toward suicide is examined, with particular attention given to the defense mechanism of projection. Similarities in attitudes toward accused witches and psychiatric patients are noted.

5628. Ludwig, A. M. & Stark, L. H. (U Kentucky, Medical Ctr) **Alcohol craving: Subjective and situational aspects.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 899-905.—Administered a specially-developed Drinking and Craving Questionnaire to 60 male alcoholic (mean age, 42.7) inpatients. 78% reported having experienced craving; 20% indicated that their need for alcohol was "fairly" or "very much" influenced by external cues, and 80% claimed "loss of control" after they have been drinking steadily. Craving was defined by 43% in terms of the desired effect of alcohol and by 58% in terms of a need to drink. Ss were more likely to experience craving when they were anxious, bored, worried, under stress, or in response to failure or unemployment. Craving was also perceived to vary in intensity. It is suggested that craving is a conditioned "cognitive label" which alerts alcoholics to emotional dysphoria providing them with an acceptable excuse to resume or continue drinking.—*Journal abstract.*

5629. McArdle, Judy. (Alcohol Counseling Ctr, Pensacola, FL) **Impression management by alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 911-916.—The notion that alcoholics can control the impression that others form of them was tested in 2 groups of 20-65 yr old male alcoholic inpatients: 79 patients who wanted to be transferred to the alcoholism treatment unit (Group I) and 81 patients who did not (Group II). 2 true-false tests derived from the MMPI, one measuring self-insight and the other an index of mental illness, were given to all the patients and they were told that patients high in self-insight and low

in mental illness would have a greater chance of doing well in the treatment unit. Group I Ss tried to appear more insightful by giving more true responses on the self-insight test than those in Group II; the latter did not indicate any attempt of impression management. (15 ref) —*Journal abstract.*

5630. Meade, Anthony C. (Marquette U) **The labeling approach to delinquency: State of the theory as a function of method.** *Social Forces*, 1974(Sep), Vol 53(1), 83-91.—Tested hypotheses regarding selective bias on the part of official decision-makers, and the independent effect of social control upon delinquency recidivism. Contrary to the findings of earlier studies, data from 438 (162 recidivists) juvenile offender records did not demonstrate selective bias in offender dispositions. While a significant, direct relationship was observed between official labeling (formal hearing) and recidivism the result is an example of the type of finding which too often leads to a theoretically unwarranted inferential leap beyond the interpretational limits of the study data. Suggestions for, and examples of, promising lines of methodological inquiry into central but neglected dimensions of labeling theory are presented. (38 ref)—*Journal abstract.*

5631. Mikić, Božidar. (Medical Ctr of Dubrovnik, Neuropsychiatric Div, Yugoslavia) **[Suicidal behavior and suicide attempts by old people living in a home for the aged.]** (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 11-17.—Studied causes, frequencies, and patterns of suicidal behavior occurring over 5 yrs in a home for the aged. Of over 400 residents of both sexes 60 yrs old or more, 41 demonstrated some form of suicidal behavior, mainly in the form of verbal communication with other residents of the home and with family. The frequency of suicidal behavior and suicide attempts increased from 3 in 1966 to 13 in 1970. Of 10 actual attempts 8 were with drugs and 2 resulted in death. Principal cause of suicidal behavior is considered to be long-term depressive disturbances. (English summary) —*P. Vrtunski.*

5632. Motto, Jerome A. (U California, Medical School, San Francisco) **Refinement of variables in assessing suicide risk.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5633. Murphy, George E. (Washington U, Medical School) **The clinical identification of suicidal risk.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5634. Nicholls, Peter; Edwards, Griffith & Kyle, Elspeth. (Inst of Psychiatry, Addiction Research Unit, London, England) **Alcoholics admitted to four hospitals in England: II. General and cause-specific mortality.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 841-855.—Analyzed causes of death of 233 male and 76 female alcoholics (out of an original group of 678 men and 257 women) 10-15 yrs after their admission to 4 hospitals. The actual deaths among men were more than twice the expected rate, and more than 3 times that among women, with accidents, poisoning, violence, and suicide being the primary causes. (25 ref)



5635. Pacht, Asher R. & Cowden, James E. (Wisconsin Dept of Health & Social Services, Div of Corrections) **An exploratory study of five hundred sex offenders.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 13-20.—Studied the case records of 501 sex offenders. In addition, a subgroup of 109 sex offenders were evaluated to determine the relationship of various personality characteristics to the types of offenses committed. Ss were grouped according to whether the law classified them under the criminal code (CC; i.e., when the court determined that no specialized treatment was needed) or as "sexually deviated" (SD; i.e., when the court found the offense to be a product of sexual psychopathology and recommended psychiatric treatment). Compared with CCs, SDs in general showed histories of long-term personality disturbances and significant difficulties in many areas of interpersonal functioning; they appeared to be more interested in evoking a positive response from their victims rather than gaining sexual gratification. CCs tended to be more aggressive toward their victims than SDs and were less interested in their victims' responses toward them. Suggestions for treatment of sex offenders are presented.—*L. Gorsey.*

5636. Paulson, Morris J. & Stone, Dorothy. (U California, Ctr for the Health Sciences, Div of Medical Psychology, Los Angeles) **Suicidal behavior of latency-age children.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 50-53.—Presents an experiential encounter with 12 suicidal, preadolescent boys and girls. Neither psychosis, organic impairment, nor mental retardation were factors contributing to the suicidal condition. 50% of the parents had modeled behavior patterns and thoughts with which at least 1 of their children were identified. Chronic marital unhappiness characterized the remaining families. From the child's viewpoint the suicidal preoccupations were a cry for help and a wish to escape from intolerable personal and familial stress. Perceived rejection by parents, siblings, and/or peers was often involved. Death wishes and fears are a reality of a child's life and the professional must not ignore them despite the discomfort of discussing them with a youngster.—*A. Krichew.*

5637. Peele, Stanton & Brodsky, Archie. (Harvard U, Business School) **Interpersonal heroin: Love can be an addiction.** *Psychology Today*, 1974(Aug), Vol 8(3), 22, 24-26.—Points out parallels between drug addiction and certain nonideal forms of love. Drugs give a person a way to structure life, and the effects do not seem inherent in the drug, but develop as a result of learning. If an individual's life is not centered entirely on drugs, then withdrawal is fairly easy. Similarly, people who need another person to structure their lives and who cut themselves off from others may develop relationships which are not growth-inducing and are nearly impossible to end.—*E. J. Posavac.*

5638. Pokorny, Alex D. (Baylor Coll of Medicine, Houston, TX) **A scheme for classifying suicidal behaviors.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5639. Robins, Lee N. (Washington U, Medical School) **Antisocial behavior disturbances of childhood: Prevalence, prognosis, and prospects.** In E. J. Anthony

& C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Reviews literature which indicates the high prevalence and early onset of antisocial behavior disorders in children. These disorders are usually associated with maleness and severe school retardation; they persist into adulthood, come to treatment only under duress, run in families, and do not yield to conventional psychotherapeutic treatment techniques. (31 ref)

5640. Rolf, Jon E. & Garnezy, Norman. (U Vermont) **The school performance of children vulnerable to behavior pathology.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5641. Rüdiger, Dietlinde & Täschner, Helmi. (German Inst of International Pedagogical Research, Frankfurt/Main, W Germany) **[Investigations on the problem structure of juvenile drug addicts.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(1), 146-161.—Matched 3 groups of 14-20 yr old high school and vocational school students ( $N = 293$ ) with respect to age, sex, and educational level and administered a questionnaire concerning personal problems to all Ss. Members of Group 1 were drug addicts under treatment, Group 2 were occasional drug users, and Group 3 had never used drugs. The responses to the questionnaire revealed significant differences between Group 1 and the other 2 groups as to the number and intensity of family problems, emotional stability, and interest in ethical, religious, and political problems. (English & French summaries)—*W. J. Koppitz.*

5642. Schuckit, Marc A. & Gunderson, E. K. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Alcoholism among Navy and Marine Corps officers.** *Military Medicine*, 1974(Oct), Vol 139(10), 809-811.—Examined the characteristics of a 6% yr sample of Navy and Marine Corps officers hospitalized for alcoholism—197 Navy and 46 Marine Corps officer cases (average ages 41 and 39 yrs, respectively). There were no significant differences between Navy and Marine officers in demographic, military status, and clinical characteristics. However, Navy officers were more often returned to full duty after hospitalization than Marine officers, and were more likely to have subsequent psychiatric hospitalizations. Incidence rates by rank also exhibited differences. Suggestions for improved screening procedures and staff training are presented, and the present data are compared with similar information regarding enlisted personnel. (15 ref)—*L. Gorsey.*

5643. Shiloh, Allon & Selavan, Ida C. (Eds.). (U South Florida, Graduate School of Public Health) **Ethnic groups of America: Their morbidity, mortality and behavior disorders: II. The Blacks.** Springfield, IL: Charles C Thomas, 1974. xvi, 296 p.

5644. Srivastava, S. P. (U Lucknow, India) **Sex life in an Indian male prison.** *Indian Journal of Social Work*, 1974(Apr), Vol 35(1), 21-33.—Discusses patterns of sexual adjustment of 400 males in an all-male institution of 1,700 population. Major areas of sexual expression included nocturnal sex dreams, masturbation, and

homosexuality. Attitudes of the prisoners are described, with the problems for prison administrators, and recommendations are made.

5645. Stein, Kenneth B. & Rozyko, Vitali. (U California, Berkeley) **Psychological and social variables and personality patterns of drug abusers.** *International Journal of the Addictions*, 1974, Vol 9(3), 431-446. —Conducted interviews with and administered a battery of psychological tests (e.g., the MMPI, the Socialization scale of the California Psychological Inventory, and the Future and Past Time Perspective Tests) to 201 voluntary male admissions to the detoxification ward of a state hospital (mean age = 25.52 yrs). 6 primary personality dimensions (tension, motoric, ideational, sensory expressive, socialization, and vocabulary intelligence) were used as the basis for a computerized (OTYPE program) analysis. Data revealed 10 types which were associated with a large number of social, demographic, and psychological variables. These 10 types are described in terms of drug history and personality test results. (15 ref) —*Journal summary.*

5646. Steinglass, Peter & Wolin, Steven. (George Washington U, Medical School) **Explorations of a systems approach to alcoholism.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 527-532. —Describes an experimental model in which up to 6 chronic alcoholic Ss were permitted to drink in a setting that included a token economy designed to replicate the major features of an alcoholic drinking gang. Clinical observations of interactional behavior in 3 groups followed a pattern that was characterized as primitive and scarce, a depressed atmosphere, and a bored and underutilized staff, although all groups were trouble free and smoothly functioning with few examples of regressive behavior.

5647. Stenmark, David E.; Wackwitz, John H.; Pelfrey, Michael C. & Dougherty, Frank. (U South Carolina) **Substance use among juvenile offenders: Relationships to parental substance use and demographic characteristics.** *Addictive Diseases*, 1974, Vol 1(1), 43-54. —During a 12-wk period, family court counselors evaluated consecutive discharges of juvenile drug offenders (157 whites and 111 blacks) in a 14-county area of South Carolina. Demographic data and findings are presented on drug-use patterns of the offenders and their parents, and the relationships between drug use and other selected variables. Results indicate that (a) there were major race differences on almost all variables; (b) on all indicators of substance use (except mother's alcohol use), whites were heavier users than blacks; (c) there was a consistent, positive interrelationship among substance use (alcohol, marijuana, and other drugs) and between father's and mother's use of alcohol; (d) father's alcohol use was positively related to all juvenile drug-use variables; (e) mother's alcohol use was positively related to all juvenile drug-use variables only for white Ss; and (f) the relationship between demographic variables and drug use depended on both race and type of drug. —*Journal abstract.*

5648. Thomas, Alexander; Chess, Stella; Sillen, Janet & Mendex, Olga. (New York U, Medical Ctr) **Cross-cultural study of behavior in children with special vulnerabilities to stress.** In D. F. Ricks, A. Thomas &

M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5649. Ulett, George A.; Itil, Ellen & Perry, Stephen G. (Deaconess Hosp, Neuropsychiatric Service, St Louis, MO) **Cytotoxic food testing in alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 930-942. —25 male alcoholics recently hospitalized for detoxication had more positive reactions to 65 foodstuffs than did abstinent members of Alcoholics Anonymous or a group of nonalcoholics. Whether the greater sensitivity is due to a genetic mechanism or to recent excessive drinking is discussed. (31 ref)

5650. Viamontes, Jorge A. & Powell, Barbara J. (Malcolm Bliss Mental Health Ctr, St Louis, MO) **Demographic characteristics of black and white male alcoholics.** *International Journal of the Addictions*, 1974, Vol 9(3), 489-494. —Studied demographic differences and variations in the reported incidence of alcohol-related symptomatology in 100 black and 100 white male hospitalized alcoholics. Results support previous findings that blacks began drinking at an earlier age, were younger at admission, and reported more hallucinatory behavior and convulsions than whites.

5651. Wallace, Don & Hiner, Darlene. (VA Hosp, Houston, TX) **Some descriptive measures on 100 consecutive VA hospital drug abuse admissions.** *International Journal of the Addictions*, 1974, Vol 9(3), 465-473. —Reports demographic, personality, and drug history characteristics of 100 consecutive admissions to a Veterans Administration hospital drug abuse program. Data for 3 subgroups are presented, and differences in economic and criminality measures and clinical pictures are discussed.

5652. Weisman, Avery & Worden, J. W. (Harvard U, Medical School, Boston) **Risk-rescue rating in suicide assessment.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.

5653. Zanocco, Giorgio. (U Modena, Clinica delle Malattie Nervose e Mentali, Italy) **[Reflections on a theme: A revision of the concept of psychopathic personality.]** (Ital) *Rivista di Psichiatria*, 1973(Nov-Dec), Vol 8(6), 633-649. —Attempts to clarify the diagnostic parameters surrounding the concepts of "psychopathic personality." Clinical observations indicate that the psychopath lacks the ability to identify with others, i.e., to love. Consequently, he lacks the capacity for discouragement and recovery, or a genuine feeling of group membership. The psychology and psychopathology of identification and aggression explain such symptoms as unauthentic attitudes (false self), tendencies to mimic and dramatize, the dynamics of sadomasochistic relationships, and the expression of instincts and archaic codes which are the basis for retaliation, parricide, incest, cannibalism, etc. —*N. De Palma.*

5654. Zubin, Joseph. (New York State Dept of Mental Hygiene, New York) **Observations on nosological issues in the classification of suicidal behavior.** In A. T. Beck, H. L. Resnik & D. J. Lettieri (Eds), *The prediction of suicide*. Bowie, MD: Charles Press Publishers, 1974. xii, 249 p.



## Learning Disorders &amp; Mental Retardation

5655. Appell, Louise S. & McKeen, Ronald L. (Catholic U of America, Program in Special Education) **Parents and professionals rate SMR and PMR adults on developmental tasks: A comparison study.** *Mental Retardation*, 1974(Oct), Vol 12(5), 14-16.—Compared the ratings by parents and professionals of severely and profoundly retarded adults on developmental tasks as described by R. Valett (1970). Results indicate that 73 out of 110 correlations between professional and parent or guardian ratings were significant. In areas where judgment of behavioral manifestations which were emotionally tinged was required, the instrument was weakest; for areas where the tasks were clearly-stated descriptions of observable performance (e.g., language and thinking skills) and for which the raters were asked to judge the quality of the performance, there was evidence that professional and parents or guardians agreed strongly. Instances of incorrect scoring procedures are noted.—*M. E. Pounsel.*
5656. Ashcraft, Mark H. & Kellas, George. (U Kansas) **Organization in normal and retarded children: Temporal aspects of storage and retrieval.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 502-508.—Studied the flow of information from input through output in a free-recall task by means of S-paced presentation times, externalized rehearsal, and interword response times. In this context, storage and retrieval of categorized material were examined for 40 10-yr-old normal and 40 16-yr-old mentally retarded children of the same mental age. As indicated by the patterns of input and output times, instructions to rehearse according to category membership led to the formation of higher order memory units that were functional during recall. Input and output times under uninstructed conditions revealed little spontaneous use of conceptual categories in either IQ group, although provision of retrieval cues resulted in a marked increase in recall performance for these Ss. Results are discussed in terms of the chunking and recoding of input and the influence of active, organized storage processing on retrieval. (16 ref)—*Journal abstract.*
5657. Baroff, George S. (U North Carolina, Chapel Hill) **Mental retardation: Nature, cause, and management.** Washington, DC: Hemisphere, 1974. xvi, 504 p. \$17.95.—This textbook includes an overview and summary of research on psychological and biological aspects of mental retardation, and examines services designed to prevent, identify, and assist retarded persons from infancy to adulthood. In-depth analyses of major educational, vocational, and residential services in 5 areas are also included. (48 p ref)
5658. Burns, Edward & Lehman, Lyle C. (State U New York, Binghamton) **An evaluation of summated rating and pair comparison measures of hyperkinesis.** *Journal of Learning Disabilities*, 1974(Oct), Vol 7(8), 504-507.—Used summated ratings and pair comparisons to assess the hyperkinesis of 20 learning-disabled children (mean age = 9.5 yrs). Results show that the ratings method was internally consistent and reliable for measuring hyperkinesis and that pair comparisons were valuable for specifying the importance of each subcategory on an individual basis.
5659. Cameron, Paul. (St Mary's Coll Maryland) **Social stereotypes: 3 faces of happiness.** *Psychology Today*, 1974(Aug), Vol 8(3), 62-64.—Answers to a self-report questionnaire indicate that the old and physically infirm did not think of themselves as less happy than the young and physically able. O ratings also showed that retarded children enjoyed life as much as normal children did. However, in all ages and physical conditions, the more well-to-do felt themselves happier than others.—*E. J. Posavac.*
5660. Carrier, Joseph K. (Parsons State Hosp Research Ctr, KS) **Nonspeech noun usage training with severely and profoundly retarded children.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 510-517.—Used a nonspeech symbol system, consisting of small pieces of masonite cut into various shapes, to investigate the learning of noun usage by 62 nonverbal, severely or profoundly retarded 7-16 yr olds. Results indicate that most such Ss could learn appropriate skills and did so in a short period of time when this nonspeech response mode was employed.—*Journal abstract.*
5661. Clifton-Everest, I. M. (MRC, Unit for Research on Medical Applications of Psychology, U Cambridge, England) **Immediate recognition of letter sequences by slow-learning children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 13-30.—Describes 2 experiments which investigated the importance of immediate memory in explaining the defects of children with specific learning disabilities. Ss were a total of 19 such children and a group of 19 normal controls who were compared on their performance on an immediate memory task involving the recognition of letter trigrams. The variables considered were (a) rate of forgetting, (b) amount of proactive interference build-up, (c) distraction from the recognition list, (d) susceptibility to acoustic confusion, and (e) interference from the interpolated task. Results offer only equivocal evidence of a defect of immediate memory in children with specific learning disabilities and are compatible with the notion that these children are slower at developing "task sets." The findings are discussed in the context of general theories of immediate memory and theories of mental retardation.—*Journal abstract.*
5662. Cromer, Richard F. (MRC Developmental Psychology Unit, London, England) **Receptive language in the mentally retarded: Processes and diagnostic distinctions.** In R. L. Schiefelbusch & L. L. Lloyd (Eds.), *Language perspectives: Acquisition, retardation, and intervention.* Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.—Reviews evidence showing that some subnormals are merely delayed in their language acquisition. 2 points are stressed: that one cannot talk about linguistic competence in the mentally retarded and that greater emphasis should be placed on the processes by which language is acquired rather than on describing the linguistic level of any group. It is hypothesized that language delay may lead to different language acquisition processes after a critical period. (5 p ref)
5663. de la Cruz, Felix F. & LaVeck, Gerald D. (Eds.). (NIH, National Inst of Child Health & Human Development, Bethesda, MD) **Human sexuality and the mentally retarded.** Baltimore, MD: Penguin, 1974. xii, 352 p. \$2.95.—Presents the paperback edition of the proceed-

ings of a 1971 conference on human sexuality and the mentally retarded. 22 papers are included on the topics of psychosocial development and sex education, physical and biological aspects of sexual behavior in the retarded, institutional, and community attitudes and policies, and current and future research directions.

5664. Dettmerman, Douglas K. (Case Western Reserve U) **MR is MR is MR: Mental retardation and the philosophy of science.** *Mental Retardation*, 1974(Oct), Vol 12(5), 26-28.—Discusses 3 dimensions of defining mental retardation: (a) the type of variable—independent, dependent, or intervening—specified by the term; (b) the level of discourse—molar or molecular—implied by the definition of the term; and (c) the degree of precision suggested by the definition.

5665. Finch, A. J.; Childress, W. B. & Ollendick, T. H. (Virginia Treatment Ctr for Children, Richmond) **Efficacy of WAIS short forms.** *Mental Retardation*, 1974(Oct), Vol 12(5), 48-49.—Studied 50 WAIS protocols with Full Scale IQ equal to or less than 69 to determine the efficacy of WAIS short forms to meet the criteria proposed by R. Resnick and A. Entin (see PA, Vol 45:9973) with retarded adults. Results indicate that none of the short-form procedures employed satisfactorily fulfilled all 3 criteria for the prediction of IQ level. (16 ref)

5666. Garcia, Robert et al. (U Texas, Austin) **Perception of depth in the profoundly retarded.** *Bulletin of the Psychonomic Society*, 1974(Sep), Vol 4(3), 185-187.—18 29-54 yr old profoundly mentally retarded male Ss, having a mean social age of 1.65 and a mean social quotient of 6.63, were tested for depth perception on the "visual cliff." 39% of those tested clearly perceived this illusion of depth. The theoretical and practical implications of this experiment, and further experiments to be carried out in the future, are discussed.—*Journal abstract*.

5667. Guarnaccia, Vincent J. & Weiss, Robin L. (Hofsta U) **Factor structure of fears in the mentally retarded.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 540-544.—Obtained parents' ratings on the 81-item Louisville Fear Survey for Children (LFSC) from a mailed survey for 102 6-21 yr olds who had a mean IQ of 43. Data were subjected to a principal-components factor analysis and rotated by varimax method. 4 relatively independent and psychologically meaningful factors emerged: Separation, Natural Events, Injury, and Animals. These factors correspond substantially to those obtained in studies that used the LFSC with nonretarded populations. (15 ref)—*Journal summary*.

5668. Hagen, John W.; Streeter, Lynn A. & Raker, Richard. (U Michigan) **Labeling, rehearsal, and short-term memory in retarded children.** *Journal of Experimental Child Psychology*, 1974(Oct), Vol 18(2), 259-268.—Used a short-term memory task to explore the effects of verbal labeling and rehearsal on serial-position recall in 86 mildly retarded 9-11 yr old children. A stimulus array consisting of 7 cards depicting familiar animals was presented for 7 trials. In Exp I, recall when Ss labeled the pictures as they were shown was compared to recall when no labeling occurred. Total recall was not affected, but for the older age group primacy recall was hindered and recency recall was facilitated by labeling.

In Exp II, when prompting accompanied rehearsal, recall improved at both recency and primacy positions. When prompting occurred for the primacy positions only, recall was higher for these positions but not for other positions.—*Journal abstract*.

5669. Hall, Judy E. (U Alabama, Ctr for Developmental & Learning Disorders, Birmingham) **Sexual behavior.** In J. Wortis (Ed), *Mental retardation and developmental disabilities: An annual review: VI*. New York, NY: Bruner/Mazel, 1974. xiv, 305 p.—Presents a review of the literature on sexuality and sexual behavior in the mentally retarded adolescent and adult, emphasizing research and theories in the areas of sterilization, sexual development, marriage, children, contraception, sex education, and sexual attitudes. The need for more research and more comprehensive evaluations of sex education programs for the retarded is cited. (147 ref)

5670. Hart, Joe W.; McCaffery, Leonard; Damron, Wilbur T. & Frank, Bob. (U Arkansas, Little Rock) **Research findings having implications for processes of administering sociometric techniques to the mentally retarded.** *Handbook of International Sociometry*, 1973, Vol 7, 14-28.—Discusses the sociological concepts of the need for social approval, social desirability, and sociometric status, as they relate to mentally retarded Ss. Research articles that provide clues to the effective administration of sociometric devices to this population are cited. Results of the multiprocedural observations by the staff of the North Hills Project in Arkansas are compared with research findings regarding perceptual development, motor skills, and other identifiable characteristics of the mentally retarded. Review of the literature indicates that retarded Ss may have a greater need for social approval and that little emphasis is placed on the type of in-classroom evaluation that could provide the basis for designing and developing a research-based, sociocultural curriculum for the mentally retarded. (38 ref)—R. J. Ambrosino.

5671. Hofmeister, Alan M. & Latham, Glenn. (Utah State U) **Development and validation of a mediated package for training parents of preschool mentally retarded children.** *Improving Human Performance*, 1972(Mar), Vol 1(1), 3-7.—Describes a 4-unit parent training program that emphasized teaching self-care skills to their preschool mentally retarded children. An evaluation of the program by parents suggests that the program has the potential to make significant changes in the behavior repertoires of preschool mental retardates.

5672. Horton, Kathryn B. (Vanderbilt U) **Infant intervention and language learning.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Reviews data on language insufficiency of retarded children. It is concluded that basic research is needed on cognitive and language development in normal children before meaningful intervention strategies for retarded children can be formulated and tested. (4½ p ref)

5673. Jackson, Robin. (Aberdeen Coll of Education, Scotland) **The ecology of educable mental handicap.** *British Journal of Mental Subnormality*, 1974(Jun), Vol 20(38, Pt 1), 18-22.—Designed an ecological study including 21 socioeconomic variables to fill a perceived



gap in knowledge obtained from surveys carried out in Great Britain. Electoral wards were taken as neighborhood units and elementary linkage analysis method was applied. 4 clusters emerged from the correlation matrix, one of which was considered particularly important to the present study. A table of correlations between backwardness and social factors for 3 previous studies, compared to correlations of educable mental handicap with social factors in the present study, is presented. It is concluded that the surveys all show a high degree of consistency associating backwardness with indices of social deviancy.—R. Hall.

5674. Johnson, Clark & Jackson, Ernest G. (Hastings Coll) **Ontogenetic changes in two forms of the Muller-Lyer illusion in normal and retarded subjects.** *Developmental Psychology*, 1974(Nov), Vol 10(6), 949-953.—Forms A (arrowheads pointing out) and B (arrowheads pointing in) of the Muller-Lyer illusion were administered to normal and retarded Ss to study possible changes in illusion strength in either or both forms. It was found that only Form A changed in strength when (a) age was varied from 8-18 yrs in normal children and (b) when the illusion was presented repeatedly over 8 trials for normal and retarded children. These findings conflict with perceptual theories which assume that both forms of the illusion change with these manipulations. A control condition was also presented and its utility is discussed. (21 ref)—*Journal abstract*.

5675. Leland, Henry & Smith, Daniel E. (Ohio State U) **Mental retardation: Present and future perspectives.** Worthington, OH: Charles A. Jones, 1974. x, 230 p. \$9.95.—Presents an introduction to research, theories, methodologies, and approaches to rehabilitation in the field of mental retardation. Topics include social attitudes toward the mentally retarded; the relationships between intelligence, poverty, and retardation; defects, disabilities, and learning; the mentally retarded child and his family; and preventive programs for retardation. (19 p ref)

5676. Liese, James E. & Lerch, Harold R. (Area VI Developmental Disabilities Board, Stockton, CA) **Physical fitness and intelligence in TMRs.** *Mental Retardation*, 1974(Oct), Vol 12(5), 50-51.—Administered the AAHPER Youth Fitness Test, the Fleishman Basic Fitness Test, and the Stanford-Binet Intelligence Scale to 21 undifferentiated trainable mentally retarded males to determine the relationship between physical fitness and intelligence in trainable adolescents. Results show a significant relationship between IQ and physical fitness even though the relationship does not indicate cause. (16 ref)—M. E. Pounsel.

5677. Overbeck, Daniel B. (Arizona Training Program, Psychology/Professional Services, Coolidge) **Visual plot of adaptive behavior and FSIQ scores as an aid in client decision making.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 187-190.—Describes the construction and use of a visual aid for displaying differences in IQ and adaptive behavior scores of retardates.

5678. Rogow, Sally M. (U British Columbia, Vancouver, Canada) **Language acquisition and the blind retarded child: A study of impaired communication.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 36-40.—Discusses the inadequacy of educational

provisions for the blind retarded child. Ordinarily, normally developing blind children do not differ from the nonvisually handicapped child in the manner and rate of language acquisition. If a blind child hears little speech, or if his speech is not attended to, he is denied primary experiences of speech development. A 3-yr study of the emerging speech patterns of a 9-yr-old nonverbal blind girl is reported. At first she used language to refuse by shouting "No." Her speech centered around nonsense syllables. Although her language became more fluent, in storytelling she narrated only single events related to her own feelings. Her greatest distortions in language usage were in expressing her feelings. Language is communication and the basic system of human interaction, but children who live as isolates in home or in residential institutions do not experience this interaction.—C. L. Nicholson.

5679. Rowitz, Louis. (Illinois State Pediatric Inst, Chicago) **Social factors in mental retardation.** *Social Science & Medicine*, 1974(Jul), Vol 8(7), 405-412.—A review of the literature suggests that studies of social factors in mental retardation are conducted primarily within epidemiological frameworks and that the research can be classified into 4 perspectives: (a) the East Coast Prevalence Studies which have been epidemiological in nature with a concern for the incidence of retardation in a given area, (b) the social epidemiological perspective of western Europe which emphasizes program planning and evaluation, (c) social-behavioral research which is concerned with social factors in labeling and life-styles of adult retardates, and (d) the crisis research trend which is concerned with how families cope with retarded children. A synthesis of findings from these 4 frameworks is presented, based on the premise that the family should be viewed as the central core of an understanding of the social elements in mental retardation. (43 ref)—*Journal abstract*.

5680. Schiefelbusch, Richard L. (U Kansas, Bureau of Child Research) **Language.** In J. Wortis (Ed), *Mental retardation and developmental disabilities: An annual review: VI*. New York, NY: Bruner/Mazel, 1974. xiv, 305 p.—Presents a review of the history of research on language development in the retarded, problems in assessment, various language training programs, and linguistic research on inappropriate language. The usefulness of Piaget's work on concept and language development for studying the problems of the retarded is discussed, and the current emphasis on behavioral and systems planning approaches to language education is examined. (105 ref)

5681. Silverman, Wayne P. (New York State Inst for Research in Mental Retardation, New York) **Complex visual discriminations in cultural familial retardates and normal children.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 539-545.—Examined information processing in a visual matching task in a group of 12 cultural familial retardates (mean age = 18 yrs) and a group of 31 normal children in Grades 2, 5, or 8, using digit sequences of varying complexity as the stimuli. Reaction times (RTs) of normal adult Ss making same judgments do not fit into a single-process self-terminating feature testing model, while those for different judgments do. This study found that (a) the same-differ-

ent relationship was the same for normal Ss and retardates, with same judgment RTs deviating from predictions of a self-terminating model; (b) overall RT was a function of Ss' mental age; and (c) differences in RTs between groups were due primarily to "intercept" rather than "slope" effects, although evidence of a possible slope difference was found between the 8th graders and the other groups.—*Journal abstract.*

5682. Talkington, Larry W. (Fairview Hosp & Training Ctr, Salem, OR) **An exploratory program for blind-retarded.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 33-35.—Discusses the neglect of the retarded blind, including the lack of information, techniques, facilities, and resources for helping this handicapped group. An exploratory attempt to develop basic programming for a sample of retarded blind, using a stimulation-activity approach, is described. The regressive state of the Ss was indicated by their almost complete disregard for anything except unusual stimuli. Communications efforts dealt with getting Ss to respond to basic commands. The socialization approach was used to try to get students to interact with each other. Efforts were made to increase mobility skills, thereby making the student more independent. Pre- and postmeasures taken on the Verbal Language Development Scale showed improvement during the project, indicating the need for further development of program techniques.—C. L. Nicholson.

5683. Umetani, Tadao. [A study of discrimination reversal-shift learning in mentally retarded children: Investigation of reaction time.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 137-147.—Studied developmental aspects of the discrimination reversal-shift learning process on the basis of analysis of reaction time and the number of trials. In Exp I, reversal shift of object-size (Task 1) and form-number (Task 2) was given to 22 13-14 yr old mentally retarded children. In Exp II, 4 successive reversal shifts of Task 2 were given to 12 mentally retarded children of the same ages. Results indicate that (a) younger Ss' preoccupation with concrete aspects of Task 1 interfered with the mediational process, (b) reaction time depended on identification of mediational cues relevant to stimulus dimensions, (c) reaction time was longer in the early stage of learning and immediately after reversal shift, and (d) fast learners have wider variability of reaction time in the early stages. (English summary) (16 ref)—S. Choe.

5684. Wagner, Rudolph F. (Richmond Public Schools, VA) **Dyssymbolia as a specific learning disability.** *International Journal of Symbolology*, 1974(Mar), Vol 5(1), 22-30.—Investigated the existence of dyssymbolia (i.e., a failure in conceptual thinking so that thoughts cannot be expressed in language) in 8 9-25 yr old Ss who had been diagnosed as dyssymbolic. Ss completed the WAIS subtests, the Kahn Test of Symbol Arrangement, the Wide Range Achievement Test, and R. F. Wagner's Reversals Test. Data suggest that dyssymbolic Ss think on more concrete levels than normals and are relatively successful in test situations requiring rote memory, but fail when concept formation task and abstract thinking are required. Deficits appear to focus on inferential rather than purely abstract thinking abilities. Suggestions

for rehabilitative exercises and implications for symbolology are discussed. (20 ref)—*Journal summary.*

5685. Wallbrown, Fred H.; Blaha, John; Counts, Dorothea H. & Wallbrown, Jane D. (Columbus Public Schools, Area of Psychological Services, OH) **The hierarchical factor structure of the WISC and revised ITPA for reading disabled children.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 65-76.—Obtained a hierarchical factor solution on correlations among WISC and Illinois Test of Psycholinguistic Abilities (ITPA) subtests for 110 reading disabled 8-10 yr olds. The ability hierarchy, which included a general (g) factor, 2 subgeneral factors, and 5 primary factors, was arranged in a manner congruent with P. E. Vernon's structural paradigm. The g-factor was defined by a moderate but distinct pattern of positive loadings from WISC and ITPA subtests. At the subgeneral level a verbal-educational factor was defined by verbal WISC and ITPA subtests, and a spatial-perceptual-mechanical factor was defined by WISC performance and ITPA visual subtests. 3 primary factors—Freedom from Distractibility, Verbal Precision, and Quasi-Specific—were defined by WISC subtests. 2 primary factors—Automatic Processes and Representational Processes—were defined by ITPA subtests. (28 ref)—*Journal abstract.*

5686. Wortis, Joseph (Ed.). (State U New York, Stony Brook) **Mental retardation and developmental disabilities: An annual review: VI.** New York, NY: Brunner/Mazel, 1974. xiv, 305 p.

### Speech Disorders

5687. Frisch, Giora R. & Handler, Leonard. (U Windsor, Ontario, Canada) **A neuropsychological investigation of "functional disorders of speech articulation."** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 432-445.—Investigated the neurological competence of 7-8 yr old males diagnosed as having "functional articulatory disorders." The Reitan-Indiana Neuropsychological Test Battery was administered to 10 children who had errors of omission, 10 who had substitutions, and 10 who were matched controls. Results show that of the 28 subtest scores, 11 showed significant differences between those children with speech problems and controls. The scores for the omission group were significantly poorer than those for the other 2 groups. 2 judges, familiar with interpretation of the battery, rated 9 of the 10 omission Ss, 7 of the 10 substitution Ss, and 1 of the 10 control Ss as brain damaged. The Ss demonstrated greatest difficulty with tasks which required sensory-receptive functions. (19 ref)—*Journal abstract.*

5688. Ingham, Roger J.; Martin, Richard R. & Kuhl, Patricia. (New South Wales Coll of Paramedical Studies, Haymarket, Australia) **Modification and control of rate of speaking by stutterers.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 489-496.—Assessed the frequency and percentage of words stuttered by 3 adult stutterers under conditions designed to modify and control rate of speaking. Target rates of 50% above base rate, 50% below base rate, and base rate were sought in experimental periods by on-line signaling of proximity to the target rate. A criterion of rate control was met by 2 Ss who reduced their frequency and percentage of words stuttered in the 50%-below-base rate condition. Some



reduced stuttering occurred in other conditions.  
—*Journal abstract.*

5689. Monnin, Lorraine M. & Huntington, Dorothy A. (California State U, Los Angeles) **Relationship of articulatory defects to speech-sound identification.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 352-366.—A total of 45 normal-speaking and speech-defective children were compared on a speech-sound identification task which included sounds the speech-defective Ss misarticulated and sounds they articulated correctly. The identification task included 4 tests: [r]-[w] contrasts, acoustically similar contrasts, acoustically dissimilar contrasts, and vowel contrasts. The speech sounds were presented on a continuum from undistorted signals to severely distorted speech signals under conditions which have caused confusion among adults. The procedure employed was designed to test, in depth, each sound under study and to minimize extraneous variables. Speech-sound identification ability of speech-defective Ss was found to be specific rather than a general deficiency, suggesting a positive relationship between production and identification ability. (27 ref)—*Journal abstract.*

5690. Yoss, Kathe A. & Darley, Frederic L. (Mayo Clinic, Rochester, MN) **Developmental apraxia of speech in children with defective articulation.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 399-416.—To identify behaviors which might distinguish developmental apraxia of speech from "functional" articulation disorders, a battery of speech and nonspeech tests was given to 30 children with moderate to severe defective articulation but with normal intelligence, hearing, and language abilities and with no apparent organic pathologic condition, and to 30 matched control Ss. Pediatric neurologic examinations were completed for the Ss with defective articulation. Highly significant differences were found between control and defective articulation Ss. A rationale was established for division of the defective articulation group on the basis of their performance on isolated volitional oral movement tasks. Combinations of variables that emerged as significant differentiating predictors between these 2 subgroups of Ss with defective articulation were neurologic ratings, 2- and 3-feature errors, distortions, prolongations and repetitions, additions, 1-place errors, and omissions. These behavioral differences support the conclusion that an identifiable developmental apraxia of speech exists in some children with defective articulation. (59 ref)—*Journal abstract.*

#### Physical & Toxic Disorders

5691. Ajax, E. T. (VA Hosp, Salt Lake City, UT) **The aphasic patient: A practical review.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 135-142.—Presents a practical model of language function as it relates to the normal and abnormal brain, and describes 2 salient deficits in speech and language which may occur in brain-damaged patients. It is shown that verbal language basically depends upon 2 stratified or formalized systems: acquisition of the auditory image or imprint and development of the corresponding motor package responsible for audible speech. Aphasia represents a malfunctioning of one or both of these systems.

In motor aphasia, a lesion involving the cortex of the left frontal lobe results in the production of few words, lack of fluency, stereotyped responses, and production of expletives (oaths). However, the patient retains awareness of his oral performance and exhibits ability to follow commands. In receptive aphasia, damage to the temporal parietal area of the left cerebral hemisphere results in the production of many meaningless, chaotically arranged words and word combinations. The patient is unable to understand others and appreciate his own errors. The presence of both deficits in auditory images and motor packages is termed global aphasia. Techniques for communicating with motor and receptive aphasics are discussed, and problems in the prognosis and treatment of aphasia are considered. Nonaphasic disturbances which may pose a problem in differential diagnosis are also noted. (18 ref)—A. Olson.

5692. Ames, Frances R. (Groote Schuur Hosp, Cape Town, S Africa) **Cinefilm and EEG recording during "hand-waving" attacks of an epileptic, photosensitive child.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 301-304.—Describes the seizures of a 5-yr-old mentally defective photosensitive epileptic boy. The seizures were complex and included repetitive hand movements. Cinefilm and EEG recordings are presented which suggest that the hand movements were part of the seizure pattern. (French summary)

5693. Amstey, Marvin S. (U Rochester, School of Medicine & Dentistry) **Herpes V. D.—A serious problem in pregnancy.** *Medical Aspects of Human Sexuality*, 1974(Aug), Vol 8(8), 128-141.—Describes basic facts about genital herpesvirus infections and its relationship to pregnancy. The virus is acquired by sexual contact and may often be a threat to newborns if the mother is infected at the time of delivery. Comparisons with syphilis and gonorrhea are discussed, and treatment recommendations are presented.

5694. Babb, Thomas L.; Mariani, Elmo & Crandall, Paul H. (U California, Los Angeles) **An electronic circuit for detection of EEG seizures recorded with implanted electrodes.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 305-308.—Describes an analog-digital circuit which will accept one or more EEG inputs and signal the presence of an electrographic seizure. The use of this seizure detector for routine and reliable ward monitoring of telemetered EEG is demonstrated. (French summary)

5695. Bancaud, J. et al. **"Generalized" epileptic seizures elicited by electrical stimulation of the frontal lobe in man.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 275-282.—Performed 509 electrical stimulations in the frontal lobes of 10 18-27 yr old epileptic patients presenting generalized spontaneous seizures. Of these 509 stimulations, 150 induced either simple electroclinical absences, complex absences, generalized tonic-clonic seizures, or bilaterally synchronous, symmetrical spike and wave seizures. These responses, which in each case paralleled the spontaneous attacks of the patient, occurred from the beginning of stimulation and ended with its cessation, except for the tonic-clonic seizures. The type of response obtained was largely related to the parameters of stimulation (i.e., in the same patient, a discharge of

subclinical spikes and waves could become an absence and subsequently a generalized tonic-clonic seizure when the intensity or duration of stimulation was increased). Results demonstrate the role of the cerebral cortex, particularly the frontal portion, in generalized epileptic attacks. (French summary) (37 ref)—*Journal summary*.

5696. Birch, Herbert G. (Albert Einstein Coll of Medicine, Yeshiva U) **Methodological issues in the longitudinal study of malnutrition.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5697. Black, F. William. (Fitzsimons Army Medical Ctr, Psychology Service, Denver, CO) **The cognitive sequelae of penetrating missile wounds of the brain.** *Military Medicine*, 1974(Oct), Vol 139(10), 815-817. —Administered cognitive tests to 100 patients with combat-incurred penetrating missile wounds of the brain and compared their performance with that of a control group of 50 Ss evacuated from Vietnam with no psychiatric or neurological problems. Tests included the WAIS, Wechsler Memory Scale, and the Shipley Institute of Living Scale for Measuring Intellectual Impairment. Mean performance of brain-injured Ss did not differ significantly from that of normals on any of the measures, suggesting the absence of significant impairment in the sample as a whole. Individuals within the brain-injured sample did, however, demonstrate both general and specific cognitive deficits, the incidence of deficits being higher in the left-hemisphere lesion sample and in Ss with posterior lesions than in Ss with right-hemisphere and frontal lesions.—*Journal abstract*.

5698. Black, F. William. (Fitzsimons Army Medical Ctr, Denver, CO) **Use of the MMPI with patients with recent war-related head injuries.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 571-573.—Computation of a group mean MMPI profile for a sample of 50 male veterans with war-related head trauma resulted in a composite protocol with elevations above a *T* value of 70 on scales 8, 2, and 1. Because of an increased frequency of psychiatrically pathological responses on the MMPI in this sample, the clinical utility of an organic-sign index to differentiate organic from functional patients was not demonstrated. Similarly, use of a 5-item MMPI central nervous system scale as a discriminator was not supported.—*Journal summary*.

5699. Blumer, Dietrich. (McLean Hosp, Belmont, MA) **Organic personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21. —Discusses the history of research on effects of frontal or temporal lobe lesions on personality, and describes characteristics of, and differences between, the psychopathology, diagnosis, etiology, and treatment of the frontal lobe personality and the epileptic personality. Several case examples are included. (23 ref)

5700. Bourgeois, M.; Broustet, A. & Benezech, M. [Syndrome 18 Q: A new case of partial deletion of the long arm of chromosome 18.] (Fren) *Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 641-648.—Reports a single case of the verified partial deletion of the long arm of chromosome 18 in a woman 35 yrs old, with typical accompanying dysmorphic picture, mental retardation, and psychological disturbances characterized by

excitation and abnormal movements.

5701. Brekke, Beverly; Williams, John D. & Tait, Perla. (U North Dakota, Ctr for Teaching & Learning) **The acquisition of conservation of weight by visually impaired children.** *Journal of Genetic Psychology*, 1974(Sep), Vol 125(1), 89-97.—Studied 72 legally blind children 6-14 yrs of age to determine whether cognitive development of visually impaired children follows stages of development similar to sighted children; 46 blind Ss resided in institutions for the blind, and 26 lived in a family situation. All Ss were administered a modification of H. Furth's (see PA, Vol 38:7981) conservation of weight problems. Results show that there were no differences in conservation between blind Ss living at home and the sighted group. Both sighted and blind Ss living at home conserved more often than the institutionalized blind. Further investigations of the differences between the 2 groups of blind Ss showed that degree of blindness was of less importance than place of residence.—*Journal abstract*.

5702. Busse, Ewald W. (Duke U, Medical School) **Mental disorders in later life: Organic brain syndrome.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5703. Collomb, Henri & Valantin, Simone. (Faculté de Médecine et de Pharmacie de Dakar, Sénégal) **A note on kwashiorkor as anorexia nervosa in infancy.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Studied the psychological aspects of "kwashiorkor" (a consequence of protein deficiency occurring at the time of weaning) in 1,000 cases. Results indicate that kwashiorkor is more frequent in urban than in rural settings, is more frequent in districts undergoing recent and rapid urbanization, and most often involves the oldest sibling.

5704. Craig, Marge. **Patient: Heal thyself.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 157-164.—Describes efforts of a woman with glaucoma to find a cure by any means. Attempts included a psychic healer, teachings of Eastern philosophers, biofeedback, a workshop involving color therapy, self-rhythmization exercises, and muscle relaxation. Successes in maintaining a low pressure and apparent absence of glaucoma is reported.

5705. Danaher, Ellen M. & Pickett, J. M. (Gallaudet Coll) **Notes on an artifact in measurement of the acoustic reflex.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 505-509.—Obtained measures of the acoustic reflex on 15 college students with moderate to severe, long-term sensorineural loss. Results indicate that at high sound levels (105 db sound pressure level and above), the eliciting stimulus can cross over to the ear in which the probe is placed and can interact with the probe tone which is present continuously in that ear; this interaction between the 2 sounds can be misinterpreted as a reflex. Ways of detecting and avoiding this test artifact are discussed.

5706. Davis, Julia. (U Iowa) **Performance of young hearing-impaired children on a test of basic concepts.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol



17(3), 342-351.—Administered the Boehm Test of Basic Concepts to 24 hard-of-hearing children and 24 normal-hearing children, aged 6-8 yrs. The hearing-impaired were enrolled at least part-time in regular public schools. Their responses were analyzed according to age level and degree of hearing loss and compared to norms for normal-hearing Ss. Results indicate significant differences in knowledge of the concepts tested between Ss with milder losses and those with moderately severe losses, but no significant differences between younger and older hearing-impaired Ss. Percentile rankings of raw scores revealed that 75% of the hard-of-hearing Ss scored at or below the 10th percentile when compared to norms for hearing Ss their age or younger. Item analysis of the responses indicate poorest performance on time concepts, followed by quantity, miscellaneous, and space concepts, in that order.—*Journal abstract*.

5707. Easson, William M. (Louisiana State U Medical Ctr, New Orleans) **Management of the dying child.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 25-27.—Considers the responsibilities of the clinician when a child is dying in hospital. He must be aware of and deal with the child's family, those who are treating the child, and the child himself.

5708. Engle, Jerome. (National Hosp, London, England) **Selective photoconvulsive responses to intermittent diffuse and patterned photic stimulation.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 283-292.—During routine EEG recordings, over 100 epileptic and nonepileptic patients were photostimulated with both diffuse and patterned intermittent light. Stimuli consisted of a standardized tube flicker with or without a checkerboard pattern attached to the lamp face. Selective photoconvulsive EEG responses evoked by only 1 type of stimulus were observed in 12 Ss—5 responded only to pattern flicker while 7 responded to only diffuse flicker. Both stimuli evoked photoconvulsive responses in 16 other patients, but 4 clearly responded better to pattern and 2 to diffuse flicker. Of 37 Ss tested with intermittent pattern reversal, diffuse seizures were observed in only 2 Ss. Of the 28 photosensitive Ss, 13 had histories of primary generalized epilepsy, 12 had some focal characteristics, 2 had progressive myoclonus epilepsy, and 1 had no history of seizures. The possibility that selective photosensitivity indicates a specific epileptogenic mechanism is discussed. (French summary) (24 ref)—*Journal summary*.

5709. Farkas, Andrea. (Children's Hosp Medical Ctr, Boston, MA) **Research on families of terminally ill children: Problems and rewards.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 41-43.—Describes a study of the relationship between the severity of a child's illness and the psychological functioning of the child, the mother, and siblings. Other research problems in the same area are suggested.

5710. Fedrick, Jean. (U Oxford, Unit of Clinical Epidemiology, England) **Sudden unexpected death in infants in the Oxford Record Linkage Area.** *British Journal of Preventive & Social Medicine*, 1974(Aug), Vol 28(3), 164-171.—Data from 170 cases of sudden unexpected death in infants who were matched for maternal age, parity, social class, legitimacy, and place and year of delivery with controls reveal significant associations

between unexpected deaths and short gestation, low birthweight, slight growth retardation, twin delivery, "insult" during pregnancy, induction of labor, neonatal jaundice, month of birth, congenital defects, and subsequent hospitalization. There was no relationship between death and breast feeding. (15 ref)

5711. Feifel, Herman. (VA Outpatient Clinic, Los Angeles, CA) **Religious conviction and fear of death among the healthy and the terminally ill.** *Journal for the Scientific Study of Religion*, 1974(Sep), Vol 13(3), 353-360.—Investigated the relationship between religious persuasion and fear of death in 92 physically healthy persons and 92 terminally ill patients. No differences in the intensity of fear of death were found between believers and unbelievers. Personal nearness to death also did not reveal any meaningful differences between believers and unbelievers. All Ss evidenced an acceptance-avoidance approach toward fear of death. (21 ref)—*Journal abstract*.

5712. Frits, Mogens L. & Lund, Mogens. (Glostrup Hosp, Denmark) **Stress convulsions.** *Archives of Neurology*, 1974(Sep), Vol 31(3), 155-159.—Discusses the etiology and pathogenesis of severe "stress" preceding convulsive attacks in 37 of 1,250 patients with convulsive disorders studied during a 13-yr period. Follow-up examinations were done 1-12 yrs later on 36 of these patients and on 27 of their children. Patients were 20-50 yrs old, with twice as many men as women. Families of propositi showed increased incidences of febrile convulsions. One child had paroxysmal changes on an EEG only during photostimulation. Lack of sleep was the dominating stress factor; mostly "combination stress" was involved. One patient died, 2 of 36 developed unprovoked convulsions, and 10 experienced recurrences of stress convulsions. Anticonvulsants apparently did not prevent recurrence. The EEG provided no aid in diagnostic evaluation or prognosis. (34 ref)—*Journal abstract*.

5713. Hahn, P. (Inst für Allgemeine Klinische Medizin, Heidelberg, W Germany) **[Cardiac infarction and cardiovascular neurosis.]** (Germ) *Nervenarzt*, 1972(May), Vol 43(5), 239-247.

5714. Hertzog, Margaret E. (Rockland Children's Psychiatric Hosp, Orangeburg, NY) **Neurological findings in prematurely born children at school age.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5715. Hoemann, Harry W.; Andrews, Carol E. & DeRosa, Donald V. (Bowling Green State U) **Categorical encoding in short-term memory by deaf and hearing children.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 426-431.—Tested 37 deaf and 38 hearing children, ages 8-12, in a short-term memory task. Special interest focused on the build-up and release of proactive interference (PI). Both groups showed PI when the items were drawn from the same conceptual class of animals. In addition, experimental groups of deaf and hearing Ss showed a release from PI when shifted to a set of items drawn from a different category on the last trial. It is concluded that deaf children encode categorically in short-term memory (suggesting a normally functioning

ability to think abstractly and to process information without acoustic mediators).—*Journal abstract.*

5716. Holtzman, Neil A.; Meek, Allen G. & Mellits, E. David. (Johns Hopkins U) **Neonatal screening for phenylketonuria: Effectiveness.** *JAMA: Journal of the American Medical Association*, 1974(Aug), Vol 229(6), 667-670.—Evaluated programs for the detection of phenylketonuria (PKU) by surveys of health departments and PKU clinics. Data show that more than 10% of infants with PKU are either not being screened or are not being detected by screening, that infants with PKU who are screened on the 1st 3 days of life are more likely to be missed than those screened later, and finally that the infants in whom a diagnosis of PKU was confirmed constituted only 5.1% of all infants with presumptive positive screening tests. (15 ref)

5717. Hudgens, Richard W. (Washington U, Medical School) **Personal catastrophe and depression: A consideration of the subject with respect to medically ill adolescents, and a requiem for retrospective life-event studies.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5718. Humphrey, G. Bennett & Vore, David A. (U Oklahoma, Health Sciences Ctr, Children's Memorial Hosp, Oklahoma City) **Psychology and the oncology team.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 27-29.—Discusses the contributions which can be made by a psychologist working with a team of tumor experts in the management of dying children.

5719. Hunter, W. L. & Bennett, P. B. (US Navy, Submarine Development Group One, San Diego, CA) **The causes, mechanisms and prevention of the high pressure nervous syndrome.** *Undersea Biomedical Research*, 1974(Mar), Vol 1(1), 1-28.—A review of the literature on the high pressure nervous syndrome (HPNS) suggests that the HPNS complex has the following characteristics in a variety of invertebrates and vertebrates, including man. It usually appears at depths somewhat greater than 500 fsw. Its symptoms involve primarily the central nervous system, being manifested as neuromuscular disturbances with incoordination, fasciculations, and tremors or as disturbances of higher cerebral functions with disorientation, microsleep, and in animals, convulsions. These neurological aberrations can be correlated to some degree with changes in the EEG. The development and intensity of HPNS is augmented by rapid compression to depth. This symptom complex seems to be a manifestation of some aspect of hydrostatic pressure per se, rather than the result of other more indirect effects of increased ambient pressure. (5 p ref)—*Journal abstract.*

5720. Jarniou-Delort, A. [The problem of "acting out" among epileptics in a day hospital: A prospective and statistical study of the Hand-Test in the day hospital at Creteil.] (Fren) *Annales Médico Psychologiques*, 1974(Apr), Vol 1(4), 465-483.—Describes the use of the Hand Test as an index of tendencies toward sociopathic acting out among epileptic patients. The patients' reactions to 10 plates which portray the human hand in various gestures are scored for content of the responses (e.g., those indicating dependence, aggressivity, or affectivity). Results show that the acting-out index

of epileptic Ss was lower than that of a normal population. An explanation is offered in terms of the constraints imposed on action by the protective nature of the institution.—*H. E. King.*

5721. Jensema, Carl. (Gallaudet Coll, Office of Demographic Studies) **Post-rubella children in special educational programs for the hearing impaired.** *Volta Review*, 1974(Nov), Vol 76(8), 466-473.—Sampled 43,946 students enrolled in special education programs for the hearing handicapped in this country during the 1972-1973 school year. 17.6% had maternal rubella reported as a cause of their hearing loss, many of these resulting from the 1963-1965 rubella epidemic. Nearly 40% of the maternal rubella group were born during November and December; and over 75% were born September through January. The maternal rubella group tended to have more severe hearing losses, more additional handicaps, and a greater percentage enrolled in full-time special education programs.—*W. A. Hass.*

5722. Jones, Kenneth O. & Studebaker, Gerald A. (Brigham Young U) **Performance of severely hearing-impaired children on a closed-response, auditory speech discrimination test.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 531-540.—The performance of 23 hearing-impaired children on a closed-response, auditory speech discrimination test and on an open-response, auditory speech discrimination test was compared to their performance on auditory tests of sensitivity, teacher-evaluated categories, and other related subject data. A comparison of the results of closed-response, auditory speech discrimination test and the open-response, auditory speech discrimination test indicates that the closed-response set test paradigm appeared more productive for use with severely hearing-impaired Ss whose level of performance is low (but not 0%) on the open-response, auditory speech discrimination test. The closed-response test scores for this group were highly positively correlated to data dependent upon hearing function, whereas the open-response scores were not. Analyses of the closed-response set test results indicate that a closed-response set test paradigm can successfully demonstrate auditory speech discrimination error patterns on a S group basis.—*Journal abstract.*

5723. Kay, Leslie. (U Canterbury, Christchurch, New Zealand) **Orientation for blind persons: Clear path indicator or environmental sensor.** *New Outlook for the Blind*, 1974(Sep), Vol 68(7), 289-296.—Compares aims of sensory aids that indicate the presence or absence of obstructions in the travel path with the aims of devices that provide more detailed information about various environmental characteristics. The blind person's "reading" of the environment is related to the formation of sentences from words through the use of the rules of syntax and grammar.

5724. Kubler-Ross, Elisabeth. (U Chicago) **The languages of dying.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 22-24.—Uses several examples to illustrate the tremendous importance and the great difficulty of listening to and helping dying children and their families.

5725. Lane, Helen S. & Baker, Dorothea. (Central Inst for the Deaf, St Louis, MO) **Reading achievement of the deaf: Another look.** *Volta Review*, 1974(Nov), Vol 76(8),



489-499.—Analyzed the reading achievement records of 132 10-16 yr old former pupils of Central Institute for the Deaf, with a mean IQ of 115. The group showed continuous improvement on the American School Achievement Tests in reading (no tests of statistical significance reported). The final grade level in reading obtained by the total group was 5.8; and that attained by the 92 students who graduated from the 8th grade was 6.2. It is concluded that better reading achievement than previously reported in the literature is apparently possible for deaf children.—*W. A. Hass.*

5726. Lev-Ran, Arye. (Beilinson Hosp, Tel-Aviv, Israel) **Gender role differentiation in hermaphrodites.** *Archives of Sexual Behavior*, 1974(Sep), Vol 3(5), 391-424.—Describes 24 cases of anatomically intersexed patients with ambiguous external genitalia. All were studied in the USSR. One patient was a true hermaphrodite, 3 had mixed gonadal dysgenesis, 9 were male hermaphrodites with testes in various stages of dysgenesis, and 11 were females with congenital adrenal hyperplasia. In several cases, the appearance of the genitalia was markedly incongruent with the assigned sex (e.g., a woman with a 7-cm phallus and a boy with a 1.5-cm phallus). With 2 partial exceptions, gender identity corresponded to the sex assigned at birth. In same-aged patients with the same clinical features and almost identical appearance of the external genitalia, but assigned to different sexes, gender identity corresponded to neonatal sex assignment. These cases demonstrate that gender identity is not determined prenatally by biological influences but rather that it is postnatally learned and determined by sex assignment in infancy and the resultant socialization experiences. (26 ref)—*Journal abstract.*

5727. Lindowski, Donald C. & Dunn, Marilyn A. (George Washington U) **Self-concept and acceptance of disability.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 28-32.—Examined the relationship between acceptance of disability (assessed by Linkowski's Acceptance of Disability Scale) and 2 aspects of self-concept—self-esteem (assessed by the Butler and Haigh Self-Ideal Self Q Sort) and social relationships (assessed by Dunn's Satisfaction with Social Relationships Scale). 55 undergraduates with physical disabilities were Ss, and data were obtained in 2 stages over approximately 2 yrs. Significant positive correlations were obtained between all 3 variables. It is concluded that acceptance of disability is a part of self-concept in general. The need to view values associated with disability as part of the broader perception of self is emphasized.—*Journal abstract.*

5728. Liss, Jay L.; Alpers, David & Woodruff, Robert A. (Washington U, Medical School) **The irritable colon syndrome and psychiatric illness.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 151-157.—25 patients with irritable colon were evaluated both medically and psychiatrically. Symptoms of the upper gastrointestinal tract were found to occur frequently in association with colon symptoms, suggesting that the syndrome is diffuse and not confined to the colon. Patients were given structured psychiatric interviews and were classified with specially designed diagnostic criteria. 23 patients (93%) were judged to be psychiatrically ill. Of these 23, 8 were

classified as having anxiety neurosis, 8 had undiagnosed psychiatric disorders, 5 had hysteria, and 2 had primary affective disorder, depressed type. Two-thirds of the psychiatrically ill patients had experienced the onset of psychiatric symptoms prior to the onset of symptoms of irritable colon. Gastrointestinal symptoms tended to conform to the course of each patient's psychiatric illness. Findings suggest that the symptoms of irritable colon are often part of diagnosable psychiatric illnesses.—*Journal summary.*

5729. Mayadas, Nazneen S. (St Louis U, School of Social Service) **Role expectations and performance of blind children: Practice and implications.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 45-52.—Discusses the concepts of "role" and "role synchrony" in relation to blind children and their interaction with other people in professional and nonprofessional situations. Also considered are the perception of expected performance by the children themselves and their actual performance as viewed by the investigators. Interviews with adolescent blind children revealed patterns of behavior which might prove valuable in the professional treatment of blind children through the manipulation of environmental variables. Results might also be used in training parents and other adults who interact with blind children.—*C. L. Nicholson.*

5730. Mechanic, David. (U Wisconsin, Madison) **Discussion of research programs on relations between stressful life events and episodes of physical illness.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5731. Minkowski, Alexandre & Amiel-Tison, Claudine. (Ctr de Recherches de Biologie du Développement Néonatale, Paris, France) **Obstetrical risk in the genesis of vulnerability.** In E. J. Anthony & C. Koupemnik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses vulnerability in terms of prenatal damage to the central nervous system (CNS), perinatal damage during delivery, prematurity and intrauterine growth retardation, socioeconomic factors, the mother-child relationship, and the prevention of CNS involvement in each group.

5732. Monsen, Randall B. (Central Inst for the Deaf, St Louis, MO) **Durational aspects of vowel production in the speech of deaf children.** *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 386-398.—Examined 12 deaf and 5 normal-hearing adolescents to determine the inherent durational differences between the closely related vowels, /i/ and /I/, and the modifying influence of the following consonant. While in normal speech the tense vowel /i/ is only relatively longer than the lax vowel /I/, in deaf Ss these vowels occupied much more restricted durational ranges.

5733. Novikova, L. A. **Blindness and the electrical activity of the brain: Electroencephalographic studies of the effects of sensory impairment.** (Trans B. Sznycer & L. Zielinski). New York, NY: American Foundation for the Blind, 1973. xviii, 341 p.

5734. Omolulu, Adewale. (U Ibadan, Food Science & Applied Nutrition Unit, W Nigeria) **Nutritional factors in the vulnerability of the African child.** In E. J. Anthony

& C. Koupornik (Eds). *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses vulnerability of Nigerian infants as a possible side effect of a trend toward artificial feeding. The effect of this trend on the mother-child relationship is discussed.

5735. Pastalan, Leon A. (U Michigan, Inst of Gerontology) **The simulation of age-related sensory losses: A new approach to the study of environmental barriers**. *New Outlook for the Blind*, 1974(Oct), Vol 68(8), 356-362.—Describes the development of a simulation model to duplicate aspects of environmental experiences of elderly persons with sensory deficits. Through the use of mechanical appliances to simulate the "normal" sensory losses that accompany advanced age, a number of tasks were performed in houses, a multi-purpose senior center, and a shopping center to discover and evaluate the types of environmental barriers faced by the elderly. Specific problems encountered when the visual, auditory, olfactory, and tactile senses are impaired are described. The space organized by these senses functions as both a stimulus and an orientation for the individual; compensatory aids for these senses are noted, and implications of the model for further research are discussed. (25 ref)—*Journal abstract*.

5736. Pattison, E. Mansell. (U California, Irvine) **Psychosocial predictors of death prognosis**. *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 145-160.—Studied interactions between physiological, psychological, and sociological variables as factors in the short-term prognosis of death. 12 male Ss with a 50% short-term mortality risk due to clinical emphysema were evaluated and followed for 18 mo. Physiological measures included blood, gas, and ventilatory measurements; psychological measures included the Inpatient Multidimensional Psychiatric Scale and the Cornell Medical Index—Health Questionnaire; sociological measures included the Nurses' Observation Scale for Inpatient Evaluation (NOSIE-30). Only the NOSIE-30 was predictive of clinical outcome, as was the availability and use of an intact positive network of social relations. Results demonstrate the importance of having something or someone to live for. (39 ref)—*Journal abstract*.

5737. Pelson, Rodney O. & Prather, William F. (U Oregon, Medical School, Portland) **Effects of visual message-related cues, age, and hearing impairment on speechreading performance**. *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 518-525.—3 groups of 12 adults each, differing primarily in age and auditory status, performed 2 speech-reading tasks. One task consisted of speech reading sentences in which the only cues provided were those from the speaker's face and lips; in the other task, a related picture was presented just prior to speech reading a given sentence. Results indicate that while message-related pictures markedly enhanced speech-reading performance for all groups, the older hearing-impaired Ss (aged 51-59 yrs) improved more than 19-26 and 52-61 yr old normal-hearing Ss regardless of age. In terms of absolute speech-reading performance, however, the younger normal-hearing Ss speech read better than either of the 2 older groups while the older adults with hearing impairment tended to

speech read better than the older Ss with normal hearing.—*Journal abstract*.

5738. Penfield, Wilder & Mathieson, Gordon. (McGill U, Montreal Neurological Inst, Quebec, Canada) **Memory: Autopsy findings and comments on the role of hippocampus in experiential recall**. *Archives of Neurology*, 1974(Sep), Vol 31(3), 145-154.—Presents detailed case reports of 2 patients who had suffered grave and unexpected loss of recent memory as a result of partial left temporal lobectomy in treatment of focal epilepsy. Autopsy findings on 1 patient indicate that he had suffered a destruction of the neurons in the right hippocampus, a long-standing ischemic lesion incurred in all probability at the time of birth. Surgical removal of the anterior portion of the left hippocampus caused instant retrograde amnesia—loss of the capacity to create "keys of access" for which the anterior half of at least 1 hippocampus is absolutely essential. The same seems to have been true of the 2nd patient. The 2 cases provide a clue to understanding the role played by the hippocampus in experiential recall and form the basis for proposing a physiological hypothesis that would explain retrograde amnesia. (19 ref)—*B. McLean*.

5739. Peronnet, F.; Michel, F.; Echallier, J. F. & Girod, J. (INSERM, Lyon, France) **Coronal topography of human auditory evoked responses**. *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 225-230.—Studied coronal topography of auditory evoked responses (AERs) in 26 normal Ss and 3 Ss with hemispheric lesions involving Heschl's gyrus. Results confirm the auditory cortical origin of the responses and demonstrate a significant interhemispheric difference which may be due to the predominance of the right hemisphere to pure tones. (French summary) (24 ref)

5740. Premack, David & Premack, Ann J. (U California, Santa Barbara) **Teaching visual language to apes and language-deficient persons**. In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Reports experiments with echolalic children to determine whether perceptual responses could be classified as imitative or nonimitative. Evidence is presented to support the proposition that language acquisition is a mapping of an already existing conceptual structure.

5741. Quigley, S. P.; Smith, N. L. & Wilbur, R. B. (U Illinois, Children's Research Ctr) **Comprehension of relativized sentences by deaf students**. *Journal of Speech & Hearing Research*, 1974(Sep), Vol 17(3), 325-341.—Approximately 450 deaf students (25 males and 25 females at each age from 10 to 18 yrs) and 60 hearing students (10 males and 10 females at each age from 8 to 10 yrs) were given the 22 parts of a test of syntactic abilities. Results from the 3 tests dealing with relativization—processing, embedding, and copying—are reported. These tests required the students to make a judgment of correct or incorrect for stimulus sentences. Results show improvement with increasing age for the 10- to 18-yr-old deaf Ss. Hearing Ss, although much younger, obtained higher scores on all subtests. Results concerning specific problems in syntax reveal (a) the position and function of the relative clause affected its difficulty; (b) with medially embedded relative



clauses, Ss tended to join the nounphrase (NP) of the relative clause with the verb phrase (VP) of the main sentence thus misunderstanding the sentence; (c) when conjoining 2 sentences, Ss tended to delete coreferential subjects and objects; and (d) the possessive form NP's was accepted by deaf Ss when the possessive form *whose* was the correct form. (21 ref)—*Journal abstract*.

5742. Raskin, David E. & Frank, Sidney W. (U Washington, Harborview Medical Ctr) **Herpes encephalitis' with catatonic stupor.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 544-546.—Contends that psychiatrists should be alert to the possibility of patients with herpes encephalitis being admitted to psychiatric units. Difficulties in the differential diagnosis of catatonic stupor are described, and a case history is presented which demonstrates how easily catatonic stupor can be mistaken for catatonic schizophrenia.

5743. Rosenberg, Leon E. (Yale U, Medical School) **A geneticist's approach to the vulnerable child.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974, xxi, 547 p.—Discusses the biological makeup of the vulnerable child and the role of hereditary factors in somatic diseases of children.

5744. Saunders, Frank A. (Smith-Kettlewell Inst, San Francisco, CA) **Electrocutaneous displays.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974, vi, 122 p.—Describes the development of electrocutaneous displays as a means of restoring sensory information to the blind and deaf. The operations of a tactile television system and a teletactor, which provide an electrotactile display of acoustic information, are described, and the underlying rationale for these displays is discussed in terms of dermal responses to electrical stimulation, the relationship of skin impedance and body locus, and the psychophysiology of single electrodes. (16 ref)

5745. Scardina, Virginia. (Cincinnati Public Schools, OH) **Identifying characteristics of children with dysfunction of the left side of the body.** *American Journal of Occupational Therapy*, 1974(Sep), Vol 28(8), 478-483.—Administered a battery of tests with variables hypothesized to reflect right-hemisphere functions to 2 groups of primary-school-age disadvantaged Ss, one group with auditory language deficits and the other with left side of the body dysfunction (LSBD). Variables other than unilateral sensorimotor factors associated with the LSBD group included deficits in comprehension, nonverbal expression of creative thinking, and spatial visualization, as well as behavior characterized by impatience, irrelevant responsiveness, and classroom disturbance. (30 ref)

5746. Schulz, Richard & Aderman, David. (Duke U) **Clinical research and the stages of dying.** *Omega: Journal of Death & Dying*, 1974(Sum), Vol 5(2), 137-143.—A review of the literature does not support E. Kübler-Ross's claim that terminal patients near death pass through 5 psychological stages in a predictable order. Data show the process of dying to be less rigid and even stageless. There is some consensus among researchers that terminal patients are depressed shortly before they die, but there is no consistent evidence that other affect dimensions characterize the dying patient.—*Journal abstract*.

5747. Shapiro, Elaine; Shapiro, Arthur K. & Clarkin, John. (Cornell U, Medical Coll, New York) **Clinical psychological testing in Tourette's syndrome.** *Journal of Personality Assessment*, 1974(Oct), Vol 38(5), 464-478.—On the basis of psychologists' ratings of the WAIS or WISC and Bender Gestalt Test and Rorschach test, 76.7% of 30 Tourette patients had signs of mild or moderate organicity. 50% had organic abnormalities on psychiatric evaluation, 58.3% on neurological evaluation, and 50% on EEG evaluation. It is concluded that patients with Gilles de la Tourette's syndrome had significantly greater organic impairment than found in a normal population. (52 ref)—*Journal abstract*.

5748. Sharma, Shridhar & Rao, Champa. (Goa Medical Coll, India) **Personality factors and adjustment patterns of peptic ulcer patients in India.** *Psychosomatics*, 1974, Vol 15(3), 139-142.—Studied 25 male Ss with peptic ulcers to provide an understanding of their personality, interpersonal relationships, conflicts, and adjustment patterns. Several projective tests and questionnaires were used. Results reveal a marked disturbance in occupational adjustment. Most Ss were ambiverts tending to extraversion with a neurotically constricted personality. Considerable anxiety was present and impaired adjustment in social and sexual spheres was noticed. Role identification and conflicts in dependence-independence needs were marked. (18 ref)—*Journal abstract*.

5749. Sigal, John J. (McGill U, Montreal, Quebec, Canada) **Enduring disturbances in behavior following acute illness in early childhood: Consistencies in four independent follow-up studies.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974, xxi, 547 p.—Examined 3 groups of 7-12 yr olds who had been treated for nephrosis, croup, and gastroenteritis between the ages of 2 and 5 to determine the psychological effects of chronic illness in childhood. On a measure of disturbance in children's behavior, formerly ill Ss scored higher than their siblings on "conduct problems"; the croup group scored higher on "test limits," "does not curb aggression," and "inadequacy-immaturity"; the gastroenteritis group scored higher on "neurotic behavior"; and both the croup and gastroenteritis groups scored higher on "child shows excessive dependence." (15 ref)

5750. Steiner, Jacob E. (Hebrew U, Hadassah School of Dental Medicine, Jerusalem, Israel) **The gustofacial response: Observation on normal and anencephalic newborn infants.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973, xix, 419 p. \$8.55.

5751. Stewart, Mark A. et al. (U Iowa, Medical School) **Intellectual ability and school achievement of hyperactive children, their classmates, and their siblings.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974, x, 383 p.

5752. Tait, Perla. (U North Dakota, Div of Behavioral Disabilities) **The implications of play as it relates to the emotional development of the blind child.** *Education*

of the *Visually Handicapped*, 1972(May), Vol 4(2), 52-54. —Discusses the importance of play for children in general and for blind children in particular. Surprisingly, the blind child does not appear to have a greater need than the sighted child for play as an emotional outlet, although he would be expected to feel more frustration and insecurity. Blind children use fewer play materials, experience less personal involvement in play, and have less curiosity and less imagination in play than their sighted peers.—C. L. Nicholson.

5753. Thach, Bradley T. & Weiffenbach, James M. (NIH, National Inst of Dental Research, Bethesda, MD) **The influence of controlled oral stimulation on tongue movements in patients with oral facial dyskinesia: Elicitation of lateral tongue movements.** In J. F. Bosma (Ed), *Oral sensation and perception: Development in the fetus and infant: Fourth symposium*. Washington, DC: US Government Printing Office, DHEW Pub No (NIH) 73-546, 1973. xix, 419 p. \$8.55.

5754. Theorell, Töres. (Karolinska Inst, Stockholm, Sweden) **Life events before and after the onset of a premature myocardial infarction.** In B. S. Dohrenwend & B. P. Dohrenwend (Eds), *Stressful life events: Their nature and effects*. New York, NY: John Wiley & Sons, 1974. xi, 340 p.

5755. Wang, H. Shan. (Duke U, Medical School) **Special diagnostic procedures: The evaluation of brain impairment.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5756. Ward, Audrey W. (U Sheffield, Medical Care Research Unit, England) **Terminal care in malignant disease.** *Social Science & Medicine*, 1974(Jul), Vol 8(7), 413-420.—Studied social and medical factors associated with dying at home vs dying in the hospital, using data from 279 English Ss who died of cancer. Differences between patients in the 2 settings were related primarily to life-style and environmental characteristics (e.g., having a chief care-giver, whether the patient lived alone, and whether the care-giver had help from friends or neighbors).

5757. Wendland, Carroll J. (U Pittsburgh, School of Health Related Professions) **Internal-external control expectancies of institutionalized physically disabled.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 180-186.—Studied 80 males 18-35 yrs old, diagnosed as having muscular-skeletal impairment, with IQ above 90. A 2-way analysis of variance of scores on Rotter's Internal-External Control Scale indicated that the percentage of time institutionalized was not significantly related to control expectancies, whereas the chronicity of disability was so related ( $p < .07$ ). Ss disabled less than 1½ yrs had significantly higher external scores than Ss disabled for 3 yrs or more. These results suggest that there may be a tendency to expect increased direction from external forces during the critical period following disability onset. (19 ref)—*Journal abstract*.

5758. White, J. C. & Tharp, B. R. (San Jose Medical Clinic, CA) **An arousal pattern in children with organic cerebral dysfunction.** *Electroencephalography & Clinical Neurophysiology*, 1974(Sep), Vol 37(3), 265-268.—Describes an unusual EEG rhythm observed in the frontal regions during arousal from sleep in 8 2-14 yr old

children. All Ss had organic cerebral dysfunction, manifested as minimal cerebral dysfunction or as a seizure disorder. This frontal arousal rhythm is characterized by 30-150  $\mu$ V, predominantly monophasic negative waves, occurring in bursts of up to 13 sec (usually 1-6 sec) with a characteristic notching of the ascending or descending phase of each wave. It is suggested that the arousal state should be studied in all children using montages of frontal electrodes. (French summary)—*Journal summary*.

5759. Wilson, Gary B.; Ross, Mark & Calvert, Donald R. (U Connecticut) **An experimental study of the semantics of deafness.** *Volta Review*, 1974(Oct), Vol 76(7), 408-414.—Investigated individual characteristics associated with labels commonly used for hearing-impaired people (e.g., "deaf," "hard of hearing," "hearing-handicapped"). College students rated individuals described in paragraphs including each of the labels. Bipolar 7-point scales were used (21 in the 1st study, 18 in the 2nd). 2 factor analyses with varimax rotations of the resulting ratings yielded 5 factors. Rating scale means and standard deviations on each of the 5 dimensions showed considerable variation over the 11 labels investigated. The label "hearing-impaired" seemed to evoke fewer negative evaluations than the others.—Hass, W. A.

## TREATMENT AND PREVENTION

5760. Adelson, Edward R. (Banyan Inst, Lake Worth, FL) **Premature ejaculation.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 83-84.—Describes steps for treating the problem of premature ejaculation, including procedures for taking the history and physical examination. Emphasis is placed on the importance of harmony and communication between partners, and counseling both partners. Preliminary exercises that the couple can take in correcting the psychological difficulties that may underlie the problems are presented.

5761. Anthony, E. James & Koupernik, Cyrille (Eds.). (Washington U, Medical School) **The child in his family: Children at psychiatric risk: III.** New York, NY: John Wiley & Sons, 1974. xxi, 547 p.

5762. Borus, Jonathan F. (Walter Reed Army Inst of Research, Washington, DC) **Reentry: III. Facilitating healthy readjustment in Vietnam veterans.** *Psychiatry*, 1973(Nov), Vol 36(4), 428-439.—Compared data on returning Vietnam veterans with data from World War II veteran studies in light of both military psychiatry and civilian studies of coping with transition. Military primary prevention programs for any returning combat veterans are recommended.

5763. Branzel, Petre. [Some considerations on the significance of a tridimensional concept in the development of contemporary psychiatry.] (Fren) *Annales Médico Psychologiques*, 1974(Mar), Vol 1(3), 341-355.—Traces the steadily increasing influence of the biological, psychological, and social sciences on psychiatry in recent years, and suggests a tridimensional formulation of their effect on the practice of psychiatry. Although developed only in Rumania thus far, the model



would probably apply to the experience of any of the other developed countries as well. (28 ref)

5764. Chertok, Léon & Guillon, Florence. (Ctr de Médecine psychosomatique Dejerine, Paris, France) [Information processing in the service of research in psychiatry: A new method.] (Fren) *Annales Médico Psychologiques*, 1974(Mar), Vol 1(3), 321-328.—Describes the utility of maintaining an ongoing coded data bank of clinical information, previously gathered, with which the record of any patient can be compared. An organization of the data permitting a program of "interrogation" is described, which provides a flexible basis for comparing questions about the test case with a broad array of clinical constellations.

5765. Escalona, Sibylle K. (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr for Research in Mental Retardation & Human Development, Yeshiva U) **Intervention programs for children at psychiatric risk: The contribution of child psychiatry and developmental theory.** In E. J. Anthony & C. Kouperek (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Discusses the necessary elements of mental illness prevention programs for children reared in severe and chronic poverty in which the programs are adapted to the theory of personality development based on a dynamic and structural interaction model. The parameters of a definition of psychiatric risk are discussed.

5766. Fazio, Anthony F. (U Wisconsin, Milwaukee) **The use of functional analysis techniques in bladder training associated with a flaccid neurogenic bladder condition: A case study.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 175-179.—Carried out a series of observations to discover possible exteroceptive stimuli controlling micturition in an adult male.

5767. Glaser, Edward M. & Backer, Thomas E. (Human Interaction Research Inst, Los Angeles, CA) **A look at participant-observation.** *Evaluation*, 1973, Vol 1(3), 46-49.—Discusses participant-observation as a clinical strategy for program evaluation research. 4 styles of participant-observation are described: (a) the complete participant, (b) the participant as observer, (c) the observer as participant, and (d) the complete observer. The advantages of continuous observation as a basis for providing constructive feedback to program staff are emphasized.

5768. Hunt, William A. & Bspalec, Dale A. (Loyola U, Chicago) **An evaluation of current methods of modifying smoke behavior.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 431-438.—While there is a wide range of the reported results of individual investigations it does seem possible to modify smoking behavior with some success. It is argued that preselection of Ss attenuates the reported success rates. Behind this preselection of Ss lies the variable of motivation, and it is noted that only those Ss who desire to quit enter treatment and that many of these drop out before completion. The major problem may be one of enticing smokers into treatment; the problem of therapy of choice may be a minor one once the smoker is motivated to change. Results of aversive conditioning, drug therapy, education and group support, hypnosis, behavior modification, and miscellaneous combined techniques are

surveyed. It is concluded that each investigator and technique is concerned with some elements of this complex, multivariate problem, but none encompasses all of them. (91 ref)—*Journal summary*.

5769. Loreto, Galdino. (U Federal de Pernambuco, Clínica Psiquiátrica de Faculdade de Medicina, Recife, Brazil) [Symposium about the diagnosis in psychiatry.] (Port) *Neurobiologia*, 1974(Jan), Vol 37(1), 83-104.—Among the conclusions reached by the members of a symposium on psychiatric diagnosis are (a) the strategy of therapeutic action in treating a mental patient must be based on a diagnostic synthesis of all findings concerning the patient; (b) despite the variety of pathological patterns of behavior, a diagnosis based on objective knowledge about the patient is possible; (c) because psychiatric diagnosis is difficult, training of psychiatrists must include not only acquisition of skills but also personal development; (d) a psychiatric diagnosis is formulated on the physician's own synthesis of all findings and on a translation of them into categories of an accepted table of diagnosis; and (e) 3 fundamental dimensions of psychiatric diagnosis include the syndrome, the etiological-pathogenetic constellation, and the personality. (25 ref)—*English summary*.

5770. Marchais, P. [Psychiatry and epistemology: The scientific orientation in psychiatry.] (Fren) *Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 565-576.—Discusses epistemological questions arising in modern science and their pertinence for clinical psychiatry. Psychiatry uses information from many sources, including sciences of different ages and levels of development; this renders it vulnerable to changes in thinking about the limits of validity of any of these sciences. The internal task for psychiatry—to integrate differing kinds of scientific information in order to understand the individual patient—is not made easier by epistemological shifts occurring outside psychiatry, in the sciences on which it is based in part.—*H. E. King*.

5771. Morrison, James R. (U California, San Diego) **Catatonia: Results of treatment.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5772. Penfold, Kathleen M. **Supporting mother love.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 464-467.—Discusses use of the nurse as a therapeutic intermediary in cases of separation of mother and infant. The psychological growth of a separated mother and infant is established and maintained by the nurse caring for the infant. A case history of an infant separated from his mother for repair of a congenital deformity illustrates this intermediary role of the nurse.

5773. Redick, Richard W.; Kramer, Morton & Taube, Carl A. (NIMH, Survey & Reports Section, Biometry Branch, Rockville, MD) **Epidemiology of mental illness and utilization of psychiatric facilities among older persons.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5774. Schoenrich, Edyth H. (Maryland State Dept of Health & Mental Hygiene, Services to the Chronically Ill & Aging, Baltimore) **The potential of health education in health services delivery.** *Health Service Reports*,

1974(Jan-Feb), Vol 89(1), 3-7.—Points out the increasing need for the health education of patients and the public in 4 areas: the relationship between health and exposure to hazardous agents, personal health maintenance, consumer rights, and patient compliance with instructions.

5775. Sidel, Victor W. & Sidel, Ruth. **Serve the people: Observations on medicine in the People's Republic of China.** Boston, MA: Beacon, 1973. xiii, 317 p. \$4.45.—Based on the author's visits in 1971 and 1972, the philosophy, development, methods, and facilities of the health care system in China are described. Health care in the cities and in the country, the role of the community and the patient in health care, medical education, the treatment of mental illness, and health administration and research are examined. (8% p ref)

5776. Turton, Lawrence J. (U Michigan, Inst for the Study of Mental Retardation & Related Disabilities) **Discussion summary: Early language intervention.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention.* Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Critically reviews articles by W. A. Bricker and D. D. Bricker (see PA, Vol 53:Issue 3) and K. B. Horton (see PA, Vol 53:Issue 3) on early language learning.

### Psychotherapy & Psychotherapeutic Processes

5777. Alexander, Leo. **Treatment of impotency and anorgasmia by psychotherapy aided by hypnosis.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 33-43.—Neocortical thought processes, such as concern with performance in the male or concern with pleasing the partner in the female, extinguish sexual responsivity by inhibiting paleocortical and hypothalamic activity on which sexual responsiveness depends. The psychotherapy of the resulting impotency in the male and anorgasmia in the female is effective when it succeeds in isolating and freeing the pleasurable feelings of sexual activity by inhibiting the neocortical concerns and interfering with goal directed thought processes.—M. V. Kline.

5778. Allen, John P.; Denney, Duane; Kendall, John W. & Blachly, Paul H. (US Air Force School of Aerospace Medicine, Brooks Air Force Base, San Antonio, TX) **Corticotropin release during ECT in man.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1225-1228.—Studied patterns of corticotropin (ACTH) secretion following single and multiple electrically induced convulsions in 7 psychiatric patients. The pattern of ACTH release during electroconvulsive therapy was similar to the pattern during other known physiological stresses. Serial seizures produced sustained high ACTH levels that fell to basal levels at the same rate as the fall after a single convulsion. (22 ref)

5779. Allison, Ralph B. **A new treatment approach for multiple personalities.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 15-32.—Reviews the treatments tried by many therapists during 14 yrs of treating a patient with 5 personalities. The effectiveness of treatments before and after the correct diagnosis was established are corrected.

5780. Balkin, Joseph. (John Jay Coll of Criminal Justice, City U New York) **Once more with feeling:**

**Moods before and after psychotherapy.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III.* Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5781. Balsam, Rosemary M. & Balsam, Alan. (Yale U, Medical School) **Becoming a psychotherapist: A clinical primer.** Boston, MA: Little, Brown & Co, 1974. xviii, 319 p.—Presents an introduction to the art and techniques of psychoanalytically oriented psychotherapy. How to evaluate the patient and how to develop a therapeutic relationship are discussed, with an emphasis on the therapist's own problems and how these are handled in relation to the patient. Special situations (e.g., suicidal patients) are also examined.

5782. Beahrs, John O. & Humiston, Karl E. **Dynamics of experiential therapy.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 1-14.

5783. Bojanin, Svetomir & Stojanović, Ljubinka. (Mental Health Inst, Belgrade, Yugoslavia) **[The problem of transference during treatment of adolescents by Desoille's method of psychotherapy.]** (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 37-40.

5784. Bordin, Edward S. (U Michigan) **Research strategies in psychotherapy.** New York, NY: John Wiley & Sons, 1974. ix, 272 p. \$16.95.—Presents overviews of methodological questions in evaluation strategies, process analysis, and the use of simplifications and analogs in psychotherapy, and current research evidence of the effectiveness of psychotherapy in terms of the type of patient, the type of therapist, the choice of intervention technique, and therapist-patient interactions. (35 p ref)

5785. Brooks, Linda. (U South Carolina, Counseling Bureau) **Interactive effects of sex and status on self-disclosure.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 469-474.—Rated the degree of self-disclosure of 40 male and 40 female undergraduates in interviews with either male or female interviewers of high or low status. A  $2 \times 2 \times 2$  analysis of variance revealed that (a) males disclosed more to females, while females disclosed more to males; (b) dyads containing a female resulted in more disclosure than all male dyads; (c) males revealed more to high-status interviewers, while females disclosed more to low-status interviewers; and (d) high- as opposed to low-status male interviewers elicited more disclosure from all Ss, while status of female interviewers resulted in no significant differences. The need for use of multiple measures in self-disclosure research and implications for client-therapist matching is noted.—*Journal abstract.*

5786. Burton, Arthur. (Private practice, Sacramento, CA) **Existential and humanistic theories: III. Application of theory.** In A. Burton (Ed), *Operational theories of personality.* New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Presents a case history to illustrate applications of some of L. Binswanger and R. D. Laing's concepts in therapy.

5787. Copeland, Adrian D. (Thomas Jefferson U, Medical School) **Textbook of adolescent psychopathology and treatment.** Springfield, IL: Charles C Thomas, 1974. viii, 141 p. \$9.75(cloth), \$6.95(paper).—Presents a textbook for practitioners and students from all fields dealing with emotionally disturbed youth. Among the



topics considered are aspects of normal adolescence, psychotherapeutic techniques for treating the problems and psychopathology of adolescence, and adaptational arrest in adolescent education and vocation.

5788. Cox, Murray. (London Hosp, England) **The psychotherapist's anxiety: Liability or asset? With special reference to the offender-patient.** *British Journal of Criminology*, 1974(Jan), Vol 14(1), 1-17.—Discusses therapist anxieties inherent in his relationship with offender-patients. The therapist must be aware of the psychodynamics within himself and his client. The relationship as it develops in 3 institutional settings, the appropriate strategy in each case, and therapist-staff interactions in each, are considered. (17 ref)

5789. Craig, Thomas J.; Huffine, Carol L. & Brooks, Marilyn. (Johns Hopkins U, Medical School) **Completion of referral to psychiatric services by inner city residents.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 353-357.—Analysis of the flow of 238 patients from an inner-city hospital psychiatric emergency service to 3 separate outpatient clinics disclosed the effects of structural barriers on the rate of completion of referral. Giving the patient, at the time of emergency room contact, an appointment for follow-up within 1 wk produced a threefold increase in completion over more traditional modes of referral. Variations in this general result between diagnostic groups and, to some extent, by sex and age suggest interaction between intrapersonal motivation for treatment and administrative barriers erected by treatment facilities. (32 ref)—*Journal abstract*.

5790. Danielsson, Clare. **Redemptive encounter: Its use in psychodrama, ancestral sociodrama and community building.** *Handbook of International Sociometry*, 1973, Vol 7, 71-83.—Discusses the nature of the therapeutic "encounter" and the settings where it may take place, of which the stage is the best because the stage makes the protagonist "develop responsibility as a cosmic man, not merely as a psychological or sociological being." The process of role reversal with the absent other is the process of redemption. For many people there are gaps in the past where relationships should have existed; the absent person needed for the therapeutic meeting needs to be rescued from oblivion. In psychodrama the past can be rewritten on the stage. 2 examples are described, one of familial redemption and one of ancestral redemption.—*R. J. Ambrosino*.

5791. DeLand, H. Brent. (Sangamon State U) **Reflections on auxiliary ego functioning.** *Handbook of International Sociometry*, 1973, Vol 7, 99-103.—Relates 3 personal experiences illustrating the role of the auxiliary ego in psychodrama. Comments on the function, attitude, and preparation of the auxiliary, as revealed by these experiences, are given.

5792. Ellis, Albert. (Inst for Advanced Study in Rational Psychotherapy, New York, NY) **Rational-emotive theory: Albert Ellis.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Describes the origins and concepts of rational-emotive therapy. It is stressed that a person's irrational beliefs and values are of critical importance in the creation of his disturbed behaviors. Teaching, training, modeling, and persuasion are considered

central to effective therapy. An illustrative case history is presented. (6 p ref)

5793. Engelhardt, H. Tristram. (U Texas, Medical Branch, Galveston) **Psychotherapy as meta-ethics.** *Psychiatry*, 1973(Nov), Vol 36(4), 440-445.—Examines values or ethics in psychotherapy and suggests that all psychotherapy, as all medicine, has a meta-ethical goal of removing hindrances to health and augmenting freedom. Health, the end goal of a curative process, is seen as personal autonomy.

5794. Felfel, Herman. (VA Outpatient Clinic, Los Angeles, CA) **Psychology and the death-awareness movement.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 6-7.—Psychology is becoming increasingly attentive to man's efforts to deal with death, which concerns people of all ages, including young children. Psychology must continue to confront it as part of the human condition. (25 ref)

5795. Feigenbaum, Elliott M. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Ambulatory treatment of the elderly.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

5796. Fine, Reuben. **My approach to psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 103-107.—Presents views based on 30 yrs of experience, touching on Freud, the problem of love in treatment, the attitudes of therapists, psychoanalysis, training and the outlook for the future. The medical model is criticized, and one consolidated profession is predicted for the future.

5797. Foulkes, S. H. **My philosophy in psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 109-114.—Discusses varied facets of psychotherapy, including psychoanalysis, transference, countertransference, group analysis, and the nature of the mind. Views are based on 40 yrs as a psychoanalyst, 25 as a training analyst.

5798. Frank, Jerome D. (Johns Hopkins U, Medical School) **Persuasion and healing: A comparative study of psychotherapy.** (Rev ed). New York, NY: Schocken, 1973. xx, 378 p. \$4.75.—Presents the revised edition of a 1960 work on the conceptual framework, procedures, and effectiveness of both psychotherapy as a whole and the various psychotherapeutic approaches. Topics include the historical roots of psychotherapy, nonmedical healing, religious revivalism and thought reform, experimental studies of persuasion, the placebo effect, individual and group therapy, and the therapeutic community. (23½ p ref)

5799. Frank, Jerome D. **My philosophy of psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 115-120.—Presents wide-ranging ideas based on more than 40 yrs experience. Topics include understanding patient communications, features of all psychotherapies, determinants of success, and the therapeutic personality. It is suggested that, by promoting a maladaptive value system, psychotherapy may be contributing to social ills rather than alleviating them.

5800. Gardner, G. Gail. (U Colorado, Medical Ctr) **Parents: Obstacles or allies in child hypnotherapy?** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 44-49.—Points out that the major obstacle to

successful child hypnotherapy is more often the attitude of the parents than that of the children themselves. Specific techniques are described for helping parents to accept the idea of hypnosis and to use various forms of active participation with the goal of becoming therapeutic allies.

5801. Hargreaves, William A. et al. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Treatment acceptance following intake assignment to individual therapy, group therapy, or contact group.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 343-349.—Studied factors relevant to the choice of individual therapy vs 2 types of group treatment. 366 applicants were randomly assigned to individual therapy, ongoing weekly therapy groups, or a daily nonappointment contact group. The immediate acceptance of this referral was judged by whether the applicant kept his 1st treatment appointment and, if he did, by client and therapist ratings following this 1st appointment. Results suggest that the initial acceptance of treatment could be improved by not initially assigning poorly motivated applicants to group therapy. Shy and distressed clients best accepted the daily nonappointment contact groups while the more articulate and outgoing client responded best to the more traditional ongoing weekly group. Clients assigned to the "wrong" type of group therapy showed poor acceptance of the referral, while the "correctly" referred group showed initial acceptance as great as comparable clients assigned to individual therapy.—*Journal abstract*.

5802. Harman, Robert L. (U Kentucky, Counseling Ctr) **Techniques of Gestalt therapy.** *Professional Psychology*, 1974(Aug), Vol 5(3), 257-263.—States that Gestalt techniques are inappropriate for therapists who prefer to be reflective and to maintain distance. A distinction is made between Gestalt exercises (activities with specific instructions) and experiments (more free-form explorations of emotions). Specific therapeutic techniques that promote the "here and now" focus of Gestaltism are described. It is cautioned that the therapist who relies solely on specific techniques becomes a technician and that there are other tasks for the Gestalt therapist than those described.—C. Wright.

5803. Horowitz, Mardi J. (U California, Medical School, San Francisco) **Microanalysis of working through in psychotherapy.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1208-1212.—Contends that selection of small segments of therapy for analysis is possible and should be encouraged because it focuses attention on low-level clinical inferences rather than on metapsychology. A method of microanalysis is presented that details the ideational structure of a conflict, views emotions as responses to incongruent ideas, describes the controlling operations motivated by these emotional responses, and indicates the sequential changes in conscious experience during a treatment episode. The microanalysis is illustrated by one episode—the composition of a poem during a session of psychoanalytically-oriented psychotherapy.—*Journal abstract*.

5804. Jachim, David P. (Family Service & Mental Health Clinic for McHenry Cty, IL) **The Social History Questionnaire as related to length of stay in psychotherapy.** *Journal of Clinical Psychology*, 1974(Oct), Vol

30(4), 446-449.—Constructed a Terminator-Remainer scale as an objective measure for identifying potential terminators and remainers prior to their entry into psychotherapy. Those items of the Social History Questionnaire (SHQ) that best differentiated between Terminator and Remainer groups were used in constructing the scale. Ss were 95 outpatients who had completed the SHQ and who were divided into 2 groups, Terminators and Remainers, according to their length of stay in therapy. Criterion groups of 23 patients each were selected and compared in terms of their responses to the SHQ. Of 393 items, 23 were found to differentiate between the 2 groups at the .05 level of significance. These 23 items then were combined into a subscale, and norms for the entire sample were established.—*Journal summary*.

5805. Jerotić, Vladeta. (Dragisa Misovic Hosp, Neuropsychiatric Div, Belgrade, Yugoslavia) [Influence of society on the formation of attitudes towards sexuality and aggressivity in the relation between psychotherapist and patient.] (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 49-52.

5806. Khan, Aman U.; Staerk, M. & Bonk, C. (Children's Memorial Hosp, Chicago, IL) **Hypnotic suggestibility compared with other methods of isolating emotionally-prone asthmatic children.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 50-53.—Carried out a study to determine the hypnotic suggestibility of a group of asthmatic children, to induce asthmatic attacks through hypnotic suggestion, and to compare hypnotic suggestibility with other methods of isolating emotionally-prone asthmatic children. Results contradict some of the earlier findings.

5807. Kosbab, F. Paul. **Imagery techniques in psychiatry.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 283-290.—Considers that hypnagogic or affective imagery is not an uncommon phenomenon; it is based on preconscious, preverbal "thinking in pictures" and characterized by symbol content, changing thematic scenes, motion, color perception, relative autonomy, and affective connotations. A brief historical overview on the topic is presented along with a concise procedural outline of one established clinical method (H. Leuner's), a didactic approach used by the author, and a discussion of some theoretical questions implied in these approaches. It is concluded that imagery techniques are a worthwhile addendum to the diagnostic-therapeutic armamentarium of the dynamically trained therapist for exploration and therapy of neurotic conflicts and related emotional difficulties. (41 ref)—*Journal abstract*.

5808. Lowen, Alexander. (Inst for Bioenergetic Analysis, New York, NY) **The body in personality theory: Wilhelm Reich and Alexander Lowen.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Discusses the unitary concept of therapy for somatic as well as psychic elements. The principles of bioenergetics and associated exercises are described, and an illustrative case history is presented.

5809. Lubrosky, Lester & Bachrach, Henry. (U Pennsylvania) **Factors influencing clinician's judgments of mental health: Eighteen experiences with the Health-Sickness Rating Scale.** *Archives of General Psychiatry*,



1974(Sep), Vol 31(3), 292-299.—A review of 18 studies using the Health-Sickness Rating Scale (HSRS), first published in 1962, supports its original promise. Reliability studies continue to show that clinicians can agree very well in judging mental health. The scale correlates with a variety of more time-consuming observer and patient scales, as well as with judgments of other similar concepts related to mental health. Several studies show that the initial level of the HSRS predicts measures of the outcome of psychotherapy. The HSRS ratings are influenced by the amount of information of the clinician, his relationship with the patient, his own experience, and his training in the use of the scale. (24 ref)—*Journal abstract*.

5810. **Lunde, Donald T.** (Stanford U, Medical School) **Eclectic and integrated theory: Gordon Allport and others.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Defines eclecticism and discusses the philosophical issues that it raises. Cultural, individual, and scientific factors that determine the appropriateness of a given theory for an individual are examined. Brief illustrative case histories are presented.

5811. **Ono, Osamu.** [Therapeutic camp with unsocial young children.] (Japn) *Japanese Journal of Child Psychiatry*, 1972(Sep), Vol 13(5), 323-331.—Summarized the significant findings of 5 summer camps conducted in the last 3 years. As a part of long-term therapy, 8-12 children 5-9 yrs old stayed for 3 days on a small island where their behavior during various activities was closely observed by the time-sampling method. No changes were observed during this short time in the children's relationships with each other or the staff. However, following the experience of children's separation from their family, parents reported improvement in their children's social behavior with playmates and family members, and less dependency. Meetings with parents, in preparation for the children's going to camp, developed into helpful group counseling. It is suggested that the therapeutic camp should become part of the community program for the prevention and early treatment of social and emotional problems in children. (English summary)—S. Ohwaki.

5812. **Oystragh, Philip.** **Hypnosis and frigidity.** *Journal of the American Society of Psychosomatic Dentistry & Medicine*, 1974, Vol 21(1), 10-18.—Discusses frigidity, its causes, types and treatment by hypnosis, utilizing automatic writing and abreaction.

5813. **Palazzoli, Mara S.** (Milan Ctr of Family Studies, Italy) **Self-starvation: From the intrapsychic to the transpersonal approach to anorexia nervosa.** (Trans A. Pomerans). London, England: Chaucer, 1974. x, 289 p. \$4.75.—Examines the essential characteristics of anorexia nervosa and its complex psychological dynamics. Detailed case histories are included, and a new conceptual model of the etiology and treatment of the disorder, based on general systems theory, communication, and cybernetics, is described. (37 p ref)

5814. **Pardes, Herbert; Papernik, Daniel S. & Winston, Arnold.** (State U New York, Downstate Medical Ctr, Brooklyn) **Field differentiation in inpatient psychotherapy.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 311-315.—Examined field differen-

tiation as a factor in the treatment of hospitalized patients. After measuring the differentiation of 60 therapists and patients with a portable rod-and-frame test, 3 categories were established: differentiated, undifferentiated, and middle. Differentiation of the therapist was significantly correlated with outcome as measured by length of stay in the hospital and likelihood of substantial clinical improvement. Further, a trend was manifested toward a correlation between therapist differentiation and likelihood of readmission. In contrast, the field differentiation of the patient seemed to have little impact on the outcome variables. The value of assigning specific therapist types to specific clinical populations where success is more likely is emphasized. (19 ref)—*Journal abstract*.

5815. **Peth, Peter R.** **Rational-emotive therapy and the older adult.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 179-184.—Holds that rational-emotive therapy (RET), as originated by A. Ellis, may provide a useful orientation towards understanding and dealing with certain psychoneuroses of late life. Certain myths about late life are presented, including beliefs that consanguinal relations are all-important, respect and support of others accrues automatically in late life, old age is a disease, to be idle or inactive is to be useless and dependent, and to be old is to be asexual. The basis of irrational beliefs in societal myths also is examined. It is felt that recognition of this type of myth may augment therapeutic understanding of the older adult.—A. Farrell.

5816. **Pickford, R. W.** **Aspects of art therapy.** *British Journal of Projective Psychology & Personality Study*, 1974(Jun), Vol 19(1), 16-20.—Describes 6 ways in which art material may serve the ends of psychotherapy: (a) spontaneous self-communication through which a person may reveal to himself the nature of his problems; (b) self-expression of conflicting needs and impulses, accompanied by sublimation and re-integration; (c) spontaneous appeal to persons other than psychotherapists; (d) indirect approach to various possible psychotherapists; (e) direct approach to a psychotherapist; and (f) therapeutic influence on other persons. Several illustrative case studies are presented.—*Journal summary*.

5817. **Powell, Thomas J.** (U Michigan) **Negative expectations of treatment: Some ideas about the source and management of two types.** *Clinical Social Work Journal*, 1973(Fal), Vol 1(3), 177-186.—Discusses the sources of the client's negative expectations of treatment. These may result from the projection of superego content, or from displacement of critical superego attitudes. Both situations are illustrated by clinical case examples. If the clinician presents himself as a benevolent figure and allies himself with the client's ideals and aspirations, then negative expectations should be offset.—S. R. Stein.

5818. **Presland, John.** **Helping the maladjusted child.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 31-40.—Reviews current research on medical and psychological methods of treating maladjusted children. While a psychological approach using behavior modification principles and teaching adjustment skills is more successful than treatment based on an illness model, radical changes in

child guidance will be required, emphasizing the role of the educational psychologist. (44 ref)

5819. **Pritchard, Warren.** **Mysticism and psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 141-145.—Proposes that the mystical is a necessary element of successful psychotherapy, which in part replaces religion and shamanism. The views of A. Huxley, W. Pahnke, C. Jung, J. Campbell, Freud and others are surveyed. It is noted that primitive tribes and great civilizations have rituals to help people prepare for death and other difficult thresholds of transformation. In modern Western culture, psychotherapy fills this role. LSD therapy in terminal illnesses is cited as an example of the mystical as part of psychotherapy.—A. Farrell.

5820. **Ricks, David F.** (City Coll, Psychological Ctr, City U New York) **Supershrink: Methods of a therapist judged successful on the basis of adult outcomes of adolescent patients.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5821. **Robertiello, Richard C.** **Fluctuations in ego states in "object relations" treatment.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 173-175.—Reports on states of symbiotic attachment, schizoid withdrawal, and healthy separation moves in cases involving schizoid patients.

5822. **Rogers, Carl R. & Wood, John K.** (Ctr for the Study of Persons, La Jolla, CA) **Client-centered theory: Carl R. Rogers.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Discusses the concepts and techniques of client-centered therapy. A process continuum of changes that evolve in therapy is outlined, and illustrative case histories are presented. (31 ref)

5823. **Rosenfield, Robert L.** (Wyer Children's Hosp, Chicago, IL) **Treating delayed puberty.** *Medical Aspects of Human Sexuality*, 1974(Aug), Vol 8(8), 142-160.—Discusses diagnostic, management, and therapeutic issues involved in cases of delayed puberty. Characteristics of delayed sexual maturation in males and females are described, and the relative advantages of psychotherapy and hormonal therapy are examined. Several case examples are included, together with commentaries by physicians and pediatricians.

5824. **Rowan, Peter J.** **Psychodramatic treatment of death fantasies in adolescent girls.** *Handbook of International Sociometry*, 1973, Vol 7, 94-98.—Applied psychodrama to death fantasies in a group of 6 girls 14-15 yrs old in a child care institution. Psychodrama was chosen because classic psychotherapy procedures had met with little success and because the girls had demonstrated a tendency to express their problems in action rather than talk about them. It was expected that psychodramatizing the death fantasy would free the creativity and spontaneity conserved by the death fantasy, and allow the girls to use spontaneity and creativity on a new level. 2 types of insight were gained by the participants: those that came about when the protagonist assumed the role of the missing significant other, and those that came about through the interaction of the protagonist with the auxiliary egos. Changes in the

girls' behavior, reported by their families and the institutional staff, are attributed to a considerable extent to the psychodrama experience.—R. J. Ambrosino.

5825. **Sandron, Leo.** (Metropolitan State Hosp, Norwalk, CA) **Psychodrama with hostile group members.** *Handbook of International Sociometry*, 1973, Vol 7, 29-36.—Describes the use of psychodrama in dealing constructively with hostility in groups. 4 case illustrations are presented in which hostility by a member or members of the group was encountered. Examples of overt, covert, verbal, and nonverbal hostility are discussed. It is important for the group director to establish a positive atmosphere during the early warm-up phase of each psychodrama by sharing himself and his own experiences. The role of the group director is summarized as that of an agent who demonstrates spontaneity, a sense of sharing, and humor.—R. J. Ambrosino.

5826. **Sauber, S. Richard.** **Approaches to pretherapy training.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 190-197.—Studied uses of pretherapy training to enhance successful therapy, stressing the therapeutic variables of attraction, openness, and readiness. 36 female patients who voluntarily sought help at a marriage counseling clinic were assigned to one of 4 experimental conditions: role induction training, vicarious pretherapy training, therapeutic reading, or control. Ss were university students seeking marital help for the 1st time. Role induction training was found to be the most effective, followed by vicarious pretherapy training. It is concluded that role induction training should be planned as a routine activity prior to the patient's 1st session with his therapist. (24 ref)—A. Farrell.

5827. **Saul, Sidney R. & Saul, Shura.** (Kingsbridge Heights Nursing Home, Bronx, NY) **Group psychotherapy in a proprietary nursing home.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 446-450.—Reports that a unique aspect of group and individual psychotherapy with elderly residents in a 200-bed proprietary nursing home was the involvement of the interdisciplinary team and the utilization of the therapy group as a tool to improve the total milieu of the setting. Parts of this process are discussed, including criteria for the selection of participants, the group process, differential uses of group therapy within different parts of the system, training of cotherapists, involvement of paraprofessionals and families, follow-through on treatment by other components of the system, and ongoing evaluation and change.—*Journal abstract*.

5828. **Savodnik, Irwin.** (Massachusetts General Hosp, Boston) **Understanding persons as persons.** *Psychiatric Quarterly*, 1974, Vol 48(1), 93-108.—Posits that American psychiatry has tended to divide into 2 camps—one seeking to understand persons as bodies and the other seeking to understand them in terms of a mechanistic mental life. It is argued that both these approaches, while rewarding in certain respects, fail in the quest of understanding persons as persons. Since psychiatry is rooted in this type of understanding, it is considered unfortunate that the division within its ranks should be along lines which confuse the major issue of psychiatry and obstruct the development of a systematic understanding of persons which is the major task of psychiatry. (21 ref)—*Journal abstract*.



5829. Scagnelli, Joan. (U North Carolina, Medical School) **A case of hypnotherapy with an acute schizophrenic.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 60-63.

5830. Schmideberg, Melitta. **My experience of psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 121-127.—Describes an early personal disillusionment with psychoanalysis and psychoanalysts. It is suggested that the condition of psychiatry and psychotherapy today can probably be compared to that of medicine several hundred years ago, containing a mixture of common sense, practical experience and superstitions, medications and manipulations, some more harmful than helpful. (17 ref)

5831. Schutz, William. **My philosophy of psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 129-131.—Presents in question and answer form the author's personal approach to psychotherapy, changes observed over time, the present state of the practice, and the role of psychotherapy in society.

5832. Slavson, S. R. **Concerning psychotherapy.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 132-140.—Discusses the task of psychotherapy, fitting treatment to personality needs, and the responsibility for improvement of society. Based on 4 decades of experience with a large number of patients, it is felt that no complete cure is possible for adults in any type of psychological therapy. Guidance and therapy for pupils with problems in public education is held to be of major importance.

5833. Sorrel, William E. **Basic concepts of transference in psychoanalysis.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 158-159.—Discusses the concepts of positive and negative transference and of positive countertransference in the patient-therapist relationship. The function of transference is explained, and the desired degree of transference at the beginning and end of therapy is considered.

5834. Strauss, John S. & Carpenter, William T. (U Rochester, School of Medicine & Dentistry) **Evaluation of outcome in schizophrenia.** In D. F. Ricks, A. Thomas & M. Roff (Eds.), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

5835. Thiemann, E. (Psychiatrische Klinik, Lüneburg, W Germany) **[Learning processes, motivational structures, and psychodynamics in mental patients: Guidelines contributing to the determination and mediation of therapeutic goals of learning.]** (Germ) *Nervenarzt*, 1972(May), Vol 43(5), 268-270.

5836. Ursano, Robert J. & Dressler, David M. (USAF Medical Ctr, Lackland, TX) **Brief vs. long term psychotherapy: A treatment decision.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 164-171.—Examined the treatment decision for brief psychotherapy in 99 cases evaluated in a community mental health center. The treatment decision was unaffected by the sociodemographic variables of the patients, but significantly affected by certain clinical, patient-clinician interactional, and institutional variables. Results do not support the concept of brief psychotherapy as supportive and long-term psychotherapy as explorative, but rather suggest a focal-nonfocal (multi-focal) model as accounting for

differences between brief and long-term psychotherapy. Implications for an institutional referral process are discussed. (27 ref)—*Journal abstract*.

5837. Walsh, Arthur C. & Walsh, Bernice H. (U Pittsburgh) **Presenile dementia: Further experience with an anticoagulant-psychotherapy regimen.** *Journal of the American Geriatrics Society*, 1974(Oct), Vol 22(10), 467-472.—Presents short histories of 10 42-71 yr old patients who responded well to combined anticoagulant-psychotherapy treatment. It is stressed that even in cases in which there is no significant improvement, the prevention of further deterioration is of great value. (16 ref)

5838. Warren, Neil C. (Ed.). **After therapy what? Lay therapeutic resources in religious perspective: The Second John G. Finch Symposium on Psychology and Religion.** Springfield, IL: Charles C Thomas, 1974. 205 p. \$11.75.—Presents a collection of 9 lectures and symposium papers on the relationships between psychotherapy and the Christian faith. Topics include the diffusion of therapeutic agency, the human potential and evangelical hope, and a psychological interpretation of T. C. Oden's theological substructure.

5839. Weisz, Stephen R. **The use of drama in therapy with psychotic patients.** *Journal of Pastoral Care*, 1974(Jun), Vol 28(2), 134-135.—Describes the involvement in a Christmas play of patients in a locked, chronic psychotic ward. Drama was used as a medium to develop a sense of community regardless of individual emotional turmoil.

5840. Wexler, David A. & Rice, Laura N. (Eds.). (U California, Medical School, San Francisco) **Innovations in client-centered therapy.** New York, NY: John Wiley & Sons, 1974. xi, 517 p. \$22.50.—Presents a collection of 15 papers on the theory, practice, and applications of client-centered counseling and psychotherapy. Topics include a cognitive theory of self-actualization, experiencing, and therapeutic process; measuring openness to experience in psychotherapy; the evocative function of the therapist; and Rogerian concepts in encounter groups.

5841. Zelig, Jeffrey K. **Hypnotherapy techniques with psychotic in-patients.** *American Journal of Clinical Hypnosis*, 1974(Jul), Vol 17(1), 56-59.—Discusses hypnotherapy techniques used with psychotic inpatients at a residential treatment center for adults.

### Drug Therapy & Drug Rehabilitation

5842. Adamson, L. et al. (E. R. Squibb & Sons, Ltd, Twickenham, England) **Fluphenazine decanoate trial in chronic in-patient schizophrenics failing to absorb oral chlorpromazine.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 181-191.—Ratings on the Brief Psychiatric Rating Scale indicate that inpatient schizophrenics whose plasma levels indicated nonabsorption of orally-administered chlorpromazine responded significantly better to intramuscularly administered fluphenazine decanoate.

5843. Albaugh, Bernard J. & Anderson, Philip O. (US Public Health Service Indian Hosp, Clinton, OK) **Peyote in the treatment of alcoholism among American Indians.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1247-1250.—Examined the development and

effectiveness of a treatment program for alcoholism among American Indians. This program offers the alcoholic Indian both occupational and cultural therapy, including participation in the services of the Native American Church (peyote meetings). During these meetings, participants often ingest peyote (mescaline), which, like LSD, facilitates cathartic expression and enhances suggestibility. Although peyote meetings are not a cure for alcoholism, they do offer some specific advantages in the treatment of the unique problems of the Indian alcoholic. (20 ref)—*Journal abstract*.

5844. Ambrosino, Salvatore V. (State U New York, Medical School, Stony Brook) **Depressive reactions associated with reserpine.** *New York State Journal of Medicine*, 1974(May), Vol 74(5), 860-864.—Reviews the literature regarding potentially dangerous side effects of reserpine and presents 5 case histories. Studies indicate such factors as higher incidence of dose-related depression in patients treated for hypertension with rauwolfia or reserpine. Although many of the patients who developed depressive reactions had a history of depression, others had no history of previous psychiatric disorder. Depressive reactions also appear to be related to personality type as well as to dosage and duration of treatment. (21 ref)—*W. L. Hunt*.

5845. Anderson, William H. & Kuehnle, John C. (Massachusetts General Hosp, Boston) **Strategies for the treatment of acute psychosis.** *JAMA: Journal of the American Medical Association*, 1974(Sep), Vol 229(14), 1884-1889.—Discusses the management of acute-onset psychosis. The cornerstone of appropriate initial management is the timely use of high-potency antipsychotic chemotherapy. Under such a regimen, the psychosis may show substantial remission within a few hours. Hospital treatment may thus be averted, obviating the problems of social opprobrium, pessimism, and high cost. Inpatient treatment is necessary if the patient is suicidal or homicidal, if there is question of delirium, if there is no viable family or social support, or if the psychosis does not clear rapidly. Subsequent careful follow-up is required to avoid the pitfalls of reactivated psychosis and medication excessive in dose or duration. (16 ref)—*Journal abstract*.

5846. Ban, T. A. et al. (McGill U, Div of Psychopharmacology, Montreal, Quebec, Canada) **A transcultural study with clomacran: Comparison of two assessment methods.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 971-989.—Clomacran, the chlorpromazine analog of the acridane series, was therapeutically effective in the treatment of 10 Canadian and 10 Mexican newly admitted schizophrenic patients. There was essentially no difference in the sensitivity of the 2 assessment methods (i.e., the Brief Psychiatric Rating Scale and the Psychopathological Assessment Scale) as far as therapeutic changes were concerned. While no difference between the sensitivity of the 2 methods for assessing therapeutic changes was seen, there were indications that for the description of psychiatric patient populations the Psychopathological Assessment Scale is more sensitive than the Brief Psychiatric Rating Scale. (15 ref)—*Journal abstract*.

5847. Bourgeois, M. [Insulin suicide: A new case of massive injection of insulin by a diabetic.] (Fren)

*Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 631-640.—Although the suicide rate for diabetic patients is well below that for the general population, self-destruction does occur. In rare instances it takes the form of manipulating the therapy either actively and directly (self-damage) by altering the treatment drastically, or passively and indirectly (suicide equivalent) by resignation and giving up a treatment regime adequate to control the condition. A single case of attempted suicide by the massive injection of insulin (400 units) is described, and the techniques of its management are used as an outline for discussing emergency therapeutics, the hypoglycemic coma, and posthypoglycemic encephalopathy.—*H. E. King*.

5848. Brauzer, B.; Goldstein, B. J.; Steinbook, R. M. & Jacobson, A. F. (U Miami, Medical School) **The treatment of mixed anxiety and depression with loxapine: A controlled comparative study.** *Journal of Clinical Pharmacology*, 1974(Aug-Sep), Vol 14(8-9), 455-463.—Conducted a double-blind study of the effects of loxapine succinate in nonpsychotic outpatients exhibiting anxiety and depression symptoms. 115 Ss 21-65 yrs old received either 10-100 mg chlordiazepoxide, 2-20 mg loxapine, or placebo for 4 wks. Ss completed the Brief Psychiatric Scale and the Profile of Mood Status Scale. Blood counts, urinalysis, blood urea nitrogen, serum glutamic oxaloacetic transaminase, alkaline phosphatase, and bilirubin were assessed before and after treatment. Results indicate that loxapine was more effective in reducing the pathology. Chlordiazepoxide was significantly more effective than placebo. Side effects were mild to moderate, and occurred significantly more often in the loxapine-treated Ss.—*P. Federman*.

5849. Brien, Robert L.; Hough, Frederick & Braun, Philip R. (Temple U) **Drug dependency, acting-out and the hand test.** *Corrective & Social Psychiatry & Journal of Behavior Technology Methods & Therapy*, 1974(Sum), Vol 20(3), 28-30.—Administered the Hand Test to 30 active drug addicts, 23 chemotherapeutically maintained methadone patients, and 30 professional staff members of an inner-city nonresidential addictive treatment agency. Raw scores were obtained for 11 scoring classes (e.g., Aggression, Fear, Communication, Cripple, and Dependence) and Acting-Out Ratios (AORs) were computed. There was a significant difference in AORs between all groups ( $p < .01$ ), with addicts higher than staff and the maintenance sample, and the staff higher than the maintenance sample. Significant differences in individual components of the AOR and in the Cripple class were also noted. There was a general tendency toward overt Aggression and acting-out on the part of addicts (Aggression,  $p < .05$ ) and toward a pathological passivity in the maintenance group (Dependence,  $p < .01$ ), with significance between addicts and maintenance group ( $p < .01$ ) and between staff and maintenance groups ( $p < .05$ ). There were no significant Dependence differences between addicts and staff.—*J. Sorokac*.

5850. Charalampous, K. D.; Freemesser, G. F. & Smalling, Kathryn F. (Baylor Coll of Medicine, Houston, TX) **A double-blind controlled study of loxapine succinate in the treatment of anxiety neuroses.** *Journal of Clinical Pharmacology*, 1974(Aug-Sep), Vol 14(8-9), 464-469.—Studied the effects of loxapine in treating



anxiety neuroses in a double-blind, placebo-controlled design. Ss were 60 adult anxiety diagnosed outpatients divided equally into 3 groups, receiving either loxapine, doxepin, or placebo for 4 wks. Laboratory tests included CC, urinalysis, blood urea nitrogen, and liver function, bilirubin, serum glutamic oxaloacetic transaminase, serum glutamic pyruvic transaminase, and alkaline phosphatase. Clinical tests included the Brief Psychiatric Rating Scale, Hamilton Anxiety Scale, and the Symptom Check List. There were no significant differences in improvement among the 3 groups. 34 Ss experienced side effects, mostly mild to moderate. It is suggested that in anxiety diagnosed patients, many nonspecific variables are confounded with the main treatment variable studied. Larger sample sizes may be necessary to distinguish differences due specifically to pharmacotherapy. (18 ref)—*P. Federman*.

5851. Claghorn, James L. (Texas Research Inst of Mental Sciences, Houston) **A double-blind comparison of pimozide vs. trifluoperazine in schizophrenic outpatients.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 1005-1009.—While pimozide did not achieve therapeutic superiority in a clinical trial with 87 chronic schizophrenic outpatients, it performed as well as trifluoperazine in relieving schizophrenic symptomatology. Pimozide caused few side effects and was effective at low doses. It is noted that extrapyramidal symptoms cause some patients to resist or discontinue treatment, a situation which often results in their hospitalization. For this reason an effective neuroleptic which produces few side effects, such as pimozide, is concluded to be a valuable addition to available therapeutic drugs. —*Journal abstract*.

5852. Covi, Lino & Alessi, Larry. (Johns Hopkins U, Medical School, Div of Clinical Psychopharmacology Research) **Pharmacological treatment of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Based on a pathogenetic viewpoint, the use of psychotropic medication in the treatment of personality disorders is discussed. Specific disorders described include alcoholism, drug addiction, sexual deviance, hyperkinetic syndromes, and behavior disorders of old age. The importance of combining pharmacological therapies with other treatment modalities is emphasized. (63 ref)

5853. de Buck, R.; Titeca, R. & Pelc, I. (U Brussels Hosp, Inst of Psychiatry, Research Unit of Clinical Psychopharmacology, Belgium) **[Controlled study of anetholtrithione (Sulfarlem) on psychotropic drug-induced xerostomia.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 510-519.—Administered anetholtrithione or placebo to 30 patients on neuroleptic and 30 on antidepressant medication in a double-blind procedure. The drug was effective in overcoming dryness of the mouth, and in some cases constipation. (Dutch, English, German, Italian, & Spanish summaries)

5854. Ekblom, B. & Haggstrom, J. E. (Ullerakers Hosp, Psychiatric Clinic, Uppsala, Sweden) **Clozapine (Leponex) compared with chlorpromazine: A double-blind evaluation of pharmacological and clinical properties.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 945-957.—Clozapine was compared with chlorproma-

zine in a clinical study with 41 inpatients with acute schizophrenia or exacerbated chronic schizophrenia of the paranoid-hallucinatory or catatonic type. The Brief Psychiatric Rating Scale, laboratory tests, a study of side effects, and a blind final subjective global evaluation were used to analyze the results. The clinical effects of clozapine appeared to be at least fully comparable with those of chlorpromazine. Neither of the 2 drugs caused any extrapyramidal side effects. Counted in milligrams, the optimum dose of clozapine was somewhat lower than that of chlorpromazine. It is concluded that clozapine appears to be an interesting and useful drug, provided that the freedom from serious side effects is confirmed in larger studies. (21 ref)—*Journal abstract*.

5855. Fabre, L. F. & Harris, R. T. (U Texas, Medical School, Houston) **Pilot open-label study on U-31,889 in anxious in-patients.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 1010-1013.—15 inpatients, diagnosed as experiencing anxiety neurosis of sufficient severity to require hospitalization, were treated with U-31,889 in an uncontrolled, open-label study. Anxiety symptoms were considerably ameliorated by the 1st period of evaluation which occurred after 11 days of treatment, and this improvement persisted throughout the 21-day study period. Side effects were negligible. Ophthalmologic examination, electrocardiogram, and hematologic, liver, kidney, and cardiac function, as determined by routine laboratory examination, were unaltered by U-31,889. —*Journal abstract*.

5856. Fann, William E.; Lake, C. Raymond & Majors, L. Frank. (Duke U, Medical Ctr) **Thioridazine in neurotic, anxious, and depressed patients.** *Psychosomatics*, 1974, Vol 15(3), 117-121.—Studied 59 Ss with symptoms of neurotic anxiety and depression in a double-blind, placebo-controlled treatment program. Thioridazine was significantly superior to placebo in alleviating symptoms of depression and anxiety. Side effects were mild, occurred only in a few Ss, and none had to discontinue the treatment. Thioridazine appears to be safe and effective in treating mild to moderate anxiety and depression. (52 ref)—*Journal abstract*.

5857. Goldberg, Harold L.; Finnerty, Richard J.; Nathan, Leon & Cole, Jonathan O. (Boston State Hosp, West-Ros-Park Mental Health Ctr, MA) **Doxepin in a single bedtime dose in psychoneurotic outpatients.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 513-517.—Assigned 41 psychoneurotic outpatients with mixed anxiety/depression and resultant sleep disturbances to receive either doxepin hydrochloride (50-300 mg/day) or a placebo at bedtime in a double-blind study for 4 wks. Scales used were the Lipman-Rickels Scale, the Psychiatric Outpatient Mood Scale, the Hamilton Anxiety Scale, and the Finnerty-Goldberg Sleep Evaluation Scale. Results indicate that doxepin, given at bedtime, was significantly more effective than a placebo in treating mixed anxiety/depression, as shown by all 3 psychiatric rating scales used and by overall evaluation, even when the improvement is controlled for pretreatment correlates of improvement. The prediction model indicated that Ss with higher occupational levels, more severe Hamilton mental rating, and less severe Hamilton behavior rating were more likely to improve. Bedtime dosing accelerated the antidepressive effect of doxepin

while yielding significant improvement in sleep patterns.

—*Journal abstract.*

5858. Gould, Leroy C. & Kleber, Herbert D. (Connecticut Mental Health Ctr. Drug Dependence Unit, New Haven) **Changing patterns of multiple drug use among applicants to a multimodality drug treatment program.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 408-413.—Reports an analysis of changing patterns of multiple drug use among 1,665 applicants to the Drug Dependence Unit of the Connecticut Mental Health Center during 1970-1973. The analysis, which subdivides applicants into 4 time cohorts according to when they began using drugs (before 1964, 1966, 1969, and 1972), discloses that polydrug abuse, if this means using a number of drugs, is not a new phenomenon and does not appear to be increasing. The use of heroin, however, and to some extent cocaine, has declined, as has also the association between heroin use and the use of other drugs. If this trend continues, treatment may be more difficult since nonopiate users are more difficult to treat separately. (20 ref)—*Journal abstract.*

5859. Guyot, M. P. [The action of dipotassium chlorazepate associated with insulin in the treatment of certain depressive states.] (Fren) *Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 627-630.—The chance observation of an excellent therapeutic response to a novel medication used with an aged patient, whose agitated depression was not relieved by the major antidepressants, has led to its trial use in a larger clinical series including depressions of varied kinds. The history of the 1st patient showed that a partial positive response had been obtained, a year earlier, to a similar agitated state upon intramuscular injection of dipotassium chlorazepate. In view of her age (81 yrs), and extremely poor nutritional state, a mild dose of insulin was added to the chlorazepate, with the hope of improving alimentation. The positive response, rapidly obtained, has led to the hypothesis that small amounts of insulin (5 units), although too insubstantial to have any direct action, might facilitate the basic action of antidepressive medications. 70% of 70 patients, with clinically differing depressive states, treated with 90 mg chlorazepate combined with 5 units of insulin (injected intramuscularly) showed a positive response within 3 wks. Individual responses varied from apparently complete recovery to an elective sedation of the moral pain observed in patients suffering a punishing religious delusion. Further experimental trials are needed, especially as intramuscular injection of chlorazepate rapidly becomes painful and an equivalent dose-maintenance by oral medication has not yet been established.—*H. E. King.*

5860. Haskell, David S.; McNair, Douglas M.; Fisher, Seymour & Kahn, Richard J. (Boston U. Medical School) **A controlled outpatient trial of perphenazine-amitriptyline and chlorpromazine.** *Journal of Clinical Pharmacology*, 1974(Oct), Vol 14(10), 536-542.—Tested the hypothesis that treating both anxiety and depression in patients displaying both symptoms would be more beneficial. Evaluation measures included the treatment of anxiety only. The effects of perphenazine-amitriptyline (tranquilizer) and chlorpromazine (antidepressant) were compared in 33 nonpsychotic outpatients over a 4-wk period in a double-blind design. Minimal drug differences were

found. Small but consistent trends favored the combination agent. The combination was significantly less beneficial in Ss with coexisting depression. A high incidence of drowsiness was observed with both drugs.—*P. Federman.*

5861. Helser, Jon F. & Wilbert, Donald E. (U California, Medical School, Irvine) **Reversal of delirium induced by tricyclic antidepressant drugs with physostigmine.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1275-1277.—Reports that 2 mg of physostigmine given intramuscularly was effective in reversing acute brain syndromes in 2 patients who had ingested toxic doses of drugs with anticholinergic properties (amitriptyline alone and an amitriptyline-perphenazine combination). Physostigmine also controlled 1 patient's tachycardia and tachypnea. Physostigmine may not control toxic effects of anticholinergic drugs when these effects are not mediated through cholinergic blockade. (21 ref)—*Journal abstract.*

5862. Hollister, Leo E. et al. (VA Hosp, Palo Alto, CA) **Protirelin (TRH) in depression.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 468-470.—Evaluated protirelin (thyrotrophin releasing hormone) as a treatment in depression in 2 independent investigations. Regardless of when protirelin was given in the course of depression, or how the course of the illness was measured, it seemed to be devoid both of therapeutic and of major adverse effects.

5863. Hollister, Leo E. & Overall, John E. (VA Hosp, Palo Alto, CA) **Evaluations of pharmacotherapy in cooperative studies.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5864. Jus, A. et al. (Hôpital St Michel-Archange, Research Div, Quebec, Quebec, Canada) **Penfluridol: A long-acting oral neuroleptic as therapeutic agent in chronic schizophrenia.** *Current Therapeutic Research*, 1974(Oct), Vol 16(10), 1041-1058.—Investigated the effect of penfluridol treatment on 39 chronic schizophrenic inpatients. There were 2 stages of patient management—an open stage of 20 wks and a double-blind stage of 12 wks. Results show that (a) penfluridol maintained the level of improvement previously achieved by other short-acting neuroleptic drugs; (b) the drug produced further improvement, especially of social adaptation and activity; and (c) the incidence of extrapyramidal symptoms was significantly lower in comparison with that occurring during neuroleptic treatment before the study and during thioridazine treatment in the double-blind stage.—*M. E. Pounsel.*

5865. Knee, Steven T. & Razani, Javad. (U Southern California, Medical School) **Acute organic brain syndrome: A complication of disulfiram therapy.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1281-1282.—Reviewed 243 consecutive admissions over a 3-mo period to a general psychiatric ward for the presence of acute organic brain syndrome in patients being treated with disulfiram for chronic alcoholism. 5 cases were identified. Treatment recommendations are presented.

5866. Kochar, Mahendra S. et al. (Medical Coll Wisconsin) **Dose-related alterations in metabolism of levodopa: Possible mechanism for hypertensive effect.**



*Journal of Clinical Pharmacology*, 1974(Aug-Sep), Vol 14(8-9), 448-454.—Studied metabolism of levodopa in 23 patients with Parkinsonism who received different doses of the drug. Dosages varied among Ss from 400-3,000 mg/day. Ss received a low 3-methoxy-4-hydroxymandelic acid (VMA) diet and no antidepressant or antihypertensive medication. 24-hr urine collections were analyzed for the excretion of levodopa, dopamine, dopac, homovanillic acid (HVA), norepinephrine plus epinephrine, metanephrines, and VMA. The quantities of urinary dopamine, dopac, and HVA varied directly with the dose of levodopa; the others increased as the dose of levodopa was increased. The ratio of dopac + HVA to dopamine, which reflects monoamine oxidase activity in the dopamine metabolic pathway, did not change significantly with differing doses of levodopa. A negative correlation was found between the dose of levodopa and the ratio of VMA to norepinephrine + epinephrine + metanephrines, which reflects monoamine oxidase activity in the norepinephrine + epinephrine metabolic pathway. Blood pressure was significantly lower in Ss receiving larger doses of levodopa. Results suggest that large quantities of dopamine formed as a result of high doses of levodopa act as a competitive inhibitor of monoamine oxidase relative to its other substrates.—P. Federman.

5867. Kollivakis, Thomas; Azim, Hassan & Kingstone, Eddie. (Allan Memorial Inst, Montreal, Quebec, Canada) A double-blind comparison of pimozide and chlorpromazine in the maintenance care of chronic schizophrenic outpatients. *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 998-1004.—51 chronic schizophrenics who had been stabilized on neuroleptic medication were transferred to sustained-release chlorpromazine or pimozide under double-blind conditions. Both drugs demonstrated effectiveness not only in maintaining adequate control of the patients' symptomatology, but also in eliciting further remission of the manifestations of their psychosis. Of particular interest was the effectiveness of pimozide for the reduction or elimination of emotional withdrawal. The type and incidence of side effects were similar for both drug groups. Results indicate that both sustained-release chlorpromazine and pimozide provide optimal therapeutic effectiveness at the convenient once-a-day administration schedule.—*Journal abstract*.

5868. Kutt, Henn & Penry, J. Kiffin. (Cornell U, Medical Coll, New York) Usefulness of blood levels of antiepileptic drugs. *Archives of Neurology*, 1974(Nov), Vol 31(5), 283-288.—Considers that monitoring blood levels of patients receiving antiepileptic drugs facilitates individualization of dosage regimens, reveals irregular drug intake, and identifies the responsible agent in intoxicated patients on multiple drug therapy. Effective and toxic blood level ranges, as well as the range of levels expected with a given dose, are presented for the major antiepileptic drugs, including diphenylhydantoin, phenobarbital, primidone, ethosuximide, and carbamazepine. (65 ref)

5869. Lal, Samarthji & Ettigi, Prakash. (Queen Mary Veterans' Hosp, Montreal, Quebec, Canada) Comparison of thiopropazate and trifluoperazine on oral dyskinesia: A double blind study. *Current Therapeutic*

*Research*, 1974(Sep), Vol 16(9), 990-997.—Thiopropazate (30 mg/day) has been compared with trifluoperazine (15 mg/day) and with placebo in 12 53-88 yr old male inpatients with oral dyskinesia in a double-blind cross-over study. A double placebo technique and videotape assessment of patients were used both at rest and during a maze test. Thiopropazate had a significant antidyskinetic effect compared with placebo. There was no difference in effect between thiopropazate and trifluoperazine in 8 patients who completed the study.—*Journal abstract*.

5870. Leeton, John. (Monash U, Queen Victoria Memorial Hosp, Melbourne, Vic, Australia) Depression induced by oral contraception and the role of vitamin B6 in its management. *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 85-88.—Pharmacological depression may be induced in approximately 1 in 15 women taking oral contraception. This depression is possibly related to an upset in tryptophan metabolism which is shunted from the 5-hydroxytryptamine pathway to the kynurine pathway. The resulting depressive syndrome may be suppressed by vitamin B6 therapy in those women who have an absolute vitamin B6 deficiency. As laboratory confirmation of this deficiency is difficult, a safe daily dose of 50 mg vitamin B6 can be given empirically to all women complaining of depressive symptoms while taking oral contraception. (22 ref)—*Journal abstract*.

5871. Lund, Lars. (Karolinska Hosp, Stockholm, Sweden) Anticonvulsant effect of diphenylhydantoin relative to plasma levels: A prospective three-year study in ambulant patients with generalized epileptic seizures. *Archives of Neurology*, 1974(Nov), Vol 31(5), 289-294.

5872. Matta, B. et al. (U Puerto Rico, Medical School, Clinical Pharmacology Unit) Comparison of triazolam, flurazepam and placebo as hypnotic agents in pre-surgical patients. *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 958-963.—Triazolam was better than placebo on 4 parameters: onset of sleep, duration of sleep, nocturnal awakenings, and quality of sleep. Flurazepam was better than placebo on nocturnal awakenings and quality of sleep. Triazolam was superior to flurazepam in sleep onset. Drug side effects were minimal and not significantly different from those with placebo.

5873. Mendles, J. & Frazer, A. (VA Hosp, Philadelphia, PA) Alterations in cell membrane activity in depression. *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1240-1246.—Findings from a review of the literature and a series of related experiments led to a working hypothesis suggesting that there may be an abnormality in aspects of cell membrane properties that normally regulate the movement of electrolytes across the plasma membrane in a subgroup of depressed patients. These patients appear to be responsive to lithium, and there is evidence that the postulated abnormality may be genetically determined. The potential usefulness of the erythrocyte as a model for studying electrolyte transport in neurons is discussed. (62 ref)—*Journal abstract*.

5874. Nieto, Dionisio. (National Autonomous U, Mexico City, Mexico) [The multidrug (polypharmacy)]

problem and the choice of psychoactive drugs.] (Span) *Archivos de Neurobiologia*, 1972(May), Vol 35(3), 197-204.—Analyzes the problems of drug use in contemporary psychiatry. Most patients have to be on drugs for long periods of time. Many drugs interact with metabolic processes and interfere with the normal functioning of the organism. When several drugs are given at the same time, the effect on the patient may be altered. Combinations of drugs should be avoided because contemporary pharmacology does not know enough about potential reactions to them. A few instances of beneficial combinations are presented.—*R. Ardila*.

5875. Nistico, G.; Ragozzino, D. & Marano, V. (U Naples, IInd Faculty of Medicine, Italy) **A comparative study of penfluridol and flupentixol in the treatment of chronic schizophrenia.** *Journal of Clinical Pharmacology*, 1974(Aug-Sep), Vol 14(8-9), 476-482.—Conducted a placebo-controlled experiment with 40 male chronic schizophrenics 23-60 yrs old, divided randomly into 2 groups of 20 each. 10 Ss in Group 1 received penfluridol for 6 wks (doses adjusted for each S to find the optimum therapeutic level) the other 10 received placebo. In Group 2, 10 Ss received penfluridol and 10 received flupentixol for 6 wks. Wing's rating scale was used for clinical assessment. Penfluridol was more effective than placebo. No difference was found between penfluridol and flupentixol, except that antipsychotic activity started after 2 wks of treatment with flupentixol and after 4 wks of treatment with penfluridol. This suggests that the former drug may be better for attack therapy with chronic schizophrenia, whereas the latter drug seems more suitable for maintenance therapy with long-lasting activity. Both drugs decreased autistic withdrawal, increased the degree of socialization and initiative and the use of more coherent language, and decreased certain behavioral disorders. (21 ref)—*P. Federman*.

5876. Ota, K. Y.; Kurland, A. A.; Rocha, J. & Block, B. A. (Spring Grove Hosp Ctr, Maryland Psychiatric Research Ctr, Catonsville) **A comparison of the relative clinical efficacy of two chlorpromazine (CPZ) preparations.** *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 1014-1021.—Compared the pharmacological efficacy of 2 brands of chlorpromazine, A and B, in 25- and 200-mg tablets. 71 adult hospitalized chronic psychotic patients, who had been treated with B (the standard chlorpromazine) as routine hospital treatment, were selected in terms of physical condition, previous dosage level of medication, and present psychiatric condition. After a baseline observation period of a few weeks, during which time they received placebo, the patients were randomly assigned under double-blind conditions to either chlorpromazine A or B, and maintained on their medications for 6 wks, at which time the crossover of chlorpromazine A and B took place. Analysis of data revealed that the clinical therapeutic actions of both chlorpromazine A and B were similar in terms of psychiatric ratings, laboratory tests, and adverse reactions.—*Journal abstract*.

5877. Overall, John E. (U Texas, Medical Branch, Galveston) **The Brief Psychiatric Rating Scale in psychopharmacology research.** In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychophar-*

*macology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5878. Overall, John E.; Hollister, Leo E. & Pokorny, Alex D. (U Texas, Medical Branch, Galveston) **Alcohol history in drug treatment.** *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 175-180.—Based on ratings of patients in 2 separate studies using the Brief Psychiatric Rating Scale and the Factor Construct Rating Scale, it is concluded that patients with the syndrome of mixed anxiety and depression respond differently to phenothiazines and benzodiazepines depending on their prior history of alcohol abuse. Patients with alcohol abuse histories responded better to the phenothiazines (acetophenazine and mesoridazine) and also generally had symptoms of longer duration. Patients without histories of alcohol abuse responded best to the benzodiazepines (diazepam and chlordiazepoxide), and their symptoms had a less chronic course. Results emphasize that treatment of depressed patients with drugs should not be an automatic reflex based on the type of depressive syndrome, but should also be based on relevant history variables such as alcohol abuse.

—*Journal summary*.

5879. Page, John G. et al. (Abbott Lab, Pharmaceutical Products Div, N Chicago, IL) **Pemoline (Cylert) in the treatment of childhood hyperkinesia.** *Journal of Learning Disabilities*, 1974(Oct), Vol 7(8), 498-503.—Conducted a controlled, double-blind study using pemoline and placebo in the management of hyperkinetic behavior associated with minimal brain dysfunction. 413 6-12 yr old children were evaluated in terms of the drug's safety, of whom 238 were rated on the drug's efficacy. Improvement in gross behavior as measured by parent, teacher, and physician global evaluations, as well as improvement in cognitive and perceptual function as measured by psychological tests, was recorded for the pemoline group. This was achieved with minimal side effects on a once-daily dosage regimen, indicating that pemoline is a highly useful clinical alternative to the amphetamines and methylphenidate as an adjunct in the management of hyperkinetic behavior.—*Journal abstract*.

5880. Pakkenberg, H. & Fog, R. (Kommunehospitalet, Copenhagen, Denmark) **Spontaneous oral dyskinesia: Results of treatment with tetrabenazine, pimozide, or both.** *Archives of Neurology*, 1974(Nov), Vol 31(5), 352-353.—Reports the treatment of 16 patients with tetrabenazine, pimozide, or both. Oral dyskinesia was eliminated by both drugs. If the hyperkinesia reappears, the 2 drugs in combination can be permanently efficient.

5881. Pauling, Linus. (Linus Pauling Inst of Science & Medicine, Menlo Park, CA) **On the orthomolecular environment of the mind: Orthomolecular theory.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1251-1257.—Defines orthomolecular psychiatry as the achievement and preservation of good mental health by the provision of the optimum molecular environment for the mind, especially the optimum concentrations of the substances normally present in the human body (e.g., vitamins). There is sound evidence for the theory that increased intake of such vitamins as ascorbic acid, niacin, pyridoxine, and cyanocobalamin is useful in treating schizophrenia. The negative conclusions of a recent report by the American Psychiatric Association



on megavitamin and orthomolecular therapy are felt to result not only from faulty arguments and from a bias against megavitamin therapy but also from a failure to deal fully with orthomolecular therapy in psychiatry. Comments by 3 psychiatrists follow Pauling's presentation. (35 ref)—*Journal abstract*.

5882. Pichot, P. & Olivier-Martin, R. (Eds.). (Ctr Psychiatrique Sainte Anne, Paris, France) **Psychological measurements in psychopharmacology**. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5883. Pinard, Gilbert & Tetreault, Leon. (St-Jean de Dieu Hosp, Research Unit, Montreal, Quebec, Canada) **Concerning semantic problems in psychological evaluation**. In P. Pichot, R. Olivier-Martin (Eds), *Psychological measurements in psychopharmacology*. Basel, Switzerland: S. Karger, 1974. 267 p. \$35.75.

5884. Sathananthan, Gregory L.; Angrist, Burton M.; Phillips, Neil & Gershon, Samuel. (New York U, Medical Ctr, Neuropsychopharmacology Research Unit) **Assessment of antipsychotic activity of a butyrophenone analogue, lenperone (AHR 2277)**. *Current Therapeutic Research*, 1974(Aug), Vol 16(8), 844-847.—10 schizophrenic inpatients were administered 10-150 mg of lenperone daily for 21-28 days. Ss were evaluated on a battery of behavioral measures (including the Brief Psychiatric Rating Scale, the Clinical Global Impression, and the Nurses Observation Scale for Inpatient Evaluation) before, twice weekly, and at termination of treatment. 2 patients showed complete remission of symptoms, 4 were unchanged except for reduced anxiety, and 4 showed fluctuations of psychopathology. Side effects were evident in patients. It is concluded that lenperone has some psychoactive properties and might be useful in treatment of schizophrenic psychoses. Further controlled studies with larger populations are suggested to determine whether lenperone is an effective tranquilizer.—*B. McLean*.

5885. Scheiner, James J. & Richards, David J. (Boulevard Medical Ctr, Fairfax, VA) **Treatment of musculoskeletal pain and associated anxiety with an ethoheptazine-aspirin-meprobamate combination (E-quagesic): A controlled study**. *Current Therapeutic Research*, 1974(Sep), Vol 16(9), 928-936.—The ethoheptazine-aspirin-meprobamate combination proved significantly superior to aspirin-ethoheptazine and to meprobamate alone in relief of pain and significantly more effective than the aspirin-ethoheptazine combination in relieving anxiety in 102 ambulant outpatients.

5886. Schultenbrandt, Joy G.; Raskin, Allen & Reatig, Natalie. (NIMH, Ctr for Studies of Child & Family Mental Health, Rockville, MD) **True and apparent side effects in a controlled trial of chlorpromazine and imipramine in depression**. *Psychopharmacologia*, 1974, Vol 38(4), 303-317.—Administered chlorpromazine (600 mg/day) and imipramine (300 mg/day) or placebo to 555 acutely depressed patients (median age, 42 yrs) to determine the incidence and severity of drug-related side effects. The ability of clinicians to distinguish between drug-related side effects and symptoms natural to the depressive illnesses was also investigated. Side effects were minimal for both active drug groups. Among the dropouts for serious side effects (31 cases), the majority were receiving chlorpromazine. Skin rash and hypoten-

sion were the most frequent reasons for side-effect terminations. Clinicians were generally able to distinguish drug-related side effects from symptoms usually associated with depression. There was some indication, however, that they tended to rate as non-medication-related, certain symptoms which were actually drug-induced. The latter included muscle rigidity, edema, and dry mouth on chlorpromazine and tremulousness on imipramine. (17 ref)—*Journal abstract*.

5887. Smith, G. R.; Taylor, C. W. & Linkous, P. (Meadowbrook Extended Care Facility, Shawsville, VA) **Haloperidol versus thioridazine for the treatment of psychogeriatric patients: A double-blind clinical trial**. *Psychosomatics*, 1974, Vol 15(3), 134-138.—46 geriatric patients who were behavior problems due to chronic brain syndromes or senile psychosis were treated with haloperidol or thioridazine under double-blind conditions. Both compounds were significantly effective in reducing agitation, disruptive behavior, and psychotic symptomatology. Haloperidol was effective over a broader range of symptomatology than thioridazine. Haloperidol consistently produced significant improvement in symptoms that reflect social interaction, alertness, and interest. Each rating method (Brief Psychiatric Rating Scale, Nurses' Observation Scale for Inpatient Evaluation, Psychiatric Evaluation Form, and global evaluation) showed significant improvement in both the haloperidol- and thioridazine-treated groups, the results favoring haloperidol treatment in each case. Adverse reactions were infrequent and mild. The type and incidence of side effects was similar for both drug groups.—*Journal abstract*.

5888. van Praag, Herman M.; Van den Burg, Willem; Bos, Erik R. & Dols, Louise C. (U Groningen, Psychiatric Clinic, Netherlands) **5-Hydroxytryptophan in combination with clomipramine in "therapy-resistant" depressions**. *Psychopharmacologia*, 1974, Vol 38(3), 267-269.—In 4 depressive patients, regarded as therapy-resistant, the antidepressive effect of levo-5-hydroxytryptophan (in combination with a peripheral decarboxylase inhibitor) was enhanced by clomipramine at a dosage which, as such, was suboptimal. This probably means that the therapeutic effect of levo-5-hydroxytryptophan is based on increase of serotonin at central serotonin receptors.—*Journal abstract*.

5889. Vista Hill Psychiatric Foundation. (San Diego, CA) **Methadone diversion**. *Drug Abuse & Alcoholism Newsletter*, 1974(Aug), Vol 3(4), 4 p.—Discusses the problem of methadone diversion, i.e., the illicit trade of methadone to addicts. A study of this activity in 5 cities, commissioned by the National Institute of Drug Abuse, is reported. Survey results indicate that the practice is widespread and that the chief source of illicit methadone is patients attending methadone maintenance clinics. The significance of this for the client, the treatment program, the addict population, and the community is examined. It is concluded that methadone maintenance has value and should continue, but that methadone diversion should be reduced to the lowest possible level.—*R. Hall*.

5890. Weiss, Brian L.; Foster, F. Gordon; Reynolds, Charles F. & Kupfer, David J. **Psychomotor activity in mania**. *Archives of General Psychiatry*, 1974(Sep), Vol

31(3), 379-383.—Investigated the levels of psychomotor activity during mania and the effects of lithium carbonate and clinical change on activity levels. Activity data were collected continuously by means of a telemetric mobility-sensing system. The study was divided into 3 sections: the monitoring of 3 manic patients (aged 22, 50, and 60 yrs) during a pretreatment baseline period, the study of 6 patients (the above 3 manic patients and 3 bipolar depressives aged 50, 24, and 39 yrs) before and during lithium carbonate treatment, and the intensive longitudinal investigation of a manic patient over a 5-mo period. Results indicate that both the quantity and patterning of manic activity were substantially different from other diagnostic groups previously studied. Activity levels do not appear to be affected by the use of lithium carbonate unless associated with clinical change. (27 ref)—*Journal abstract*.

5891. Wittenborn, J. Richard. (Rutgers State U, Interdisciplinary Research Ctr, New Brunswick) **A search for responders to niacin supplementation.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 547-552.—Attempted to identify characteristics distinguishing schizophrenic patients who responded well to niacin supplementation from good responders in a control group. Good responders in the niacin group showed premorbid histories with relatively strong interpersonally oriented commitments, while the good responders in the controls did not.

5892. Zung, William W. et al. (Duke U, Medical Ctr) **Pharmacology of depression in the aged: Evaluation of Gerovital H3 as an antidepressant drug.** *Psychosomatics*, 1974, Vol 15(3), 127-131.—Carried out a double-blind trial of 30 geriatric patients with depressive illness, who received either Gerovital-H3 by injection or placebo or imipramine orally for 4 wks. Treatment schedules were as follows: (a) 5-10 cc Gerovital (as 2% procaine hydrochloride) or placebo 3 times/wk; and (b) 1-4 capsules/day containing 25 mg imipramine, or placebo. Pre- and posttreatment tests, using the clinical Global Impression Scale and the Zung Self-Rating Depression Scale, showed Gerovital-H3 to be superior to imipramine.—A. S. Kulkarni.

### Behavior & Group Therapy

5893. Alterman, Arthur I.; Gottheil, Edward; Skoloda, Thomas E. & Grasberger, Joseph C. (VA Hosp, Coatesville, PA) **Social modification of drinking by alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Sep), Vol 35(3-A), 917-924.—During a 6-wk experimental treatment program in which patients could choose to drink, 44 male alcoholics (mean age, 44) attended group discussions prior to the drinking decisions phase of the program. The therapist reinforced 20 patients to take a few drinks (Group I) and 24 to abstain (Group II). The patients' commitments concerning plans for drinking or abstinence were recorded. Of the 20 men in Group I, 9 made commitments to drink and 13 subsequently drank; 15 of the 24 in Group II made commitments not to drink and 16 subsequently remained abstinent. It is concluded that social reinforcement of abstinence within a group setting can effectively reduce the number of patients drinking; the reinforcement of drinking, however, had no appreciable effect.—*Journal abstract*.

5894. Balcerzak, Wallace S. & Siddall, James W. (U Wisconsin, Milwaukee) **A brief discussion of a model for improving the cost effectiveness of a token economy in a rehabilitation setting.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 501-504.—Describes a possible method for analyzing the cost effectiveness of a token economy in a sheltered workshop where subcontracted goods are produced. Analysis indicates that the cost of a token economy could be decreased or eliminated by various financial and staffing alternatives.

5895. Borkovec, Thomas D. (U Iowa) **Heart-rate process during systematic desensitization and implosive therapy for analog anxiety.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 636-641.—Used systematic desensitization, implosive therapy, and an avoidance response placebo procedure for the treatment of analog anxiety in 36 female college students with snake phobia. Heart-rate data were collected to supplement previously reported basal skin conductance results. Repeated conditioned stimulus (CS) exposure did result in general arousal reduction under desensitization and implosion regimes, while CS exposure paired with visualized avoidance responding was related to arousal maintenance.—*Journal abstract*.

5896. Bostock, Tudor & Williams, Christopher L. (Royal Hobart Hosp, Tasmania) **Attempted suicide as an operant behavior.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 482-486.—In the light of the increased incidence of attempted suicide and the stress this imposes on medical resources, alternative approaches to management need to be considered. Where it can be established that the suicidal behavior has an operant component, management according to behavioral principles would appear relevant. The behavior of a 20-yr-old woman who exhibited repeated suicidal behavior was managed within a ward program by means of operant principles. After 27 mo of follow-up, there has been no recurrence for 18 mo. (18 ref)—*Journal abstract*.

5897. Cantón-Dutari, Alejandro. (Clinica Presidente Remón, Panama City, Panama) **[The use of systematic desensitization in the treatment of an airplane phobia.]** (Span) *Revista Latinoamericana de Psicología*, 1974, Vol 6(2), 151-156.—Describes the treatment of a 27-yr-old woman with fear of flying characterized by tachycardia, muscular tension without hypermotility, and involuntary images of planes crashing. Systematic desensitization and a method of muscular contraction-relaxation to counteract the tension-producing stimuli were used and the patient was allowed to monitor herself during the 1-wk intervals between the 5 treatment sessions. 2 mo after treatment the patient made a plane trip of more than 2 hrs without the phobic reaction. (English summary)—V. A. Colotta.

5898. Claghorn, James L.; Johnstone, Edwin E.; Cook, Thomas H. & Itschner, Lorri. (Texas Medical Ctr, Texas Research Inst of Mental Sciences, Houston) **Group therapy and maintenance treatment of schizophrenics.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 361-365.—Used group psychotherapy and antipsychotic medications in the treatment of 49 17-59 yr old outpatient schizophrenics. 2 treatment regimens, using thiothixene and chlorpromazine hydrochloride, were divided into group therapy and nongroup therapy



subgroups for 6 mo. Patients' symptoms were evaluated on a monthly basis with a physician's global assessment and the Brief Psychiatric Rating Scale. Subtle changes in Ss' interpersonal emotional adjustment were measured before and after treatment by the Interpersonal Test Battery. Results indicate no substantial difference between medications but a positive change over this time period for both drug regimens. While group therapy did not alter patients' symptomatology, it did, according to projective test results, deepen the Ss' awareness and insight into their own behavior.—*Journal abstract.*

5899. Court, J. H. (Flinders U South Australia, Bedford Park) **Behaviour therapy.** *Interchange*, 1974, No 15, 129-142.—Considers that behavior therapy, developed as a technique for the control and modification of behavior, does not present new ethical problems but does bring a number of issues into focus because of its relative effectiveness in achieving its intended goals. Attention is drawn to divergent trends, emphasizing experimental rigor vs a broad-spectrum use of techniques. It is argued that the assumptions of strict behaviorism are not essential in order to endorse the practices of behavior therapy. The ethical issues are largely related to the freedom of choice which a patient may exercise. Good behavior therapy not only respects the individual's freedom to participate in or reject the offer of therapy, but also, as a result of successful therapy, allows the individual to have a greater degree of control over his own actions. Such a position is consistent with a Christian view of the dignity and worth of man.—*Journal summary.*

5900. Croghan, Leo M. (Washington U) **Encounter groups and the necessity for ethical guidelines.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 438-445.—Outlines the origin and development of the 28-yr-old encounter group movement and reports the various claims of the movement's proponents and the criticisms of its detractors. The debate over the ethical implications of the encounter movement is highlighted, and the 1973 American Psychological Association publication, *Guidelines for Psychologists Conducting Growth Groups*, is suggested for further reading. (16 ref)—*Journal summary.*

5901. Cull, John G. & Hardy, Richard E. (Virginia Commonwealth U, Fishersville) **Group work through peer pressure: A therapeutic approach to the rehabilitation of the youthful drug abuser.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Describes the goals and methods of SEED, a drug treatment program based on the treatment model developed by Alcoholics Anonymous. The background of program participants, the service delivery system, staffing and training, and the program's impact and results are discussed.

5902. Cull, John G. & Hardy, Richard E. (Virginia Commonwealth U, Fishersville) **Marital counseling in groups.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Suggests that group counseling is a valid approach in discriminating between actual and reported behavior in marital counseling. 8 types of marital partners are described—the aggressor, acceptance seeker, sympathy

seeker, confessor, externalizer, isolate, dominator, and antagonist. Procedures are discussed for accommodating each type within the group setting.

5903. Dengrove, Edward. (American Society of Psychosomatic Dentistry & Medicine, Brooklyn, NY) **Thought-block in behavior therapy.** *Journal of the American Society of Psychosomatic Dentistry & Medicine*, 1974, Vol 21(1), 19-24.—Suggests that conditioning by distraction rather than aversion holds promise of training individuals to control thoughts effectively by blocking out unwanted ideas.

5904. DiScipio, William J. (Ed.). (Bronx State Hosp, NY) **The behavioral treatment of psychotic illness: Advances in theory and technique.** New York, NY: Behavioral Publications, 1974. 240 p.

5905. Duncan, Jack A. (Virginia Commonwealth U) **Group counseling with adolescents in the school setting.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Discusses 3 major group procedures as they relate to treating adolescents—group counseling, group guidance, and group psychotherapy. In addition to providing other background information, discussions are included on the time and frequency of meetings, the counselor's and the counsellee's role, the 1st session, continuation of group sessions, precautionary measures, and the final sessions.

5906. Emmelkamp, Paul M. & Ultee, Kees A. (Inst for Clinical & Industrial Psychology, Utrecht, Netherlands) **A comparison of "successive approximation" and "self-observation" in the treatment of agoraphobia.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 606-613.—Used a crossover design, with 16 agoraphobic adults, employing successive approximation and a self-observation method in which the client was not reinforced by the therapist. Assessments were made by the therapist and by an independent O at the beginning of treatment, at crossover, at the end of treatment, and at the follow-up 3 mo later. Ss were administered a phobic anxiety scale, phobic avoidance scale, social anxiety scale, the Fear Survey Schedule, Self-Rating Depression Scale, and Internal-External Control Scale. Both treatments resulted in significant improvement on several variables. There was no significant difference between successive approximation and self-observation on any of the variables.—*Journal abstract.*

5907. Epstein, Leonard H. et al. (Auburn U) **Generality and side effects of overcorrection.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 385-390.—Evaluated the effects and side effects of overcorrection for self-stimulatory behaviors of a 5-yr-old male and an 8-yr-old male in a specialized day-care program. For one child, a "hand" overcorrection procedure involving arm and hand exercises was introduced contingent upon inappropriate hand movements and later contingent upon inappropriate foot movements. After "hand" overcorrection was withdrawn for inappropriate foot movements, a "foot" overcorrection procedure involving foot and leg exercises was introduced contingent upon inappropriate foot movements. For the 2nd child, the "hand" overcorrection procedure was introduced contingent upon inappropriate hand movements during a free-play period and was later contingent upon inappropriate

vocalizations at nap-time. "Hand" overcorrection was withdrawn and then reintroduced sequentially for both behaviors. Results indicate the "hand" overcorrection procedure suppressed inappropriate hand movements and inappropriate behaviors that were topographically dissimilar. Inverse relationships were observed between the 2nd child's inappropriate hand movements and appropriate toy usage during free play and between his inappropriate vocalizations and inappropriate foot movements during nap-time. Results suggest that overcorrection procedures that are effective for one behavior can be used to reduce the frequency of topographically different behaviors.—*Journal abstract.*

5908. Ewing, John A. (U North Carolina, Medical School, Chapel Hill) **Behavioral approaches for problems with alcohol.** *International Journal of the Addictions*, 1974, Vol 9(3), 389-399.—Considers that many alcoholics cannot withstand the rigorous requirements of psychoanalysis and that the completion of such treatment does not necessarily guarantee that alcoholics will be able to drink in moderation. A holistic approach to alcoholism treatment is therefore urged using any or all methods of therapy that appear appropriate. Behavioral approaches to alcoholism are compared to, and shown to be compatible with psychodynamic views of the problem. These approaches fall into 2 categories: techniques to develop aversion or indifference to alcohol combined with a view of ultimate abstinence, and techniques to replace alcoholic drinking patterns with controlled patterns. Evidence for the success of aversive approaches is presented, and it is suggested that these be considered when available and when a total abstinence program has been decided upon by both patient and therapist. Current attempts to develop moderate drinking in alcoholics are still only in the developmental stage and require further research and longer follow-up evaluations. (67 ref)—*Journal summary.*

5909. Fielding, John M. **Problems of evaluative research into group psychotherapy outcome.** *Australian & New Zealand Journal of Psychiatry*, 1974(Jun), Vol 8(2), 97-102.—Reviews the literature, noting that evaluative research has lagged behind clinical applications of group psychotherapeutic methods. Historical, social, and cultural factors, as well as diverse theoretical orientations and a preoccupation with the differences between various group approaches, have contributed to the dilemma of defining group psychotherapy. A variety of research strategies have been developed to assess group psychotherapy outcome. Approaches using construct criteria, with an individualized outcome for each patient, would seem to offer the most potential for future outcome studies. It is concluded that many variables influence evaluative research in group psychotherapy, and that the conventional research approach of a controlled clinical trial has limited feasibility. (70 ref)—*Journal abstract.*

5910. Foley, Vincent D. & Dyer, Wayne W. (St John's U, Jamaica, NY) **"Timing" in family therapy: The "when," "how," and "why" of intervention.** *Family Coordinator*, 1974(Oct), Vol 23(4), 373-382.—The timing of family therapy, the "when" of intervention, can be taught to the beginning therapist. The manner or the "way" in which interventions are made, although in part

dependent on the personality and skill of the therapist, can also be suggested. The rationale or the reasons "why" interventions are made can be explained in the light of the goals of growth and development of the family system. 8 occasions illustrating the "when," the "how," and the "why" behind therapeutic intervention in family therapy are presented.—*Journal abstract.*

5911. Foley, Vincent D. **An introduction to family therapy.** New York, NY: Grune & Stratton, 1974. xiv, 207 p.—Presents a discussion of the major concepts and theorists in family psychotherapy. Topics include the applicability of double bind, pseudomutuality, and systems concepts to family therapy, similarities and differences in the major theoretical approaches to family therapy, and an ecological perspective of the future of family therapy. (8 p ref)

5912. Franks, Cyril M. & Wilson, G. Terence (Eds.). (Rutgers State U, Psychological Clinic, New Brunswick) **Annual review of behavior therapy: Theory & practice: 1974.** New York, NY: Brunner/Mazel, 1974. xiv, 769 p. \$25.

5913. Fried, Robert. (Hunter Coll, City U New York) **A device for enuresis control.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 682-684.—A simple, compact, and inexpensive device consisting of an oscillator and transmitter operating in the frequency modulation band is described in its application to the detection and control of enuresis.

5914. Haller, Linda L. (Western Psychiatric Inst & Clinic, Community Mental Health Ctr, Pittsburgh, PA) **Family systems theory in psychiatric intervention.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 462-463.—Applies concepts from systems theory to family therapy. Interventions into a family system with problems requires 3 kinds of data for evaluation: (a) process information from the family session, (b) covert and overt rules maintaining family relationships, and (c) types of interventions that affect the family systems. The unit of treatment in this model is the family system. 4 systems concepts are identified as basic for intervention in the family system: (a) The family system has an ego emotional mass that is affected by the level of dysfunction of members of the system. (b) The family system has a homeostatic regulation which limits individual changes of behavior. (c) One member of the family system can be identified as absorbing the tension of the system. (d) Patterned interactions maintain the status quo of the family system. The systems concept is applied in a case illustration of a family seeking professional psychotherapy intervention.—*R. G. Gibson.*

5915. Hardy, Richard E. & Cull, John G. (Eds.). (Virginia Commonwealth U) **Group counseling and therapy techniques in special settings.** Springfield, IL: Charles C Thomas, 1974. ix, 166 p.

5916. Hardy, Richard E. & Cull, John G. (Virginia Commonwealth U) **Group counseling with public offenders.** In R. E. Hardy & J. G. Cull (Eds.), *Group counseling and therapy techniques in special settings.* Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Emphasizes the importance of group leaders to facilitate prisoners' overcoming hostility toward treatment. Flexibility is suggested as the most important feature of any prisoner group-counseling program.



5917. Harris, Sandra L.; Hershfield, Robin E.; Kaffashan, Lucille C. & Romanczyk, Raymond G. (Rutgers State U, Douglass Coll, New Brunswick) **The portable time-out room.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 687-688.—Suggests that the tantrum behavior of highly self-stimulatory children may be controlled through the use of a 3-panel screen employed as a time-out room.
5918. Jackson, Donald A. & Wallace, R. Frank. (U Kansas) **The modification and generalization of voice loudness in a fifteen-year-old retarded girl.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 461-471.—Treated a 15-yr-old severely disturbed girl for aphonia. Because of the extent of her withdrawal, the S was conditioned in a laboratory setting and received tokens for speaking loudly enough to operate a voice-operated relay. Conditioning at first consisted of saying 100 monosyllabic words, with the possibility of reinforcement on each word. Later, the S was required to say a polysyllabic word, and finally, 5 or 6 words per token. The S was shaped to speak with normal loudness in the laboratory, and generalization to a reading situation in the laboratory was measured and observed to occur, at first for a few minutes, and later for a longer period. Generalization to a reading situation in the classroom did not occur, but the S's voice loudness also increased in the classroom when several new reinforcement contingencies were put into effect there. (25 ref)—*Journal abstract*.
5919. Jonckheere, P. [Beyond hallucinogenic drugs: The case of Solange.] (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 497-509.—Illustrates the use of family intervention in the case of a 19-yr-old female with hashish dependence. (Dutch, English, German, Italian, & Spanish summaries)
5920. Jovanović, Tihomir & Jakulić, Slobodan. (Laza K. Lazarevic Hosp for Mental & Nervous Diseases, Belgrade, Yugoslavia) **[Psychotherapeutic work with a large group in the closed psychiatric department.]** (Ser) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 41-47.
5921. Kashinsky, Wayne. (Rutgers State U, Douglass Coll, New Brunswick) **Two low cost micturation alarms.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 698-700.
5922. Kazdin, Alan E. (Pennsylvania State U) **The effect of model identity and fear-relevant similarity on covert modeling.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 624-635.—Investigated the efficacy of covert modeling procedures on snake avoidance in 84 undergraduates. In a 2 × 2 design, model identity (imagining oneself vs imagining someone else as the covert model) and fear-relevant model similarity (coping vs mastery model) were examined. In 2 sessions Ss imagined approach behavior of a covert model. A no-model control group, which imagined fear-relevant scenes without a model, was included in the design. Model identity did not affect treatment outcome. Ss who imagined themselves or another person improved. Fear-relevant similarity was consistently related to avoidance reduction. On behavioral, arousal, anxiety, and attitudinal measures of avoidance, coping-model Ss evinced greater improvement than mastery-model Ss at posttreatment and at a 3-wk follow-up assessment. Implications of the results for modeling and systematic desensitization (covert self-modeling) are elaborated. (26 ref)—*Journal abstract*.
5923. Kifer, Robert E.; Lewis, Martha A.; Green, Donald R. & Phillips, Elery L. (U Kansas) **Training predelinquent youths and their parents to negotiate conflict situations.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 357-364.—In response to parental requests for assistance in dealing with their adolescent problem children, 3 parent-child pairs were taught negotiation responses to hypothetical conflict situations using behavior rehearsal and social reinforcement. The negotiation process was separated into component behaviors that were practiced during simulations by each youth and his parent under the direction of trainers. Results indicate that (a) the procedures were successful in training youths and their parents in negotiation behaviors that produced agreements to conflict situations and (b) these behaviors generalized to actual conflict situations in Ss' homes.—*Journal abstract*.
5924. Kostka, Marlon P. & Galassi, John P. (West Virginia U, Student Counseling Service) **Group systematic desensitization versus covert positive reinforcement in the reduction of test anxiety.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 464-468.—Compared modified versions of systematic desensitization and covert positive reinforcement to a no-treatment control condition in the reduction of test anxiety in 27 undergraduates. Both experimental groups received 8 treatment sessions, and the systematic desensitization group received 2 additional sessions devoted to relaxation training. The 2 treatments were comparable and generally superior to the control group in pretest-posttest and pretest-follow-up changes as measured by the Suinn Test Anxiety Behavior Scale and the Alpert-Haber Achievement Anxiety Test. On an anagrams performance test, the covert reinforcement and control groups were superior to the desensitization group. No significant differences occurred in subjectively experienced anxiety during the performance test.—*Journal abstract*.
5925. Lassiter, Robert A. (Virginia Commonwealth U) **The use of group counseling in achieving adjustment to work.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Provides a brief background of work adjustment and group counseling and presents a procedure for using group counseling methods in a work adjustment setting; this procedure is presented through an activity schedule that is offered as a guideline for helping handicapped people toward a better life through productive work. (19 ref)
5926. Lewis, Susan. (Vanderbilt U Hosp, Div of Child Psychiatry) **A comparison of behavior therapy techniques in the reduction of fearful avoidance behavior.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 648-655.—Investigated the relative effectiveness of modeling, participation, and a combination of the 2 in reducing the avoidance behavior of 40 5-12 yr old male campers toward water activities. Measures included a pre- and postintervention behavior rating scale, a follow-up behavior rating scale, and an instructor's rating scale. The combination of modeling and participation was the most effective; however, modeling alone and participa-

tion alone, in contrast to a control condition, each significantly reduced avoidance behavior. Further, the participation component was more effective than the modeling component in inducing these behavioral changes.—*Journal abstract.*

5927. Lutzker, John R. (U of the Pacific) **Social reinforcement control of exhibitionism in a profoundly retarded adult.** *Mental Retardation*, 1974(Oct), Vol 12(5), 46-47.—Reports that exhibitionism was successfully treated in a 52-yr-old male by applying differential social reinforcement for other behavior.

5928. Mahoney, Kathryn. (Pennsylvania State U) **Count on it: A simple self-monitoring device.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 701-703.—Describes an inexpensive and easily constructed wrist counter for self-monitoring. Its resemblance to contemporary handcrafted leather jewelry makes it less conspicuous than the more usual golf counter.

5929. Mahoney, Michael J.; Kazdin, Alan E. & Lesswing, Norman J. (Pennsylvania State U) **Behavior modification: Delusion or deliverance?** In C. M. Franks & G. T. Wilson (Eds), *Annual review of behavior therapy: Theory & practice: 1974*. New York, NY: Brunner/Mazel, 1974. xiv, 769 p. \$25.—Reviews the literature, surveying conceptual, empirical, and ethical arguments concerning behavior therapy and its applications. It is noted that, although behavior modification has no unified learning theory, there is no foundation to the contentions that the behavioral approach undermines choice, responsibility, and creativity, and there is no doubt about the efficacy of behavioral modification procedures. (7 p ref)

5930. Maletzky, Barry M. **Assisted covert sensitization for drug abuse.** *International Journal of the Addictions*, 1974, Vol 9(3), 411-429.—Describes a novel technique for the treatment of drug abuse in which a malodorous substance, valeric acid, is used to increase the covert sensitization process. Data from 20 16-43 yr old enlisted men who had abused a variety of drugs (e.g., alcohol, heroin, cigarettes, marijuana, and glue) show that this "assisted" covert sensitization procedure produced beneficial results not only in stopping overt drug use but also in reducing the frequency of thoughts and urges associated with the drug abuse. The practicality of this procedure is discussed, although it is emphasized that its use as an overall treatment of drug abuse awaits more definitive research and evaluation. (33 ref)  
—*Journal summary.*

5931. Marquis, John N. (VA Hosp, Palo Alto, CA) **Behavior modification theory: B. F. Skinner and others.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Outlines the basic concepts of learning theory, operational science, and the methods of behavior therapy. These are related to a behavioral view of man. A case history is presented to illustrate the planning and implementation of behavioral treatment. (21 ref)

5932. McCall, Raymond J. (Marquette U) **Group therapy with obese women of varying MMPI profiles.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 466-470.—19 33-60 yr old obese females who were participating in short-term group therapy that was oriented toward development of self-control techniques

showed improvement posttherapeutically in personality profile and in capacity to lose weight. This small but reliable dual effect was most striking for those who originally showed the most deviant MMPI profiles.  
—*Journal summary.*

5933. Milosavljević, Peter. (Mental Health Inst, Belgrade, Yugoslavia) [Some aspects of work with psychiatric patients' families.] (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(1), 19-25.

5934. Moreno, Zerkia T. (Moreno Inst, Beacon, NY) **Origins of the group psychotherapy movement.** *Handbook of International Sociometry*, 1973, Vol 7, 5-13.—Presents an overview of the history of the group psychotherapy movement, a creation of the 20th century. Key figures in the movement and their contributions are discussed, including T. Burrow, E. W. Lazell, L. C. Marsh, J. L. Moreno, and J. H. Pratt.

5935. Percell, Lawrence P.; Berwick, Peter T. & Beigel, Allan. (Adult Probation Dept, Redwood City, CA) **The effects of assertive training on self-concept and anxiety.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 502-504.—Administered the Lawrence Interpersonal Behavior Test (IBT), the Self-Acceptance scale of the California Psychological Inventory, and the Taylor Manifest Anxiety scale (TMAS) to 100 psychiatric outpatients (mean age = 29.4 yrs) to test the hypothesis that people who are assertive are also more self-accepting and less anxious. Results show a substantial positive relationship for both men and women between the IBT and the self-acceptance measure and a strong negative correlation for women only between the IBT and the TMAS. To test whether group assertive training would increase self-esteem and reduce general level of anxiety, as well as teach assertive skills, 24 patients were assigned to either an assertive training group or a relationship-control group for 8 sessions. Ss in the assertive training group showed significant increases in assertiveness (measured by the IBT), self-acceptance (measured by the Beger Self-Acceptance Scale), and significant decreases in anxiety (measured by the TMAS) relative to controls.—*Journal abstract.*

5936. Piecznik, Steven & Birk, Lee. (Harvard U, Medical School, Boston) **Behavior therapy of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management*. Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Reviews basic principles of behavior therapy and discusses the use of behavior modification and other techniques (e.g., emotional labeling, modeling, behavioral rehearsal, and role playing) in the inpatient treatment of character disorders. A specific case history is presented to illustrate these principles in the ward management and treatment of a severely disturbed patient. (36 ref)

5937. Ramirez, Luis & Ribes, Emilio. (Ctr de Modificación de Conducta B. F. Skinner, Bogotá, Colombia) **[Effects of punishment on multiple behaviors in a human subject.]** (Span) *Revista Latinoamericana de Psicología*, 1974, Vol 6(2), 161-178.—Studied punishment effects in a severely retarded child under a multiple-concurrent design, using 6 different responses in 2 successive stimulus situations. Differential reinforcement of other behavior and fixed interval reinforcement schedules were also used to evaluate interaction with



punishment. Results show that many of the assumptions about punishment are unjustified and that its effects are complex and dependent on multiple variables. (15 ref) —English summary.

5938. Ross, Steven M. (VA Hosp, Salt Lake City, UT) **Behavioral group therapy with alcohol abusers.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Bases suggested techniques focusing group therapy in treating alcoholics on the assumption that alcohol abuse is a learned problem—patients learn to either escape or avoid unpleasant events or to gain access to pleasurable events through excessive drinking. Areas covered include techniques and terminology, pregroup preparations, and group meetings.

5939. Russell, Richard K. & Sipich, James F. (Michigan State U, Counseling Ctr) **Treatment of test anxiety by cue-controlled relaxation.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 673-676.—Demonstrated the effectiveness of cue-controlled relaxation for an 18-yr-old female college student. Changes in self-report and performance measures in test taking were noted. The cue-controlled relaxation technique is described and its advantages over systematic desensitization discussed.

5940. Salhoot, Joyce T. (Baylor Coll of Medicine, Houston, TX) **The use of two group methods with severely disabled persons.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Focuses on the unique aspects of using group methods with the severely disabled. Among the topics included are the purpose of the group, selection of members, concrete pregroup preparations, leadership, intake, group content and techniques, and the time-limited vs the open-ended group.

5941. Sank, Lawrence I. & Biglan, Anthony. (George Washington U, Medical Ctr) **Operant treatment of a case of recurrent abdominal pain in a 10-year-old boy.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 677-681.—A token system was instituted with a male 10-yr-old which successfully decreased the reported level of abdominal pain, increased school attendance, and ended the occurrence of severe pain attacks. These new behaviors were maintained at a smooth and high rate of performance through a variable reinforcement schedule.

5942. Steinfeld, G. J.; Rautio, E. A.; Rice, A. H. & Egan, M. J. (Federal Correctional Inst, Narcotic Unit, Danbury, CT) **Group covert sensitization with narcotic addicts: Further comments.** *International Journal of the Addictions*, 1974, Vol 9(3), 447-464.—Describes the details of a group covert sensitization procedure for imprisoned narcotics addicts. Each of the sensitization tape recordings used in the 8 sessions are described, and sample responses from each of the 3 treatment groups (covert sensitization and therapeutic community membership, covert sensitization without therapeutic community, and no treatment) are discussed. Fears expressed by the Ss were categorized by sensory modality, discreteness of stimuli, and whether they were interpersonal, impersonal, or related to self-perceptions. Of the 8 participants, only 1 returned to drugs after release. The limitations of the present evaluation are examined, and

suggestions for further research on the content of the sensitization tapes are presented.—L. Gorsey.

5943. Sternberg, David & Cohen, Abraham. **Reciprocal sculpturing techniques for training ex-addict group leaders.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 185-189.—Discusses the use of sculpturing as a training device in certain group situations which permits the tracing and subsequent working through of difficulties stemming from early relationships and experiences. This technique can lead to intricate transformations which occur as a function of the intrapsychic and transactional blending of old and new relationships. It is felt that the working-through state consists in understanding—often through the transference to each other—the introjects of the parents, so that each individual can experience how difficulties manifested in the present have emerged in their unconscious attempts to perpetuate or master old conflicts arising from early familial situations.—A. Farrell.

5944. Stevens-Long, Judith & Lovaas, O. Ivar. (California State U, Los Angeles) **Research and treatment with autistic children in a program of behavior therapy.** In A. Davids, *Child personality and psychopathology: Current topics: I*. New York, NY: John Wiley & Sons, 1974. ix, 239 p. \$13.95.

5945. Stierlin, Helm. (NIMH, Adult Psychiatry Branch, Bethesda, MD) **Family therapy: An introduction.** In A. Burton (Ed), *Operational theories of personality*. New York, NY: Brunner/Mazel, 1974. x, 421 p. \$15.—Describes family therapy as a new way of conceptualizing psychiatric problems as well as a new treatment form. The concepts of family homeostasis, family ego mass, transactional mode disturbances, and others are discussed. A detailed case history is presented to illustrate application of family theory.

5946. Tasto, Donald L. & Chesney, Margaret A. (Colorado State U) **Muscle relaxation treatment for primary dysmenorrhea.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 668-672.—Treated 7 female students by a combination of muscle relaxation and imagery associated with menstrual pain reduction. Significant differences between pre- and posttreatment measures were all in the expected direction.

5947. Thurrell, Richard J. & Marshall, John R. (U Wisconsin, Medical School, Madison) **Difficulties in implementation of behavior therapies in a mixed or eclectic clinical situation.** *Journal of Nervous & Mental Disease*, 1974(Sep), Vol 159(3), 158-163.—Considers that the behavior therapy movement brings a renewed empiricism to psychiatry with its emphasis on practicality and precision. Application of specific behavioral techniques engenders difficulties that occur with some regularity: (a) a constricted view of treatment indications, (b) tendencies either to quit too soon or to persist too long, (c) the glib use of pseudobehavioral jargon, (d) a miring in loyalty struggles and pseudoethical issues, (e) overzealous or apologetic application, and (f) casual experimentation. Remedy of these problems begins with reappraisal in terms of general behavioral principles rather than rote applications of techniques. (15 ref) —Journal abstract.

5948. Toepfer, Caroline T.; Bicknell, Ann T. & Shaw, David O. (Inst for Behavior Modification, New Wilming-

ton, PA) **Remotivation as behavior therapy.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 451-453.—Emphasizes similarities between remotivation and behavioral therapies. It is suggested that remotivation be made more systematic by specifying operationally desired behaviors, obtaining direct quantitative measures of patients' responses, and focusing upon differential reinforcement of goal behaviors for each patient.

5949. Tracey, Dorothy A.; Briddell, Dan W. & Wilson, G. Terence. (Rutgers State U, Psychological Clinic, New Brunswick) **Generalization of verbal conditioning to verbal and nonverbal behavior: Group therapy with chronic psychiatric patients.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 391-402.—12 chronic psychotic hospitalized female patients received token reinforcement contingent on 2 separate classes of verbalizations: (a) positive statements about optional activities available in the hospital setting and (b) positive statements about people. Cross-class generalization of reinforced verbal responses about activities to overt behavior was tested by actual participation in activities; within-class generalization of verbal responses about people to verbalizations in another stimulus setting was assessed in a structured interview situation. A multiple baseline design with contingency reversals was employed to demonstrate experimental control of both classes of verbalizations in the group sessions. Positive statements about activities generalized to actual participation in activities, while generalization of the positive statements about people to verbalization in the extra-group setting did not occur. (19 ref)—*Journal abstract*.

5950. Watson, Luke S. & Bassinger, Joan F. (Illinois Dept of Mental Health, Chicago) **Parent training technology: A potential service delivery system.** *Mental Retardation*, 1974(Oct), Vol 12(5), 3-10.—Describes the Parent Training Technology System (PTTS), an operant-type behavior modification system that utilizes parents as behavior modification technicians. The program has been used to eliminate undesirable behavior and to teach self-help, language, motor coordination, social-recreational, and academic skills to mildly, moderately, severely, and profoundly retarded children, as well as psychotic and "emotionally disturbed" children. It is suggested that because parents, siblings, peers, and teachers are involved in the program, and training takes place in the child's natural environment, many stimulus control problems inherent in more traditional intervention clinical strategies are avoided. (27 ref)—*Journal abstract*.

5951. Wilson, Earl D. (U Nebraska, Counseling Psychology Program) **Patient programming toward self control in the psychiatric hospital setting.** *Corrective & Social Psychiatry & Journal of Behavior Technology Methods & Therapy*, 1974(Sum), Vol 20(3), 21-24.—Unmanageable psychiatric patients are typically handled in 1 of 3 ways or in a combination of them: increased medication; isolation and/or restraints; and increased attention and supervision by staff. This study evaluated the effectiveness of a combined technique in bringing the behavior of 1 female S from an uncontrolled state (requiring restraint) to a stage of self-management which ended the need for forced control and facilitated the completion of special activities. The technique involved

positive reinforcement of the desired response and punishment of inappropriate responses. Differential reinforcement successfully controlled the patient's work and social behavior, and control was achieved in a very short time. A sufficient measure of self-regulation was achieved to allow the S to leave the hospital and become gainfully employed; however, this result cannot be directly attributed to the use of the described methodology. The relative effects of punishment and positive reinforcement as separate conditions contributing to patient control cannot be adequately evaluated from this study. Various attitudinal and behavioral changes in the staff were necessary to manage this program.—*J. Sorokac*.

5952. Wollersheim, Janet P. **Cognitive desensitization: Explication of a new technique via a case report.** *Journal of Contemporary Psychotherapy*, 1974(Sum), Vol 6(2), 146-153.—Discusses the advantages of cognitive desensitization (CD) in a variety of situations. A case history is presented of a 19-yr-old university sophomore who sought help because of extreme fear of flunking. CD helped to desensitize the stimulus situation and alleviated the anxiety inherent in the process of attitude and behavioral change. This approach is considered to have certain advantages over both ordinary desensitization and the more typical cognitive therapeutic techniques. It is concluded that CD may be the treatment of choice for certain problems associated with high anxiety.—*A. Farrell*.

5953. Young, James A. & Wincze, John P. (Dalhousie U, Halifax, Nova Scotia, Canada) **The effects of the reinforcement of compatible and incompatible alternative behaviors on the self-injurious and related behaviors of a profoundly retarded female adult.** *Behavior Therapy*, 1974(Oct), Vol 5(5), 614-623.—Used a multiple-baseline, within-S design with a 21-yr-old retarded girl in which the reinforcement of a physically compatible target behavior (eye contact with the E) resulted in a systematic increase in this behavior but no decrease in self-injurious behaviors. The reinforcement of a physically incompatible target behavior (sitting erect with hands lowered) also resulted in its increase over baseline level. Under this condition, one class of self-injurious behavior increased in frequency while another class decreased. Data indicate that the mere presence of any particular alternative behavior that is effective in obtaining reinforcement is not sufficient in itself to reduce self-injurious behavior. During a final phase of this study, response contingent shock was introduced. This procedure was effective in suppressing the class of self-injurious behavior to which it was applied. Self-injurious behavior which was not punished continued at baseline level.—*Journal abstract*.

5954. Zupnick, Stanley M. (St Vincent Hosp & Medical Ctr, Toledo, OH) **A new approach to disturbed children: The medical college school program.** *Psychiatric Quarterly*, 1974, Vol 48(1), 74-85.—Describes a treatment-oriented day-school program for emotionally disturbed children, structured according to the principles of behavioral theory. The daily routine, types of children served, and results are discussed. The program works with the parents also, using traditional psychotherapeutic principles while concurrently teaching them the use of



behavioral techniques for the home. A case example illustrating the principles and procedures of the program and a discussion of its future directions are included.—*Journal abstract.*

### Psychoanalysis

5955. Appel, Gerald. An approach to the treatment of schizoid phenomena. *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 99-113.—Describes the schizoid personality as an individual oscillating between simultaneously clinging to objects and expelling them, fleeing those who would love him and yet being unable to renounce external objects altogether. Theoretical constructs are compared, favoring a model of an ego threatened on all sides in an unresponsive universe. The schizoid experience develops early in life as a result of disturbed primary parent-child relationships, which lead the infant to turn in on itself for safety into fantasy and withdrawal. Therapy involves the provision of a reconstructive object-relationship experience which helps the patient reverse the withdrawal process and experience his own self and ego.—*B. Smith.*

5956. Binstock, William A. Purgation through pity and terror. *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 499-504.—Analyzes the "metaphor of constipation" and various modes of catharsis, from Aristotle's doctrine of esthetic purgation to the latest self-expressive movements in psychotherapy. It is argued that human emotions are not foreign substances to be expelled for reasons of self-improvement, notwithstanding Freud's original formulation of therapy as a cleansing process. (15 ref)—*C. T. Sullivan.*

5957. Bradlow, Paul A. Depersonalization, ego splitting, non-human fantasy and shame. *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 487-492.—Uses material from 4 psychoanalytic case histories to illustrate the view that predisposing factors such as discrepancies between the ego and ego-ideal lead to splitting of the ego, with some part (usually the "bad or evil self") being rejected. The resulting nonhuman fantasies and feelings of depersonalization, at least in acute episodes, may be related psychodynamically to experiences of shame. (18 ref)—*C. T. Sullivan.*

5958. Brandt, Lewis W. (U Saskatchewan, Canada) Experiments in psychoanalysis. *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 95-98.—Describes a case study which tested the hypothesis that an analysand who resists change by enslavement to an onerous ego ideal will give up part of his resistance if the analyst fulfills the patient's recommendations as to how he should be treated. Reduction of resistance was confirmed by the patient recalling memories and by openness to interpretation. The interventions of the treatment process are seen as experimental paradigms where an independent variable is manipulated and in which the dependent variable stipulated by the hypothesis occurs.—*B. Smith.*

5959. Eberenz, Udo. [The human image in psychoanalysis.] (Germ) *Heilpädagogik*, 1973(Dec), Vol 42(4), 342-349.—Discusses Habermas's critique of psychoanalysis, especially his idea of the misunderstanding of psychoanalysis by scientists. An attempt is made to formulate the method, subject matter, and purpose of psychoanalysis, and to describe the interplay of psychoanalytic theory and practice. Reference is made to Freud's

great desire for scientific comprehension, and his wish to help liberate man from irrational compulsions and dependence. The socialization theory of psychoanalysis is outlined; according to this theory, disordered object relationships in childhood, and the resulting conflicts, are responsible for irrational solutions to conflict. The psychoanalytic theory of illness is discussed, with special emphasis on the concept that actual suffering, subjectively experienced, can be diminished only through comprehension of the significance of one's earlier life. (French summary) (18 ref)—*C. Bauer.*

5960. Eigen, Michael. Abstinence and the schizoid ego. *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 493-498.—Discusses cases in which psychoanalytic patients spontaneously underwent periods of isolation and abstinence for the sake of their personal development. Such experiences can be conceptualized in terms of the rediscovery of a powerful, unintegrated structure which resembles H. Elkin's (see PA, Vol 59:8555) "schizoid ego" rather than H. Guntrip's (see PA, Vol 43:14551) "true self."—*C. T. Sullivan.*

5961. Etchegoyen, R. H. A note on ideology and psychoanalytic technique. *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 485-486.—Points out that in some cases the psychoanalyst actually imposes an ideology on the patient, but that in other cases, through projective identification, the patient falsely attributes some of his conflicting views to the analyst. This form of resistance poses technical problems which are briefly discussed.

5962. Feldman, Harold. A psychoanalytic addition to human nature. *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 133-139.—Proposes that psychoanalysis adds a new type of thought to the patient's life—control by associative samplings of feeling, the union of affect and ideas in the service of rational decision.

5963. Meadow, Phyllis W. (Manhattan Ctr for Advanced Studies, NY) A research method for investigating the effectiveness of psychoanalytic techniques. *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 79-94.—Compared the verbal behavior with which 20 psychoanalytic patients responded to 2 classes of intervention—interpretation, and contact functioning or mirroring of transference resistance. Classical interpretation included the insight-furthering techniques of confrontation, clarification, interpretation of the past, and working through. Contact functioning used the ego-insulating techniques of echoing the ego and devaluating the object. 4 transference-resistance responses were investigated: projection of self-hatred, turning anger against the self, projection of absence of positive affect, and threats of acting out. 2 psychoanalyst judges rated the patients' tape-recorded transcripts on 3 scales to show the range of inhibition or lack of inhibition in expressing feeling, detailing of history, and presence of insight. Greater change was found when the analyst reflected the patient's mode of defense than when he interpreted it. (27 ref)—*B. Smith.*

5964. Ornstein, Paul H. & Goldberg, Arnold. (U Cincinnati, Medical School) Psychoanalysis and medicine: I. Contributions to psychiatry, psychosomatic medicine and medical psychology. *Diseases of the Nervous System*, 1973(Apr), Vol 34(4), 143-147.—Con-

siders the areas of medicine in which psychoanalysis has had an impact as (a) a treatment process, (b) a theory of the mind and a body of knowledge about human development, and (c) a method of research into the personality and its aberrations. The impact of Freudian concepts of the unconscious, transference, and early infantile and childhood development on psychiatry and psychotherapy is discussed. The contribution of psychoanalysis as a method of research has led to knowledge about the etiology, pathogenesis, and curative processes of mental illness. Psychoanalysis as a theory and technique is also closely linked to the entire field of psychosomatic medicine, and has contributed to the formation of medical psychology, which considers such issues as the emotional climate in which illness can attain a remission or cure. However, it is suggested that medical psychology has not been assimilated into general medical practice because psychoanalysts have failed to translate their knowledge into effective and communicable therapeutic measures applicable to the medical field.—A. Olson.

5965. Robinson, Lillian H. (Tulane U, Medical School) **Sleep and dreams in the analytic hour: The analysis of an obsessional patient.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 115-131.—Discusses the functions of sleep during analysis, using the case of an obsessional patient to illustrate the theory. Sleep is seen to serve multiple purposes: to be a defense against instinctual impulses as well as their symbolic gratification, to be a resistance to analysis and an escape from and submission to wishes to be dependent on the analyst. By interpreting and understanding the meaning of each episode, the sleep behavior can expedite analysis by facilitating the patient's acceptance of his inner striving and by increasing his ability to relinquish his defense of excessive control.—B. Smith.

5966. Saperstein, Jerome L. & Gaines, Jack. **Metapsychological considerations on the self.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 415-424.—Discusses a basic dichotomy between metapsychological theory and clinical practice in psychoanalysis. The former uses "ego" and related concepts to deal with individual functioning from an objective standpoint, but the latter needs a different concept, such as the "supraordinate self," to reflect the subjective, experiential aspects of the "self-as-agent" in decision-making and other purposeful, meaningful activities. It is hoped that this conceptual innovation will help to bring theory and practice into closer agreement. (29 ref)—C. T. Sullivan.

5967. Shafii, Mohammad. (U Michigan, Medical Ctr, Children's Psychiatric Hosp) **Silence in the service of ego: Psychoanalytic study of meditation.** *International Journal of Psycho-Analysis*, 1973, Vol 54(4), 431-443.—Describes the beneficial effects of meditative silence, in contrast to the usual psychoanalytic position that silence indicates a defensive lack of verbalization on the patient's part. (37 ref)

5968. Strean, Herbert S. (Rutgers State U, Graduate School of Social Work, New Brunswick) **Psychoanalytically-oriented casework versus behavior modification therapy.** *Clinical Social Work Journal*, 1973(Fal), Vol 1(3), 143-160.—Illustrates the usefulness of both forms of treatment, and points out the disadvantages of

accepting one form to the exclusion of the other. The importance of tailoring treatment modalities to the needs of the client is stressed.

5969. Weiner, Herman. **Toward a body therapy.** *Psychoanalytic Review*, 1974(Spr), Vol 61(1), 45-52.—Reevaluates and upholds the view of catharsis as a therapeutic modality to integrate body-mind. Insight based on insufficiently relived experiences is considered inadequate, because repressed memories were never rightfully lived in the first place. The functions of the nondominant cortical hemisphere are noted in terms of body-mind integration.

### Counseling & Community Mental Health & Crisis Intervention

5970. ———. **A community treatment program: Mendota Mental Health Institute, Madison, Wisconsin.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 669-672.—Describes an intensive treatment program, called Training in Community Living, in which mental patients live and work in the community with support from a specially trained staff. Patients remain in the program for 14 mo and are gradually linked with appropriate community services.

5971. ———. **A plan for minimizing psychiatric casualties in a disaster: Columbia Area Mental Health Center, Columbia, South Carolina.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 665-668.—Details a plan which calls for the center to operate as an information and communications center on disaster casualties, to provide a site for reuniting families and a haven for uninjured survivors, and to give immediate counseling or treatment to those in distress or shock.

5972. Birger, Daniel; Plutchik, Robert & Conte, Hope R. (Albert Einstein Coll of Medicine, Yeshiva U) **The evolution and demise of a crisis intervention program in a state hospital.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 675-677.—A crisis intervention team at a state hospital offered professional services to approximately 27 patients before it was disbanded after 6 mo of operation. The evolution of the team and the conflicts that led to its demise are described, and the experience is evaluated.

5973. Caplan, Harvey W. & Black, Rebecca A. **Unrealistic sexual expectations.** *Medical Aspects of Human Sexuality*, 1974(Aug), Vol 8(8), 8-36.—Considers that most sexual problems are centered around unrealistic expectations, particularly distorted conceptions about orgasm. Problems involving performance anxiety, sexual responsiveness, and frequency of intercourse are examined, and case examples are included. It is suggested that the dichotomy between and the unquestioning acceptance of concepts of masculinity and femininity in contemporary society may often reinforce distorted and incorrect ideas about sexual behaviors. Suggestions for counseling patients are presented.—L. Gorsey.

5974. Crum, Roger S. (Lutheran Welfare Services of Illinois, Presbyterian—St Luke's Hosp, Chicago) **Counseling rape victims.** *Journal of Pastoral Care*, 1974(Jun), Vol 28(2), 112-121.—An emergency room chaplain presents a case verbatim of counseling a rape victim. Counseling focused first on the patient's need for help in managing the psychological, social, and legal issues



raised by the family and the police, and then on her need for recall of the trauma and private reflection on it.

5975. Cull, John G. & Hardy, Richard E. (Eds.). (Virginia Commonwealth U) **Deciding on divorce: Personal and family considerations.** Springfield, IL: Charles C Thomas, 1974. xiii, 158 p.

5976. Davis, Ann E.; Dinitz, Simon & Pasamanick, Benjamin. (Miami U) **Schizophrenics in the new custodial community: Five years after the experiment.** Columbus, OH: Ohio State University Press, 1974. xxviii, 214 p.—Presents findings and case histories from a long-term study of social, familial, and vocational adaptive behavior patterns in schizophrenics after hospital release, emphasizing the success of various treatment procedures, the social factors that contribute to psychotic episodes, and the patients' ability to make satisfactory personal and vocational community adjustments. Suggestions for treatment of schizophrenics and community programs are also presented. (13 p ref)

5977. Daylong, William B. (First Baptist Church, Reedsburg, WI) **Beyond the wall of silence: Pastoral care of the stroke patient.** *Journal of Pastoral Care*, 1974(Jun), Vol 28(2), 122-133.—Describes and discusses the difficulties faced by stroke patients and the use of pastoral conversation as a rehabilitative tool. The results of a stroke leave the patient with traumatic knowledge of his illness, physical disabilities, and mental disabilities due to brain damage. The emotional reactions to these deficits are fear, anger, depression, and feelings of isolation and loneliness. A commonly perceived interpretation of the stroke experience is a conviction of sin. The pastor can help the patient give positive meanings to his experience. He can provide knowledge of the illness and its effects, a relationship that helps the patient reestablish his place in his environment, a creative approach to rehabilitation, and a supportive church community.—B. Smith.

5978. Dibner, Susan S. **Newspaper advice columns as a mental health resource.** *Community Mental Health Journal*, 1974(Sum), Vol 10(2), 147-155.—Reports results of a study of 100 letters sent to 2 newspaper advice columns in 1958-1968. Findings indicate that people using this source of help blamed others for their problems and did not see themselves as needing to change. Besides being seen as a place to get advice, newspaper columns were used to obtain specific and general psychological information or to express an opinion. Findings are compared to those concerning other community sources of help. It is suggested that advice columns may appeal to people who would not go elsewhere as well as those in the process of finding a more "professionally trained" practitioner.—*Journal abstract.*

5979. Everett, Henry C. (Harvard U, Medical School, Boston) **Sexual demands which cause marital conflict.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 113-114.—Presents counseling suggestions for dealing with sexually incompatible couples, including the necessity of distinguishing between qualitative and quantitative demands of one partner, the importance of talking with the partners both individually and jointly, the need to create an objective and reassuring atmosphere, and

the importance of facilitating open and honest communication between the partners.

5980. Gadpaille, W. J. **Masturbation in preadolescent girls.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 179-180.—Presents suggestions for family physicians and pediatricians in assessing the problem of preadolescent girls' masturbation. 2 major factors in counseling are identified: the parents' feelings and attitudes, and the girl's age and level of maturation. Methods of evaluating the child's motivations, handling the problem of compulsive masturbation, and reassuring parents about the normality of masturbation are briefly considered.

5981. Galin, Richard S. (Brentwood VA Hosp, Los Angeles, CA) **A modular, community-oriented treatment program: For the chronic incapacitated psychotic patient with severe residual psychosocial impairment.** *Psychiatric Quarterly*, 1974, Vol 48(1), 26-49.—Outlines current deficiencies of hospital-based treatment programs for chronic psychotic patients. The specific structure and organization of a new and innovative program is described in which the basic elements are interpersonal and resocialization emphasis, a thoroughly humanistic and therapeutic milieu, individualized and psychosocially based treatment of a 3-stage and 2-setting design, an implemented continuity of care principle extended into the community satellite aftercare center and outpatient phases of treatment, expanded and enriched roles and team approach of staff, and considerable flexibility. 6 suggestions are offered for research and evaluation which might demonstrate wide applicability of the program. (34 ref)—*Journal abstract.*

5982. Gass, Gertrude Z. (Grosse Pointe Farms, MI) **Equitable marriage.** *Family Coordinator*, 1974(Oct), Vol 23(4), 369-372.—Considers that counselors and psychotherapists must increasingly concern themselves with changing role relationships in marriage. Attempts to establish an equity in marriage have received little attention in professional journals. These shifts need careful study by clinicians so that couples may be supplied with options that lead to self-realization and fulfillment for both partners.—*Journal abstract.*

5983. Hackney, Harold. (Purdue U) **Applying behavior contracts to chronic problems.** *School Counselor*, 1974(Sep), Vol 22(1), 23-30.—Describes the behavior contract as a formal agreement between the client and others who affect or are affected by the client's behavior. The objectives of this contract are to obtain a commitment to change, to effect the change, and to agree in advance what the consequences of the change will mean for all involved. Critical elements of behavioral contracts—identifying observable target behaviors, recording observed behaviors, establishing performance criteria, defining reinforcement schedule, and determining a time within which behavioral change is to occur—are discussed and illustrated by an example. Behavioral contract emphasizes structure, clarifies roles and responsibility, and identifies alternative behaviors and their consequences.—A. S. Helge.

5984. Hagin, Rosa A. & Corwin, Carol G. (New York U, Medical Ctr, Learning Disorders Unit) **Bereaved children.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 39-40.—Examines the mental

health consequences to the child of parental death, and the development of his inner concept of death. Helping the bereaved child involves preventing distorted grief responses and encouraging the normal processes of mourning. Both parents and surviving siblings need assistance when it is a child that dies. Effective intervention in the mourning process is necessary to help children deal with grief through their own life experiences and in terms of the culture in which they live.—A. Krichev.

5985. Harper, Frederick D. & Stone, Winifred O. (Howard U) **Toward a theory of transcendent counseling with blacks.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jul), Vol 2(4), 191-196.—Presents a 10-point theory that is suggested as a framework for counseling black Americans as a distinct cultural and ethnic group. The importance of the counselor's orientation or outlook regarding blacks and of his choice of counseling techniques is emphasized. Based on the belief that black students often need immediate results to problems, a counseling technique that is supportive, directive, and informative or one which employs acceptance, advising, approval, persuasion, assurance, and probing techniques is suggested.—M. E. Pounsel.

5986. Hawkins, David R. (U Virginia, Medical School) **Disturbing erotic fantasies.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 177-178.—Presents suggestions for the nonpsychiatric physician in treating the patient who presents erotic fantasies, emphasizing that it is crucial to understand the nature, origins, and purposes of the fantasy that is disturbing. 5 factors which are important in history taking and counseling are presented, and underlying themes of some fantasies are noted.

5987. Helner, Philip A. & Jessell, John C. (Southfield Public Schools, MI) **Effects of interpretation as a counseling technique.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 475-481.—Through the use of videotaped, simulated counseling situations, the reactions of 50 4th-grade, 10 10th-grade, and 50 graduate school males toward the technique of interpretation were examined. The feelings of Ss toward interpretation were compared with their feelings toward the techniques of reflection, advice giving, and probing. A significant number of Ss of each educational level expressed negative feelings toward the use of interpretation. Implications of the use of interpretation in counseling are discussed. (17 ref)—*Journal abstract*.

5988. Hetznecker, William & Forman, Marc A. (Temple U, Health Sciences Ctr) **On behalf of children.** New York, NY: Grune & Stratton, 1974. xviii, 232 p.—Presents an account of the authors' experiences in child mental health programs, emphasizing problems and procedures involved in the development of clinical services, consultation, and new manpower resources. Topics include the transformation of a traditional child guidance clinic into a community psychiatric clinic, problems in school consultation, and evaluations of parent education and mental health assistant programs.

5989. Isquith, Robert N. **Health-related audiovisual aids for Spanish-speaking audiences.** *Health Service Reports*, 1974(Mar), Vol 89(2), 188-202.—Provides an annotated list, with prices and distributors of films, TV

spots, filmstrips, and slides, which appear in a book distributed without charge by the Health Services Administration of the US Public Health Service.

5990. Kety, Seymour S. (Harvard U, Medical School, Boston) **Research still holds the answer.** *MH*, 1974(Win), Vol 58(1), 6-8.—Federal and state governments and private foundations are responding to the waning of public enthusiasm by cutting psychiatric research funds and turning to other problems. It is argued that mental health research is still the most practical and efficient way to utilize our scientific and financial resources for greatest social benefits.

5991. Kroeker, L. L. (U Rochester, Counseling & Special Services) **Pretesting as a confounding variable in evaluating an encounter group.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 548-552.—Evaluated the effectiveness of an encounter group designed to enhance relationships between 3 groups of 68 15-21 yr old black inner-city males and 3 groups of 38 white and 2 black policemen and the interaction between pretesting and treatment and its effects on outcome. There were 3 experimental and 3 control groups which either did or did not participate in the pretest and treatment portions of the study; all groups completed the posttest. The 2 evaluation measures were the Alienation Index Inventory and a specially developed projective device; these were administered by white and black Es to same-race groups. Results indicate that the proportion of variance contributed by pretesting is influenced by group membership, treatment, and outcome criterion and is largely unpredictable. It is suggested that such variance be controlled in each experiment. (16 ref)—L. Gorsey.

5992. Lassiter, Robert A. (Virginia Commonwealth U, School of Community Services) **Group counseling with people who are mentally handicapped.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Discusses issues surrounding the use of group counseling as a means of treating the mentally handicapped client. These include a review of the literature, a rationale for the role of the worker as a group counseling leader, and general guidelines for establishing a systematic pattern for counseling individuals with various mentally handicapping conditions.

5993. Lee, Soong H.; Gianturco, Daniel T. & Eisdorfer, Carl. (Duke U, Medical School) **Community mental health center accessibility: A survey of the rural poor.** *Archives of General Psychiatry*, 1974(Sep), Vol 31(3), 335-339.—Surveyed 223 households, including 70% from low social classes, about community and personal problems and where they seek help for these problems. There was a high prevalence of "mental health problems," yet a majority of the persons affected sought no help. Very few people considered the mental health center as a resource, and local physicians were the overwhelming choice for those who would seek help. A large percentage of lower-class people did know the purpose of the clinic but saw mental health problems in a pejorative fashion. Fear of being identified as mentally ill was an effective barrier to seeking services. Findings suggest that long-term community education, indigenous workers, and back-up services to local physicians would



facilitate mental health service to the community.  
—*Journal abstract.*

5994. **Lemere, Frederick.** (U Washington, Medical School) **The sexless marriage—necessarily a problem?** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 81-82.—Presents suggestions for counseling each partner involved in a sexless marriage, emphasizing that this may not be a problem when there is deep and abiding affection based on a mutual respect. Recommendations for evaluating the potential for corrective therapy and what to counsel when the marriage will remain sexless are also noted.

5995. **Lester, David.** (Richard Stockton State Coll) **Effect of suicide prevention centers on suicide rates in the United States.** *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 37-39.—Compared suicide rates in 8 cities which had established prevention centers by 1967, 8 which had centers by 1969, and 8 cities without centers. Data on suicides in 1960 and 1969 were studied. It is concluded that suicide prevention centers do not appear to have a statistically significant effect on the suicide rate of cities.

5996. **Lilleskov, Roy K.** (Jewish Board of Guardians, Child Development Ctr, New York, NY) **Experiences with early intervention.** *Psychosocial Process*, 1974(Spr), Vol 3(1), 14-27.—Describes several kinds of problems encountered in a day care program for children under 3 yrs old from a high risk population (disorganized, multiple-problem families of the lower lower class). 3 cases are presented: Andy, an 18-mo-old boy who was withdrawn and showed retarded social and speech skills; Betty, an 18-mo-old girl who was inactive, could not walk, and was unable to manipulate objects; and Dora, a normal child. It is concluded that (a) day care can serve as a basis for many types of intervention, (b) day care can supplement the maternal function, and (c) in many cases a clinical assessment is needed to work with parents.—*J. M. Kleinman.*

5997. **Luckey, Robert E. & Shapiro, Ira G.** **Recreation: An essential aspect of habitation programming.** *Mental Retardation*, 1974(Oct), Vol 12(5), 33-35.—Discusses the importance of recreation to the total system of habilitative services for mentally retarded persons in terms of previous and current trends in the field. The role of the parent-volunteer movement, and recent developments which suggest that the full normalizing potential of recreational programming may be achieved in the future, are also discussed.—*Journal abstract.*

5998. **Marcotte, David et al.** (Medical U, South Carolina) **What sexual literature do you advise patients to read?** *Medical Aspects of Human Sexuality*, 1974(Aug), Vol 8(8), 66-85.—Presents recommendations of 5 psychiatrists and gynecologists for books and journals that persons seeking sexual counseling and/or treatment should read. Books for several age groups are included, and suggestions for concurrent counseling are presented.

5999. **Mazade, Noel A.** (U North Carolina, Medical School, Chapel Hill) **Consultation and education practice and organizational structure in ten community mental health centers.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 673-675.—45 staff members involved in consultation and education rated the organizational flexibility of their centers and indicated

the time they spent in each of 8 types of activities. Resulting data suggest that the research model is of value in studying the nature and direction of mental health center programming.

6000. **Paykel, Eugene S. et al.** (St George's Hosp, London, England) **Treatment of suicide attempters: A descriptive study.** *Archives of General Psychiatry*, 1974(Oct), Vol 31(4), 487-491.—Examined treatment patterns and their determinants in 274 suicide attempters coming to an emergency room. Only a small proportion (9.1%) required medical hospitalization. 44% were admitted to psychiatric hospitals and 38% referred for outpatient treatment. On follow-up of a sample of outpatient referrals, only half came for their 1st appointment. Comparisons of treatment groups (on the Los Angeles Suicide Prevention Center Assessment of Suicidal Potentiality and the Hamilton Rating Scale for Depression) indicated that the decision to hospitalize was independent of social factors but was strongly related to relevant clinical criteria reflecting severity and suicidal risk. Choice of facility for hospitalization was related to some nonclinical factors. Reasons for outpatient nonattendance were less clear, and its reduction presents a major therapeutic challenge. (16 ref)—*Journal abstract.*

6001. **Reiner, Beatrice S. & Edwards, Raymond L.** (Juvenile Welfare Board of Pinellas County, FL) **Adolescent marriage: Social or therapeutic problem?** *Family Coordinator*, 1974(Oct), Vol 23(4), 383-390.—Presents a study of 50 marriage counseling cases where both partners were under 20 yrs of age at the time of marriage. It is concluded that the vulnerability of early marriages due to inexperience, lack of preparation, unconsolidated identities, and problems carried over from families of origin is greatly increased by the failure of communities to provide the basic economic and human supports formerly offered by family networks. Suggested methods for identifying the social needs of these couples, for designing preventive education programs, and for counseling are noted.—*Journal abstract.*

6002. **Schnell, Richard.** (Children's Hosp Medical Ctr, Developmental Evaluation Clinic, Boston, MA) **Helping parents cope with the dying child with a genetic disorder.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 34-35.—Suggests that tact, sensitivity, perceptiveness, and good taste are necessary when informing parents of a diagnosis of a fatal disease in their child. The presence of at least 2 people in the discussion with the parents is helpful. Further counseling of parents should be directed toward the child's rights and needs and should emphasize the rewards to be obtained as well as the parents' own need to give to the child. Informing the child and helping him are equally important.—*A. Krichev.*

6003. **Schooley, Christopher C.** (Louisville Presbyterian Theological Seminary, KY) **Communicating with hospitalized children: The mutual storytelling technique.** *Journal of Pastoral Care*, 1974(Jun), Vol 28(2), 102-111.—Suggests that through the mutual story telling technique, in which hospitalized child and pastor exchange stories, support, hope, and healing can be encouraged by the pastor. At the same time, the child

can be encouraged to express despair, anger, and anxiety.

6004. Smith, Mary L. (U Colorado, School of Education) **Influence of client sex and ethnic group on counselor judgments.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 516-521.—Asked 198 secondary school counselors to predict the academic success and choose an appropriate career for 4 hypothetical cases in which the sex and ethnic group designation were varied systematically. Results show that variation in sex and ethnic group designation did not produce variations in counselor evaluations. Counselor sex was not related to systematic variance in evaluations. Several reliable sources of variability were identified, including the target situation the client was projected into and counselor response style. (17 ref)—*Journal abstract*.

6005. Sternlicht, Manny & Sullivan, Ina. (Willowbrook Developmental Ctr, Queens Unit, Staten Island, NY) **Group counseling with parents of the MR: Leadership selection and functioning.** *Mental Retardation*, 1974(Oct), Vol 12(5), 11-13.—Describes the various roles and functions of the leader of a parents group, and argues for a maximum of flexibility in accordance with the aims and objectives of the particular group. The concept of several leaders is explored, and the objectives of diverse types of groups discussed.—*Journal abstract*.

6006. Tavormina, Joseph B. (U Virginia) **Basic models of parent counseling: A critical review.** *Psychological Bulletin*, 1974(Nov), Vol 81(11), 827-835.—Defines the structure of parent counseling procedures, which represent a new trend in therapeutic strategy for behavior problems in children. Research evidence on the effectiveness of 2 basic counseling models—the behavioral and the reflective—is evaluated. Included are analyses of design, methodology, and outcome derived from each method. Overall, both strategies have been reported as successful with a variety of problem behaviors and divergent populations. However, exploration of the relative effectiveness of these models through comparative cost efficiency studies with specific problems and specific types of children is needed to enhance optimal utilization of available mental health services. (51 ref)—*Journal abstract*.

6007. Thoreson, Carl E. & Anton, Jane L. (Stanford U, School of Education, Ctr for Research & Development in Teaching) **Intensive experimental research in counseling.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 553-559.—Considers that experimental research in counseling has been dominated by pretest-posttest designs. However, intensive designs that examine treatment processes and effects with individuals over time offer several advantages, such as immediate data on how treatment influences clients. K. R. Mitchell's (see PA, Vol 44:4151) article on using an intensive design is analyzed. Several design and analysis problems are discussed, such as inadequate experimental control and nonindependence of data. Alternative designs and analysis methods are presented. (30 ref)—*Journal abstract*.

6008. Weisman, Avery D. (Massachusetts General Hosp, Boston) **Coping with untimely death.** *Psychiatry*, 1973(Nov), Vol 36(4), 366-378.—Defines the differences between timely and untimely deaths within their socio-

psychological contexts. Untimely deaths include those that are premature, unexpected, and calamitous. Professional intervention techniques are outlined.

6009. Williams, Arthur R. (Private practice, Anamosa, IA) **The initial conjoint marital interview: One procedure.** *Family Coordinator*, 1974(Oct), Vol 23(4), 391-395.—Describes a model format for the initial conjoint marital interview which takes into account the need to reduce the anxiety of both partners, the elicitation of pertinent data, diagnosis and treatment plan development, the determination of the length of therapy, and the use of the interview as a teaching-supervising tool. 6 specific areas which constitute the "marital inventory" are identified—religion, friends, in-laws, activities, budget, and sex—and recommendations for obtaining complete and factual information about these areas are presented. The need to view the marriage relationship itself as a "3rd person" is discussed as a useful tool in reducing anxiety and in gaining the active cooperation of the couple.—L. Gorsey.

6010. Williams, Bertha M. (U Tennessee, Student Counseling Ctr) **Trust and self-disclosure among black college students.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 522-525.—Investigated 2 models of counseling to determine which best facilitated self-disclosure and trust in 18 black undergraduates. One model involved professional counselors; the other consisted of minimally trained peer counselors. Ss were systematically assigned to 1 of the 2 models and exposed to 5 60-min counseling sessions with either a professional or a peer counselor. It was hypothesized that persons participating in a peer counseling experience will trust and self-disclose at a higher level than persons participating in a professional counseling experience. Data from the Self-Disclosure Questionnaire and J. B. Rotter's 1967 Interpersonal Trust Scale did not support the hypothesis. Both groups disclosed and trusted at a significantly higher level after treatment. (17 ref)—*Journal abstract*.

6011. Willis, Diane J. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **The families of terminally ill children: Symptomatology and management.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 32-33.—Notes that the psychologist must personally come to grips with the notion of death in order to work with the child's family. The bereaved family and siblings are discussed and several approaches to counseling the family are suggested. (18 ref)

6012. Wright, Logan. (U Oklahoma, Health Sciences Ctr, Children's Memorial Hosp, Oklahoma City) **An emotional support program for parents of dying children.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 37-38.—Notes that children who are dying are usually aware of it, yet many parents and hospital staff members avoid the subject. Research now underway on a consultation program with dying children and their parents is described.

### Physical Treatment

6013. ———. **Psychosurgery: An NAMH position statement.** *MH*, 1974(Win), Vol 58(1), 22-23.—States the position of the National Association of Mental Health regarding psychosurgery. It is suggested that this radical procedure for control of behavior be curtailed



and used only after the serious ethical and legal issues have been fully explored and all other means of controlling behavior have been exhausted. More research utilizing nonhuman Ss is suggested.

6014. Avery, Wanda; Gardner, Carolyn & Palmer, Suzanne. (U California, San Francisco) **Vulvectomy.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 453-455.—Describes the psychological effects of vulvar carcinoma in women. Psychological factors of depression, existential anxiety, fear of disfigurement and loss of sexual-reproductive functions are characteristic of women requiring a vulvectomy. Implications of these psychological factors for professional care providers and family members are discussed.

6015. Blegvad, B. (U Hosp, State Hearing Ctr, Odense, Denmark) **Clinical evaluation of behind-the-ear hearing aids with compression amplification.** *Scandinavian Audiology*, 1974, Vol 3(2), 57-60.—42 selected patients with hearing impairment of purely perceptive type and with definite recruitment by Metz's test compared a behind-the-ear hearing aid with amplitude compression and linear amplification over a 2-mo period. 13 patients chose the compression amplifier hearing aid, while the remainder preferred the conventional amplifier. Subjective evaluation revealed only minor differences between the 2 types of apparatus.

6016. Breggin, Phyllis. (Washington School of Psychiatry, DC) **Underlying a method: Is psychosurgery an acceptable treatment for "hyperactivity" in children.** *MH*, 1974(Win), Vol 58(1), 19-21.—Explores the positive and negative effects of psychosurgery as a treatment for hyperactivity. Desired results are rarely obtained, unwanted side effects occur in the personality, and the operation is irreversible. Until more research has been conducted, discontinuation of this method of altering undesired behavior is urged.

6017. Hertz, Dan G. & Schneidman, Gurit. (Hadassah U Hosp, Hebrew U—Hadassah Medical School, Jerusalem, Israel) **Psychosomatic aspects of induced ovulation.** *Psychosomatics*, 1974, Vol 15(3), 109-112.—Reports preliminary observations on emotional reactions of 3 women conceiving after long infertility (3-7 yrs). Short clinical vignettes describe fluctuations of mood and increased emotional lability during repeated therapeutic efforts to induce ovulations. The sudden confrontation of the anovulatory woman with her reproductive ability provokes this normative crisis. Multiple intrapsychic and interpersonal factors (parental relationship, husband role, feminine identity) are considered as precipitating factors in the development. Duration of the sterile period appears to be of major importance to the extent and quality of the emotional reactions. (15 ref)—*Journal abstract*.

6018. Hingson, Ralph. (Boston U, Medical School) **Obtaining optimal attendance at mass immunization programs.** *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 53-64.—Outlines a program designed to increase attendance at mass immunization centers. Receptivity to immunization is described as a 3-step behavioral process: learning about the program, deciding to attend, and attending. (43 ref)

6019. Huang, Jacob C. & Fanta, Eugene. (New York City Dept of Health, Lower East Side Health District,

NY) **Disease patterns and the team approach to the practice of family medicine.** *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 25-30.—Presents a case report of a family in health crises. The traditional method of treating individual illnesses would not have been effective, but a team approach led to the recognition and effective treatment of the disease pattern of the family. Changes in attitude, tension reduction, and increased self-confidence were observed.

6020. Jurko, M. F.; Andy, O. J. & Giurintano, L. P. (U Mississippi, Medical Ctr, Jackson) **Changes in the MMPI as a function of thalamotomy.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 569-570.—For MMPIs administered to 8 patients prethalamotomy and at varying intervals postsurgery, the only significant long-term change was a decrease in hypomania; for short-term (5 days) there was a decrease in psychasthenia.

6021. Kubala, Stephanie & Clever, Linda H. (St Xavier Coll) **Acceptance of the nurse practitioner.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 451-452.—Attempted to identify attitudinal differences toward health care delivery between patients treated by conventional physician-controlled clinics and patients treated by nurse practitioner-controlled clinics. Ss were 84 patients 40-80 yrs old from a general medical clinic who had been treated during the previous 6 mo. Their health problems were stabilized diseases which required continuing treatment. Ss were randomly assigned to 2 groups: those whose primary care was provided by their physician and those whose care was referred to a nurse practitioner. Evaluations of the patients' experience of their care, made during treatment, indicate 3 objections to nurse practitioners: (a) dissatisfaction with the title of nurse practitioner, (b) fear of changes in their established treatment, and (c) fear that continuity of care will diminish. Implications of the identified attitudinal changes are discussed in terms of educational needs for health care professionals, patients, and their families. —R. G. Gibson.

6022. Macgregor, Frances C. (New York U, Medical Ctr, Inst of Reconstructive Plastic Surgery) **Transformation and identity: The face and plastic surgery.** New York, NY: Quadrangle/New York Times Book, 1974. xxv, 230 p. \$8.95.

6023. Pfeiffer, Eric. (Duke U, Medical School) **Interacting with older patients.** In E. W. Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

6024. Uehling, David T. (U Wisconsin, Madison) **When a patient requests vasectomy.** *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 191-192.—Describes issues in patient screening for vasectomy, in counseling both partners about possible complications and legal considerations, and in conducting follow-up evaluations of the operation. The physician must emphasize in his discussions with the patient that the operation is voluntary and probably irreversible.

### Social Casework & Rehabilitation

6025. Arcaya, Jose. (Westmoreland County Community Coll, Youngwood, PA) **Probation and parole records considered as therapeutic tools.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 150-161.—Ar-

gues that 2 activities of probation officers, record-keeping and individual counseling, are complementary in nature and may be used to facilitate communication between officers and their clients. It is suggested that probation officers' records are of equal, if not greater, importance to the client than to the legal and judicial bureaucracies. How the typical probation officer maintains his records is described, along with how these records might be used to increase the probation client's self-awareness of his history and experiences. A methodology for involving the client in record-keeping activities is presented, and traditional objections which might be raised against this procedure are examined. The need to treat probation clients as responsible citizens is emphasized.—*L. Gorsey.*

6026. **Bratter, Thomas E.** (New York City Dept of Probation, Group Dynamics Project, NY) **Guardian, behavioral engineer, advocate, friend: Humanistic roles for probation officers.** *Corrective & Social Psychiatry & Journal of Behavior Technology Methods & Therapy*, 1974(Sum), Vol 20(3), 1-9.—Identifies 4 sequential role changes in the probation relationship which are believed to expedite positive and responsible behavioral change in the adolescent offender. (a) As guardian, the probation officer (PO) enforces responsible behavior. By legal mandate, he must reconstruct the parent-child relationship and must establish and enforce limits. (b) As a behavioral engineer, the PO encourages the offender to test new behavior and ways of thinking. This aspect of treatment becomes problem-solving. The most effective technique to enable the probationer to view himself realistically is confrontation. (c) As an advocate, the PO is committed to action and becomes the offender's representative, negotiator, intervener, broker, supporter, consultant, etc, particularly in facilitating educational and vocational mobility and in encouraging economic autonomy. This role enables the PO to make more demands on the adolescent to continue to actualize his potential. (d) If the probation process has been effective, the final phase of the relationship is less authoritarian. The previous relationship of unequals may, if desired by both parties, lead to the construction of a relationship of equals, i.e., to friendship. (25 ref)—*J. Sorokac.*

6027. **Braukmann, Curtis J. et al.** (U Kansas) **An analysis of a selection interview training package for predelinquents at Achievement Place.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 30-42.—Evaluated the effectiveness of an interview skills training program for boys at Achievement Place, a small family-style behavior modification program for adolescents with behavior problems. The program was developed to teach appropriate social behaviors and mannerisms in job interviews. 3 experiments were conducted with a total of 6 12-16 yr old boys; Ss were rated on 4 measures—social behaviors, personal appearance, volunteering of information, and posture. Data from pre- and posttraining videotaped observations of Ss indicate (a) that the training package was effective, at least in combination with the opportunity to earn additional money, in teaching boys appropriate interview behaviors and (b) that naive trainers, given the specific training materials package, can be as effective as the present Es in teaching the various skills.—*L. Gorsey.*

6028. **Brieland, Donald.** (U Illinois, Jane Addams School of Social Work) **Children and families: A forecast.** *Social Work*, 1974(Sep), Vol 19(5), 568-579.—Considers that whether social work will be able to successfully forecast the needs of children and families in the 1980s depends on the profession's response to broader societal issues, including income security, unemployment, health services, education and advocacy, population growth, adoption, juvenile rights and child protection, and legal actions against mismanagement, mistreatment, or malpractice. Future needs in these areas that can be served by social workers are discussed. (34 ref)

6029. **Brody, Elaine M. & Brody, Stanley J.** (Philadelphia Geriatric Ctr, PA) **Decade of decision for the elderly.** *Social Work*, 1974(Sep), Vol 19(5), 544-554.—Discusses the current status of the elderly population in the US, emphasizing the role of social work in handling problems related to age discrimination, stereotypes of "old people," economic conditions, health and social service needs, the need for a widening of social and occupational roles of the elderly, and increasing the diversity and activity of their social and physical environments. (40 ref)

6030. **Cull, John G. & Hardy, Richard E. (Eds.).** (Virginia Commonwealth U) **Administrative techniques of rehabilitation facility operations.** Springfield, IL: Charles C Thomas, 1974. xv, 279 p. \$15.75.—Presents a series of 13 papers on sheltered workshop administration, personnel administration in rehabilitation facilities, training programs for workshop administrators, staff development responsibilities in rehabilitation programs, and legal and financial considerations in operating rehabilitation facilities.

6031. **Goodman, James A.** (National Academy of Sciences, Inst of Medicine, Washington, DC) **Racial minorities in the 1980s.** *Social Work*, 1974(Sep), Vol 19(5), 580-584.—Predicts that a focus on humanistic concerns during the 1980s will change conditions for minorities in the US. Current social trends and conditions that will affect the quality of life and help remove barriers to racial equality are identified, and the role of the social work profession in widening the scope of these trends is discussed.

6032. **Ho, Man Keung & McDowell, Eunice.** (U Oklahoma, School of Social Work) **The black worker-white client relationship.** *Clinical Social Work Journal*, 1973(Fal), Vol 1(3), 161-167.—Discusses factors which influence the establishment of meaningful relationships between black workers and white clients.

6033. **Irwin, John.** (California State U, San Francisco) **The trouble with rehabilitation.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 139-149.—Examines the processes in the correlational setting that consistently defeat attempts to achieve humanistic and democratic models of rehabilitation. It is argued that these attempts, although planned with good intentions, run against insurmountable barriers inherent in the operations of correctional systems. The decrease in importance of postrelease rehabilitation programs, and 4 internal, often unstated, concerns of correctional officials often operate as barriers against effective rehabilitation; these concerns include increasing the ease of employee work



routes, reducing outside criticisms, maintaining moral superiority of the employees over the prisoners, and maximizing the autonomy of the bureaucracy. Data from the NewGate college education projects at several western state penitentiaries are presented which show that successful changes in correctional facilities must come from outside the institution. 4 phases of correctional-staff response to outside programs are described and cited as reasons for the failure of rehabilitative efforts. —L. Gorsey.

6034. Jaques, Marceline E. & Patterson, Kathleen M. (State U New York, Rehabilitation Counseling Program, Buffalo) **The self-help group model: A review.** *Rehabilitation Counseling Bulletin*, 1974(Sep), Vol 18(1), 48-58. —Self-help mutual aid groups are organized by peers who share a common problem. Through group identification, mutual support, and modeling, behavior is directed toward learning a new coping life style. 2 group types exist, one of individuals with a problem or condition and the other of family or friends of persons with a problem or condition. The latter type most frequently functions as an advocacy or social action group; the former are primarily occupied with their personal problem solving and programs. Alcoholics Anonymous is credited with organizing the 1st self-help group more than 35 yrs ago and providing the model for many others to follow. This "people's movement" has provided a parallel system of care to that of the professional model where it is not widely known or accepted. The self-help group model is considered to be a viable and necessary part of a total rehabilitation service system. (33 ref)—*Journal abstract*.

6035. Katrin, Susan E. (Georgia State U) **The effects on women inmates of facilitation training provided correctional officers.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 5-12.—Studied the effectiveness of a 40-hr, 13-wk facilitation training program for 14 female 25-56 yr old correctional officers in terms of 105 female inmates' pre- to posttest changes on the Affect Adjective Check List, the Correctional Institutions Environment Scale, and Ziller's Self-Other Orientation Tasks. Facilitation training was conducted according to R. Carkhuff's model and was aimed at increasing the officers' abilities to relate in a helpful or facilitative manner in interpersonal encounters with inmates. Results indicate that the program had significant ( $p < .05$ ) effects in reducing inmate anxiety levels and increasing inmates' social interest and the officers' communication abilities. No effects on inmates' perceptions of the correctional environment or on their self-esteem scores were found. (15 ref)—L. Gorsey.

6036. Kraus, J. (Dept of Child Welfare & Social Welfare of New South Wales, Sydney, Australia) **A comparison of corrective effects of probation and detention on male juvenile offenders.** *British Journal of Criminology*, 1974(Jan), Vol 14(1), 49-62.—Studied 223 offenders given probation and 223 committed to an institution, matched for age at sentence, year of sentence, type of offense, age at 1st offense, number and type of previous offenses, and number of previous detentions. For most offenses recidivism was higher after detention than after probation, for "behavior problems" results were the same after both treatments, and "take and use

vehicle" offenders responded better to detention. The frequency and types of offenses following probation and detention are reported. Offenders previously in institutions responded better to probation than to detention. There was no difference in the amount of recidivism following single and multiple commitments to an institution. (29 ref)—D. R. Evans.

6037. Kyst, Ebbe. (Aarhus State Hosp, Clinic for Ambulant Treatment of Neurosis, Aarhus, Denmark) **[Psychological and social adaptation in patients undergoing long-term hemodialysis.]** (Danh) *Nordisk Psykiatrisk Tidsskrift*, 1974, Vol 28(2), 107-123.—9 female and 15 male patients (age 21-70) undergoing hemodialysis (Hd) were interviewed by a psychiatrist 3-5 times in 5 mo. Problems of adjustment were experienced by all Ss during the 1st weeks of Hd; these problems frequently subsided without psychiatric care. 10 Ss were judged to be candidates for recurring psychiatric treatment, but no psychotic reactions were found, and only 1 instance of "concrete suicidal impulses." Existential problems were rarely reported. Of 17 married Ss, almost 2/3 claimed to have experienced a deepening of their relationship; half of the Ss reported increased dependency on the spouse. Most Ss reduced their sexual activity. Significant decrements in social life, sports, and travelling were noted. It is recommended that psychologists or psychiatrists retain contact with all Hd patients in order to evaluate and meet their need for psychotherapy and to encourage group activities. (29 ref)—R. G. Wikmark.

6038. Morris, Robert. (Brandeis U, Florence Heller Graduate School for Advanced Studies in Social Welfare) **The place of social work in the human services.** *Social Work*, 1974(Sep), Vol 19(5), 519-531.—Foresees that in the 1980s the major changes in social work will occur in the medical and mental health systems. Social workers will become essential to these systems as health care is extended further from its hospital base into the community, which will require more attention to management and integration of community services.

6039. Payne, James S.; Mercer, Cecil D. & Epstein, Michael H. (U Virginia) **Education and rehabilitation techniques.** New York, NY: Behavioral Publications, 1974. ix, 307 p.—Describes theories, services, and procedures which can be used to aid the handicapped in obtaining employment and adjusting to a work situation. A model for effecting the education and rehabilitation of the handicapped is presented, along with descriptions of actual skills needed for securing and maintaining jobs, and the services and delivery systems necessary for the career education of young children. (16 p ref)

6040. Platt, Jerome J. & Scura, William C. (Hahnemann Medical Coll & Hosp, Experimental Studies Section, Community Mental Health Ctr, Philadelphia, PA) **Peer judgments of parole success in institutionalized heroin addicts: Personality correlates and validity.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 511-515.—Studied the validity and personality correlates of peer judgments of parole success in 89 incarcerated heroin addicts (mean age = 22.1 yrs). Ss completed a battery of personality measures, including Rotter's Internal-External Control Scale, the Death Concern Scale, the Adjective Check List, and the Sensation-Seeking Scale. Ss judged as successes by their peers, in

contrast to peer-judged failures, had significantly higher rates of parole success at 6 and 15 mo following release and differed significantly from the failures on 17 of 33 personality dimensions. Results are discussed within the context of previous studies of peer ratings in other settings, and implications for research are noted. (20 ref) —*Journal abstract.*

6041. Pooley, Richard. (Pendleton Project, Chesapeake, VA) **Work release programs and corrections: Goals and deficits.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 62-72.—Discusses the rationale, administration, housing and food service procedures, financial considerations, psychosocial factors, and treatment procedures in work-release programs. The problems of the discrepancy between expectations and reality experienced by the work-release resident and determining the extent of administrative authority are discussed.

6042. Rootes, Lloyd E. (Iowa State Reformatory, Anamosa) **The effect of achievement motivation training on women prisoners.** *Criminal Justice & Behavior*, 1974(Jun), Vol 1(2), 131-138.—Studied the effectiveness of a program that emphasized teaching the participants behaviors characteristic of persons with high achievement motivation. A control group received the same 24-hr series of films, discussions, and games but without emphasizing the achievement element. Ss were 42 residents of a women's reformatory. The Edwards Personal Preference Schedule (EPPS), the Work Performance Report (WPR), and the Mehrabian Achievement Scale for Women (MASW) were used as pre- and posttest evaluation measures. No significant differences in pre- to posttest scores on any of the 3 measures were found in either of the 2 groups, although there was a significant difference between posttest EPPS Achievement Scale scores of the 2 groups. The hypothesis that EPPS and MASW scores would be significantly correlated was not supported. Performance of experimental Ss increased after training as assessed by WPR posttest scores.—*L. Gorsev.*

6043. Schnelle, John F. & Lee, J. Frank. (Middle Tennessee State U) **A quasi-experimental retrospective evaluation of a prison policy change.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 483-496.—Used an interrupted time-series design and quasi-experimental logic to assess the behavioral effects of a prison disciplinary intervention on approximately 2,000 adult male inmates. The uncontrolled nature of the prison environment prevented experimental analysis of intervention effects. The quasi-experimental methodology applied in this study exemplifies how data, otherwise lost, can be retrieved. In addition, the process by which qualified conclusions can be drawn from the retrieved data is demonstrated.—*Journal abstract.*

6044. Seron, X. & Tissot, R. (U Liege, Belgium) **[Re-education of a left spatial agnosia.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Jul), Vol 73(4), 448-457.—Conducted programed exercises with a patient suffering from a moderate left spatial agnosia, resulting in considerable amelioration of his symptoms. Examples of the exercises are included. (Dutch, English, German, Italian, & Spanish summaries)

## Hospital Programs & Hospitalization & Institutionalization

6045. ———. **A school-hospital remotivation program: Veterans Administration Hospital, St Cloud, Minnesota.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 661-664.—Describes a program in which 6th graders in a social studies class serve as remotivational therapists for chronic geriatric patients. The program has increased ties between hospital and community and has improved the quality of life for elderly patients.

6046. Bergmann, Thesi. **Children in the hospital.** New York, NY: International Universities Press, 1965. 162 p. \$2.45.—Based on the authors' experiences in a children's hospital, children's reactions to specific illnesses and the relationship between personality and the speed of recovery are discussed. Ways of giving emotional aid to children in the hospital, recommendations for modifying hospital procedures, and specific case histories are presented.

6047. Bovier, Ph.; Giacobino, P.; Mottaz, Y. & Richard, J. (U Genève, Clinique Psychiatrique, Switzerland) **[Reflections on an analysis of 100 recent admissions to the geriatric service of the university psychiatric clinic in Geneva.]** (Fren) *Annales Médico Psychologiques*, 1974(Apr), Vol 1(4), 494-514.—Analyzed 100 geriatric hospital admissions by diagnosis, sex, source of referral, reasons for hospitalization, and the percentage of patients returned to home or other domicile. Most patients presenting a psychiatric problem were discharged within 3½ mo (93%); few patients with organic-cerebral disorders could be released in the same time period (38%).—*H. E. King.*

6048. Burrill, Roger H.; McCourt, James F. & Cutter, Henry S. (VA Hosp, Brockton, MA) **Beer: A social facilitator for PMI patients?** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 430-431.—Ratings of 30 psychiatric medically infirm males (mean age = 60 yrs) who were given beer or soda in a "pub-like" atmosphere indicate no differences between groups in social responsiveness; all patients became more sociable as the session progressed. Results do not support the indiscriminate use of "beer therapy" with these patients.

6049. Byrd, Richard E.; La Londe, Christopher & Soth, Nancy. **Four stages of institutional development in an adolescent psychiatric hospital.** *Hospital & Community Psychiatry*, 1974(Oct), Vol 25(10), 655-659.—Proposes that a new institution has 6 tasks to perform, each associated with a critical stage of development or critical issue. In a new adolescent psychiatric hospital, 4 critical incidents were identified that reflect the 1st 4 tasks of staffing, organizing, planning, and controlling; the incidents and their resolution are described.

6050. Chanoit, P. F. & Ceballos de Traversa, B. **[Preliminary inquiry on the long-term course of patients leaving the psychiatric hospital: Methodology and rationale.]** (Fren) *Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 609-626.—Presents preliminary findings on 100 psychotic and nonpsychotic patients, taken from a larger study planned to include posthospital follow-up of 2,000 patients. The 100 patients were members of a teacher's benefit society, which poses certain problems in posthospital surveillance because of the typically mobile nature of the profession, and



because a direct approach to recovered patients is not feasible owing to the public nature of their work. Follow-up of the trial group of 100 was difficult but feasible; most could be found for investigation 10 yrs after discharge. Questionnaires were completed at the time of hospitalization, on discharge, and 10 yrs later. Data from the preliminary sample (age and sex distribution, nosological classification, rated improvement, etc) are presented, but their value is considered to rest mainly in discovering the adequacy of data collection methods and the closeness of fit of the chosen group to the larger sample from which it was selected. Findings based on the full sample are expected to provide information of a kind unavailable in the usual epidemiological study, which is limited to hospital discharge data only or to short-term follow-up after leaving hospital care.—*H. E. King.*

6051. Colthart, Shirley M. (U Rochester, Medical School) **A mental health unit in a skilled nursing facility.** *Journal of the American Geriatrics Society*, 1974(Oct), Vol 22(10), 453-456.—Outlines the services available in a 44-bed geriatric unit and presents statistics on 103 53-95 yr old patients. The majority of the patients responded to treatment by some increase in their activities and improved feelings of dignity and self-esteem. The lack of nursing-home beds for the continued care of Medicaid patients and lack of adjunctive services (e.g., day-care center, workshop, and transportation) are cited. It is argued that physicians, psychiatrists, nurses, social workers, patients, and their families must work together. Whether based in a community mental health center or elsewhere, a Geriatric Team gains expertise in providing service to the patients, in consultation with other medical facilities, and in locating community resources.—*Journal abstract.*

6052. Copp, Laurel A. (Veterans Administration, Washington, DC) **The spectrum of suffering.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 491-495.—Studied hospital patients' experience of suffering, their coping styles, and strategies for minimizing pain. Nursing students interviewed 148 patients in 5 hospitals asking questions about the meaning of pain and suffering. The 5 most common descriptions of pain given by the patients were that it was treacherous, mean, hateful, detestable, and sneaky. Pain was personified as female twice as often as male. Using Z. J. Lipowski's (1970) categories of meanings of illness, patients verbalized suffering as challenge, enemy, punishment, weakness, relief, strategy, loss, or value. 6 strategies were used to cope with suffering: (a) counting, (b) words, (c) deep thinking and visualization, (d) attempting mind-body separation, (e) distraction, and (f) contact with people. Implications from the patients' responses in the interviews are discussed in relation to patient care.—*R. G. Gibson.*

6053. Dolan, Patricia O. & Flumere, Judith A. (Boston U) **Patients' coffee hour.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 479-480.—Discusses the use of a morning coffee hour to increase patient socialization behavior. Hospital volunteers and students with nursing staff support provided a coffee hour for medical-surgical patients in a Boston hospital. Decreases in boredom and loneliness, and increases in patient interaction, socialization, and interest in personal appearance were reported.

6054. Finkelstein, Mildred & Rosenberg, Gilbert. (Maimonides Hosp & Home for the Aged, Montreal, Quebec, Canada) **New lifestyle for the aged in a long-term hospital.** *Journal of the American Geriatrics Society*, 1974(Nov), Vol 22(11), 525-527.—Suggests that the aged patient in an institution can be helped to develop a new lifestyle. A structured atelier workshop is described and illustrated with 3 brief case histories. A key factor in success is raising the patient's standard of work so that he can perform as an artisan and sell products of professional quality. The patient benefits by the tangible recognition that he is a part of the working force and thus finds it easier to accept the institution as his community.—*Journal abstract.*

6055. Garetz, Floyd K. & Peth, Peter R. (U Minnesota, Medical School) **An outreach program of medical care for aged high-rise residents.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 404-407.—Discusses the purposes and effects of an outreach medical care program for the elderly. Medical self-neglect of older adults in a subsidized congregate living setting was attributed to problems of mobility, finance, and inadequate health service delivery models. These problems were surmounted successfully by a carefully planned, comprehensive health service dispensary located within a high-rise apartment complex. Goals of service, teaching, and consultation via interdisciplinary team solutions to multiple problems were achieved, demonstrating a viable approach to geriatric care.—*Journal abstract.*

6056. Geiger, O. Glenn & Johnson, Lorelei A. **Positive education for elderly persons: Correct eating through reinforcement.** *Gerontologist*, 1974(Oct), Vol 14(5, Pt 1), 432-436.—Implemented a positive continuous reinforcement procedure for 6 geriatric patients with severely low rates of correct eating. The reversal-type experimental design was used, in which each S was his or her own control. Average correct eating increased from 12% of meals eaten correctly at the beginning of the study to 84% of meals eaten correctly at the end of the study. The technique can be readily employed in professional practice. (17 ref)—*Journal abstract.*

6057. Groeschel, Benedict J. (Children's Village, Dobbs Ferry, NY) **Social adjustment after residential treatment.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

6058. Gunzburg, H. C. (Hosp for the Mentally Subnormal, Birmingham, England) **The physical environment of the mentally handicapped: IX. The search for a home environment.** *British Journal of Mental Subnormality*, 1974(Jun), Vol 20(38, Pt 1), 28-42.—Critically appraises results of an exercise in which 3rd-yr architecture students redesigned a living unit for mentally handicapped Ss to create a home-life, noninstitutional environment. The design aspects of 6 floor plans are evaluated with regard to the Ss' special needs.

6059. Hailey, Anthea M. (MRC Social Psychiatry Unit, Inst of Psychiatry, London, England) **The new chronic psychiatric population.** *British Journal of Preventive & Social Medicine*, 1974(Aug), Vol 28(3), 180-186.—Used data from the psychiatric case register of the Camberwell section of London, England, to examine characteristics and the development of a new chronic

population in 3 types of psychiatric care—inpatient, day patient, and hostel care. For the period from 1964 to 1972, the number and characteristics of new long-term patients in each form of care are analyzed. The net accumulation of new long-term patients appeared to stabilize after a few years; the population of long-term day patients and residents in psychiatric hostels was still increasing. The epidemiological basis of the study allowed the number of cases to be expressed as rates/head of population.—*Journal abstract.*

6060. Kalogerakis, Michael G. (Bellevue Hosp, New York, NY) **Hospitalization of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management.* Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses admission, adjustment, and treatment of adolescents hospitalized for personality disorders. Appropriate criteria for admitting such patients to a hospital are described, and the management of hospitalized personality disorders is examined in terms of structure, staff, goals and methods, and special problems. Administrative issues related to hospitalization are also noted.

6061. Liebman, Mayer C. & Hedlund, Douglas A. (Sheppard & Enoch Pratt Hosp, Towson, MD) **Therapeutic community and milieu therapy of personality disorders.** In J. R. Lion (Ed), *Personality disorders: Diagnosis and management.* Baltimore, MD: Williams & Wilkins, 1974. xi, 432 p. \$21.—Discusses the history, rationale, and development of the therapeutic community concept in the treatment of the mentally ill and its specific applications to personality and related disorders. Issues in the use of the intermediate and long-term psychiatric hospital and nonhospital settings as treatment approaches to personality and nonpsychotic disorders are examined, and psychosocial (interpersonal), personality (intrapsychic), and learning models of the efficacy of the therapeutic community are described. (113 ref)

6062. Lyon, Keith E. & Zucker, Robert A. (Michigan State U) **Environmental supports and post-hospital adjustment.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 460-465.—Examined the informal interpersonal influences present in the environment of 38 patients after release from a short-term psychiatric inpatient unit. These influences were related to 2 measures of adjustment based on a self-administered symptom check list: (a) absolute symptomatology at 3 mo and (b) the difference in symptomatology as indicated by a comparison of scores on the checklist administered on the ward and those at 3 mo. Results show that a stable home life (marriage, high home living involvement, older age, and many home activities) was linked with low 3-mo symptomatology as was the presence of benign visitors. The ease with which the individual clusters divided themselves on statistical and content levels implies that the concept of environmental support is not a unitary one and suggests that the areas of home life and involvement with others should be studied independently.—*Journal summary.*

6063. Marks, Patricia & Ball, Thomas S. (Pacific State Hosp, Pomona, CA) **Hazardous voluntary falling: A treatment approach.** *Mental Retardation*, 1974(Oct), Vol 12(5), 36-39.—Prior to treatment, a nonverbal, 8-yr-old

severely retarded child was confined in an enclosed crib 17 hrs/day to prevent hazardous voluntary falling. The treatment program involved the technique of developing a small rug as a cue and, concurrently, a conditioned reinforcer for sitting. The rug, when placed on a stool or bed, served the dual function of controlling falling and reinforcing appropriate sitting or lying. It was demonstrated that bed- and stool-falling changed as a function of rug placement and control over falling was retained even after the rug was no longer in use.—*Journal abstract.*

6064. McLachlan, Eileen. (California State U, Los Angeles) **Recognizing pain.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 496-497.—Discusses subtle and obvious behavioral responses to pain. Although thresholds for pain do not vary significantly, reactions to pain differ among cultures and individuals. Subtle affect changes include excitement, irritability, depression, withdrawal, and behavior reversals. Techniques for assessment of subtle behavior and their implications for nursing care are discussed.

6065. Megargee, Edwin I. (Florida State U) **Applied psychological research in a correctional setting.** *Criminal Justice & Behavior*, 1974(Mar), Vol 1(1), 43-50.—Describes a cooperative research and data collection program conducted at a medium security institution for youthful offenders. Group testing, interviewing, autonomic nervous system screening, central records scanning, progress report development, and exit-data collection procedures are described, and suggestions for research and implications of research in a correctional institution are discussed.

6066. Midenet, Marc. [Leaving the psychiatric hospital after more than 10 years of hospitalization.] *(Fren) Annales Médico-Psychologiques*, 1974(May), Vol 1(5), 583-606.—Presents 17 case histories of patients hospitalized for at least 10 yrs, released, and remaining out of the hospital for at least 1 yr. The group was clinically heterogeneous, although most carried a diagnosis of schizophrenia or alcoholism. Questions raised concern the factors leading to prolonged confinement, the forces eventually mobilized to provide belated release, and the role played by social or familial influences. 2 common elements seem identifiable. (a) The most recent advances in chemotherapy have finally ameliorated even those cases previously resistant to drug treatment. (b) Most patients in the delayed-release group faced an unusually rejecting family or social situation, characterized by an active refusal to accept the patient for convalescence. Changes in either the patient's attitude toward self-management or in the family's attitude toward acceptance were probably decisive in effecting ultimate discharge. Only 4 returned to some form of family living; 13 either became self-sustaining or found employment in a protective (though nonhospital) environment, such as in a community for the retired. A greater optimism among treatment staff, based on psychopharmacologic advance, is likely also to have produced subtle changes in the psychological support offered to patients formerly considered beyond recovery.—*H. E. King.*

6067. Miller, Ralph H. & Keith, Robert A. (Claremont Graduate School, Social-Environmental Psychology



Program) **Behavioral mapping in a rehabilitation hospital.** *Rehabilitation Psychology*, 1973(Win), Vol 20(4), 148-155.—Raises the question of how long patients should remain in treatment for best results, and contends that they are poorly integrated into the social structure of the hospital.

6068. Moss, Sidney Z. & Moss, Miriam S. (Northwest Community Mental Health Ctr, Philadelphia, PA) **Mental illness, partial hospitalization, and the family.** *Clinical Social Work Journal*, 1973(Fal), Vol 1(3), 168-176.—Reports a 1-day hospital program with an average daily attendance of 35 members. Patients are primarily black, and are from 16 to 65 yrs old. The primary treatment is multiple group interaction, with emphasis on the here-and-now. The setting is nonmedical. How the family is involved in treatment is described.—S. R. Stein.

6069. Oudenne, William. (New Jersey Dept of Institutions, Management Operations, Trenton) **Resident labor: A practical solution in New Jersey state institutions.** *Mental Retardation*, 1974(Oct), Vol 12(5), 17-19.—Describes a 2-phase program for reducing resident labor in public institutions for the mentally retarded and the successful pursuit of this goal in state institutions. A proposal for equitable compensation of trainees and marginal workers is briefly reviewed.

6070. Rosenblatt, Aaron. (Bronx State Hosp, NY) **Providing custodial care for mental patients: An affirmative view.** *Psychiatric Quarterly*, 1974, Vol 48(1), 14-25.—Traces the changes in state mental hospitals from being primarily custodial institutions through being an agency for delivering long-term mental health care to the present emphasis on being an acute short-term treatment facility. During the last 20 yrs, efforts have been made to attack the problem of custodial care by setting up special units to prevent hospitalization. These special programs are generally either supplementary or experimental and, it is argued, if relied on exclusively would result in the death of the state mental hospital. Arguments against this latter course are cited, and a new approach to providing custodial care is described. This arrangement is predicated on (a) allowing custodial patients to select for themselves the alternatives of remaining in hospital or being treated "in the community," (b) providing in-hospital custodial care which is less restrictive but regulated to provide more harmonious relations among the residents, and (c) providing mental health care and contact with community social and health agencies.—B. McLean.

6071. Rowe, Dorothy. (St John's Hosp, Lincoln, England) **The effect of a more stimulating environment on the behaviour of a group of severely subnormal adults.** *British Journal of Mental Subnormality*, 1974(Jun), Vol 20(38, Pt 1), 6-13.—Assessed 21 17-38 yr old severely subnormal male patients (IQ under 30, mental age about 2 yrs) on a hospital ward to develop a more enriched environment. Piagetian techniques for analyzing the sensorimotor period were applied and a program of activities instituted (e.g., simple gymnastics, physiotherapy, art therapy, field trips). Follow-up assessment 7 mo later showed that 14 Ss had reached Stage 6 of Object Permanence, Piaget's stage at which language begins to develop. It is concluded that a more stimulat-

ing environment can help mental subnormals realize more potential, possibly even helping to reach the stage of language if begun early.—R. Hall.

6072. Sand, Patricia & Berni, Rosemarian. (U Washington, Medical School) **An incentive contract for nursing home aides.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 475-477.—Studied the effects of incentive contracting on the behavior of nursing home aides and patients. Aides and 16 patients were given monetary incentives for increasing the time patients spent out of bed and the amount of talking and other social behavior by patients. Baseline data of patient activity were recorded by student observers 2 wks prior to the treatment intervention period. For 3 wks aides participated in weekly 15-min training sessions on techniques for increasing patient activity and social behavior. The patients were randomly assigned to an incentive contract group or a control group. In the experimental group aides and patients were given \$5.00 and \$2.00 respectively for each patient demonstrating a 1/2 increase in the frequency of the specified behaviors in a 1-wk period. Results indicate that 5 of the 8 patients in the experimental group demonstrated statistically significant increases in activity levels. Patients in the control group demonstrated increased activity but not to a significant degree. Implications for nursing administrators are discussed.—R. G. Gibson.

6073. Scheer, Nancy & Barton, Gail M. (Ann Arbor Area Community Services, Washtenaw County Community Health Ctr, MI) **A comparison of patients discharged against medical advice with a matched control group.** *American Journal of Psychiatry*, 1974(Nov), Vol 131(11), 1217-1220.—Studied prospective admission and follow-up variables by comparing 21 psychiatric patients leaving an institutional facility against medical advice (AMA) with 21 control patients. It is concluded that leaving AMA is not necessarily detrimental to patients 3 or 6 mo after discharge, that the patient may actually be running toward health rather than away from treatment, that the AMA patients have a different relationship with the staff than non-AMA patients, and that effort might be spent in educating the staff and milieu that an AMA discharge may be beneficial therapeutically rather than a negative occurrence.—Journal abstract.

6074. Siegle, Dorothy S. (California State U, San Jose) **The gate control theory.** *American Journal of Nursing*, 1974(Mar), Vol 74(3), 498-502.—Discusses the gate control theory of pain, advanced by R. Melzack and P. D. Wall (1968), that pain can be modulated in the spinal cord, brain stem, and cerebral cortex, and that an individual's perception and interpretation of pain are affected by the central nervous system in the cerebral cortex and thalamus. The interaction of 3 cerebral processes affects the psychological factors of perception and interpretation: (a) sensory-discriminatory, (b) motivational-affect, and (c) cognition activities. A number of interventions are described as effective in modulating these cerebral processes. Implications of the gate control theory are discussed in relationship to medical and nursing care of individuals with pain.—R. G. Gibson.

6075. Stotsky, Bernard A. (Geriatric Memory Clinic, Needham, MA) **Extended care and institutional care: Current trends, methods, and experience.** In E. W.

Busse & E. Pfeiffer (Eds), *Mental illness in later life*. Washington, DC: American Psychiatric Assn, 1974. vi, 301 p. \$7.

6076. Suedfeld, Peter. (U British Columbia, Vancouver, Canada) **Solitary confinement in the correctional setting: Goals, problems, and suggestions.** *Corrective & Social Psychiatry & Journal of Behavior Technology Methods & Therapy*, 1974(Sum), Vol 20(3), 10-20.—Solitary confinement, or isolation, can serve 4 major purposes: (a) indoctrination and interrogation, (b) quarantine, (c) punishment, and (d) rehabilitation. The ethical problems involved in forcible indoctrination, the eliciting of confessions, the brutalizing effect on the interrogator, and the adverse effect on society, make the use of solitary confinement for indoctrination and interrogation often questionable, unethical, and illegal. The 2nd use of isolation, quarantine, has 3 major goals: to protect the individual from being harmed by other prisoners; to protect other people, inside or outside the institution; and to protect the individual against himself (suicide). Perhaps the most widely used application of isolation in North America is for punishment, the "hole." In general, punitive measures do not seem to reduce or eliminate recidivism, nor to turn inmates towards a more productive life. The effectiveness of the "hole" is doubtful enough to warrant rejecting it as a punishment. Used in a moderate and carefully controlled way, however, as part of a sensible rehabilitative system, isolation and reduced sensory input may be effective and humane tools in helping inmates to develop noncriminal styles of life. (60 ref)—J. Sorokac.

6077. Sugaya, Katsuhiko. [Milieu therapy of enuresis: A case study.] (Japn) *Japanese Journal of Child Psychiatry*, 1972(Sep), Vol 13(5), 332-338.—Reports the successful treatment of a 16-yr-old girl with severe nocturnal enuresis since infancy. After running away from home she was brought to a child guidance clinic. As there was no enuresis at the clinic, it was decided that it was caused by environmental factors. Milieu therapy was conducted for 1 yr 3 mo, during which time the patient's relationships with the therapists and her family improved greatly. Upon returning home there was no recurrence of enuresis. (English summary)—S. Ohwaki.

6078. Talkington, Larry W. (Fairview Hosp & Training Ctr, Salem, OR) **Resident advice: A viable management tool.** *Mental Retardation*, 1974(Oct), Vol 12(5), 20.—Describes a resident advisory council in a public institution for the retarded that (a) explored the potential use of any advice made by the group; (b) secured direct consumer input to top administration relative to program offerings, services, and policies; and (c) provided an occasion for top management and staff personnel to relate to representative residents.

6079. Thralow, Joan U. & Watson, Charles G. (VA Hosp, St Cloud, MN) **Remotivation for geriatric patients using elementary school students.** *American Journal of Occupational Therapy*, 1974(Sep), Vol 28(8), 469-473.—Describes the design and evaluation of a remotivation program for 72 chronically ill geriatric patients. 36 experimental patients, 36 control patients, and 36 6th graders were included in the program. The school children and the experimental patients met biweekly in discussion groups for 3½ mo using a 4-step

group process format to promote the development of interpersonal relationships and a renewed interest in living among the geriatric patients. Both patient groups were rated by the Nurses Observation Scale for Inpatient Evaluation (NOSIE-30), and remotivation and morale self-evaluation scales. Ss were rated before the program started, 11 wks after it started, and 4 wks after its completion. Data show that the experimental Ss significantly improved in several areas, including interest in community or home events, desire for travel and visitors, feelings about staff and treatment, and desire to participate in hospital activities.—*Journal abstract*.

6080. Venkatramiah, S. R. (Sri Venkateswara U, Tirupati, India) **Low cost one-way vision screen for unobserved observation in child guidance clinics.** *Child Psychiatry Quarterly*, 1974(Apr), Vol 7(2), 14-15.—Describes the construction and functioning of a 1-way vision screen to observe children. The materials and costs of such a device are listed.

6081. Vitello, Stanley J. (Pennsylvania State U) **Cautions on the road to normalization.** *Mental Retardation*, 1974(Oct), Vol 12(5), 39-40.—Discusses the development of institutionalized care in the US for the mentally retarded and offers 10 cautions regarding the training and education of the severely and profoundly retarded.

6082. Welch, Michael W. & Gist, Jerre W. (U Alabama, Ctr for Developmental & Learning Disorders) **The open token economy system: A handbook for a behavioral approach to rehabilitation.** Springfield, IL: Charles C Thomas, 1974. xii, 189 p.

6083. Wilson, Bertrand. **A quest for justice: My confinement in two institutions.** Hicksville, NY: Exposition, 1974. 112 p. \$5.—Describes one man's battle for his freedom throughout 9 yrs (1942-1951) of illegal incarceration in modern mental hospitals.

6084. Wright, E. C.; Abbas, K. A. & Meredith, C. (Queen Mary's Hosp for Children, Carshalton, England) **A study of the interactions between nursing staff and profoundly mentally retarded children.** *British Journal of Mental Subnormality*, 1974(Jun), Vol 20(38, Pt 1), 14-17.—Observed 16 9-18 yr old ambulant children (mental age 18-24 mo or less) in 5 hospital wards for interactions promoting positive, negative, or neutral patient behavior. An extreme poverty of interpersonal exchange between Ss and staff was noted and a lack of Ss' attempts to relate to staff. Findings suggest a need to (a) revise training for nurses caring for mentally retarded children; and (b) consider other types of staff training, other forms of long-term care, and the need for larger staffs.—R. Hall.

## EDUCATIONAL PSYCHOLOGY

6085. Blumenfeld, Warren S. & Sartain, Patricia L. (Georgia State U) **Predicting alumni financial donation.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 522-523.—Attempted to predict alumni financial donation or nondonation from demographic information available at graduation. Records of 59 donors and 59 nondonors were item analyzed. Weights were assigned and cross-validated using the records of 50 held-out



donors and 50 held-out nondonors. A biserial correlation of .37 ( $p < .01$ ) was obtained.

6086. Colvard, R. & Bennett, A. M. (American Coll Testing Program, Iowa City, IA) **Patterns of concentration in large foundations' grants to US colleges and universities.** *ACT Research Reports*, 1974(Apr), No 63, 30 p.—Presents data on all grants reported by 276 foundations in 1963, 1966, 1969, and 1970 to US universities and colleges in terms of amount of grant, type of institution, geographic location, and purpose of grant. Findings indicate that each year at least 46% of grants and 75% of the actual funds involved came from no more than 25 of the foundations. (24 ref)

6087. Newton, Fred B. (U Georgia, Counseling & Student Personnel Services) **The effect of systematic communication skills training on residence hall paraprofessionals.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 366-369.—Developed a 12-hr training program to increase paraprofessional housing staff functioning in communication skills. The training model combined what is known about basic communication dimensions with the use of simulation and role playing in a housing setting. Ss were 32 student personnel assistants. Analysis by covariance found significant increases for the treatment group on the 3 Carkhuff communication scales: Empathic Understanding, Respect, and Communicative Accuracy. There were no significant sex or experience differences.—*Journal abstract*.

6088. Winer, Jerry A.; Pasca, Alyce E.; Dinello, Frank A. & Weingarten, Samuel. (U Chicago) **Nonwhite student usage of university mental health services.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 410-412.—Asked 39 mental health program directors at 20 universities why their services were not being used by nonwhite students. 4 major explanations for this nonuse were mentioned, each being supported by  $\frac{1}{4}$  -% of the directors: (a) nonwhite students are committed to an antiestablishment viewpoint which precludes seeking help from a service identified with the majority, (b) many black students wish to see black staff members and the clinics have too few to meet the demand, (c) minority students are less psychologically minded and feel their problems are environmentally or socially oriented rather than personality related, and (d) services other than mental health clinics were attracting nonwhites. It is suggested that many mental health professionals are not fully meeting their responsibilities to nonwhite students.—*L. Gorsey*.

#### School Administration & Educational Processes

6089. Abt, Clark C. (Abt Assoc, Cambridge, MA) **Forecasting the cost-effectiveness of educational incentives.** *Educational Technology*, 1974(Mar), Vol 14(3), 27-29.—Demonstrates how cost-benefit analysis can be used to forecast the performance of educational incentives. Examples of typical incentives and the associated measures of effectiveness are provided. A hypothetical analysis is presented.

6090. Adams, Gerald R. & Cohen, Allan S. (Pennsylvania State U) **Children's physical and interpersonal characteristics that effect student-teacher interactions.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1),

1-5.—Studied the impact of student characteristics on the quality of teacher-student interactions in a naturalistic setting. Ss were teachers in 3 kindergarten, 4 4th, and 3 7th grade classrooms who were observed by 3 elementary school principals and a professor of education over a 6-mo period. Ss were rated on teacher attentiveness to pupils, permissiveness-flexibility, degree of affection displayed toward students, and teaching style. Ss were asked to rate each of their students on 4 measures of physical and interpersonal attractiveness, 2 undergraduates categorized the observation data into verbal support, control, and neutral statements. There were no significant effects of the student's verbal ability, level of disruptive behavior, or personal appearance on the frequency of teacher-student interactions, although facial attractiveness had some effect, and there was a significant Grade Level  $\times$  Facial Attractiveness interaction. Limitations of the data because of the higher mean IQs of the 4th graders are discussed.—*L. Gorsey*.

6091. Alexander, Karl L. & Eckland, Bruce K. (Johns Hopkins U) **Sex differences in the educational attainment process.** *American Sociological Review*, 1974(Oct), Vol 39(5), 668-682.—Used longitudinal data on a national sample of 2,077 students first surveyed as high school sophomores in 1955 and later followed up in 1970 to assess sex main and interaction effects in an elaborated school process model. Results indicate the following: (a) despite positive sex effects for women in terms of academic performance and self-concepts and despite simultaneous controls on status background variables, ability, curriculum, the influence of significant others (parents, teachers, and peers), and college plans, a relatively strong and unmediated depressant sex effect remained for the educational attainment of women in the late 1950s. (b) Status background influences were a double liability for women in that such influences were considerably more determinant of high school process and outcome variables for females, while academic ability was more important for males. (c) At the college level, whereas the influence of family origins was modest for both sexes, ability remained considerably more important for the continuing educational progress of men. (35 ref)—*Journal abstract*.

6092. Anderson, Robert H. & Hemenway, Robert E. (Memphis State U) **Pre-student teaching practicum with exceptional children: A program description.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 152-157.—Describes a newly developed teaching experience for the educable-mentally-retarded teacher trainee at the junior year level. The program represents a commitment on the part of teacher educators at the university level to provide relevant experiences for students and to improve the quality of training programs even when student enrollment is large.

6093. Averch, Harvey A. et al. **How effective is schooling? A critical review of research.** Engelwood Cliffs, NJ: Educational Technology Publications, 1974. xvi, 258 p. \$9.95.—Uses 5 research approaches—input-output, process, organizational, evaluation, and experiential—as the basis for analyzing research on the effectiveness of education. Chapters are designed to bridge the gap between educational research and policy.

6094. Balch, Robert W. & Kelly, Delos H. (U Montana) **Reactions to deviance in a junior high school: Student views of the labeling process.** *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 25-38. —Conducted a questionnaire study of 105 9th-graders to examine key aspects of the labeling process. Results indicate that Ss clearly believed that the same deviant act would evoke different reactions from their teachers depending on the character of the offending student. Ss also believed that their teachers tended not to offer constructive help to boys defined as troublemakers. Ss believed that troublesome students were subjected to various practices which would probably further alienate them from the educational system. (27 ref)—*Journal abstract*.

6095. Bassin, William M. (Shippensburg State Coll) **A note on the biases in students' evaluations of instructors.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 16-17.—Demonstrated that a significant pattern of bias is discernable in students' evaluations of instructors—low grades and a high level of quantitative content lead to low evaluation scores, and vice versa.

6096. Borg, Walter R. & Stone, David R. (Utah State U) **Protocol materials as a tool for changing teacher behavior.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 34-39.—Studied changes in teacher behavior brought about by training with the Utah State University (USU) Protocol Modules. 19 inservice elementary teachers were studied using a single group pretest-posttest design. Teachers made statistically significant gains in 5 of the 7 specific behaviors covered in the training materials. Gains related to protocol materials training were compared with gains related to minicourse training on 6 of the 7 variables where comparable data were available. The 2 instructional models brought about similar gains on most of the behaviors compared. It is concluded that the simpler protocol model is as effective as the minicourse model for changing simple, clearly defined teacher behaviors.—*Journal abstract*.

6097. Comer, James P. (Yale U, Child Study Ctr) **The black American child in school.** In E. J. Anthony & C. Koupernik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Traces the growth of differential treatment of education in the US as it serves to increase the vulnerability of black youth.

6098. D'Alonzo, Bruno J. (Northern Illinois U, Programs for the Mentally Retarded) **Perceived role behavior expectations of Full-Time Work-Study Program Coordinators.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 131-133.—Surveyed 4 selected reference groups ( $N = 177$  respondents) to determine significant differences in perceived role expectations for Full-Time Work-Study Program Coordinators (FTCs) of educable mentally retarded youth. A 63-item instrument (FTC Behavior Scale) was developed for the survey. Data were analyzed by (a) ranking of items by per cent of agree responses and (b) a chi-square statistical technique to determine significant differences at the .05 level. Data analyses revealed the respondent groups differed regarding 4 of the items within the instrument.—*Journal abstract*.

6099. Drumbheller, Sidney J. (Drake U) **Competency based teacher education must emphasize fewer and more global behaviors to maximize efficiency and morale.** *Educational Technology*, 1974(Mar), Vol 14(3), 5-11.—Proposes an alternative to competency-based teacher education: training programs which emphasize fewer atomistic behavioral objectives in favor of more global behaviors. Rather than defining many small competencies and expecting the teacher-candidate to integrate them into an effective teaching style, the prospective teacher should concentrate on role-playing until an appropriate teaching style has been identified. Then behaviors should be brought under cognitive control. Teacher education programs using a global focus will be more relevant, more productive, more intuitive, and more easily managed than traditional competency-based approaches.—C. B. Kreitzberg.

6100. Echewa, W. Whittier. (School District of Philadelphia, PA) **Balancing theory with practice: A hypothetical model.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 157-162.—Suggests that special education departments could offer a 2-session early involvement course at the freshman or sophomore university level to allow special education students the opportunity to become actively involved with retarded and nonretarded children while simultaneously testing their assumed aptitudes. Detailed outlines of the 2 suggested sessions are included.

6101. Erben, Michael. **Teachers' views of the role of liberal studies in a technical college curriculum.** *Research in Education*, 1974(May), No 11, 31-41.—Studied the possible application of deviance studies to organization studies on educational sociology. However, interviews with university faculty and staff indicate that data obtained for this purpose was also used effectively to obtain information about curriculum content.

6102. Forrer, Stephen E. (U Maryland, Counseling & Personnel Services) **Dissemination systems in university orientation: An experimental comparison.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 394-399.—Compared 2 types of information dissemination (newsletter and a 1-day orientation program) for parents using 3 criteria—factual knowledge, attitudes, and perceptions of the university environment. Results show that different systems of information dissemination have differential effects on parents of incoming freshmen, with the newsletter being more effective in providing factual knowledge and the orientation program being more effective in increasing awareness of university life.

6103. Green, Robert L. (Michigan State U, Coll of Urban Development) **Public schools and equal educational opportunity.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jul), Vol 2(4), 198-207.—Discusses problems surrounding equal education in America. A 2-pronged attack on the problem is suggested: (a) reeducating the existing teaching force and (b) completely overhauling teacher-training programs. (26 ref)

6104. Greenwood, Charles R.; Hops, Hyman; Delquadri, Joseph & Guild, Jacqueline. (U Oregon) **Group contingencies for group consequences in classroom management: A further analysis.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 413-425.



—The relative effects of rules, rules plus feedback, and rules plus feedback plus group and individual consequences for appropriate behavior were investigated in 3 classrooms containing a total of 68 children in Grades 1-3 during reading and mathematics periods. The consequences were individual and group praise, and group activities. The total intervention package (rules plus feedback plus group and individual consequences) was most effective in increasing appropriate behavior. Rules plus feedback produced increased appropriate behavior in 2 of the 3 classrooms. Rules alone produced no change in classroom behavior. Maintenance of appropriate classroom behavior was noted approximately 3 wks after the program ended. Teacher's correct use of praise was also maintained for 2 of the 3 teachers at levels generated during the total package condition. (26 ref)—*Journal abstract*.

6105. Gullotta, Thomas P. (Youth Resource Ctr, Glastonbury, CT) **Teacher attitudes toward the moderately disturbed child.** *Exceptional Children*, 1974(Sep), Vol 41(1), 49-50.—Used 50 student or full-time teachers to assess teacher attitudes and expectations in treating an acting-out male youngster. In response to 10 suggested solutions, Ss selected those that required service outside the described school structure. Ss indicated a desire to keep the youngster in class if assistance was available.

6106. Hamilton, David & Delamont, Sara. (U Glasgow, Scotland) **Classroom research: A cautionary tale.** *Research in Education*, 1974(May), No 11, 1-15.—Describes American interaction analysis and anthropological classroom research. Suggestions for the future development of classroom research in Britain are provided. (42 ref)

6107. Harrington, Charlene. (U California, Berkeley) **Experiences with pass/not pass grading: Student view.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 376-382.—Data from 1,205 undergraduates' responses to a questionnaire on the pass/not pass grading option indicate that the majority favored this grading option but opposed grading in general. Ss with a vocational orientation preferred traditional letter grading, while those who were "identity seekers" preferred grading options.

6108. Harrington, Charlene. (U California, Berkeley) **Experiences with pass/not pass grading: Faculty view.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 383-388.—Data from 256 faculty members' responses to a questionnaire on pass/not pass grading option indicate that although the majority favored the structure, purposes, and operation of this grading option, they preferred limited use of it by students. Faculty members most opposed to the option were older, higher-ranking, and held positions in the fields of chemistry, engineering, and business.

6109. Heltzmann, Ray & Staropoli, Chuck. (Villanova U) **The elementary teacher preparation program: A graduated clinical approach to the education sequence.** *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 23-24.—Discusses the advantages of an approach in which experiences with various instructional modes and settings are emphasized at the sophomore and junior levels of training. It is suggested that such an approach

would lead to a more desirable student-teaching internship and consequently to a better classroom teacher.

6110. Hilliard, Asa G. (California State U, School of Education, San Francisco) **The intellectual strengths of black children and adolescents: A challenge to pseudoscience.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jul), Vol 2(4), 178-190.—Focuses on the implications of the research literature pertaining directly to the black child and adolescent. 2 principal topics are treated: (a) educational research and some of its weaknesses are discussed, including sample bias, inaccurate data, and irrelevant variables; and (b) unexplained growth and intellectual strength, are examined, including a sampling of studies or projects that show the extent to which blacks in certain environments have made significant achievements. (36 ref)—*M. E. Pounsel*.

6111. Husén, Torsten. (U Stockholm, Sweden) **Multi-national evaluation of school systems: Purposes, methodology, and some preliminary findings.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(1), 13-39.—Discusses historical developments in international education and different methodological problems in performing empirical cross-national comparative research. The organization of international research, the construction of international achievement tests in certain subject areas, and certain teacher variables in international research are also examined. (5 p ref)

6112. Hussell, Ivan & Smithers, A. **Changes in the educational opinions of student teachers associated with college experience and school practice.** *Research in Education*, 1974(May), No 11, 43-50.—Studied 73 female teacher training students to determine the extent of change in educational opinions before and after teaching practice and college experiences. Ss were evaluated for changes in tender-mindedness, radicalism, and naturalism. Results show that over the 6-mo period, Ss became significantly less tender-minded and more radical in their educational opinions. Analyses of teaching practice and college experiences indicate that the increase in tough-mindedness was associated with the teaching practice period and the increase in radicalism with the college experience. It is suggested that these findings are the outcome of a program of teacher training where practicality is emphasized. (20 ref)—*M. E. Pounsel*.

6113. Kehle, Thomas J.; Bramble, William J. & Mason, Emanuel J. (Kent State U) **Teachers' expectations: Ratings of student performance as biased by student characteristics.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 54-60.—Studied expectations of 96 5th-grade teachers on general personality variables as well as an achievement variable. The influence of 4 independent variables (sex, race, intelligence, and attractiveness) on expectations was investigated using a multivariate analysis of variance design and the Teacher Rating Form of the Barclay Classroom Climate Inventory. Teachers were given fictitious descriptions of students and then asked to rate student personality characteristics and essay performance. Significant effects were attributed to the sex of the student, the Sex  $\times$  Attractiveness interaction and the 4-way interaction. It is concluded that expectations teachers hold for elementary students are extremely complex and are based on a combination of student characteristics. (17 ref)—*Journal abstract*.

6114. Knotek, Stefan. (Faculty of Pedagogy, Nitra, Czechoslovakia) [Systemological and regulative aspect of the educational process.] (Czec) *Jednotná Škola*, 1974(Jun), Vol 26(6), 505-514.—Argues that scientific management of the educational process assumes the realization of its functional and dialectical analysis. The teacher, as the regulating factor of the educational system, must be prepared to fulfil the requirements of pedagogical and psychological analysis and diagnosis of the student. The constant feedback between the teacher as the subject of the educational process and the pupil as its object achieves changes in the pupil in the direction set by the stated aims of the educational system. Addition of the factor of a teaching machine or teaching program strengthens the control and regulation of the system. (Russian summary)—*English summary*.

6115. Kontiainen, Seppo. (U Helsinki, Finland) **Authoritarian attitudes of supervisors in relation to the effects of supervision as assessed by student teachers.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(2), 79-94.—Analyzed authoritarian attitudes of supervisors in relation to effects of supervision on personal development of student teachers, as assessed by the student teachers themselves. The study is a continuation of earlier research by S. Kontiainen (see PA, Vol 52:3934). Questionnaire data were obtained from 95 female and 94 male student teachers on their assessment of 32 supervisors. Methods of factor analysis and control analysis were applied to the data. Results are interpreted to mean that how authoritarian attitudes are experienced by student teachers depends on other characteristics of supervisor behavior in combination with these attitudes. The analyses show that authoritarian attitudes tend to result in negative—or at best neutral or moderate—effects of supervision.—*Journal abstract*.

6116. Koskenniemi, Matti. (U Helsinki, Finland) **The instructional process and realization of curriculum planning reports from the DPA Helsinki.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(3), 101-116.—Presents a taxonomical instrument for description of instructional processes which is based on the results of triple coding of 174 lessons with systems developed by R. F. Bales, A. A. Bellack, and N. A. Flanders and on logic and concept analysis. The necessity to have continuous chains of instructional situations as targets and the inclusion of goal variables into the paradigm are emphasized. (18 ref)

6117. Lerner, Janet W. & Schuyler, James A. (Northeastern Illinois U) **Computer simulation: A technique for training educational diagnosticians.** *Journal of Learning Disabilities*, 1974(Oct), Vol 7(8), 471-476.—Describes a method of training learning disabilities specialists, using the diagnosis of computer-simulated cases by the trainees as a supplement to regular practicum experience, thus bridging the gap between courses in theory and actual clinical practice.

6118. Lundgren, Robert E. & Shavelson, Richard J. (Temple City Unified School District, CA) **Effects of listening training on teacher listening and discussion skills.** *California Journal of Educational Research*, 1974(Sep), Vol 25(4), 205-218.—Investigated R. E. Snow's (1968) model of cognitive events in teacher-learner interaction at the input state. 60 teacher interns

completing their training were selected. The ability to use key words in summarization of a discussion was used as the most reliable measure of listening. Results suggest that listening skills (the teacher's ability to extract information completely and accurately) can be improved through training. (24 ref)—*Journal abstract*.

6119. Matsuda, Michihiro. [Psychological analysis of the teaching processes in the primary school: II.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 181-186.—3 arithmetic teachers with different amounts of teaching experience taught 3 different classes of 4th graders the same unit of subject matter. Teaching and learning activities were videotaped, and 6 Os recorded and classified children's activities on a 45-item scale. Teacher-pupil interaction was classified according to its duration and frequency. The pre- and posttests of pupil achievement were compared. The teacher with the longest teaching experience used the teacher-centered approach, spent more time in individualized instruction, and scored highest on the posttest of pupil achievement. (18 ref)—S. Choe.

6120. Muller, Mary. **Visual anthropology in teacher education.** *Audiovisual Instruction*, 1974(Oct), Vol 19(8), 30-33.—Describes a teacher education course in Latin America which utilized the rationale and techniques of visual anthropology as part of an effort to develop instructional materials and to offer the students field practice in empirical research. Skills developed through photography of children in the street and in rural villages are described.

6121. Neely, George. (U Michigan, Medical School, Mental Health Research Inst) **Evaluation of the consultation process in schools.** *Professional Psychology*, 1974(Aug), Vol 5(3), 299-302.—Explains the philosophy and methods of the Educational Change Team, a "multidisciplinary multiparty advocacy" educational consultant group. The group recognizes and explores the differing goals of different groups within educational systems, emphasizing input from students and minority group members. Their major goals are ending institutional racism and promoting youth interests. Accountability to the client is stressed as the major form of evaluation.—C. Wright.

6122. Oliver, Lincoln I. (US DHEW, National Ctr for Health Statistics, Rockville, MD) **Behavior patterns in school of youths 12-17 years.** *Vital & Health Statistics, Series 11*, 1974(May), No 139, 50 p.—Presents estimates of the distributions of perceptions of teachers and other school officials on selected behavioral characteristics of youths 12-17 yrs of age in the noninstitutional US population by age and sex. Findings are based on questionnaire responses of Ss in the Health Examination Survey of 1966-1970. A descriptive analysis was made of teachers' responses concerning youths' intellectual ability, academic performance, peer relations, and emotional adjustment to school. Specific behavioral patterns are examined in relation to assessments of mental development, school achievement, and adjustment. Data indicate that adolescent girls are more successful than boys, particularly in terms of adjustment to the specific environment; these findings are consistent with other data which show that girls achieved higher scores on tests of school achievement even though boys had higher



scores on tests of intellectual development. (16 ref)  
—*Journal summary.*

6123. **Parsonson, Barry S.; Baer, Ann M. & Baer, Donald M.** (U Waikato, Hamilton, New Zealand) **The application of generalized correct social contingencies: An evaluation of a training program.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 427-437.—2 female aides operating a kindergarten-style program for 6 institutionalized mental retardates (mean age = 9.4 yrs) were trained, using O feedback, to apply generalized correct social contingencies to 10 defined classes of appropriate and inappropriate child behaviors. A multiple baseline design was used to demonstrate, sequentially, the effects of the training procedure upon the attending behavior of each aide. After withdrawal of feedback, a posttraining follow-up assessed the durability of training. It was found that training increased the proportion of appropriate child behaviors to which both aides attended, compared with baseline data, and a follow-up over a number of weeks indicated that the effects of training were apparently durable.—*Journal abstract.*

6124. **Pascarella, Ernest T.** (Syracuse U, Ctr for Instructional Development) **Students' perceptions of the college environment: How well are they understood by administrators?** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 370-375.—Studied the accuracy of administrators' descriptions of the college environment in comparison with student perceptions. 2 groups of 109 student personnel administrators and administrative staff from 2 large, private universities and 483 freshmen and 410 seniors completed a semantic differential rating of the concept "this university" for 27 bipolar adjectives. A factor analysis yielded 3 factors—Intellectual and Creative Dynamism, Bureaucracy, and Aesthetic Idealism which accounted for about 58% of the variance. Student and administrator responses differed significantly on the 1st 2 factors. Administrators projected students as viewing the environment significantly higher in terms of intellectual stimulation and significantly lower in terms of bureaucracy than students did. No significant differences between the perceptions of administrative subgroups (e.g., department chairmen or academic affairs heads) were found.—*L. Gorsey.*

6125. **Pfeifer, C. Michael & Schneider, Benjamin.** (Westinghouse Behavioral Safety Ctr, Columbia, MD) **University climate perceptions by black and white students.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 660-662.—Studied the perceptions of university climate of 138 black and 730 white undergraduates. Factor analyses of a 115-item university climate questionnaire were performed in racial subgroups. 5 factors were extracted for whites and 6 for blacks. 2 racism factors appeared in the black sample, while only 1 racism factor appeared in the white sample. There were consistent and significant differences on the factor scales between the 2 races, with blacks perceiving the university climate more negatively.—*Journal abstract.*

6126. **Popham, W. James et al.** (U California, Los Angeles) **Performance tests for instructional developers: An exploratory investigation.** *Educational Technology*, 1974(Mar), Vol 14(3), 57-61.—Describes the development and implementation of an assessment instrument

for evaluating the competency of instructional developers. A performance test strategy was adopted in which the developer was given a specific instructional objective and the background required to prepare materials to be administered to learners. The competence of the developer was determined by the effectiveness and learner appeal of the material developed. Results were sufficiently encouraging to warrant additional studies.—*C. B. Kreitzberg.*

6127. **Rowe, Mary B.** (U Florida, Inst for Development of Human Resources) **Pausing phenomena: Influence on the quality of instruction.** *Journal of Psycholinguistic Research*, 1974(Jul), Vol 3(3), 203-224.—Investigated the consequences of manipulating 2 species of "wait-time" on the development of language and logic in 36 children in elementary science programs. When wait-time of 3-5 sec was achieved through training, analysis of more than 900 tapes shows changed values on 8 student variables: (a) the length of response (number of words) increased, (b) the number of unsolicited but appropriate responses increased, (c) failures to respond decreased, (d) incidence of speculative responses increased, (e) incidence of student-student comparisons of data increased, (f) incidence of evidence-inference statements increased, (g) frequency of student-initiated questions increased, and (h) the variety in type of verbal moves made by students increased. Servochart plots of recordings show that students discussing science phenomena tended to speak in bursts, with intervals of as much as 3-5 sec between bursts being fairly common provided they were not interrupted. 2 teacher variables changed—response flexibility scores increased and teacher questioning patterns became more variable.—*Journal abstract.*

6128. **Scott, Harry V.** (West Virginia State Coll, Div of Teacher Education) **Levels of involvement: A descriptive model for teacher education.** *Educational Technology*, 1974(Mar), Vol 14(3), 48-52.—Proposes a model which outlines the logical steps from an undergraduate student beginning a teacher education program to an autonomous classroom teacher. The model describes 7 levels of involvement with representative activities at each level. The emphasis is on progressively greater personal involvement. There are at least 4 dimensions to teacher education—instructional, personal, professional, and community involvement. The proposed model, although centering around the instructional dimension, is comprehensive enough to fit the other 3 dimensions as well.—*C. B. Kreitzberg.*

6129. **Short, Byrl G. & Szabo, Michael.** (Penfield Central Schools, NY) **Secondary school teachers' knowledge of and their attitudes toward educational research.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 75-78.—Investigated relationships among secondary teachers' attitude toward and knowledge of educational research and selected demographic characteristics. 204 teachers completed the Short Knowledge of Educational Research Test, a semantic differential attitude inventory, and a personal data form. Results show that (a) knowledge and attitude scores are related to subject area taught; (b) knowledge scores are related to subject area taught, recency of course work in educational research, measurement, or statistics, and

research participation; (c) attitude and knowledge scores are unrelated to the sex of the teacher, years of teaching experience, and grade level taught; and (d) the correlation between knowledge and attitude scores is not significantly different from zero.—*Journal abstract.*

6130. Sorotzkin, Feige; Fleming, Elyse S. & Anttonen, Ralph G. **Teacher knowledge of standardized test information and its effect on pupil I.Q. and achievement.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 79-85.—Studied the effects on pupil performance of providing 2nd grade teachers with either IQ test information, achievement test information, IQ and achievement test information, or no test information within the context of teachers' views toward testing. Analyses of covariance of final IQ and achievement test scores (Kuhlmann-Anderson IQ Tests and Stanford Achievement Test) for 567 2nd graders in 23 classes revealed that there were no significant differences as a function of the type of test information distributed to the teachers. 2nd-graders whose teachers and high-middle opinions of tests scored significantly higher on final vocabulary and arithmetic achievement tests than did students whose teachers had low opinions of standardized tests. Significant sex differences in test results were also observed. (19 ref)—*Journal abstract.*

6131. Startup, Richard. (University Coll Swansea, Wales) **Why students wish to reform university government.** *Research in Education*, 1974(May), No 11, 69-82.—Surveyed 321 university students to assess attitudes about the university and its political structure. Results indicate that (a) one-fourth of the Ss felt that "radical changes" should take place in the university's political structure, (b) 1 out of 10 generally wanted more student participation (one-third listed specific dissatisfactions), (c) slightly more than two-fifths felt that occupational expectations had been met, and (d) personal and social expectations were fulfilled for between one-half and three-fourths of the Ss. It is suggested that the "reformer" is the student who is intellectually and personally dissatisfied.—*M. E. Pounsel.*

6132. Turner, Paul R. (U Arizona) **Why Johnny doesn't want to learn a foreign language.** *Modern Language Journal*, 1974(Apr), Vol 58(4), 191-196.—Presents anthropological reasons for the high rate of drop-out and resistance in foreign language courses. It is argued that successful foreign language learning requires identification with the foreign culture, but democratic pressures toward cultural homogeneity in the US entail a negative evaluation of ethnicity, therefore, any identification with US immigrant cultures is rejected.—*C. A. Sherrard.*

6133. Webster, William J. & Mendro, Robert L. (Dallas Independent School District, TX) **The investigation of aptitude-treatment interactions as an integral part of program evaluation.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 86-91.—One of the primary objectives of public education in the 1970's is that of meeting the educational needs of all children through individualization. Despite this goal, little information concerning individual differences in learners is currently available. A schema for the systematic investigation of individual differences in learning through the use of aptitude-treatment interaction studies is outlined,

which also provides an approach to incorporating these studies into an ongoing evaluation system. (34 ref)—*Journal abstract.*

6134. Wetterström, Magnhild. **Student democracy in Grades 1-6.** *Educational & Psychological Interactions*, 1974(Mar), No 46, 26 p.—Presents results from a series of mapping studies in which headmasters, supervisory teachers, student teachers, and various teacher and student groups expressed their views on co-influence in the school today and in the future. Assessments are reported from teachers and students both at ordinary schools and at more progressive schools. Results indicate a generally positive attitude towards increased student influence but reveal several specific problems that emerged when this attitude was expressed in more concrete terms.—*Journal abstract.*

6135. Zachrisson, Bertil. [Examination and evaluation of student research essays in teacher training within the area of craft and industry.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Aug), No 247, 69 p.—Reports results from an examination and evaluation of 457 essays written by student teachers within the area of craft and industry. The purpose of this investigation was twofold: (a) to identify essays of potential use for teacher training and vocational training and (b) to study correlations between essay proficiency and student background data. An organization model and advice to teachers and students on the subject are included. (18 ref)—*English abstract.*

6136. Zarur, Francisco & Velandia, Aquiles. (U Pedagógica Nacional, Bogotá, Colombia) [Relationship of aptitudes, interests, and personality traits with respect to teacher efficiency with students at a school of education.] (Span) *Revista Latinoamericana de Psicología*, 1974, Vol 6(2), 179-196.—Administered Thurstone's Primary Mental Abilities (PMA), the Guilford-Zimmerman Interest Inventory, and the Maudsley Personality Inventory to 60 advanced students of pedagogy, 30 evaluated by training supervisors as very efficient teachers and 30 as very inefficient. Statistically significant differences were obtained in the Verbal Comprehension factor of the PMA and in the Service Category of the Interest Inventory, both in favor of the efficient group. (English summary) (37 ref)—*V. A. Colotla.*

#### Curriculum Development & Teaching Methods

6137. Adams, Wesley J. (U Alberta, School of Household Economics, Edmonton, Canada) **The use of sexual humor in teaching human sexuality at the university level.** *Family Coordinator*, 1974(Oct), Vol 23(4), 365-368.—Discusses the value of using sexual humor as an innovative teaching method in college human sexuality courses. One such course is described—a graduate-level seminar which meets 3 hrs/wk for 13 wks. Both the instructor and the students share responsibility for teaching the course. Sexual humor, as a specific teaching method, is used only during 1 3-hr session; the procedure involves primarily the use of cartoons to illustrate common misconceptions about sexuality, frequent sexual problems, the scientific approach to sexual behavior, and the problem of sexual morality. Sample discussion questions and cartoons are described.—*L. Gorsey.*



6138. Berman, Arthur I. (U Copenhagen, Denmark) **The media-activated seminar.** *Educational Technology*, 1974(Mar), Vol 14(3), 43-45.—Describes the medium-activated seminar, in which an autolecture is led by a student or teaching assistant, followed by an unstructured seminar involving the teacher. Medium requirements, choice, format, and content are discussed, and the way in which this teaching format is combined with other elements in the learning process. Several attitudinal statements by students exposed to media-activated seminars have indicated that graduate students prefer this type of instruction to more conventional methods.—C. B. Kreitzberg.

6139. Besmer, Beverly F. **Loving your environment: A humanistic approach to primary school environmental studies.** *Interpersonal Development*, 1973-1974(Aug), Vol 4(2), 120-132.—Reports concepts and contents of a humanistically oriented primary school environmental education curriculum. The confluence of affective and cognitive learning is considered in influencing student-teacher relationships. A teachers' guide, including illustrative activity plans, is excerpted.

6140. Blizek, William L.; Jackson, Karl & LaVoie, Joseph C. (U Nebraska, Omaha) **Short course vs conventional structures for teaching philosophy.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 25-33.—Examined 2 course structures which are suitable for college teaching—lecture/discussion and independent study. Ss were 100 undergraduates enrolled in philosophy of art and social philosophy classes which were designated as either the independent study or the lecture-discussion format. Measures were obtained on acquisition of factual content, attitudes, student motivation, satisfaction, and classroom climate. Factual content increased during the semester, but this increase was a function of course structure and class. Students liked the independent study format better than the lecture-discussion format. Highly motivated students did better in the independent format, while poorly motivated students performed better in the conventional format. Results suggest that students and course structures should be matched in their motivational properties. (24 ref)—*Journal abstract*.

6141. Born, David G. & Davis, Michael L. (U Utah) **Amount and distribution of study in a personalized instruction course and in a lecture course.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 365-375.—Considers that the rapid proliferation of courses based on F. S. Keller's (1968) Personalized System of Instruction (PSI) calls for a prompt evaluation of the relative costs involved in PSI and more traditional forms of college instruction. To determine the cost in student time required by a course taught with PSI relative to lecture, undergraduates did their studying in a special study center where course materials could be used but not removed. The 63 students in the PSI section spent an average of about 50% more time in the study center (46 hrs) than did the 31 students in the lecture section (30 hrs), but that difference was made up by the lecture students spending an average of 20 hrs attending lectures. Thus, total preparation time was about the same. PSI students scored slightly higher on common course exams, and while college entrance exam scores

correlated highly with course exam scores, study center time was reliably related to course exam score only for PSI students. An analysis of the study records of individual students revealed that PSI produced fairly regular patterns of study by all students, while lecture students varied greatly in their patterns.—*Journal abstract*.

6142. Borton, Terry; Belasco, Leonard & Echewa, Thomas. (Board of Education, Office of Curriculum & Instruction, Philadelphia, PA) **Dual audio TV instruction: A mass broadcast simulation.** *AV Communication Review*, 1974(Sum), Vol 22(2), 133-152.—1st and 2nd graders were given the opportunity to listen to radio instruction coordinated with a TV cartoon. Measurements were made of the extent to which children watched the cartoon, listened to the radio instruction, and learned vocabulary words taught via radio.

6143. Brown, David & Reschly, Daniel. (U Arizona) **The modification of classroom asocial behaviors: Individual vs. group incentives.** *SALT: School Applications of Learning Theory*, 1974(Jul), Vol 6(4), 42-49.—Studied whether an intrinsic classroom motivator (peer influence) in conjunction with extrinsic reinforcement (candy) and punishment (time-out room) was more effective than extrinsic reinforcement and punishment alone in modifying aggressive classroom behavior. Ss were 12 boys and 8 girls, 4 yrs old, in a Head Start classroom. Phases 1 and 3 of the design used candy and time out as reinforcers or punishment with individual children. In Phases 2 and 4 groups of 4 children were reinforced or punished at the end of each hour instead of the individual child. Each phase decreased aggressive behavior from baseline, but in Phases 2 and 4 the reductions were greater. The changes were resistant to extinction in the same manner. It is concluded that very young children can assume responsibility for their personal actions and contribute to the maintenance and control of peer behavior.—D. R. Marina.

6144. Brown, Louis F. (U Iowa, Coll of Education, Div of Special Education) **An analysis of instructional materials.** *Mental Retardation*, 1974(Oct), Vol 12(5), 21-25.—Describes a system for analyzing instructional materials, using J. P. Guilford's (1967) structure-of-intellect model and additional variables. It is suggested that evaluation of these materials is essential because of (a) the increased effort to account for individual learner differences; and (b) mass production of materials, making it difficult for a teacher to determine the worth of a specific instructional item.

6145. Callahan, Carolyn M. & Renzulli, Joseph S. (U Virginia) **Development and evaluation of a creativity training program.** *Exceptional Children*, 1974(Sep), Vol 41(1), 44-45.—Studied the effectiveness of *New Directions in Creativity*, a 3-volume creativity training program. Results from 63 6th graders and their teachers indicate that the program is a valuable resource in the development of creative thinking abilities.

6146. Carrico, Mark & Wood, Robert W. **An evaluation of the influence of Sesame Street on kindergarten achievement.** *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 2-6.—Compared the goal attainment of 45 kindergartners who viewed Sesame Street with the attainment of 45 Ss who did not view the

program. A test designed for the study was administered before and after the study to the control and experimental groups to measure the effect of Sesame Street relative to the attainment of selected behavioral goals. Results show that Ss who viewed Sesame Street showed significant achievement gains in all areas.—*Journal abstract.*

6147. Carroll, Archie B. & Watson, Hugh J. (U Georgia) Utilizing job enrichment concepts for instructional purposes. *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 7-11.—Discusses uninteresting, routine, and meaningless class work assignments as possible factors in feelings of monotony, boredom, and apathy among college students. Results of the implementation of job enrichment concepts in a college class indicate that students responded with greater interest and enthusiasm and with higher quality performance.

6148. Cundick, Bert P.; Gottfredson, Douglas K. & Willson, Linda. (Brigham Young U) Changes in scholastic achievement and intelligence of Indian children enrolled in a foster placement program. *Developmental Psychology*, 1974(Nov), Vol 10(6), 815-820.—Attempted to determine whether Indian students participating in a foster home placement program would show educational gains greater than those previously found with other Indian education programs. 84 children who had been enrolled for 5 or more yrs were selected as Ss and their standardized testing records obtained from the schools. The tests, administered when the Ss were 8-14 yrs old, included the Iowa Test of Basic Skills and California Test of Mental Maturity. Although testing records were incomplete, it was found that compared to national norms, the mean achievement score for this group declined with successive yrs of participation in the program and total IQ scores showed no significant changes. It is concluded that results are similar in this respect to those obtained on Indian students who remain at home and are educated in public schools. (22 ref)—*Journal abstract.*

6149. Erickson, Marilyn R. & Howell, John F. (Springfield Public Schools, MA) Summer program helps pre-schoolers. *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 39.—Used the Peabody Picture Vocabulary Test to assess the development of 110 preschoolers enrolled in a summer program. Results support the hypothesis that the program would significantly help the children.

6150. Findley, Warren G. (U Georgia) Grouping for instruction. In L. P. Miller (Ed), *The Testing of black students: A symposium*. Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.—Discusses theoretical, empirical, and practical reasons for the unsoundness of the ability grouping system in schools, especially as it affects black children. The effects of ability grouping programs on academic performance and self-concepts in black children and more profitable alternatives to this system (e.g., peer tutoring) are discussed.

6151. Flowers, John V. (U California, Program in Social Ecology, Irvine) Behavior modification technique to reduce the frequency of unwarranted questions by target students in an elementary school classroom. *Behavior Therapy*, 1974(Oct), Vol 5(5), 665-667.—After a 3-wk token-reinforcement treatment, 8 5th graders

significantly decreased their unwarranted questions and significantly increased their warranted questions. 21 Ss not in treatment also significantly increased their frequency of warranted questions, indicating that the change in the target Ss actually changed the entire classroom system.

6152. Galey, Minaruth & George, Kenneth D. (Temple U, Coll of Education) Development of skills of classification using television. *AV Communication Review*, 1974(Sum), Vol 22(2), 153-166.—The effectiveness of TV science instruction coupled with the use of science kit materials was tested with 1st graders. Results indicate no difference between TV and classroom lessons in developing classification skills.

6153. Hammill, Donald D. & Larsen, Stephen C. The effectiveness of psycholinguistic training. *Exceptional Children*, 1974(Sep), Vol 41(1), 5-14.—Reviewed the results of 38 studies which attempted to train children in psycholinguistic skills and which used the Illinois Test of Psycholinguistic Abilities as the criterion of improvement. It is concluded that the effectiveness of such training has not been conclusively demonstrated and, therefore, that the rapid expansion of psycholinguistic training programs seems unwarranted. (56 ref)—*Journal abstract.*

6154. Henderson, Ronald W. & Swanson, Rosemary. (U Arizona, Tucson) Application of social learning principles in a field setting. *Exceptional Children*, 1974(Sep), Vol 41(1), 53-55.—Evaluated the effectiveness of modeling and reinforcement procedures on the development of question-asking skills in 30 Papago native Americans. Results show that although all groups made significant improvement, improvement was greater for treated groups.

6155. Hillelsohn, Michael J. (Human Resources Research Organization, Eastern Div, Alexandria, VA) Student initiated reports: Operational analysis in the evaluation of CAI curricula. *HumRRO Professional Paper*, 1974(Sep), No 15-74, 23 p.—Defines operational analysis as a part of formative evaluation taking place while a course is in progress. In Project IMPACT, student-perceived problems, as reflected by student-initiated reports, are the source of data for this phase of formative evaluation. The self-reporting techniques can reveal individual differences in student-learning-environment interactions which are not obtainable by other means. The individual student's perceptions can then be used to improve the instructional program. Applications of the data for administrative purposes are discussed, and administrative staffing for the IMPACT operational computer-assisted instruction (CAI) course is described. (21 ref)—*Journal abstract.*

6156. Hollander, Carl E. (Colorado Ctr for Psychodrama, Sociometry & Sociatry, Denver) Role playing: An action learning process. *Handbook of International Sociometry*, 1973, Vol 7, 88-93.—Describes and discusses conditions under which role playing can contribute to the teaching-learning process in early school-age learners. Several important steps are outlined which are necessary if the role-playing experience is to be a positive one. Role-playing situations applicable to classes in history, English literature, developmental anatomy, social studies, mental health, mathematics, social issues,



and the biological sciences are listed and described.—R. J. Ambrosino.

6157. Jakobovits, Leon A. (U Hawaii) **Transactional engineering analysis and foreign language teaching: A reply to Ney.** *Modern Language Journal*, 1974(Apr), Vol 58(4), 201-203.—Replies to an article by J. W. Ney (see PA, Vol 53:Issue 3) which criticized the ambivalence of foreign language teaching theorists toward behaviorist and cognitive linguistic theories. The abandonment of psychological theories of language in favor of sociolinguistic and transactional analysis as the theoretical foundation of foreign language teaching practice is proposed.

6158. Leviton, Dan & Forman, Eileen C. (U Maryland, Adults' Health & Developmental Program) **Death education for children and youth.** *Journal of Clinical Child Psychology*, 1974(Sum), Vol 3(2), 8-10.—Presents some observations on education about death, especially for the elementary school child and the college student. The educator must know the background and motivation of students in such classes. Methods in death education and emotional barriers are discussed. It is recommended that death education be given, but only by thoroughly trained personnel.—A. Krichew.

6159. Mercer, G. (U Leeds, England) **Are we being fair to political education in the school?** *Research in Education*, 1974(May), No 11, 51-67.—Studied 389 English adolescents to determine the impact of a political education course on their political attitudes. Ss were administered questionnaires at the beginning and end of the school year. Results indicate that the political education course did little to alter existing trends in Ss' political learning. Where improvement was linked with the course, it tended to be commensurate with the original growth rate achieved by the individual. (23 ref)—M. E. Pounsel.

6160. Mercurio, Joseph A. (U Otago, Dunedin, New Zealand) **Caning: Educational ritual.** *Australian & New Zealand Journal of Sociology*, 1974(Feb), Vol 10(1), 49-53.—Carried out a study of corporal punishment, using the method of participant observation, in a high school in Christchurch, New Zealand, which had a staff of 45 masters and an enrollment of 1,100 boys 13-17 yrs old. Observations indicate that caning is a ritual which serves as a thermostat. It tries to keep the system in balance and to maintain the values of discipline, manliness, and egalitarianism. Other considerations include the attempt to force upon the ritual more than it can bear, the persistence of the ritual in the threat of change, and its acceleration of need before its inevitable demise.—*Journal summary.*

6161. Mullahy, Thomas E. (Pathway School, Jeffersonville, PA) **The genesis of mathematical awareness.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

6162. Ney, James W. (Arizona State U) **Contradictions in theoretical approaches to the teaching of foreign languages.** *Modern Language Journal*, 1974(Apr), Vol 58(4), 197-200.—Points out a contradiction in the writings of foreign language teaching theorists, who espouse the cognitive linguistic theory of

N. Chomsky, but recommend behaviorist-based drill and pattern practice in teaching.

6163. O'Connell, Michael. (Helen Ross McNabb Ctr, Knoxville, TN) **Immediate feedback, delayed feedback, and perceptual cues and inquiry during verbal interactions.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 536-538.—Evaluated the effectiveness of diverse ways of teaching an interpersonal inquiry technique. Using 5 experimental groups of male undergraduates and a videotape technique, the impact of delayed feedback, immediate feedback, and perceptual cues was separated. When Ss were exposed to delayed feedback plus perceptual cues, they learned at a significantly higher level than when receiving immediate feedback.—*Journal abstract.*

6164. Peters, Marie F. (U Connecticut) **The black family: Perpetuating the myths: An analysis of family sociology textbook treatment of black families.** *Family Coordinator*, 1974(Oct), Vol 23(4), 349-357.—Considers that a serious issue in the family sociology field is the inadequacy of both research and textbooks in the treatment of black American families. The contemporary view of the black family usually emphasizes concepts of deviancy, pathology, and/or uncontrolled sexuality. College family sociology textbooks in the family sociology field are analyzed to demonstrate how all family sociology textbooks should be examined as to their treatment of black family literature. Most are found to be inaccurate and unacceptable; only a few meet acceptable criteria. A guide is presented for evaluating college family sociology textbooks. (37 ref)—*Journal abstract.*

6165. Placek, Robert W. (U Georgia) **Design and trial of a computer-assisted lesson in rhythm.** *Journal of Research in Music Education*, 1974(Spr), Vol 22(1), 13-23.—Describes development of a computer-assisted lesson in rhythm perception, designed for students in elementary education, using TUTOR language and the PLATO III system.

6166. Prince, Warren F. (Case Western Reserve U) **Effects of guided listening on musical enjoyment of junior high school students.** *Journal of Research in Music Education*, 1974(Spr), Vol 22(1), 45-51.—Divided 342 7th graders and 5 California schools into 3 groups. Group 1 received 12 tape-recorded narrated lessons on baroque music over a 3-mo period. Group 2 received 12 similar lessons on 20th century music. Group 3, controls, received only the regular general music lessons. Liking for specific styles of music was not affected either by the special training materials and methods or by general music classes.—D. S. Higbee.

6167. Romanek, Mary L. (Pennsylvania State U, McKeesport) **A self-instructional program for musical concept development in preschool children.** *Journal of Research in Music Education*, 1974(Sum), Vol 22(2), 129-135.—Studied 42 preschoolers at a state university nursery school. Data indicate that Ss showed significant learning of concepts of loudness, pitch, and duration after 12 20-min self-instructional lessons. A control group with no instruction did not show significant learning.

6168. Ruder, Kenneth F. & Smith, Michael D. (U Kansas, Bureau of Child Research) **Issues in language**

training. In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Discusses issues concerned with (a) evaluation and selection of language training programs, (b) content of a language training program, (c) language training procedures, and (d) language assessment. It is stressed that such programs should be able to identify and train both relevant linguistic structures and appropriate environmental situations which call for the use of particular structures. (6 p ref)

6169. Scoresby, A. Lynn; Apolonio, Franklin J. & Hatch, Gary. (Brigham Young U) **Action plans: An approach to behavior change in marriage education.** *Family Coordinator*, 1974(Oct), Vol 23(4), 343-347.—Presents the rationale, methodology, and implications for using action plans to facilitate behavior modification of college students in marriage education courses. Action plans consist of acting to increase or decrease the frequency of a specific unit of overt behavior by identifying what behavior is to be changed, what level of commitment is required to make the change, where help can be obtained, and possible obstacles to change. Case studies are given as illustrations of how action plans may be implemented, and student evaluations of action plans as a teaching tool are reported. It is concluded that planned behavior change can effectively be carried out by students who report greater learning and self-satisfaction.—*Journal abstract*.

6170. Swick, Kevin J. (Southern Illinois U, Carbon-dale) **Developing children's creative talents through media and activities.** *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 53-56.—Presents examples of creative media activities that correspond to developmental growth stages in children. Suggestions are provided for infant and nursery school, preschool and primary grade, and junior high school children.

6171. Van Hevel, John & Hawkins, Robert P. (Western Michigan U) **Modification of behavior in secondary school students using the Premack principle and response cost technique.** *SALT: School Applications of Learning Theory*, 1974(Jul), Vol 6(4), 31-41.—Applied a simple, economical, self-contained token reinforcement system which increased the amount of time that junior high school students spent attending to their work. During baseline a record was made of the percentage of time each student spent attending to his work. When points, backed up by free time, were delivered contingent upon attending behavior, the percentage of time spent attending increased. When the experimental contingencies were discontinued for a short time, attending behavior decreased. Reinstatement of the procedure again increased the time spent attending. Performance was maintained as reinforcement was delivered less often, and was also maintained on checks made several weeks after the E had left the classroom.—*Journal abstract*.

6172. VanderWiel, Ray & Foley, Bob. (Educational Service Ctr, Cedar Rapids, IA) **Any telephone a dial-access station.** *Educational Technology*, 1974(Mar), Vol 14(3), 54-57.—Describes a system whereby users can obtain access to prerecorded educational materials

through any telephone. Operating cost for the system is estimated at \$.61/hr.

6173. Verreck, W. A. (Ed.). (Eindhoven U of Technology, Educational Research Group, Netherlands) **Methodological problems in research and development in higher education: Proceedings of the Inaugural Congress of the European Association for Research and Development in Higher Education, Rotterdam, December 3-5, 1973.** Amsterdam, Netherlands: Swets & Zeitlinger B. V., 1974. xii, 439 p.—Presents 24 symposium papers on goals and objectives in curriculum construction, new approaches to curriculum evaluation, the implementation of educational innovations, approaches to individualization of instruction, and measurement and individual differences.

6174. Witt, William. (U Wisconsin) **Effects of numerical data upon reading time and recall of scientific writing.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 532-534.—To examine the effects of numerical units upon reading time and recall, 50 university students were exposed to text containing numerical references and 50 were exposed to identical text with descriptive modifiers substituted for the numbers. Numerical data significantly increased reading time but, in the predicted direction, fell short of significance in decreasing recall.

#### Academic Learning & Adjustment & Achievement

6175. Berzonsky, Michael D. & Ondrako, Mary A. (State U New York, Cortland) **Cognitive style and logical deductive reasoning.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 18-24.—Conducted 2 studies to analyze the role of reflection in logical deductive reasoning. In Study 1 69 6- and 7-yr-olds were administered a measure of reflectivity (Matching Familiar Figures Test; MFFT) and a logic test involving concrete manipulations. Results indicate that reflectives scored higher than impulsives on the logic test, but the difference was not statistically significant ( $p < .10$ ); fallacy principles were more difficult than the valid ones, and sex differences were nonsignificant. To determine whether the nonsignificant effect of reflectivity in Study 1 was a function of the concrete nature of the logic test, 39 11-yr-olds were administered a verbal measure of logical reasoning and the MFFT in a 2nd study. Suggestive items were more difficult than concrete or abstract ones. Valid principles were less difficult than invalid ones. While reflectives performed better than impulsives on the logic test, the magnitude difference was again nonsignificant. (19 ref)—*Journal abstract*.

6176. Cockriel, Irvin W. (U Missouri) **Sociometric status scores and reading achievement.** *Handbook of International Sociometry*, 1973, Vol 7, 84-87.—Investigated the relationship between social rejection and reading achievement. Ss were 4 6th grade classes in a large suburban school. 2 sociometric status scores were derived, and reading comprehension scores from the Iowa Tests of Basic Skills (ITBS) and the Petriell Reading Comprehension Test (PRCT). Pearson product-moment correlation coefficients were computed between the social status and reading comprehension scores. Results indicate that positive social status was positively correlated with reading comprehension as measured by the ITBS



and PRCT ( $p < .01$ ), and negative social status was negatively correlated with comprehension ( $p < .01$ ). Findings thus confirm earlier research results.—*R. J. Ambrosino.*

6177. **Dahlöf, Urban.** (U Göteborg, Inst of Education, Sweden) Trends in process-related research on curriculum and teaching at different problem levels in educational sciences. *Scandinavian Journal of Educational Research*, 1974, Vol 18(2), 55-77.—Reviews research on the influences of certain environmental factors (e.g., size and characteristics of the school) on student achievement. The data indicate that educational process data are helpful in developing an explanatory model both on the macro-systems level and on the classroom interaction level. 7 promising characteristics of the approach are noted. It is concluded that the findings strongly support claims for a reorientation of educational research. (3½ p ref)—*R. Hall.*

6178. **Fisher, Richard I.** (Colorado State U) **Cognitive appraisal: An examination.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 147-152.—Tested 295 college students to determine the effects of specified variables of self-appraisal and task-appraisal on achievement, self-assessment of achievement, and expended effort. The academic self-concept was found to contribute significantly to achievement on a specific task. A nonsignificant partial correlation between task confidence and task achievement with intelligence controlled was obtained. Approximately two-thirds of the variance in self-assessment of achievement was due to perceived achievement on a specific task. The variables of self-appraisal (i.e., academic self-concept and self-confidence) and task appraisal (i.e., task confidence and task interest) did not affect self-assessment of achievement. Expended effort appears to have had a small part in the total variance of self-assessment of achievement. Expended effort was significantly related to task interest, but variables of self-appraisal did not contribute significantly to expended effort.—*Journal abstract.*

6179. **Flynn, Timothy M.** (Southern Illinois U, Carbondale) **The personality characteristics of school readiness in disadvantaged preschool children.** *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 45-52.—To determine the characteristics that are related to school readiness, 7 characteristics were examined in 195 3-5 yr olds: (a) delay of gratification, (b) relationship with achievement model, (c) dependency, (d) motor inhibition, (e) self-control, (f) self-concept, and (g) risk-taking. A cognitive ability measure was used as a covariate to remove the purely intellectual factor from the measure of school readiness to insure that the characteristics being examined were of an affective nature. Results of regression analysis indicate that self-concept accounted for a significant percentage of achievement variance for both males and females. Self-control, delay of gratification, and motor inhibition accounted for a significant percentage of variance for males but not for females. However, risk-taking was related to school readiness for females but not for males. (20 ref)—*Journal abstract.*

6180. **Forbes, Gordon B.** (Millikin U) **Birth order and academic behavior among seriously disadvantaged adults.** *Journal of Social Psychology*, 1974(Aug), Vol

93(2), 301-302.—Found no relationship between birth order and attendance in or successful completion of an adult continuing education course among severely disadvantaged adults. Results suggest that previous findings of greatest academic success for firstborns may be applied only to highly advantaged populations.

6181. **Greene, David & Lepper, Mark R.** (Stanford U) **Intrinsic motivation: How to turn play into work.** *Psychology Today*, 1974(Sep), Vol 8(4), 49-54.—Investigated the hypothesis that extrinsic rewards for an activity will lower the value of intrinsic rewards. A replicated study showed that nursery school children used magic markers less often after being rewarded for using them than they did before the reward, and less often than other children who were not rewarded. The use of math-related activities by grade school children was similarly affected. Since there appears to be some sort of trade-off between extrinsic and intrinsic motivation, extrinsic motivation should be used only when there is no intrinsic motivation to lose or when the fundamentals are being learned.—*E. J. Posavac.*

6182. **Jackson, Barry & Van Zoost, Brenda.** (Ontario County Board of Education, Oshawa, Canada) **Self-regulated teaching of others as a means of improving study habits.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 489-493.—30 undergraduates enrolled in an 8-session study skills program were given exercises throughout the sessions and asked to evaluate their own performance on these tasks and reward themselves with money. 15 Ss were required to teach the contents of each session to a friend and then to self-assess and monetarily self-reinforce their teaching competence. The remaining 15 Ss constituted a non-teaching control. Analysis of variance of scores on the Brown-Holtzman Survey of Study Habits and Attitudes and a specially developed Study Skills Inventory showed that all Ss reported significantly better study habits following the program, with a significant Teaching  $\times$  Program interaction indicating greater gains for the teaching Ss. Ss in both groups showed a significant reduction in Suinn Test Anxiety Behavior Scales scores. (26 ref)—*Journal abstract.*

6183. **Jensen, Reimer.** (Royal Danish School of Educational Studies, Copenhagen) **The risk of going to school.** In E. J. Anthony & C. Koupnik (Eds), *The child in his family: Children at psychiatric risk: III*. New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Suggests that in addition to their positive aspects, schools also expose vulnerable children to experiences that may be detrimental (e.g., the school setting may create feelings of inferiority, teacher's evaluation may undermine the child's enthusiasm and self-confidence, or it may inculcate group attitudes, values, and behavior that create conflicts for the child in his adjustment to his family and community).

6184. **Leon, Gloria R.** (U Minnesota, Lab of Physiological Hygiene) **Personality change in the specially admitted disadvantaged student after one year in college.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 522-528.—A group of 87 disadvantaged freshmen college students (predominantly black or Puerto Rican) admitted under a special entrance program was compared to a group of 36 regularly admitted freshmen. The

special entrance group showed an inverse relationship between interpersonal trust at the end of the school year and 1st- and 2nd-semester grade-point average. The control group showed a positive relationship between end-of-year interpersonal trust and grade-point average. Those disadvantaged Ss who fared better academically showed more internal locus of personal control at the completion of the freshman year. For the control group at the end of the school year, external control orientation was associated with lower interpersonal trust. The implication of these findings for those who work with minority-group students is discussed.—*Journal summary.*

6185. Maas, James B.; Jayson, Jill K. & Kleiber, Douglas A. (Cornell U) **Effects of spectral differences in illumination on fatigue.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 524-526.—Examined the effects of different spectra of environmental illumination on fatigue after a period of studying. No significant differences in Ss' self-reported states were identified. However, objective measures revealed less perceptual fatigue and better visual acuity under lighting which closely approximated the spectral quality of natural sunlight than under traditional cool-white lighting.

6186. Marciniak, Francis M. (Rhode Island Coll) **Investigation of the relationships between music perception and music performance.** *Journal of Research in Music Education*, 1974(Spring), Vol 22(1), 35-44.—Tested 11th and 12th graders from 6 high school bands participating in the 1969 and 1970 Illinois competition festivals. Data from Schinke's Test of Music Perception, the Drake Musical Aptitude Tests, and academic achievement tests, indicate that music perception was significantly related to music aptitude, academic achievement, ensemble experience, and instruction in music history and music theory. However, music perception was not significantly related to band performance, Ss' major instruments, literature ratings, socioeconomic status, or the background of the band director.—*D. S. Higbee.*

6187. Maudal, Gail R.; Butcher, James N. & Mauger, Paul A. (Hennepin County General Hosp, Minneapolis, MN) **A multivariate study of personality and academic factors in college attrition.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 560-567.—Performed multiple linear discriminant function analyses using academic, performance, and personality variables to discriminate among groups of transfers, persisters, and dropouts 2 yrs after college matriculation. 273 male and 433 female undergraduates were Ss. Measurements included the Personality Research Form, the MMPI, Block's Ego Control scale, grade point averages, and Scholastic Aptitude Test scores. Discrimination above base rates was obtained with either academic or personality variables. Analysis of all variables combined added no predictive power beyond that by either subset alone. Results held up on cross-validation. (28 ref)—*Journal abstract.*

6188. Moore, J. William & Holmes, Suzy. (Bucknell U) **The effects of verbally controlled success and failure conditions of persistent behavior.** *Journal of Experimental Education*, 1974(Fall), Vol 43(1), 70-74.—Studied the effects of success, failure, and combined success and failure experiences on 3 types of persistent behavior in 72

6th-grade students. Ss were randomly assigned to 1 of 3 treatment groups. Success and failure were defined in terms of verbal comments administered by E after the completion of each anagram list. Ss were trained using anagram lists under 1 of the 3 experimental conditions. Ss experiencing both success and failure during training voluntarily attempted more lists after training ( $p < .10$ ) than Ss experiencing only failure. Ss experiencing only failure performed at a higher level when participation was required but reinforcement was withheld ( $p < .05$ ). Ss' performance was differentially affected as a function of sex, IQ, and treatment during the training period.—*Journal abstract.*

6189. Nordlund, Gerhard. (U Umea, Sweden) **Prediction of success in secondary school studies.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(3), 133-150.—Studied the usefulness of students' present grade point averages in predicting their academic performance in secondary school, compared the prediction value of their average grades to the predictive value of ability and achievement tests, and examined how the selection of pupils can be improved using test and grade data. Data from 1,365 students in 2 levels of the upper secondary school confirm previous findings that prior grade point averages are the best predictors of subsequent academic achievement. This prediction cannot be substantially improved by adding ability and achievement test scores. Social status of the Ss was a significant contribution to the prediction ( $p < .05$ ).—*L. Gorsey.*

6190. Prociuk, Terry J. & Breen, Lawrence J. (U Manitoba, Winnipeg, Canada) **Locus of control, study habits and attitudes, and college academic performance.** *Journal of Psychology*, 1974(Sep), Vol 88(1), 91-95.—Examined the relationship between locus of control and 2 academic-related variables—study habits and attitudes, and college academic performance. 89 college students were administered (a) the Survey of Study Habits and Attitudes; and (b) Levenson's Internal, Powerful Others, and Chance scales, the latter providing separate measures of 2 external control dimensions. Results indicate that internal control was related positively to effective study habits and attitudes and to college academic success, while the opposite was true for powerful others and chance control. Significant differences were found between powerful others and chance control as related to study habits and attitudes and to college grade-point averages.—*Journal abstract.*

6191. Silberman, Harry F. (U California, Los Angeles) **Job satisfaction among students in work education programs.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 261-268.—Conducted interviews about job characteristics and 6 related variables (feedback availability, task difficulty, stimulus variation, group atmosphere, adult role models, and meaningfulness) with 1,016 students in grades 9-14 from 50 work education programs. 696 similar students who held part-time jobs but were not participating in work education programs also were interviewed. Participating students were significantly more satisfied with their jobs than were the nonparticipating students. Group atmosphere, availability of adult role models, meaningfulness of work roles, and availability of feedback accounted for much of the



variation in job satisfaction among students. (16 ref)  
—*Journal abstract.*

6192. Wilson, J. A. (Queen's U, NICER Research Unit, Belfast, Northern Ireland) **Adjustment in the classroom: II. Patterns of adaptation.** *Research in Education*, 1974(May), No 11, 17-29.—Examined the pattern of linear relationships among 29 indices of pupil adjustment in 300 10-yr-olds. Results suggest that the classroom reflects differential attitudes and expectations towards the educational and social needs of boys and girls. The patterns varied in such a way as to suggest that boys and girls are expected to fulfill distinguishable roles.

### Special Education

6193. ———. **Curriculum in early childhood education: Report of a seminar held from 15-25 November 1972 in Jerusalem.** The Hague, Netherlands: Bernard van Leer Foundation, 1974. 172 p. \$5.50.—Provides the texts of 5 papers presented or used as background documents at the Seminar on Curriculum in Compensatory Early Childhood Education: Disadvantaged Children and Their Early Education, Designing a Relevant Preschool Curriculum, the Curriculum in the Classroom, Compensatory Education for Aboriginal Children in Queensland, and the Athlone Early Learning Center, South Africa.

6194. Anderson, Nancy. (Montgomery County School District, PA) **On the practical side.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.—Discusses the teacher's role in the use of 4 methods of psychoeducational treatment of handicapped children: chemotherapy, psychotherapy, behavior modification, and specialized educational procedures (e.g., diagnostic and prescriptive teaching). Guidelines for teachers in working with children with specific handicaps and suggestions for activities and evaluation methods are presented. (17 ref)

6195. Apple, Marianne M. (Santa Clara Blind Ctr, San Jose, CA) **Kinesic training for the blind: A program.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 55-60.—Attempted to develop a kinesics training program for the congenitally blind adolescent in order to bridge the gap between education or vocational training and the everyday communication and social skills needed by the blind. An experimental program in nonverbal communications utilizing facial expressions and gestures was developed and put into operation with congenitally blind adolescents serving as Ss. Final measurements of the effectiveness of the 6-wk program gave inconclusive results, but feedback from the training suggested that it had been helpful.—C. L. Nicholson.

6196. Bateman, Barbara. (U Oregon) **Discussion summary: Language intervention for the mentally retarded.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p. \$14.50.—Critically reviews articles by J. F. Miller and D. E. Yoder, et al (see PA, Vol 53:Issue 3) concerning the relevance of normal language development data and theory to teaching language to retardates.

6197. Bauer, J. R. (Davis Joint Unified School District, Psychological Services & Special Education, CA) **The "therapy" in educational therapy.** *Academic Therapy*, 1972-1973(Win), Vol 8(2), 199-205.—Proposes an ego-coping function model of educational therapy for severely dysfunctional students. The administrative strategies of the model are discussed within the framework of the educational environment, professional consultation for the teacher, and support services available to parents. Teaching model tasks are identified and described to include aspects of the student's academic and socio-emotional growth.—M. E. Blankenship.

6198. Bellamy, G. Tom & Bellamy, Terry T. (U Oregon, Ctr on Human Development) **Descriptive concepts for preschool retarded children.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 115-122.—Details the direct instruction method, teaching materials, and measurement procedures used in teaching descriptive concepts to 4 4-yr-old retarded boys. All Ss learned correct responding to tasks used during teaching and developed concepts, as evidenced by performance on novel tasks. Replication of the program with 3 2- and 3-yr-old retarded children was equally successful. Results support the view that preschool retarded children can be taught many of the skills with which other children enter public schools.—*Journal abstract.*

6199. Bennett, Clinton W. (McGill U, Montreal, Quebec, Canada) **Articulation training of two hearing-impaired girls.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 439-445.—Trained 2 4-yr-old hearing-impaired girls to articulate correctly /f/ and /sh/ phonemes in the initial position of words in response to pictures. They were first trained to imitate, and then to respond when asked "what's this?" As a result, both girls generalized correct articulation to words requiring both phonemes in the initial and final positions. (16 ref)  
—*Journal abstract.*

6200. Bloss, Joan W. (U Michigan, School of Education, Early Childhood Education Program) **Rhymes, songs, records, and stories: Language learning experiences for preschool blind children.** *New Outlook for the Blind*, 1974(Sep), Vol 68(7), 300-307.—Describes how traditional nursery literature can play a significant role in developing the language skills of blind preschool children (e.g., introducing the concept of order). Suggested tales and songs are presented, along with hints for their presentation and adaptation to real-life situations. (18 ref)

6201. Dardig, Jill C. (U Massachusetts, Northeast Regional Media Ctr for the Deaf, Amherst) **A visual literacy program for deaf students.** *Audiovisual Instruction*, 1974(Oct), Vol 19(8), 24-27.—Describes a program and materials developed by the Northeast Regional Media Center for the Deaf to teach middle-school-aged deaf children how to communicate using visual media.

6202. Enis, Carol A. & Cataruzolo, Michael. (Perkins School for the Blind, Watertown, MA) **Sex education in the residential school for the blind.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 61-64.—Discusses the special problems of sex education of blind children in residential schools, where this issue is just

becoming apparent. The physical development of the blind child takes place at the same rate as that of the non-visually handicapped child. The blind child is deprived of many everyday experiences of learning about the anatomy of the body, the development of sexual characteristics, seeing miniskirts and see-through blouses, pornographic literature, and even watching members of his family walk around in underwear. He must learn primarily by auditory and tactile means. Another problem is the misconception of dimension, texture, and location of the genitals. Most blind students attend schools beyond commuting distance, consequently they have to become residential students and this interferes with possible parent-child communication. Therefore, sex education should be included in every residential school for the blind.—C. L. Nicholson.

6203. Gadberry, Eve P.; Brown, Lou; Shores, Richard E. & York, Robert. (U Wisconsin, Madison) **Use of a stimulus-fading procedure to teach retarded-emotionally disturbed students to discriminate mathematical operations.** *SALT: School Applications of Learning Theory*, 1974(Jul), Vol 6(4), 1-19.—Taught 3 emotionally disturbed educable retarded students to discriminate appropriate mathematical operations. Initially the Ss knew how but not when to add or subtract. A series of stimuli (teacher instructions) and correlated responses culminating in the performance of the criterion response (correct discrimination) was arranged. When the students could perform the criterion response, the verbal instructions were systematically faded. Results indicate that voiced procedure was effective, in that the students learned to discriminate addition and subtraction word problems. (16 ref)—*Journal abstract*.

6204. Gallagher, James J. (U North Carolina, Frank Porter Graham Child Development Ctr) **Education.** In J. Wortis (Ed), *Mental retardation and developmental disabilities: An annual review: VI*. New York, NY: Bruner/Mazel, 1974. xiv, 305 p.—Reviews evidence of 5 current trends in educational developments for the mentally retarded, including the use of the courts to establish and insure the rights of the retarded, the refinement of behavior modification and shaping techniques in teaching the retarded, and a greater interest in early education and intervention programs. (72 ref)

6205. Goodstein, H. A. & Kahn, H. (U Connecticut) **Pattern of achievement among children with learning difficulties.** *Exceptional Children*, 1974(Sep), Vol 41(1), 47-49.—Examined the relationship between scores on the Wechsler Intelligence Scale for Children, Gates-MacGinitie Reading Test, and Science Research Associates Achievement Series: Arithmetic in 50 children with specific learning disabilities. Results show that Ss' arithmetic computation, reading achievement, and measured intelligence were stable and relatively independent.

6206. Guess, Doug; Sailor, Wayne & Baer, Donald M. (Kansas Neurological Inst, Topeka) **To teach language to retarded children.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Reviews studies (a) dealing primarily with normal speech and language development and (b) using operant procedures or behavior modification with language-deficient children. An experimental training

program is described, and 7 experiments within the program are outlined, as the guiding framework for a training manual. (4 p ref)

6207. Hyatt, Ralph & Rolnick, Norma (Eds.). (St Joseph's Coll) **Teaching the mentally handicapped child.** New York, NY: Behavioral Publications, 1974. vii, 337 p.

6208. Johnson, Carl M. & Kaye, James H. (Kalamazoo Valley Multihandicap Ctr, MI) **The development of lip reading through generalized conditioned reinforcement in a deaf multiply handicapped child.** *SALT: School Applications of Learning Theory*, 1974(Jul), Vol 6(4), 21-30.—Reports the successful use of conditioned reinforcement in teaching lip reading to a 9-yr-old boy, diagnosed as emotionally disturbed and trainable mentally retarded, with an IQ of 45 and a moderate-to-severe hearing loss when wearing an aid. After a baseline score was obtained, reinforcement, consisting at first of tokens and praise and secondly of smiles, was used after correct choices of fruits voiced by the teacher. Later, the fruits were only mouthed, and reinforcement was given in various fixed ratio schedules. Durability checks produced correct responses of 92% and 97%. It is concluded that clinicians can use tangible immediate reinforcers such as tokens to shape and maintain complex behaviors.—D. R. Marina.

6209. Jones, Reginald L. (U California, Berkeley) **Student views of special placement and their own special classes: A clarification.** *Exceptional Children*, 1974(Sep), Vol 41(1), 22-29.—Administered a school morale inventory by L. Wrightman et al to 341 junior high school mental retardates and 717 nonretarded students, to study the school attitudes of the students and to contrast the attitudinal findings with earlier data on stigma reported by teachers and by mental retardates. Results reveal as many positive responses were given by special class students to various questions as were given by the nonretarded group. Since other investigations indicate overwhelmingly that retarded students reject special class placement, it is suggested that retarded students reject the stigma of special placement but hold many positive attitudes toward their classroom and school experiences. An analysis of responses from 114 suburban mental retardates and 227 inner-city retardates reveals more positive attitudes held by the suburban retarded. It is suggested that retarded students cannot be considered a homogeneous group and that the educational problems of the inner-city retardates are particularly acute.—*Journal abstract*.

6210. Kaslow, Florence W. (Hahnemann Graduate School, Philadelphia, PA) **Movement, music and art therapy techniques adapted for special education.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

6211. Kozloff, Martin A. (Boston U, Ctr for Applied Social Science) **Educating children with learning and behavior problems.** New York, NY: John Wiley & Sons, 1974. xix, 459 p. \$16.95.—Presents a handbook for teachers, parents, therapists, and administrators designed to develop a comprehensive education program for children with a variety of learning and behavior problems. Principles, evaluation of the child, planning of



programs, and teaching in such areas as learning readiness, motor skills, imitation, speech, and self-help skills are detailed. Assignments at the end of each chapter are included to give the reader practice in planning and conducting similar programs.

6212. **Kunce, Joseph T.; Bruch, Monroe A. & Thelen, Mark H.** (U Missouri, Regional Rehabilitation Research Inst) **Vicarious induction of academic achievement behavior in disadvantaged adults.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 507-510.—Used a counseling procedure termed "vicarious induction of behavior" to develop academic achievement motivation in disadvantaged adults. The procedure required an analysis of the desired target behavior—academic achievement motivation—to identify specific skills and covert attitudes. Ss viewed and discussed videotapes that had models depicting a desire to achieve academic success and methods of achieving and executing specific achievement skills. New behaviors emerging as a consequence of the O's attainment of the modeled achievement behaviors were anticipated, specified, and evaluated. Results of a preliminary experimental study of 26 adults in basic education classes show that the procedure is easily applied and effective.—*Journal abstract*.

6213. **Lane, Elaine.** (Bridgeport Public School System, CT) **Severe reading disability and the initial teaching alphabet.** *Journal of Learning Disabilities*, 1974(Oct), Vol 7(8), 479-483.—Conducted a pilot study to determine whether the initial teaching alphabet (ITA) can serve as a remediation tool that would significantly improve the reading achievement level of 6th graders with a severe reading disability. Using the Gray Oral Reading Test in a public elementary school, 11 male and 3 female 11-13 yr old Puerto Rican and black 6th graders were identified as reading at or below the 2nd grade reading level. A prescribed training program with the ITA was followed for 100 school days. The Gray test was again administered, and reading levels were found to be significantly improved.—*Journal abstract*.

6214. **Luckey, Robert E. & Addison, Max R.** (National Assn for Retarded Citizens, National Child Advocacy Project, Arlington, TX) **The profoundly retarded: A new challenge for public education.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 123-130.—Describes the training methodology used over the last decade in residential and other nonschool settings with profoundly retarded persons. Problems unique to the profoundly retarded and suggested areas for program emphasis are presented to provide a frame of reference for future curriculum development. (3 p ref)—*Journal abstract*.

6215. **Lutzker, John R. & Sherman, James A.** (U of the Pacific) **Producing generative sentence usage by imitation and reinforcement procedures.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 447-460.—3 retarded Ss aged 32, 12, and 6 yrs and 2 developmentally normal toddlers aged 2.5 yrs were trained, using imitation and reinforcement procedures, to use correct sentences. The experimental task was to use sentences with correct subject-verb agreement to describe pictures that were presented to the Ss. 2 classes of sentences were taught: those involving a plural subject that required the

use of the verb "are" (e.g., "the boys are running") and those involving a singular subject that required the use of the verb "is" (e.g., "the boy is running"). The basic design of the study involved multiple baselines for each class of sentences. 4 of the Ss began to produce novel, untrained sentences of a particular type to generalization probe pictures when that particular class of sentence was currently being trained. Thus, the imitation and reinforcement procedures appeared to be functional in producing generative sentence usage for both types of sentences. One S produced correct sentences to both singular and plural probe pictures when only "is" sentences had been taught. A reversal procedure and retraining phase indicated that for this S, imitation and reinforcement procedures for training one class of sentence behavior seemed functional in producing generative responses of the other class of sentences. (15 ref)—*Journal abstract*.

6216. **Miller, Jon F. & Yoder, David E.** (U Wisconsin, Madison) **An ontogenetic language teaching strategy for retarded children.** In R. L. Schiefelbusch & L. L. Lloyd (Eds), *Language perspectives: Acquisition, retardation, and intervention*. Baltimore, MD: University Park Press, 1974. xv, 670 p \$14.50.—Describes a program specifying the relationship between form, function, and experience and providing for the shaping of attending behavior and increasing motivation in retarded children. It also provides for testing the relative contribution of programed experience and linguistic marking in the cognitive-perceptual aspects of language development. (38 ref)

6217. **Murphy, John F.** (Hingham Public Schools, MA) **Learning by listening: A public school approach to learning disabilities.** *Academic Therapy*, 1972-1973(Win), Vol 8(2), 167-189.—Describes a format for meeting individual needs of students with learning disabilities in regular elementary and secondary programs. The program includes auditory learning, individual presentation, sympathetic classrooms, oral examinations, different homework, and qualified report cards. Examples of modified scheduling are given, with instructional techniques for the regular classroom teacher.—*M. E. Blankenship*.

6218. **Rolnick, Norma.** **The psychoeducational evaluation.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

6219. **Rosen, Marvin.** (Elwyn Inst, PA) **Behavior modification.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.—Discusses the theory and application of behavior modification principles in teaching mentally handicapped children. Token economies, principles of operant conditioning and instrumental learning, and the use of shaping and reinforcement techniques in classroom settings are described, and case examples of their use with 3 mentally retarded persons are presented. (17 ref)

6220. **Rosen, Marvin.** (Elwyn Inst, PA) **The acquisition of language.** In R. Hyatt & N. Rolnick (Eds), *Teaching the mentally handicapped child*. New York, NY: Behavioral Publications, 1974. vii, 337 p.

6221. Stevens-Long, Judith & Rasmussen, Marilyn. (California State U. Los Angeles) **The acquisition of simple and compound sentence structure in an autistic child.** *Journal of Applied Behavior Analysis*, 1974(Fal), Vol 7(3), 473-479.—Used contingent reinforcement and imitative prompts to teach an autistic 8-yr-old male to use simple and compound sentences to describe a set of standard pictures. When imitative prompts and reinforcement were discontinued, correct use of simple sentences declined, but increased again when imitative prompts and reinforcement were reinstated. When imitative prompts and reinforcements were used to teach compound sentence structure, correct use of simple sentences declined, and correct use of compound structure increased. At the end of training, the child also used novel compound sentences to describe a set of pictures on which he had received no direct training. —*Journal abstract.*

6222. Sykes, K. C. (Florida State U) **Camp Challenge: Program for parents and their preschool children with visual handicaps.** *New Outlook for the Blind*, 1974(Oct), Vol 68(8), 344-347.—Describes a 6-day "camp challenge program" for preschool children with visual handicaps and their parents which provides parents with information about their children's needs and teaches the children personal care, and social, language, and motor skills along with traditional camp activities. Recruitment, programing, financial, and administrative issues related to the operation and sponsorship of the program are discussed.

6223. Tuttle, Dean W. (U Northern Colorado) **A comparison of three reading media for the blind: Braille, normal recording, and compressed speech.** *Education of the Visually Handicapped*, 1972(May), Vol 4(2), 40-44.—Compared the available reading media for visually handicapped individuals in terms of efficiency and other important factors related to the blind individual's capacity to approximate normal reading conditions. Test material was prepared in each reading medium and distributed to the sample population. An index of learning efficiency was computed for each test. Results reveal that while comprehension was the same for the 3 media, there were significant variations in time and efficiency, and that compressed speech was most advantageous.—C. L. Nicholson.

6224. Wagner, Patricia. (Bronx Developmental Services, Model Rehabilitation Program, NY) **Children tutoring children.** *Mental Retardation*, 1974(Oct), Vol 12(5), 52-55.—In 2 parts, reviews literature on children tutoring other children. Part 1 presents tutorial models for non-mentally-retarded children; Part 2 discusses literature on the retarded tutoring other retarded children. (32 ref)

6225. Williams, Charlotte L. & Blake, Kathryn A. (U Georgia, Special Reading Instructional Procedures for Mentally Retarded & Learning Disabled Children Research Program) **Special reading instructional procedures for mentally retarded and learning disabled children: Overview of research program activities.** *Education & Training of the Mentally Retarded*, 1974(Oct), Vol 9(3), 143-149.—Briefly summarizes the problem, goals, target groups, organizing dimensions, specific program activities, and strategies used in

conducting research during the 1st 2 yrs of an experimental reading instructional program for retarded and learning-disabled children.

6226. Wilson, Diana A. **Teaching multiply handicapped blind persons in a state hospital.** *New Outlook for the Blind*, 1974(Oct), Vol 68(8), 337-343, 362.—Discusses the need of multiply handicapped blind residents of state institutions for alternative programs of education. The multiplicity of handicaps makes it necessary to tailor a program for almost every individual. A compensatory education program for 14 blind retarded youths in a state institution is described; the program included auditory evaluation and training, body image training, tactual learning, leisure-time activities and skills, and sensory motor training. Suggestions for staff training are presented, the use of behavior modification techniques in similar program is discussed, and the need to combat dehumanization for institutionalized persons by making educational and recreational programs available is noted.—*Journal abstract.*

6227. Winkelstein, Ellen; Shapiro, Bernard J.; Tucker, Dorothy G. & Shapiro, Phyllis P. (Rhode Island Coll) **Early childhood educational objectives for normal and retarded children.** *Mental Retardation*, 1974(Oct), Vol 12(5), 41-45.—Presents a model for early childhood education where the objectives are viewed as the same for normal and retarded children with variations only in the degree of achievement. The means by which the classroom teacher can construct educational objectives that cover various behaviors is discussed.

6228. Withrow, Frank B. (US Dept of Health, Education, & Welfare, National Advisory Committee on the Handicapped, Washington, DC) **The fine art of auditory training, or is anyone listening?** *Volta Review*, 1974(Oct), Vol 76(7), 415-419.—Reviews features of hearing and of training for children whose hearing is impaired. The sense of hearing plays major roles in safety and in communication. Auditory training should be matched to the needs and requirements of each hearing-impaired child. 15 objectives, grouped under 3 major heads, are listed. Speaking directly into the young child's ear, and the use of electronic amplification of sound, should begin as early as possible. Early auditory experience builds a basis for communication via self-stimulation, and leads to the association of sight and sound as a foundation for language. Conclusions of some authorities on the subject are cited.—W. A. Hass.

6229. Wooster, Arthur D. (U Nottingham, School of Education, England) **Acceptance of responsibility for school work by educationally subnormal boys.** *British Journal of Mental Subnormality*, 1974(Jun), Vol 20(38, Pt 1), 23-27.—Tested the hypothesis that mentally retarded children educated in an informal school offering opportunities to choose and to experience the outcome of choice, in a supportive atmosphere, would be able to accept more responsibility for their own successes and failures in school. Increased awareness of the relationship between personal striving and outcome was expected to result in higher attainment scores on a measure of reading ability. 2 groups of 20 boys, matched for age and home background, were chosen to represent the extremes on a formal-informal dimension. Ss were tested by a group reading assessment and on the Intellectual



Achievement Questionnaire. Greater acceptance of responsibility for academic achievement was found in informal school Ss, who also scored significantly higher on the reading test. Comparison on measures of locus of control and reading ability supported both hypotheses.—R. Hall.

### Counseling & Measurement

6230. Befring, Edvard. (U Aarhus, Denmark) [Educational-psychological research.] (Danish) *Skolepsykologi*, 1974, Vol 11(5), 379-383.—Discusses educational research, stressing the need for decentralization. Neglected problem areas calling for research, and the new perspectives required, are considered.

6231. Coons, Frederick W. (Indiana U, Medical School) Sex on campus: Informing and advising a new student. *Medical Aspects of Human Sexuality*, 1974(Sep), Vol 8(9), 25-26.—Presents suggestions for counselors and physicians in assessing a student's personal relationships and helping him understand his sexuality. A history that includes information about the student's peer and parent interactions and self-concept is crucial in evaluating developmental and psychological progress.

6232. Cull, John G. & Hardy, Richard E. (Eds.). (Virginia Commonwealth U) *Counseling high school students: Special problems and approaches*. Springfield, IL: Charles C Thomas, 1974. xiii, 256 p.

6233. Engin, Ann W. (Ohio State U, Coll of Education) An analysis of supplementary subtests and their influence on the total WISC scores of high achieving students. *Journal of Psychology*, 1974(Sep), Vol 88(1), 121-125.—Attempted to determine whether or not the addition of one or both of the supplementary WISC subtests, Digit Span of the Verbal Scale and Mazes of the Performance Scale, materially affected the obtained IQs for 44 high-achieving 5th-grade Ss. All 12 subtests of the WISC were individually administered to Ss, and IQs were then calculated in such a manner that specific comparisons could be made. These comparisons were between WISC Verbal, Performance, and Full Scale IQs composed of the maximum number of subtests, and Verbal, Performance, and Full Scale IQs exclusive of Digit Span, Mazes, or both subtests. Analyses by use of *t* tests for correlated means revealed highly significant differences. The addition of Digit Span and Mazes in the WISC battery served to depress the Verbal, Performance, and Full Scale IQs of the high-achieving Ss.—*Journal abstract*.

6234. Fielding, Michael F. & Pappas, James P. (McGuire VA Hosp, Psychological Services, Richmond, VA) Internal-external control of reinforcement and the Strong Vocational Interest Blank: A comparison study. *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 482-484.—Studied the relationship between the Strong Vocational Interest Blank (SVIB), Form T399, and Rotter's Internal-External Control Scale (I-E scale). A previous study by D. G. Zytowski (see PA, Vol 41:7353) suggested a relationship between locus of control and occupational interest. To verify this, he correlated the SVIB with the I-E scale and concluded that such a relation did exist. Because the SVIB has been revised since Zytowski's study, a comparable study using the newer SVIB form was completed. Using a college

freshman sample of 736, Pearson correlation coefficients were computed between the I-E scale and the SVIB; several correlations were significant at the .10 level; however, the largest correlation was -.16.—*Journal abstract*.

6235. Flaughter, Ronald L. (Educational Testing Service, Princeton, NJ) Some points of confusion in discussing the testing of black students. In L. P. Miller (Ed), *The Testing of black students: A symposium*. Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.—Discusses 4 major confusions that have delayed the progress toward the realization that testing is not always a source of unfairness for minority students—misconceptions about the nature of the psychometric model, exaggerations about the objectivity of psychometrics, misinterpretations about the meaning of psychometric terms, especially "validity," and most important, the question of the functions that tests serve.

6236. Graff, Robert W.; Raque, David & Danish, Steven. (Salisbury State Coll) Vocational-educational counseling practices: A survey of university counseling centers. *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 579-580.—Assessed vocational-educational counseling at 52 university counseling centers. Surveyed were staff resources (level of staff) directed to vocational counseling, the use of innovative procedures in vocational counseling, and the degree to which career counseling services were evaluated. Results show that master's level staff and practicum students did most of the vocational counseling, innovative practices were few, and research and evaluation were limited.—*Journal abstract*.

6237. Grandy, Thomas G. & Stahmann, Robert F. (U Iowa, Counseling Service) Family influence on college students' vocational choice: Predicting Holland's personality types. *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 404-409.—Conducted interviews with 487 college freshmen who were decided on their occupational choices about parental educational backgrounds, political orientations, religious preferences, and other background variables. Ss were then classified according to J. Holland's personality and occupational typology. A stepwise discriminant analysis was performed to evaluate the relative importance of the family variables in the typology, and 4 categories of similarity or consistency between personality and occupational choices were formed (exact, adjacent, intermediate, and opposite). Personality types were exactly predicted in 45.3% of the cases; for 26.7%, predictions corresponded to personality types adjacent to expressed occupational choices. Family variables were most successful in predicting personality types (exact and adjacent choices) for the social and enterprising groups, and least successful in predicting investigative types. 5 of the 8 best predictors were related to parents' occupations.—L. Gorsey.

6238. Gross, Leon J. & Gaier, Eugene L. (State U New York, Buffalo) College major and career choice: A retest of Holland's theory. *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 209-213.—Studied whether the previously established relationship between vocational choice and self-ratings on J. L. Holland's personality stereotypes among college freshmen would be strengthened with 109 male college seniors sampled on the basis

of major field choice. Ss completed a questionnaire to select career stereotypes which described them best. Significant relationships were obtained for 4 stereotypes (realistic, conventional, enterprising, and artistic) on the basis of both major and vocational choice, although significant stereotypes were not identical in each. 3 of these significant relationships based on vocational choice matched those obtained previously. An additional finding suggested that vocational choice was slightly more valid than major field as a basis for utilizing this technique. However, the more restricted class sample emphasized did not produce a more substantial relationship between self-ratings and occupational choice as expected.—*Journal abstract.*

6239. Hambleton, Ronald K. & Traub, Ross E. (U Massachusetts) **The effects of item order on test performance and stress.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 40-46.—Studied the effect of item order (easy-to-difficult or difficult-to-easy) on 106 11th graders' performance on a mathematics test (Cooperative Mathematics Test Algebra II), on the amount of stress experienced by Ss during the test (assessed by heart-rate measures), and on the performances of high and low test-anxious Ss (assessed by the Alpert-Haber Achievement Anxiety Test). Results show that the mean number of correct answers for questions arranged in the difficult-to-easy order was significantly lower than the number arranged in the reverse order and that the difficult-to-easy order increased heart rate more than the reverse order. No differences in performance were found between high and low test-anxious Ss. (28 ref)—*L. Gorsey.*

6240. Henrysson, Sten & Wedman, Ingemar. (U Umea, Sweden) **Some problems in construction and evaluation of criterion-referenced tests.** *Scandinavian Journal of Educational Research*, 1974, Vol 18(1), 1-12.—Discusses problems in establishing the goals of criterion-referenced tests, specifying short- and long-term learning objectives, insuring the homogeneity of test items, and determining appropriate score cut-off levels. The rationale behind different item analysis procedures for criterion-referenced data is examined, recent empirical data on the evaluation of these tests is presented to demonstrate the intercorrelations between these various analysis procedures, and the future of criterion-referenced testing is considered. (30 ref)—*L. Gorsey.*

6241. Hufstader, Ronald A. (U Iowa) **Predicting success in beginning instrumental music through use of selected tests.** *Journal of Research in Music Education*, 1974(Spring), Vol 22(1), 52-57.—34 beginning instrumental students in Grades 4-6 in 4 bands in an urban North Carolina school system were divided into high and low groups as judged by technique, tone quality, musical reading ability, rhythmic reading ability, and general musicality. Test battery data indicate that 14 of the 18 Ss rated high could be identified by their test score profiles, while 15 of the 16 Ss rated low were classified correctly. Variables ranked in order of importance were intelligence (California Test of Mental Maturity), musicality (Gaston's Test of Musicality), academic achievement (California Achievement Tests), and tests with various types of apparatus.—*D. S. Higbee.*

6242. Hurst, James C.; Davidshofer, Charles O. & Arp, Suzanne. (Colorado State U, Counseling Ctr) **Current perceptions and practices of charging fees in college and university counseling centers.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 532-535.—Mailed a questionnaire that assessed the practice of charging special fees for counseling, testing, and outreach programs, as well as the perceptions of counseling center directors on the fee issue, to 281 directors of college and university counseling centers. Results indicate that 36% of the agencies receive partial funding from student fees; only 3% receive compensation from student or faculty insurance programs. Charging fees for counseling services to students is a practice of only 4% of the respondents, a proportion which has remained stable over the past 10 yrs. In contrast, the proportion of agencies that charge fees for testing has increased from 11 to 34% over the 10-yr period.—*Journal abstract.*

6243. Kramer, Howard C.; Berger, Florence & Miller, George. (Cornell U, Office of the Dean of Students) **Student concerns and sources of assistance.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 389-393.—Administered a questionnaire on the types of student problems, perceptions of available sources for help, and the types of problems not addressed by the university of 1,200 undergraduates. Data from the responses of 293 male and 140 female undergraduates and graduate students show that the most important problems for both males and females were vocational choices and career planning and personal unhappiness. A significantly higher proportion of women than men reported having problems. "Friend" was the most frequently mentioned source of help for personal problems and the career center and faculty advisor were most frequently mentioned for academic and career problems. Class and specific sex differences are reported, along with the types of problems for which Ss perceived that there was no help available and implications for counseling and program intervention.—*L. Gorsey.*

6244. Kruuse, Emil. (School Psychology Office, Albertslund, Denmark) **[Research and investigation by school psychologists.]** (Danish) *Skolepsykologi*, 1974, Vol 11(5), 350-363.—Describes and comments on 99 responses to a questionnaire distributed in September 1973 to the 113 school psychological offices in Denmark concerning current and planned projects. 34 of the current projects were of the traditional type e.g., testing and special education, 13 dealt with educational psychology and 8 were investigations of the curriculum and the structure of the school system. The low level of local activities is explained by work, lack of personnel, and no active support from relevant authorities.—*P. Mylov.*

6245. Lambert, Nadine M. (U California, School of Education, Berkeley) **A school-based consultation model.** *Professional Psychology*, 1974(Aug), Vol 5(3), 267-276.—Differentiates between school- and community-based consultation. Objectives of school-based consultation may be changes in pupil behavior, teacher behavior, or a combination of both. Consultation is described as essentially directive, informational, and problem-oriented, encompassing 3 stages: gaining teacher acceptance and trust, sharing ideas about classroom problems, and working together for optimal education. It is stated that



both consultants and school administrators will benefit from systematic evaluation of consultation. (15 ref)—C. Wright.

6246. Lennon, Roger T. **The testing of black students: Dilemmas for test publishers.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6247. Mercer, Jane R. **Latent functions of intelligence testing in the public schools.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6248. Mertz, William H. & Doherty, Michael E. (Bowling Green State U) **The influence of task characteristics on strategies of cue combination.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 196-216.—Studied the validity of the conclusion that cue combination in clinical judgment can be described by a simple, additive model. Cue characteristics were manipulated to see whether Ss might appear linear under some conditions but not others. Each of 9 experienced high school guidance counselors made 1,368 predictions of college success based upon either 1 or 2 aptitude test scores. The 2-cue data were examined using several models. Although the linear model accounted for a high proportion of the predictable variance for all Ss in all conditions, within 1 condition (high subjective correlation between cues), 7 of the Ss were markedly nonlinear. It is concluded that one cannot talk about linear or configural judges independently of task conditions. (22 ref)—*Journal abstract*.

6249. Miller, Lamar P. (Ed.). (New York U) **The testing of black students: A symposium.** Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6250. Mitchell, Kenneth R. & Piatkowska, Olga E. (U New South Wales, Student Counseling & Research Unit, Kensington, Australia) **Effects of group treatment for college underachievers and bright failing underachievers.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 494-501.—Presents a review of findings of 31 treatment studies of college underachievers and bright failing underachievers separately, with the purposes of (a) evaluating the effects of group treatments on the academic performance of these students and (b) isolating from the data variables related to improved academic performance. Variables from the following categories are examined: counselor experience, treatment type, treatment duration and structure, treatment targets, and client motivation. Findings indicate that success rates are low and that there are few clear relationships between isolated variables and improvement in academic performance. (34 ref)—*Journal abstract*.

6251. Nissen, Thomas. [Indispensable research areas.] (Danh) *Skolepsykologi*, 1974, Vol 11(5), 384-386.—Discusses research in educational psychology with emphasis on 3 areas that should have equal priority: (a) observation of behavior patterns leading to intervention, (b) instructional content providing a true description of the world, and (c) education of parents to elucidate inhibiting factors in the family.

6252. Oliver, Laurel W. (U Maryland) **The effect of verbal reinforcement on career choice realism.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 275-284.—24 male undergraduates viewed 102 slides containing

occupational titles and stated whether each represented a realistic career choice. Each S was given 3 trials, with experimental Ss receiving positive verbal reinforcement on the 2nd trial for realistic responses. (If the choice was congruous with the individual's occupational type, as determined by the Vocational Preference Inventory, it was scored as realistic). Results reveal a tendency for all Ss to increase in career choice realism as a function of participation in the experiment, with significantly ( $p < .05$ ) more experimental Ss than control Ss demonstrating an operant system of responses. (18 ref)—*Journal abstract*.

6253. Plotkin, Lawrence. (City U New York) **Research, education, and public policy: Heredity v. environment in Negro intelligence.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6254. Ravenette, A. T. **Maladjustment: Clinical concept or administrative convenience: Psychologists, teachers and children: How many ways to understand?** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 41-47.—Advocates a model with universal application for understanding the disturbed and disturbing child. Everyone develops his own personal map of people and interpersonal relationships for making sense of his world. Using this model, the educational psychologist can help teacher and child understand their relationship.

6255. Rustin, Stanley L. (Queensborough Community Coll, Bayside, NY) **The gringo and counseling Puerto Rican college students.** *Handbook of International Sociometry*, 1973, Vol 7, 37-42.—Describes a year of group counseling by a non-Puerto Rican of Puerto Rican college students enrolled in an urban college. Conflicts between traditional Puerto Rican values and middle-class American values, personal identity confusion, and sexual role conflicts are common dilemmas of the Puerto Rican college student. Group counseling techniques were used with a group of 7 females and 5 males. Feelings of deprivation, powerlessness, and being victimized by a racist society were expressed by the group. Involvement of a non-Puerto Rican counselor with Puerto Rican students was initially successful because the students had a basis for a trusting relationship outside of the counseling context; but as new students arrived at the school the gringo was rejected because he was not a Puerto Rican. This result suggests the need for the Puerto Rican student to establish himself without non-Puerto Rican help.—R. J. Ambrosino.

6256. Scott, Craig S.; Fenske, Robert H. & Maxey, E. James. (Oregon State System of Higher Education, Teaching Research Div, Monmouth) **Change in vocational choice as a function of initial career choice, interests, abilities, and sex.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 285-292.—Studied changes in expressed vocational choices made over an 18-mo period by 2,928 students enrolled in 1 of 62 2-yr institutions. 4 mutually exclusive categories of vocational choice change were constructed based on the American College Testing Program Career Planning Profile and its follow-up questionnaire. Ability, interest, and family background measures were used as independent variables. Results indicate that (a) changers were very similar

to nonchangers in terms of the independent variables examined, (b) there were substantial differences in the choice changes made by males and females, and (c) vocational choice change patterns varied widely among groups of individuals whose original vocational choices placed them in different major vocational categories. —*Journal abstract.*

6257. Small, M. M.; DeYoung, Alan J. & Moos, Rudolf H. (Stanford U) **The University Residence Environment Scale: A method for describing university student living groups.** *Journal of College Student Personnel*, 1974(Sep), Vol 15(5), 357-365.—Describes the development, use, and validation of a new scale, the University Residence Environment Scale, which systematically assesses the social climates of university student living groups. A comparison between living units and group climates on 2 large university campuses is presented. (24 ref)

6258. Soegard, Arne. (Office of School Psychology, Lyngby-Taarbæk, Denmark) **[Problems concerning construction of new tests and translation of foreign tests.]** (Danish) *Skolepsykologi*, 1974, Vol 11(5), 387-402.—Describes construction, revision, and proper use of tests in the practice of educational psychology. Many new tests of specific functions and abilities are needed but general standards should be avoided. A qualitative, clinical analysis is a prerequisite and norms must be local averages.

6259. Temp, George E. **Psychometric barriers to higher education.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Engelwood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6260. Tucker, Robert N. & Gunnings, Thomas S. (New York U) **Counseling black youth: A quest for legitimacy.** *Journal of Non-White Concerns in Personnel & Guidance*, 1974(Jul), Vol 2(4), 208-216.—Questions the validity of many of the counseling techniques used with black counselees. 3 principal topics are presented: (a) an explanation of how the liberal and progressive traditions of counselors are different from the emerging values of growing numbers of black counselors; (b) an illustration of how the practices which are the consequences of these values are dysfunctional in terms of both their immediate and long-range effects on all black Americans; and (c) an identification of some trends already in progress which give a different philosophical basis that may lead to viable alternate counseling procedures vis-à-vis black youth, in particular. (27 ref)—*M. E. Pounsel.*

6261. Wakefield, James A.; Alston, Herbert L.; Yom, B. Lee & Doughtie, Eugene B. (U Houston) **Related factors of the survey of study habits and attitudes and the Vocational Preference Inventory.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 215-219.—Administered the Survey of Study Habits and Attitudes (SSHA) and the Vocational Preference Inventory (VPI) to 100 undergraduates. The scales of the 2 instruments were compared using canonical analysis. The analysis revealed a relationship between a component of the SSHA and a component of the VPI which accounted for 31% of the variance of the 2 instruments. The related components indicate that a dimension running from an academic orientation to a nonacademic orientation was

measured by certain scales of each instrument.—*Journal abstract.*

6262. Ward, J. (U Victoria, British Columbia, Canada) **The measuremetre: A useful psychometric concept.** *Association of Educational Psychologists' Journal & Newsletter*, 1972(Fal), Vol 3(2), 52-53.—Presents an empirically derived formula which permits calculation of the number of grades (the measurements) to be allowed in order to communicate test results, incorporating the idea of measurement errors.

6263. Westbrook, Franklin D. (U Maryland, Counseling Ctr) **A comparison of three methods of group vocational counseling.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 502-506.—Superimposed a group discussion process over a typical vocational counseling process in which the primary focus was on test information, and over 2 atypical vocational counseling processes, one in which occupational information was primary and the other in which test information and occupational information were optional and randomly presented upon a group member's request. All Ss selected goals in the initial stages of counseling. 57 undergraduates were studied in 6 single-sex experimental groups and 2 control groups. Data from a levels-of-decision-making scale, the Edwards Personal Preference Schedule, and the Kuder Occupational Preference Inventory show that the atypical groups learned significantly more and retained longer than did both the typical and control groups. (15 ref)—*Journal abstract.*

6264. Williams, E. Belvin. (Educational Testing Service, Princeton, NJ) **Testing the black minority: Strategies and problems.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Engelwood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6265. Williams, Robert L. (Washington U) **The problem of match and mismatch in testing black children.** In L. P. Miller (Ed), *The Testing of black students: A symposium*. Engelwood Cliffs, NJ: Prentice-Hall, 1974. x, 113 p.

6266. Yanai, Haruo. **[An investigation of the procedure of aptitude diagnosis: II. Aptitude diagnosis for 84 specialized courses of the university.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Sep), Vol 21(3), 148-159.—Used factor analysis to derive 60 predictor and 36 criterion scales from measures of interest, personality, vocational interest, and abilities obtained from 631 4th yr college and graduate students in 144 academic specializations. Of 576 Ss (excluding 55 whose interests did not match the specialized areas), 84 specializations were identified. Distances in terms of Euclidian measures among the 84 areas were calculated and analyzed, yielding 12 clusters. Multiple discriminant analysis based on 60 predictor and 36 criterion measures of the 12 cluster areas yielded 4 factors: Natural science vs Humanities, Architecture vs Chemistry and Medicine, Practical vs Research, and Social vs Individual. (English summary)—*S. Choe.*

6267. Yarber, William L. (Purdue U) **Retention of knowledge: Grade contract method compared to the traditional grading method.** *Journal of Experimental Education*, 1974(Fal), Vol 43(1), 92-96.—Studied whether students graded by the contract method (experimental group) would retain, for a 5-wk period, the knowledge



level possessed at the end of a 9-session venereal disease unit and if the contract students would retain as much, or more, knowledge than students graded by the traditional method (control group). 27 Ss for the grade contract group were drawn from 2 junior high school health classes and the 30 Ss for the traditional grading group were drawn from 2 other health classes. Results indicate that the grade contract students, as well as the traditional grading students, retained the knowledge level possessed at the end of the unit, and that the contract students did not retain any more, or less, knowledge than the traditional grading students. (20 ref) —*Journal abstract.*

## APPLIED PSYCHOLOGY

6268. Ashton, Robert H. (U Texas, Austin) **Cue utilization and expert judgments: A comparison of independent auditors with other judges.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 437-444.—Examined cue utilization by independent auditors, a type of expert judge, within an analysis of variance framework. After reading a brief narrative describing a hypothetical manufacturing company, 63 auditors judged the strength of payroll internal control as a function of 32 different combinations of 6 internal control indicators. Results demonstrate the overwhelming importance of main effects as compared to configural cue utilization. The average correlation for interjudge consistency was .70, while the average intrajudge correlation was .81. The average insight index (the correlation between an auditor's subjective weights and the statistical weights of the 6 cues) was .89. Similarities and differences between the present findings and those of studies involving other types of expert judges are discussed. (17 ref)—*Journal abstract.*

6269. Battalio, Raymond C. et al. (Texas A&M U) **An experimental investigation of consumer behavior in a controlled environment.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 52-60.—Describes the general structure of controlled economic environments and reports the results of a series of experimentally induced price changes on consumer behavior in one such environment—a token economy system established in a female ward for chronic psychotics at a state hospital. Findings demonstrate that consumption patterns did not immediately return to their original values following displacement and that there were definite patterns to this behavior. Results also demonstrate the suitability of controlled economic environments as laboratories for the experimental analysis of consumer behavior and add to the understanding of consumer behavior, particularly with respect to the continuing effects of temporary price changes on the composition of consumption. (23 ref) —*Journal abstract.*

6270. Bauman, Karl E. & Chase, Charles L. (U North Carolina, Chapel Hill) **Interviewers as coders of occupation.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 107-112.—Examined an alternative approach to the measurement and coding of occupational status by changing the procedure of obtaining initial information. The new procedure was used in a survey of attitudes and

practices toward family planning conducted with a sample of 846 white and 851 black women in 9 cities during 1969. Its efficiency was determined by the strength of correlation of the occupational status and education of the male head of the household with family income. Results show that codings by interviewers were significantly correlated with those of office coders, but that the correlation was more significant for white than for black interviewers. It is concluded that in general, interviewer coding is as efficient as office coding.—M. K. Phifer.

6271. Berning, Carol A. & Jacoby, Jacob. **Patterns of information acquisition in new product purchases.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 18-22.—Used a process methodology to examine information acquisition behavior for new vs established purchase alternatives and for innovators vs noninnovators. 5 types of information were studied—actual ads from print media, price, actual package information, comments attributed to "friends," and comments attributed to sales personnel—in the context of purchase decisions made by 86 20-82 yr old women for 5 new products. Results indicate that significant differences exist between the amount of information requested from the "friend" source by innovators about new products. Personal information sources were consulted after impersonal sources. The significant Innovativeness  $\times$  Information Source interaction suggests that the decision-making process preceding the purchase of an innovative product differs from the process preceding the purchase of an established product, and that this difference lies primarily in the search for information from friends. (28 ref)—L. Gorsey.

6272. Bettman, James R. (U California, Graduate School of Management, Los Angeles) **A threshold model of attribute satisfaction decisions.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 30-35.—Describes a threshold model of binary attribute satisfaction decisions using M. Fishbein's attitude model components (1972). The model is used to determine when an attribute of a brand is seen as satisfactory by consumers, given measures describing both that brand and others. The construction of hypothetical decision nets is discussed, and the variable of degree of conviction is related to the outcome of various satisfaction decisions. The model is tested using multivariate probit analysis and is supported by the data. Implications for attitude research and statistical methodology are discussed. (18 ref)—*Journal abstract.*

6273. Blood, Milton R. (Georgia Inst of Technology) **Spin-offs from behavioral expectation scale procedures.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 513-515.—Notes that behavioral expectation scale procedures have been used to construct performance evaluations in a variety of work settings. With slight modifications the procedures can also be used to provide information to organizations for evaluating performance, developing training programs, and assessing agreement on and communication of organizational policy.

6274. Britt, David W. & Galle, Omer. (Florida Atlantic U) **Structural antecedents of the shape of strikes: A comparative analysis.** *American Sociological Review*, 1974(Oct), Vol 39(5), 642-651.—Comparison of

2 models supports the conclusions that variations in the size of plants and industries affect the degree to which short, broad strikes are effective, and that the impact of unionization variables is best interpreted in terms of their ability to overcome economic disincentives against striking. (27 ref)

6275. Davis, Harry L. & Rigaux, Benny P. (U Chicago, Graduate School of Business) **Perception of marital roles in decision processes.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 51-62.—Influence exerted by husbands and wives at different stages in the decision process was examined for 25 economic decisions in a convenience sample of Belgian households in which both spouses were questioned. Results indicate that while no differences were apparent in average relative influence, the phase of information search was characterized by considerably more role specialization than either of the other 2 phases (problem recognition and final decision) for almost all of the products studied. Implications are discussed in relation to communication strategies as well as for research on household economic behavior. (39 ref) —*Journal abstract.*

6276. Demby, Emanuel. **Psychographics and from whence it came.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Discusses the past, present, and future uses of psychographics in consumer-oriented marketing research. Guidelines for the construction and execution of psychographic studies are presented in terms of 3 classes of psychographic variables—product attributes, consumer life-styles, and psychological concepts, interests, and opinions. (26 ref)

6277. Ferber, Robert & Chao Lee, Lucy. (U Illinois) **Husband-wife influence in family purchasing behavior.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 43-50.—Investigated the extent to which husbands and wives in recently married couples (1968) exert independent influences on the financial behavior of the couple. Ss have also been interviewed approximately every 6 mo since the fall of 1968. Specifically, focus was placed on (a) the role husbands and wives play in money management, (b) the factors that determine which partner plays the principal role in money management, and (c) the differences between various aspects of family financial behavior if the dominant role is exerted by the husband or by the wife. Using the concept of a family financial officer (FFO), results indicate that, by the end of the 2nd yr of marriage, the FFO was the wife in over one-third of the families, the couple was acting jointly in about the same proportion, and in slightly over one-fourth of the families the FFO was the husband. However, if the husband was the FFO, the couple was more likely to save a higher proportion of income and in variable dollar forms, and to purchase automobiles less frequently.—*Journal abstract.*

6278. Fry, Joseph N. & McDougall, Gordon H. (U Western Ontario, School of Business Administration, London, Canada) **Consumer appraisal of retail price advertisements.** *Journal of Marketing*, 1974(Jul), Vol 38(3), 64-67.—Studied the influence of communicators (retail stores) and messages (price reductions on major consumer durables) advertised through 1 channel (newspaper), in an attempt to determine whether consumers

thought (a) that the stated regular price in an ad was, in fact, the regular price at that store and/or competitive stores, and (b) that the stated sale price was the best deal in town. It was hypothesized that consumer reaction would be a function of the retailer (source credibility) and 2 audience characteristics, shopping experience at the store and social class. Sample was 332 housewives in an urban area. Consumer reactions to price ads were influenced by source, message, and shopping experience. Social class was not a factor. Some consumers indicated a general distrust of sales, but most of them had specific reasons for not accepting advertised claims. Evaluations were based on experiences concerning the store, perceived knowledge of prices, discounts, and perceived shopping ability.—*D. Tweed.*

6279. Frye, Robert W. & Klein, Gary D. (California State U, Long Beach) **Psychographics and industrial design.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Reports a study to determine whether psychographic data could be more effective in explaining product design preference behavior than demographic data. Data from consumer ratings of 5 radios designed to meet psychographic descriptions and 5 designed to meet the demographic descriptions of the consumer panel show that the psychographic specifications produced the highest-rated radio. The potential of psychographics to reduce trial-and-error product tests and to measure the results of the design process is noted.

6280. Gliszczynska, Xymena. (Polish Academy of Sciences, Warsaw) **A decisional model of worker motivation.** *Polish Psychological Bulletin*, 1974, Vol 5(2), 93-98.—Developed a model of worker motivation as a result of a critical examination of the earlier model product of the human relations doctrine. The proposed model assumes that a given behavior of the worker is either reinforced or extinguished by experience, a mediating role in this process being played by the worker's expectancy as to the consequences of his behavior. Productivity is viewed as a means for the attainment of goals which are of value in the given social environment. The model is based on concepts similar to the principal concepts of decision making theory (i.e., subjective probability and expected value, as the product of incentive and motive). The concept of reinforcement, derived from learning theory, is defined as agreement between attained value and expected value.—*Journal abstract.*

6281. Hodock, Calvin. **Use of psychographics in analysis of channels of distribution.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Describes various forms of product distribution (e.g., supermarkets, mail order department stores, and discount stores), some recent changes in major distribution systems, and how these changes were both the cause and effect of changes in life-styles. Some common factors in different distribution strategies are identified, and the use of psychographic research findings in developing new distribution channels is discussed.

6282. Hustad, Thomas P. & Pessemier, Edgar A. **The development and application of psychographic life style and associated activity and attitude measures.** In W. D.



Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Presents an introduction to life-style (i.e., psychographic) research, including a taxonomy of consumer measurements and their applications, alternative research strategies, and some problems and prospects in activity and attitude investigations. The validity and reliability of various consumer research methodologies are discussed, and problems in implementation of some strategies in an actual market setting are noted. (49 ref)

6283. Jacoby, Jacob; Speller, Donald E. & Berning, Carol K. (Purdue U) **Brand choice behavior as a function of information load: Replication and extension.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 33-42.—Based a study of 192 housewives on the hypothesis that there are finite limits to the ability of human beings to assimilate information during any given limit of time, and that once these limits are surpassed, behavior tends to become confused and dysfunctional. The theory was tested by operationalizing information in terms of number of brands and amount of information per brand provided for rice and prepared dinners. Results confirm the hypothesis, and suggestions for future studies are provided. (31 ref)—*Journal abstract*.

6284. Jordaan, Jean P. & Super, Donald E. (Teachers Coll, Columbia U) **The prediction of early adult vocational behavior.** In D. F. Ricks, A. Thomas & M. Roff (Eds), *Life history research in psychopathology: III*. Minneapolis, MN: University of Minnesota Press, 1974. x, 383 p.

6285. Katona, George. **Psychology and consumer economics.** *Journal of Consumer Research*, 1974(Jun), Vol 1(1), 1-8.—Presents a psychological analysis of consumers' spending and saving behavior in response to inflation, recession, or increased assets and inventories where findings differ from generalizations presented by traditional economic analysis.

6286. Landon, E. Laird. (U Colorado, Coll of Business) **Self concept, ideal self concept, and consumer purchase intentions.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 44-51.—179 male and 173 female undergraduates rated his or her self-image, ideal self-image, and purchase intentions for a list of 12 and 7 products, respectively. It was hypothesized that self-image and ideal self-image would be equally correlated with purchase intentions, that some Ss would show a dominant influence of self-image correlation over all products used (an actualizing tendency) and that some Ss would show a dominant influence of ideal self-image (a perfection tendency). Results show that (a) self-image and ideal self-image tended to be positively correlated, (b) over all Ss, purchase intentions tended to be correlated with self-image rather than with ideal self-image, and (c) purchase intentions of some products were more correlated with ideal self-image than with self-image. The actualizing and perfection tendencies did not entirely explain all the data; it appears that factors important determinants of the relative differential impact of self-image and ideal self-image on purchase intentions. (27 ref)—*L. Gorsev*.

6287. Lovell, Mark. (Leo Burnett-LPE, London, England) **European developments in psychographics.** In

W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Reviews recent European studies of life-style and psychographic characteristics and presents an example of a large psychographic study in which the author was engaged. Methodological differences between US and European studies are noted, and problems common to psychographic studies in all countries are discussed. (19 ref)

6288. Morrison, Robert F. & Arnold, Stephen J. (U Toronto, Faculty of Management Studies, Ontario, Canada) **A suggested revision in the classification of nonprofessional occupations in Holland's theory.** *Journal of Counseling Psychology*, 1974(Nov), Vol 21(6), 485-488.—Reports that, in a test among 268 males in 4 mining occupations (laboratory, process, extraction, and mining), J. L. Holland's theory of vocational choice was not as predictive as previously demonstrated for professional and technical occupations. Contrary to Holland's theory, the 4 groups which were classified within the realistic type did not exhibit similar personalities. Significant differences were found between the 4 groups on 16 of 38 life history questionnaire items, and only 3 of 8 tested traits supported the classification of all 4 nonprofessional occupational groups into the realistic type. It is suggested that data from members of nonprofessional occupations may be used to test and revise Holland's primary classification of these occupations. (15 ref)—*Journal abstract*.

6289. Morrison, Robert F. & Sebald, Maria-Luise. (U Toronto, Faculty of Management Studies, Ontario, Canada) **Personal characteristics differentiating female executive from female nonexecutive personnel.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 656-659.—Conducted a study of personal characteristics differentiating employed executive and nonexecutive women in a large metropolitan area. 39 pairs of Ss, matched on age, education, work site, length of employment, and other similar variables were differentiated on level achieved (organization status and policy contribution). All Ss completed the Weissman Personnel Classification Test and the Edwards Personal Preference Schedule. The executive group was significantly higher in (a) the self-esteem component of need for achievement, (b) the need for power, and (c) mental ability. Significant differences between the pairs were not found in variables designed to contrast early socialization processes, marital environment, and the need for affiliation.—*Journal abstract*.

6290. Mueller, Charles W. (U Iowa) **City effects on socioeconomic achievements: The case of large cities.** *American Sociological Review*, 1974(Oct), Vol 39(5), 652-667.—Used data from probability samples in 15 of the largest US cities to examine the possible causal influence of community context on an individual's occupational status attainment and income. Findings suggest that across large US communities the processes by which socioeconomic statuses are achieved are homogeneous, and city contextual differences are relatively unimportant. (24 ref)

6291. Myers, James H. & Gutman, Jonathan. (U Southern California, Graduate School of Business Administration) **Life style: The essence of social class.** In W. D. Wells (Ed), *Life style and psychographics*.

- Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Argues that the social class construct is only a subset of the indicators of life-style and that it has meaning primarily to the extent that it is separated from family income. The number and distribution of social classes, methods of measuring social class consumer behavior, market applications of the social class construct, and a study of the relationship of large numbers of life-style items to a social class index are also discussed. (33 ref)
6292. Nakanishi, Masao; Cooper, Lee G. & Kassarian, Harold H. (U California, Graduate School of Management, Los Angeles) **Voting for a political candidate under conditions of minimal information.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 36-43.—Describes the modification of various models developed to measure market share to account for variables in the selection of a political candidate and to predict voting behavior. Data indicate that the interactive brand share type model is superior in predicting elections and that the critical variables in the selection of a political candidate to an unimportant office were endorsements and not having a recognizable female name.
6293. Ostlund, Lyman E. (U Pennsylvania, Wharton School) **Perceived innovation attributes as predictors of innovativeness.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 23-29.—Reports 2 studies that apply diffusion theory to 2 new consumer products. The research objective in both studies was to discriminate buyers from nonbuyers using the personal characteristics of respondents and their perceptions of each new product and also to assess the relative importance of the predictor variables. Data from 2 samples of housewives show that in both studies perceptual variables (e.g., relative advantage of the new product, perceived risk, complexity, observability, and compatibility) were far more successful as predictors of the purchase outcome than respondent personal characteristics. (17 ref) —*Journal abstract.*
6294. Pernica, Joseph. **The second generation of market segmentation studies: An audit of buying motives.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Discusses the procedures, rationale, and validity of market segmentation studies which use inverse factors analysis (the Q-technique) to divide consumers of a single product into segments based on psychographic and life-style characteristics. A general model of consumer motivation is described, and case examples of the usefulness of the Q-technique are presented.
6295. Porter, Lyman W.; Lawler, Edward E. & Hackman, J. Richard. (U California, Irvine) **Behavior in organizations.** New York, NY: McGraw-Hill, 1975. xiv, 561 p.—Presents an introduction to the study of behavior in organizations, emphasizing the individual, the organization, and their interaction in work situations. Topics include choice, adaptation, and developmental processes in individual-organization relationships; structural and social factors in work behavior; and ways of improving organizational effectiveness. (22½ p ref)
6296. Reynolds, Fred & Darden, William. (U Georgia, Coll of Business Administration) **Construing life style and psychographics.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Reviews G. A. Kelly's theory of personal constructs and describes how it is applicable to and can be used to discriminate between "life-style" and "psychographics" as fields of inquiry. How the theory can also provide guidance when choosing between product or brand attributes and more generalized types of items in the construction of psychographic questionnaires is also described. (35 ref)
6297. Reynolds, Fred D. (U Georgia, Coll of Business Administration) **An analysis of catalog buying behavior.** *Journal of Marketing*, 1974(Jul), Vol 38(3), 47-51.—Explored 3 factors that affect catalog buying behavior: convenience, offering, and degree of risk. Findings are based on a mail survey of 1,099 Georgia housewives, with a 27% return. Catalog buyers report higher income, tend to be younger, more venturesome, and more self-confident. They are also more likely to have children under 12 yrs old. It is concluded that retailers need to understand the in-home market better and should personalize to a greater degree the promotion directed at that market.—*D. Twedt.*
6298. Rohles, Frederick H. (Kansas State U) **The modal comfort envelope and its use in current standards.** *Human Factors*, 1974(Jun), Vol 16(3), 314-322.—Exposed 1,600 Ss, in groups of 5 men and 5 women each, to 20 dry-bulb temperatures at each of 8 relative humidities. From this study, 15 temperature-humidity conditions were selected and identified as the Modal Comfort Envelope (MCE). Within this envelope, 94% of the Ss were either slightly cool, comfortable, or slightly warm; 3% were cool and 3% were warm; and none were hot or cold. To validate these findings, a new sample of 150 Ss was tested, and the results agree favorably with the original findings. The MCE was used in a clothing study and in an investigation of thermal comfort in the elderly; results of these studies are discussed, together with suggestions for the use of the MCE as a tool for examining the thermal sensation as a function of such nonthermal factors as lighting, S density, sex, and activity.—*Journal abstract.*
6299. Scherf, Gerhard W. (U Guelph, Ontario, Canada) **Consumer dissatisfaction as a function of dissatisfaction with interpersonal relationships.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 465-471.—An application of C. P. Alderfer's existence, relatedness, and growth theory (see PA, Vol 43:13656) investigated whether frustrated relatedness needs result in additional consumer existence needs, which in turn produce consumer dissatisfaction. A study of 306 randomly chosen consumers indicates that a decrease of Ss' ratings of satisfaction in their relations with "significant others" and with people at the place of employment was correlated with an increasing desire for more items of material value in the consumer role. Some correlations reached higher statistical significance when respondents of the lowest income group and those of both the oldest and the youngest age categories were eliminated from the sample. Higher incomes correlated positively with existence need satisfaction. Results support Alderfer's theory.—*Journal abstract.*
6300. Thompson, Charles W. & Rath, Gustave J. (Northwestern U) **The administrative experiment: A**



**special case of field testing of evaluation.** *Human Factors*, 1974(Jun), Vol 16(3), 238-252.—Describes a strategy and method of field testing or evaluation called administrative experimentation. The method is defined in terms of its relation to other methods and its potential strengths and limitations, and case studies of its use are presented to provide a basis for evaluating its usefulness. (18 ref)

6301. **Villemez, Wayne J.** (Florida Atlantic U) **Ability vs. effort: Ideological correlates of occupational grading.** *Social Forces*, 1974(Sep), Vol 53(1), 45-52.—Investigated the relationship between occupational prestige, the level of ability perceived as necessary to perform a job, and the amount of effort perceived as necessary to perform it. Data from 168 undergraduates who rated 120 occupations on these variables indicate that the level of ability and the amount of effort perceived as necessary to perform a job are strongly related to the prestige continuum, but which is paramount varies with self-perception of individual capabilities in terms of the effort-ability continuums. Findings support 3 conclusions: (a) The argument that consensus on prestige does not indicate consensus as to distributive justice is not supported. (b) In areas characterized by a high degree of the division of labor, the effort-ability distinction becomes cloudy. (c) Because of egocentrism in occupational grading, the use of prestige or prestige-related categories does not seem justified in studies where interest is focused on individual attributes or attitudes. (34 ref)—*Journal abstract.*

6302. **Ward, Scott.** (Harvard U, Graduate School of Business Administration) **Consumer socialization.** *Journal of Consumer Research*, 1974(Sep), Vol 1(2), 1-14.—Traces the development of interest in consumer socialization. Major policy and conceptual issues are posed, and research in several areas of study is reviewed. Directions for research are specified in 3 key areas: consumer socialization processes, content of learning, and permanence of early learning. Interest in consumer socialization has developed largely due to contemporary issues relating to corporate and public policy formation. Research goals should center around developing the information-processing capabilities of consumers or around ultimate consumer effectiveness in families. (85 ref)—*Journal abstract.*

6303. **Welgart, Kathleen M.** **Stratification, ideology, and opportunity beliefs among black soldiers.** *Public Opinion Quarterly*, 1974(Spr), Vol 38(1), 57-68.—While many social observers feel that the military offers blacks better opportunities than civilian institutions do, the overwhelming majority of the 454 black soldiers sampled in this study either equated the 2 sectors or rated civilian institutions as superior. Both position in the military hierarchy (rank) and ideological orientation (separatist, pluralist, or assimilationist) provide some assistance in differentiating those soldiers more likely to cite the military as comparatively advantageous for blacks. (21 ref)—*Journal abstract.*

6304. **Wells, William D. (Ed.).** (U Chicago, Graduate School of Business) **Life style and psychographics.** Chicago, IL: American Marketing Assn, 1974. viii, 363 p.

6305. **Wells, William D.** (U Chicago, Graduate School of Business) **Life style and psychographics: Definitions,**

**uses and problems.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Discusses the question of definitions in life-style and psychographic research, the use of psychographic methods in advertising campaigns, product positioning, preference assessment, and market segmentation; the relationship between psychographics and media; and theoretical and methodological problems in translating from psychographic data to marketing decisions. (79 ref)

6306. **Wind, Jerry & Green, Paul.** (U Pennsylvania, Wharton School) **Some conceptual, measurement, and analytical problems in life style research.** In W. D. Wells (Ed), *Life style and psychographics*. Chicago, IL: American Marketing Assn, 1974. viii, 363 p.—Discusses several questions related to the methodology of life-style and psychographic research, including the role of life-style in marketing research as related to criterion variable set; problems associated with the construct, indicators, and validation of life-style; and the influence of response bias, the respondent's frame of reference, and data collection procedures on life-style indicators. (51 ref)

#### Occupational Guidance & Personnel Selection & Training

6307. **Arvey, Richard D. & Mussio, Stephen J.** (U Tennessee, Coll of Business Administration) **A validation strategy for the "nonsample."** *Professional Psychology*, 1974(Aug), Vol 5(3), 264-266.—Presents a method of nondiscriminatory employment test validation when there are no minority personnel in jobs being considered. A test battery is validated with the Caucasian employees and then administered to an applicant pool containing a high proportion of minority group members. If differences between racial groups emerge, discriminatory items are ascertained by item analysis and deleted. If no differences appear (as in the case reported), the battery is standardized with on-the-job minority personnel.—C. Wright.

6308. **Baker, Larry D.** (U Missouri, School of Business Administration, St Louis) **Authoritarianism, attitudes toward blindness, and managers: Implications for the employment of blind persons.** *New Outlook for the Blind*, 1974(Sep), Vol 68(7), 308-314.—A review of the literature indicates that some employers express positive attitudes toward the capabilities of blind persons but are unwilling to hire them. One factor which may explain this reluctance is the authoritarian personality characteristics of some employers. High authoritarians tend to hold more negative attitudes toward the blind and may hold or aspire to important decision- and policy-making positions in organizations. It is suggested that organizations in the economic system may foster the development or promotion of persons who are most likely to hold negative attitudes toward blind persons to positions where decisions affecting the employment of the blind are made. Suggested areas of research are presented (e.g., recruitment and selection policies for blind persons). (35 ref)—*Journal abstract.*

6309. **Britton, Jean O. & Thomas, Kenneth R.** (Pennsylvania State U) **Age and sex as employment variables: Views of employment service interviewers.**

*Journal of Employment Counseling*, 1973(Dec), Vol 10(4), 180-186.—Studied the perceptions of 56 23-67 yr old employment interviewers regarding the worker characteristics of males and females of varying ages. Results showed that significant main effects due to age were obtained on 6 questions: how difficult workers would be to place in jobs during an economic recession, how difficult they would be for an employer to train, how slow they would be in maintaining production schedules, how accident-prone they would be on the job, how frequently they would be absent from work, and how likely they would be to have the skills an employer would want. 50-yr-olds were seen as the most and 25-yr-olds as the least difficult to place and train, while 18-yr-olds were seen as the most likely to have accidents and to be absent, and as the least likely to have desired skills. Females were seen as more likely than males to be frequently absent and less likely than males to have the skills an employer would want.—*Journal abstract*.

6310. Cassel, Russell N. & Stroman, Samuel D. (U Wisconsin, Milwaukee) Evaluation of the UMW Computerized Decision Development System for use with ROTC students. *Journal of Instructional Psychology*, 1974(Win), Vol 1(1), 12-22.—Used the Computerized Decision Development System (DEDEV) with 63 students to determine the validity of the system and the Ss' attitude toward it. Results show that DEDEV was effective in teaching Ss the psychology of decision-making; Ss felt that it was useful for the preparation of officers.

6311. Cauley, William J. The fully functioning employment service counselor. *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 118-122.—Defines fully functioning employment service counselors as individuals who feel personally and professionally significant and who use personal and professional competencies to foster an accurate image of themselves with clients and other professionals within the employment service. They are aware of the changing demands and the expanding scope and goals of employment counseling occurring over the past 10 yrs, although many others in the employment service, including training and supervising counselors, are not. These counselors must take the responsibility for bringing others into their scope of awareness and must define, through their own actions, their developing identity.—*Journal abstract*.

6312. Cecil, Earl A.; Paul, Robert J. & Olins, Robert A. (U Missouri) Perceived importance of selected variables used to evaluate male and female job applicants. *Personnel Psychology*, 1973(Fall), Vol 26(3), 397-404.—118 graduate and undergraduate students were presented a list of 50 variables and asked to rank each variable on a modified Likert-type scale. Some variables were judged more important for the potential female applicant for a white-collar job: pleasant voice, clerical skills, high school degree, computational skills, immaculate dress, and ability to express self well. Other variables were judged more important for the male applicant: flexibility, persuasiveness, ability to work under pressure, motivation, and aggressiveness. It is concluded that females might experience greater difficulty than their male counterparts in finding managerial

work. Males might have difficulty securing a typical clerical position.—R. S. Albin.

6313. Chatterji, Sibabrata & Mukerjee, Manjula. (Indian Statistical Inst, Calcutta) Group task and its use as measure of personality in selection situation. *Japanese Psychological Research*, 1974(May), Vol 16(1), 22-28.—Considers that personality determines the behavior of a person to a large extent and that, therefore, care should be taken when selecting suitable candidates for jobs or training. Data were collected from 41 groups of 10 graduate management students each to determine the relation between job performance and several personality traits measured through group tasks conducted at the time of selection. Results show that the job performance of individuals with the required level of ability would be satisfactory provided they possess certain personality traits (e.g., application and leadership).—*Journal abstract*.

6314. Ehrle, Raymond A. (George Washington U) Between boredom and terror: The credibility and survival of the professional. *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 113-117.—Considers that, as fewer opportunities become available for private practice on the part of the professional employment counselor, his situation becomes one of terror in maintaining continuous credibility or of boredom by bureaucratic stagnation. Suggestions for dealing with these 2 undesirable alternatives while maintaining a standard of excellence are briefly discussed.

6315. England, George W. & Lee, Raymond. (U Minnesota) The relationship between managerial values and managerial success in the United States, Japan, India, and Australia. *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 411-419.—Investigated the relationships between managerial values and managerial success for a diverse sample of 878 American managers, 301 Australian managers, 500 Indian managers, and 312 Japanese managers. Cross-validated results show that value patterns were significantly predictive of managerial success and could be used as a basis for selection and placement decisions. Results also indicate that managers from the 4 countries were rather similar in terms of the personal values that were related to success. More successful managers had pragmatic, dynamic, and achievement-oriented values, while less successful managers had more static and passive values. Arguments for and against using value assessment results in selection and placement decisions are discussed. (31 ref)—*Journal abstract*.

6316. Hagin, William V. & Smith, James F. Advanced simulation in underground pilot training (ASUPT) facility utilization plan. *US AFHRL Technical Report*, 1974(Jun), No 74-43, 36 p.—Describes the capabilities of a flight simulation research facility located at Williams Air Force Base, Arizona. Research philosophy to be applied is discussed, and long range and short range objectives are identified. A time-phased plan for long range research accomplishment is described. In addition, some examples of near-term research efforts which will be conducted during periods when the total system is not available are described in some detail. These projects address immediate simulator user's needs.—*Journal abstract*.



6317. Jennings, J. Richard; Rose, R. M. & Kreuz, Leo. (Walter Reed Army Inst of Research, Washington, DC) **Stress and performance during and after Officer Candidate School.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 500-503.—Related military performance during and after Officer Candidate School (OCS) to interview and questionnaire measures of stress and personality (e.g., the Marlowe-Crowne Social Desirability scale). A company of 69 candidates was studied early in training, just prior to graduation, and after 6 mo on duty as officers. It was found that psychiatric interview ratings of stress and change in coping style related to class standing in OCS but not to subsequent military performance. Personality and maturational variables were related to performance after OCS. Motivational distortion by candidates and initial impression formation by superior officers appeared to be factors in determining OCS class standing.—*Journal abstract*.

6318. Kauffman, Stephen P. & Dwyer, Francis M. (SUN Area Vocational School, New Berlin, PA) **Effectiveness of cartoons and photographs in in-service training.** *California Journal of Educational Research*, 1974(Sep), Vol 25(4), 197-204.—Investigated the relative effectiveness of different types of visual illustrations used to complement instruction presented in inservice training programs. Ss were 70 college students in an instructional media course, 56 "preprofessional" state employees (i.e., those employees without an undergraduate or 3-yr nursing degree), and 53 professional state employees. Each S received a pretest, participated in 1 of 2 instructional presentations (which varied only in whether the cartoons and photographs were in color or black and white), received a criterion test, and responded to a visual preference survey. Results indicate that, in general, cartoons were more effective than realistic photographs in facilitating S's achievement on immediate and delayed retention tests. However, identical visuals were not equally effective in facilitating achievement in the 3 groups of Ss. A majority of Ss in each group indicated that they learned more from the cartoon presentation and would prefer to receive instruction complemented by cartoons rather than by realistic photographs.—*Journal abstract*.

6319. Lawrence, Richard E. & Stern, Herbert. (U Maryland) **A training program to prepare agency counselor-interviewers.** *Journal of Employment Counseling*, 1973(Dec), Vol 10(4), 168-172.—Describes a training program conducted with selected regular employees of a federal agency to prepare them to serve as counselor-interviewers in the upgrading process. Data from the evaluation of communication patterns and recommendations for similar programs are presented.

6320. Lawrence, Richard E. (U Maryland) **A theory, philosophy, and practice for the employment counselor.** *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 107-112.—Discusses the need for an adequate definition and theory of counseling in view of the many pressures on employment counselors to provide personal problem counseling (e.g., role definition and decision-making suggestions) for job applicants. A specific approach to counseling, based on existential philosophy, is described.

6321. McLaughlin, Donald H. & Tiedeman, David V. (American Inst for Research, Palo Alto, CA) **Eleven-year career stability and change as reflected in Project Talent data through the Flanagan, Holland, and Roe occupational classification systems.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 177-196.—Investigated the extent of career stability and the patterns of career change which have occurred in the lives of Project TALENT 12th-grade male students in the 11 yrs since they were tested. "Career" plans in the last year of high school and at 1, 5, and 11 yrs after testing were classified by the Flanagan, Holland, and Roe occupational classification systems to study the career stability and patterning within each system. Career stability was about the same in all 3 classification systems but decreased in all cases as the interval over which it was measured increased. Career stability increased as Ss grew older, proving to be the greatest from 5 to 11 yrs after high school. Patterns of change mildly conformed to the circular patterns claimed by Holland and Roe for their systems and the linear pattern hypothesized for the Flanagan system. Generally, the direction of "career" flow was away from intellectual careers to careers in business and sales but each system had unique results as well.—*Journal abstract*.

6322. Meyer, David P. (US Dept of Labor, Manpower Administration, Washington, DC) **The Widget Syndrome.** *Journal of Employment Counseling*, 1974(Sep), Vol 11(3), 101-106.—Discusses the recent tendency in manpower administration to view human services in mechanistic terms. This Widget Syndrome tends to cause an emphasis on large numbers of transactions as a measure of effectiveness. An analysis of the placement process is presented which stresses the psychological components of job-seeking and distinguishes between placement and finding suitable jobs for people. A "scientific method" of placement is described which enables job counselors to determine differences among groups of applicants who obtained and did not obtain employment and to develop policies for dealing with the unemployed.—*L. Gorsey*.

6323. Nagle, George S. (Armed Forces Inst, Madison, WI) **Number of contacts with disadvantaged applicants as an indicator of success.** *Journal of Employment Counseling*, 1973(Dec), Vol 10(4), 203-207.—Studied the number of contacts with disadvantaged applicants in a medium-sized employment service office and their relation to success. Most of the 333 applicants were served by 5 contacts. Results indicate that success occurs in from 3 to 5 contacts and failure occurs beyond 7 contacts. Re-evaluation of service plans for applicants carried beyond 5 contacts is suggested.—*Journal abstract*.

6324. Phelps, R. J.; Peer, Gary G. & Canada, Richard M. (Indiana U) **Training employment service personnel in basic counseling skills.** *Journal of Employment Counseling*, 1973(Dec), Vol 10(4), 173-179.—Describes the results of a 2-yr paraprofessional training program in basic counseling skills for 29 employment service interviewers. Trainees evidenced a significant decrease in closed-mindedness as assessed by the Rokeach Dogmatism Scale, and changes in types of counselor responses as measured by the Porter Test of Counselor Attitudes.

6325. Robinson, David D.; Wahlstrom, Owen W. & Mecham, Robert C. Comparison of job evaluation methods: A "policy-capturing" approach using the Position Analysis Questionnaire. *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 633-637.—Used a policy-capturing method of job evaluation, which involved the multiple regression weighting of numerical job analysis data obtained using the Position Analysis Questionnaire (PAQ), to predict compensation rates in 2 studies. In Study 1 compensation rates were derived and compared for 19 municipal government jobs using the policy-capturing and 4 conventional methods. The rates derived using the 5 methods intercorrelated between .82 and .95. In Study 2 PAQ data and job evaluation points previously determined using a point method were obtained for 131 jobs in a utility company. A stepwise regression analysis, used to select and weight PAQ factor scores to predict the job evaluation points, yielded a multiple correlation of .90. Because of comparable results and lower cost, the policy-capturing method was adopted in both organizations. (18 ref)—*Journal abstract*.
6326. Rosen, Benson & Jerdee, Thomas H. (U North Carolina, Graduate School of Business Administration) Effects of applicant's sex and difficulty of job on evaluations of candidates for managerial positions. *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 511-512.—To investigate the influence of sex-role stereotypes on evaluations of candidates for managerial positions, 235 male undergraduate business students evaluated job applicant forms which differed only in the male or female name given to the applicant. Findings confirm that sex-role stereotypes influence evaluations of applicants and selection decisions. Male applicants were accepted more frequently than equally qualified females, and were evaluated more favorably on general suitability, potential for long service, and potential for fitting in well in the organization. Also supported was the hypothesis that job demands have differential effects on evaluations of male and female applicants. Females were given lowest acceptance rates and poorest evaluation for "demanding" managerial positions.—*Journal abstract*.
6327. Schmidt, Frank L. (Michigan State U) Probability and utility assumptions underlying use of the Strong Vocational Interest Blank. *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 456-464.—Decision implications of E. K. Strong's (1955) assumption of equal base rates for his men-in-general and individual occupational groups are explored, using the Strong Vocational Interest Blank (SVIB) Physician's scale as an example. It is demonstrated that when realistic base rates are assumed, total decision error rate using the SVIB—even when optimal cutting scores are employed—is at best about equal to that resulting from prediction using base rates alone. Use of the SVIB as recommended by Strong implicitly assumes that false negative errors are much more serious than are false positives. When "reasonable" utility or gain matrices are assumed, use of the SVIB can reduce total error rate despite the limitations imposed by low occupational base rates; this effect is greater when statistically optimal cutting scores, rather than those recommended by Strong, are used. (15 ref)—*Journal abstract*.
6328. Schoenfeldt, Lyle F. (U Georgia) Utilization of manpower: Development and evaluation of an assessment-classification model for matching individuals with jobs. *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 583-595.—Describes a model for the assessment of individual characteristics, the identification of psychological requirements of jobs, and the classification of applicants to job opportunities. The validity of the model was investigated with 1,934 undergraduates. Subgroups, formed on the basis of previous behavioral data collected during the freshman year, differed with respect to criteria (e.g., arts-sciences vs applied studies and grade point average) measurements taken 4 yrs later. More importantly, the subgroups differed with respect to the curricular paths walked during college. Results indicate that it is possible to differentiate people in meaningful ways, to identify "job families," and to match people with jobs. (34 ref)—*Journal abstract*.
6329. Showalter, John M. & Bryant, Flora. (Ohio State U, Ctr for Vocational Technical Education) Use of job simulation kits with WIN enrollees. *Journal of Employment Counseling*, 1973(Dec), Vol 10(4), 192-196.—Describes the use of Job Experience Kits (J. D. Krumboltz et al), which measure interest in 21 occupations, with 122 disadvantaged adults in Work Incentive Programs. Data from administrations of the kits before and after Ss participated in a vocational orientation and assessment program support their value in facilitating the vocational decision-making process of adult clients.
6330. Sjödin, Karl-Göran & Glesecke, Cecilia. [A training evaluation system for officers and conscripts.] (Swed) *MPI A-Rapport*, 1974(Aug), No 27, 34 p.—Describes the rationale, procedures, and results of a training system for military personnel which is based on a feedback model and uses questionnaires and group discussions. Results from its use with 4 military units are presented. Findings indicate that training evaluation systems based on feedback to different levels in the training organization can be valuable in increasing the immediacy of information and making training procedures more efficient. The need to provide information about changes that have been made to insure that each individual is aware of his own job responsibilities is emphasized.—*English abstract*.

### Job Performance & Satisfaction

6331. Rasmussen, J. & Jensen, A. (Danish Atomic Energy Commission, Research Establishment Riso, Roskilde, Denmark) Mental procedures in real-life tasks: A case study of electronic trouble-shooting. *Ergonomics*, 1974(May), Vol 17(3), 293-307.—Analyzes verbal protocols to study the mental procedures used by skilled electronics repair men in their normal working environment. The procedures found are organized as a search through a system which is viewed as a hierarchy of subunits. Basically different types of recurrent search routines are found with great differences in respect to the number of observations needed and the complexity of the mental data processing involved. The records demonstrate an ability by the men to conduct the search by general routines depending upon their general professional background and a preference for rapid streams of simple decisions giving good or bad judgments.



ments regardless of whether observations are informationally redundant. The records indicate that the men have confidence that the general routines will ultimately lead them to the fault. In cases where they are unsuccessful, there seems to be a fixation resulting in a tendency to rely on repetitions rather than to generate specific procedures based on reasoning related to the functioning of the specific system. (German summary)—*Journal abstract*.

6332. Axelson, Olav. (Regionsjukhuset, Yrkesmedicinska kliniken, Örebro, Sweden) **Influence of heat exposure on productivity.** *Work-Environment-Health*, 1974, Vol 11(2), 94-99.—Proposes an approximate and computationally simple formula for the prediction of relative reduction in work capacity due to heat stress. The applicability of the proposed model was tested using experimental data on heart rates, sweat rates, and metabolic rates accounted for in the literature. The agreement between the predicted and observed values on productivity reduction was in most situations found to be fairly good. Recommendations for the air velocity parameter value and the temperature scale to be used are suggested. Consideration is also given to the nature of the basic data as well as to the need for complementary practical observations.—*Journal abstract*.

6333. Beck, Lawrence J. (San Jose State U) **The effect of spurious angular accelerations on tracking in dynamic simulation.** *Human Factors*, 1974(Aug), Vol 16(4), 423-431.—Investigated the effect of spurious simulator yaw motions on a pilot's control performance, and compared the efficiency of static and dynamic simulator tracking in previously unexamined vehicle dynamics. 12 healthy airline pilots served as Ss in a moving-base flight simulator under congruent-motion, spurious-motion, and no-motion conditions. Results indicate a significant increase in the amount of error with increasing levels of spurious motion during the initially administered series of trials. The influence of spurious motion, however, was absent in a 2nd series of trials. Data suggest that the Ss learned to compensate in their performance for the spurious inputs. Congruent visual and rotational cueing produced superior performance to that of tracking with visual information alone. (21 ref)—*Journal abstract*.

6334. Biersner, Robert J. & Ryman, David H. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Prediction of scuba training performance.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 519-521.—296 trainees of the US Navy School for Divers Second Class completed a demographic questionnaire, a health inventory, and an attitude survey. Significant multiple correlations in a validation sample and in a cross-validation sample were obtained between these variables and a pass-fail performance criterion. Scales dealing with mental health and training apprehension were the most significant predictors.

6335. Courthéoux, Jean-Paul. (CNRS, Paris, France) **[From professional mobility to social mobility.]** (Fren) *Orientation Scolaire et Professionnelle*, 1974(Jan-Mar), No 1, 53-58.—Reports on the extent and direction of professional mobility based on data published by the French government. Included are rates of promotion and demotion for engineers and for untrained workers within

and outside the organization, and information about recruitment sources for upper and lower employee echelons. It is pointed out that in an upwardly mobile society a son working at the same level as his father may find himself in an inferior position socially.

6336. Eden, Dov & Leviatan, Uri. (Tel Aviv U, Israel) **Farm and factory in the kibbutz: A study in agricultural psychology.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 596-602.—Surveyed kibbutz communities with a mix of factory and farm jobs to study the effects of industrialization on work and workers while controlling for the effects of urbanization. Questionnaire responses of 476 workers in a representative sample of factories were compared to those of 175 workers in location-matched agricultural branches in 27 kibbutz collective settlements. Factory workers rated their jobs significantly lower than did farm workers on plant manager's leadership, opportunities for self-realization on the job, participation, control, peer relations, and information about the job. However, factory jobs were rated cleaner, easier, and more mental. Factory and farm workers were similar in outcome measures, including supervisory ratings of performance, job satisfaction, mental health, and alienation. (19 ref)—*Journal abstract*.

6337. French, Earl B.; Metersky, Morton L.; Thaler, David S. & Trexler, Jerome T. (Lehigh U) **Herzberg's two factor theory: Consistency versus method dependency.** *Personnel Psychology*, 1973(Fal), Vol 26(3), 369-375.—Tested whether results obtained by using an F. Herzberg (see PA, Vol 34:4849) type of written questionnaire are significantly different from those obtained when Herzberg's oral interview procedure is used. 25 male systems analysts and systems engineers were studied. Results were statistically similar whether using oral or written data collection techniques. These results are discussed in terms of criticism often directed at Herzberg's methods. It is concluded that it is possible to replicate Herzberg's methods by controlling crucial aspects in the experimental process. (15 ref)—*R. S. Albin*.

6338. Hadley, Robert G. (California State U, Los Angeles) **Comment on Locke's satisfiers and dissatisfiers among white-collar and blue-collar employees.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 507-508.—Contends that some methodological problems limit E. A. Locke's (see PA, Vol 51:10066) classification system for occupational satisfiers and dissatisfiers which distinguished between agent and event categories. An alternative classification system, taking into account the multiple determination of some events, is recommended.

6339. Heisler, W. J. (U Notre Dame) **A performance correlate of personal control beliefs in an organizational context.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 504-506.—Compared scores of 175 employees of a government agency on Rotter's Internal-External Control Scale to scores on an index of personal effectiveness composed of 5 factors indicative of success within a governmental occupational context: number of promotions, salary increases, and awards received; current salary; and grade differential. Employees with a greater belief in external control reported significantly lower personal effectiveness than those with a lesser belief in external control. When organizational rewards were perceived by agency members as skill-determined, the

relationship between environmental control beliefs and personal effectiveness increased, while the relationship was nearly zero when agency rewards were seen as chance-related.—*Journal abstract.*

6340. Herold, David M. (Georgia Inst of Technology, Coll of Industrial Management) **Interaction of subordinate and leader characteristics in moderating the consideration-satisfaction relationship.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 649-651.—Reports that the relationship between leader consideration and worker satisfaction varied for groups of subordinates reporting (a) different levels of need for independence and (b) supervisors with different levels of hierarchical influence. In 91 nonsupervisory industrial workers, relationships between consideration (measured by the Leader Behavior Description Questionnaire) and 3 facets of satisfaction were significantly positive for those subordinates low in independence who had supervisors low in influence and for subordinates high in independence who had supervisors high in influence. No significant relationships were found for the low-independence-high-influence and high-independence-low-influence groups. No support was found for previous findings that leaders' hierarchical influence alone moderates consideration-satisfaction relationships.—*Journal abstract.*

6341. Ilgen, Daniel R. & Seely, William. (Purdue U) **Realistic expectations as an aid in reducing voluntary resignations.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 452-455.—Realistic information about a situation into which 234 US military cadets were about to enter was presented to the new members after they had decided to join the organization, but before they reported to the organization. When compared to a control group of 234 cadets who received no such information, the experimental group showed significantly lower turnover. The results are discussed in reference to the functions served by realistic job information available to new members after they have accepted a position with an organization.—*Journal abstract.*

6342. Karp, H. B. & Nickson, Jack W. (Old Dominion U, School of Business Administration) **Motivator-hygiene deprivation as a predictor of job turnover.** *Personnel Psychology*, 1973(Fal), Vol 26(3), 377-384.—Tested motivator-hygiene theory as a predictive tool for job turnover. 50 black working poor people (sex not specified) were selected because of their low level of job stability and interviewed according to F. Herzberg's methodology. Each S then completed a job motivation inventory (R. Kahoe, 1966). The hypothesis stating that this sample would perceive motivators as a source of satisfaction and hygiene as a source of dissatisfaction was confirmed. It is concluded that motivator and hygiene deprivation do predict job turnover because they indicate how much satisfaction and dissatisfaction are actually perceived on an existing job. Positive correlations were also found between motivator deprivation and hygiene deprivation.—*R. S. Albin.*

6343. Kempner, T. & Wild, Ray. **Job design and productivity.** *Journal of Management Studies*, 1973(Feb), Vol 10(1), 62-81.—Studied the relationship between job design and worker productivity to obtain a systematic body of knowledge concerning general principles of job design. These studies were conducted among unskilled

female manual workers in the electronics industry in Great Britain. Survey techniques were used to determine the relationships among job satisfaction, community attitudes, and biographical data on factors such as labor turnover and job attitude. Results indicate that job satisfaction is significantly influenced by and influences these variables. Greater quantitative precision in the assessment of the relationships between job design and productivity will depend on advances in the measurement of these variables. (17 ref)—*R. A. Levit.*

6344. Klimoski, Richard J. & London, Manuel. (Ohio State U) **Role of the rater in performance appraisal.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 445-451.—Notes that ratings for performance appraisal are frequently made by supervisors. In the present study, judgments of effectiveness for 153 hospital nurses were obtained from the nurse herself and her peers in addition to her supervisor, using the same rating form. Factor analysis indicated that each rating source could be clearly identified and characterized. The data reaffirm the notion that interrater disagreement may reflect systematic rater bias as well as meaningful differences in the ways in which judgments are made. Implications for comprehensive appraisals are suggested. (29 ref)—*Journal abstract.*

6345. Lee, Raymond & Booth, Jerome M. **A utility analysis of a weighted application blank designed to predict turnover for clerical employees.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 516-518.—Demonstrated the validity of a weighted application blank in predicting turnover for clerical employees. Cross-validated results showed relatively low shrinkage of the validity coefficient, and indicated that weighted application blank scores could be used as a basis of selection.

6346. Lefkowitz, Joel. (Baruch Coll, City U New York) **Job attitudes of police: Overall description and demographic correlates.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 221-230.—Administered a battery of job questionnaires (e.g., Job Descriptive Index, Porter Need Satisfaction Questionnaire, the Leadership Opinion Questionnaire, and the Rokeach Dogmatism Scale) to 312 policemen in a midwestern city. Police appeared not to be dissimilar from other "typical" industrial samples in terms of job satisfaction patterns, need gratification and orientation, job involvement, dogmatism, anti-Negro bias, and supervisory orientation. They were, however, more dissatisfied with their jobs than were comparable groups. The most significant correlates of job attitudes were age, rank, and job assignment. (15 ref)—*Journal abstract.*

6347. McLaughlin, Gerald W. & Butler, Richard P. (Virginia Polytechnical Inst) **Perceived importance of various job characteristics by West Point graduates.** *Personnel Psychology*, 1973(Fal), Vol 26(3), 351-358.—Investigated the relative importance of various job characteristics to a select group of Army officers and examined whether A. Maslow's hierarchy of needs (1954) is useful for describing their need structure. A 31-item questionnaire was sent to 1,003 West Point graduates from the classes of 1963-1967. 605 (60%) were returned. It was found that the greatest importance was attached to job characteristics that pertain to one's reputation



This is interpreted to mean that these Ss were functioning primarily at a level where they were concerned with status, recognition, and respect. Self-esteem, safety/security, and self-fulfillment were important needs in that ranked order. Maslow's theory was found to be useful. It is concluded that the army should concentrate its improvement plan for officers on improving self-esteem and reputation.—R. S. Albin.

6348. Morgan, Ben B.; Brown, Bill R. & Alluisi, Earl A. (Old Dominion U) **Effects on sustained performance of 48 hours of continuous work and sleep loss.** *Human Factors*, 1974(Aug), Vol 16(4), 406-414.—The work efficiency of 10 undergraduate research assistants during a 48-hr period of continuous work and sleep loss was assessed using the synthetic-work technique. Performance during the period of stress was significantly influenced by the circadian rhythm. Decrements first occurred after approximately 18 hrs of continuous work, and performance decreased to an average of 82% of baseline during the early morning hours of the 1st night. Performance improved to about 90% of baseline during the daytime of the 2nd day but decreased to approximately 67% during that night. All measures of performance recovered to baseline levels following a 24-hr period of rest and recovery. (17 ref)—*Journal abstract*.

6349. Mowday, Richard T.; Porter, Lyman W. & Dubin, Robert. (U California, Irvine) **Unit performance, situational factors, and employee attitudes in spatially separated work units.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 231-248.—Investigated the relationships between work unit performance and employee attitudes and situational characteristics among 411 female clerical workers in 37 branches of a bank. The relationship of 2 independent dimensions of performance to attitudes and situational characteristics was studied in a multivariate framework by multiple discriminant analysis. Employee attitudes were significantly related to a measure of branch performance reflecting job duties performed within the branch. Employees in branches rated high in performance had a higher level of attitudes toward aspects of both the branch in which they worked and the larger organization of which it was a part, while individuals in low- and medium-performing branches had lower levels of attitudes that were similar. Situational characteristics of the branch were most highly related to the manager's performance of loan functions, a large portion of which may take place outside the branch. (18 ref)—*Journal abstract*.

6350. Newman, John E. (State Farm Insurance Co, Bloomington, IL) **Predicting absenteeism and turnover: A field comparison of Fishbein's model and traditional job attitude measures.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 610-615.—Studied the lab-to-field generalizability of M. Fishbein's (1967) attitude-behavior model and examined the relative efficacy of the Fishbein model and traditional job attitude measures as predictors of absenteeism and turnover. Predictor data were collected from 108 nursing home employees immediately preceding the 2-mo time period of interest. Criterion data were obtained at the end of the 2-mo period. Fishbein's model received some field support, particularly with respect to predicting turnover. Traditional job attitude measures were more effective pre-

dictors of absenteeism, while Fishbein's model was a more effective predictor of turnover. It is concluded that neither approach seems superior especially in light of the amounts of criterion variance accounted for.—*Journal abstract*.

6351. Porter, Lyman W.; Steers, Richard M.; Mowday, Richard T. & Boulian, Paul V. (U California, Graduate School of Administration, Irvine) **Organizational commitment, job satisfaction, and turnover among psychiatric technicians.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 603-609.—Studied changes across time in measures of organizational commitment and job satisfaction as each related to subsequent turnover among 60 recently employed psychiatric technician trainees. A longitudinal study across a 10½-mo period was conducted, with attitude measures (Organizational Commitment Questionnaire and Job Descriptive Index) collected at 4 points in time. Results of a discriminant analysis indicate that significant relationships existed between certain attitudes held by employees and turnover. Relationships between attitudes and turnover were found in the last 2 time periods only, suggesting that such relationships are strongest at points in time closest to when an individual leaves the organization. Organizational commitment discriminated better between stayers and leavers than did the various components of job satisfaction. (36 ref)—*Journal abstract*.

6352. Ramsey, J. D.; Halcomb, C. G. & Mortagy, A. K. **Self-determined work/rest cycles in hot environments.** *International Journal of Production Research*, 1974(Sep), Vol 12(5), 623-631.—24 male undergraduates performed a visual vigilance task under various temperature conditions (70, 82, and 90°F). Ss were allowed to determine when they desired a rest from monitoring. Ss selecting "long" sessions had both poorer performance scores and less accurate time estimates than Ss selecting short sessions. Ss in general did a poor job of relating their own thermal discomfort, drowsiness, boredom, estimates of job performance, and preference for the task to their actual performance score and/or time on duty. No significant temperature effects were noted. (French & German summaries) (16 ref)—*Journal abstract*.

6353. Robey, Daniel. (Marquette U) **Task design, work values, and worker response: An experimental test.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 264-273.—Used 60 undergraduates to test the hypothesis that job satisfaction and performance are affected by the interaction of task design and work values. 2 routine decision tasks were performed by Ss classified as having either intrinsic work values or extrinsic work values using F. Friedlander's 1965 questionnaire. Findings support the hypothesis that the interaction between job content and work values affects job satisfaction. Performance data partially support the hypothesis. The job enlargement thesis is thus shown not to be generally valid but rather affected by individual differences of Ss. (18 ref)—*Journal abstract*.

6354. Theologus, George C.; Wheaton, George R. & Fleishman, Edwin A. (American Inst for Research, Washington, DC) **Effects of intermittent, moderate intensity noise stress on human performance.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 539-547.

—Studied the effects of prolonged exposure to 2 noise stressors (random and patterned intermittent 0 and 85 db) on the performance of 60 male undergraduates on 3 tasks requiring different abilities (reaction time, rate control, and time-sharing). The sensitivity of alternate metrics of performance degradation was also evaluated within an analysis of covariance design. Ss were randomly assigned to the various treatments, and a series of  $2 \times 2 \times 4$  (Noise Intensity  $\times$  Noise Quality  $\times$  Trial Blocks) covariance analyses were carried out. The effects of random noise on performance depended on the type of task and performance measure. The reaction-time task was affected, the rate-control task was not, and the time-sharing task was affected only after continued exposure to noise. Patterned noise had insignificant effects. (20 ref)—*Journal abstract*.

6355. Wanous, John P. (New York U, Graduate School of Business Administration) **Individual differences and reactions to job characteristics.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 616-622.—Evaluated 3 different methods of measuring individual differences as moderators of employee reactions to job characteristics. The 3 methods are urban vs rural background, strong vs weak belief in the Protestant work ethic, and high vs low strength for "higher order" needs. Each of these 3 methods was used as a moderator of the relationships between job characteristics on the one hand, and specific job facet satisfaction, overall job satisfaction, and job behavior on the other hand. Data were obtained from 80 newly hired female telephone operators. Based on the job satisfaction results, higher order need strength was the most useful way to measure this type of individual difference, followed by the Protestant work ethic, and lastly by urban vs rural background of the worker. There were no differences among the 3 individual differences as moderators of the job characteristics and job behavior relationship. (18 ref)—*Journal abstract*.

6356. Wearing, Alexander J. & Bishop, Doyle W. (U Melbourne, Vic, Australia) **The Fiedler contingency model and the functioning of military squads.** *Academy of Management Journal*, 1974(Sep), Vol 17(3), 450-459.—Investigated the joint effects of leader esteem for least preferred coworker (leader LPC), mean LPC of members, and intergroup competition on adjustment, interpersonal relations, and task performance effectiveness. Questionnaire data was obtained from 52 US Army combat engineer training squads of approximately 13 recruits each. The variables had few independent effects but interacted to affect the adjustment and task performances of the squads.—*Journal abstract*.

6357. Weinstein, Neil D. (Rutgers State U, Cook Coll, New Brunswick) **Effect of noise on intellectual performance.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 548-554.—Studied the effect of realistic noise levels on an intellectually challenging task. 33 undergraduates performed proofreading in quiet or with a background of intermittent teletype noise (70 db). As predicted, noise Ss did not differ significantly from quiet Ss in detecting spelling errors but were poorer at identifying grammatical errors. Contrary to expectations, recall of the content of the proofreading passages was unaffected. Detailed analysis revealed that Ss initially worked more slowly

and less steadily during noise bursts than during intervening quiet periods, but more accurately. Results are interpreted in terms of the feedback available to the Ss and the strategies they adopted to cope with the distraction. (15 ref)—*Journal abstract*.

6358. Wyon, D. P. (National Swedish Inst for Building Research Environmental Lab, LTH, Lund) **The effects of moderate heat stress on typewriting performance.** *Ergonomics*, 1974(May), Vol 17(3), 309-318.—Reanalyzes data from the 1923 report of the New York State Commission on Ventilation in which the typing performance of a total of 32 male and 15 female typists was evaluated for 5-10 days at air temperatures of 20 and 24°C. By using nonparametric statistical methods that were not available at the time of original publication, it is shown that Ss performed considerably and significantly more work at 20 than at 24°C on the task. (German summary) (17 ref)

### Management & Leadership

6359. Burgoyne, John G. **An action research experiment in the evaluation of a management development course.** *Journal of Management Studies*, 1973(Feb), Vol 10(1), 8-14.—The Manchester Business School's Management Course was used as the context to explore the nested action research method. Action research is characterized by (a) the observation of the behavioral context under study and the use of the observations to influence that context (influencing procedure) and (b) the assessment of the change brought about by using this method (monitoring procedure). Since these 2 quasi-independent studies are carried out "one inside the other," the approach is designated "nested." The paradigm was used to test the hypothesis that the influencing procedure, a systematic interview of course objectives and feedback on student response to the course, would result in the monitoring of an increase in student perception of how much they had learned. The confirmation of this hypothesis suggests that the paradigm is useful in the development of educational curricula.—R. A. Levitt.

6360. Cummings, L. L.; Huber, George P. & Arendt, Eugene. (U Wisconsin, Graduate School of Business, Madison) **Effects of size and spatial arrangements on group decision making.** *Academy of Management Journal*, 1974(Sep), Vol 17(3), 460-475.—Reviews the literature on the effects of group size and space upon group decision-making performance, member satisfaction, member consensus, and leadership emergence. Administrative implications are drawn from an experiment studying the effects of the 2 variables on decision quality, decision speed, and member consensus. (31 ref)

6361. Evans, Martin G. (U Toronto, School of Business, Ontario, Canada) **A leader's ability to differentiate, the subordinate's perception of the leader, and the subordinate's performance.** *Personnel Psychology*, 1973(Fal), Vol 26(3), 385-395.—Explored the possibility that a leader behaves differently toward different subordinates. 310 public utility workers were evaluated on job performance, leadership behavior, and ideal leader behavior based on self-ratings and completion of the Leadership Behavior Description Questionnaire. 2 hypotheses were tested: (a) that supervisors with low



stereotype scores were highly discriminating in judgments about their subordinates, and (b) that a supervisor's differentiation moderates the relationship between a subordinate's perception of the leader's behavior and the subordinate's rating of his own performance. Results failed to support either hypothesis.—R. S. Albin.

6362. Fodor, Eugene M. (Clarkson Coll of Technology) **Disparagement by a subordinate as an influence on the use of power.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 652-655.—Determined whether distribution of rewards by student supervisors in an industrial simulation was influenced by a situation in which a member of the work crew repeatedly disparaged their competence. Ss were 60 male undergraduates. Disparagement did not appear to affect the supervisor's allocation of rewards to an ingratiation, but it did result in a tendency to favor a compliant worker who was not an ingratiation. Under circumstances where he found himself the object of denigration by a subordinate, the supervisor gave the compliant worker higher creativity ratings on toy models designed during the simulation than he did in the control condition of the experiment.—*Journal abstract*.

6363. Goodman, Paul S. (Carnegie-Mellon U) **An examination of referents used in the evaluation of pay.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 170-195.—Presents a conceptual framework for determining how people evaluate their pay. Data from 209 25-65 yr old managers indicate that people use multiple referents in evaluating their pay. 3 classes of referents (other, system, and self) were identified which were significantly associated with feelings about pay satisfaction. Factors affecting the selection of referents were also described. Level of professionalism and salary were related to the selection of different types of referents. Location in an organizational boundary (vs inside) role did not directly affect the selection of referents. (17 ref)—*Journal abstract*.

6364. Hammer, W. Clay & Tosi, Henry L. (Michigan State U) **Relationship of role conflict and role ambiguity to job involvement measures.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 497-499.—Obtained measures of role conflict, role ambiguity, and various job involvement variables for 61 high-level managers. Role conflict was negatively related to the amount of reported influence and positively related to the amount of perceived threat and anxiety. Role ambiguity was negatively correlated with job satisfaction and influence, and positively related to job threat and anxiety. It is suggested that organizational level be taken into account when studying the relationship of role stress factors with job involvement measures.—*Journal abstract*.

6365. Heneman, Herbert G. (U Wisconsin, Graduate School of Business, Madison) **Comparisons of self- and superior ratings of managerial performance.** *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 638-642.—Self- and superior ratings of performance on 9 dimensions were obtained from an interorganizational sample of 102 managers by a mail questionnaire. It was found that self-ratings possessed less leniency, restriction of range, and halo error than did superior ratings. The ratings only partially met the requirements of convergent and discriminant validity. (15 ref)—*Journal abstract*.

6366. Ivancevich, John M. (U Houston) **A study of a cognitive training program: Trainer styles and group development.** *Academy of Management Journal*, 1974(Sep), Vol 17(3), 428-439.—Studied 2 groups of 1st-level managers ( $n = 32$ ) involved in a cognitive-oriented training program. The structured or directive style was more effective in achieving group cohesiveness, minimizing participant conflict, increasing communication, achieving group productivity, and encouraging a favorable attitude toward the trainer than was a less structured trainer style.—*Journal abstract*.

6367. Larcebeau, Jean. [Man in the work hierarchy.] (Fren) *Orientation Scolaire et Professionnelle*, 1974(Jan-Mar), No 1, 23-42.—Describes the relationship between superior and subordinate as a material exchange of a certain amount of time during which service is rendered. The function of hierarchical chains is seen as collecting time on each level from the worker and disseminating the time of the superior (in the form of his competence and judgment) toward the bottom of the hierarchy. Protection and remuneration of the subordinate corresponds to his loyalty and respect toward the superior.

6368. Mackenzie, Kenneth D. (U Kansas) **Measuring a person's capacity for interaction in a problem solving group.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 149-169.—Describes a study in which the problem of combining the determinants of the span of control of a supervisor in a hierarchy was extended to that of deriving an expression for the maximum number of subordinates a person can have. This maximum is constrained by the norm set by the group and considers slack time, internal calculation time, and times for interaction with supervisors and colleagues as well as subordinates. The expression for maximum span of control was then modified for use with empirical data from actual groups. A discussion of some of the data problems and their solutions is presented. Among these problems are learning, varying problem complexity, and clock errors.—*Journal abstract*.

6369. Miner, John B. (Georgia State U) **Motivation to manage among women: Studies of business managers and educational administrators.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2), 197-208.—Conducted studies in a department store and in 4 school districts to determine if managerial motivation is related to management success indexes and whether female managers have less managerial motivation than males. Ss were 44 female and 26 male managers in the department store (mean ages = 47.9 and 34.8 yrs, respectively) and 25 female and 194 male educational administrators (mean age = 53.5 and 45.0 yrs, respectively). The measure of managerial motivation used was the Miner Sentence Completion Scale. Managerial motivation was significantly related to the success of female managers, but no consistent differences in the managerial motivation of male and female managers were found. Implications for the vocational guidance of females and for research in the area of managerial talent supplies are discussed.—*Journal abstract*.

6370. Miner, John B. (Georgia State U) **Motivation to manage among women: Studies of college students.** *Journal of Vocational Behavior*, 1974(Oct), Vol 5(2),

241-250.—Administered the Miner Sentence Completion Scale (MSCS) to 46 male and 97 female undergraduate education students, 99 male and 42 female graduate education students, 107 female and 944 male undergraduate business students, and 29 male and 47 female liberal arts undergraduates. Although differences in the motivation to manage were not found among Ss majoring in education, females in business administration and liberal arts had lower managerial motivation scores than the comparable male samples. Findings are discussed in terms of their relationships to sex discrimination, prospective managerial talent shortages, and the vocational guidance of female undergraduates in general.—*Journal abstract.*

6371. Rosen, Sidney; Grandison, Richard J. & Stewart, John E. (U Georgia) **Discriminatory buckpassing: Delegating transmission of bad news.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 249-263.—48 male undergraduates were assigned the role of personnel manager while a confederate served as their assistant. Their task was to test a job applicant (confederate) and, based on his (rigged) passing or failing performance, to inform him of whether he would be hired for a (bogus) position. Managers also had to decide whether to tell the good or bad news directly to the applicant or to delegate ("buck-pass") the telling to their assistant. After the 1st candidate left, a 2nd arrived unexpectedly. It was predicted that managers would initially adopt the preferred role of discriminatory buckpassing (telling good news directly, buck-passing on bad news), but would see the 2nd candidate's arrival as an opportunity to achieve equity with their assistant. There was no evidence of equitable behavior. Instead, discriminatory buck-passing occurred to a nonsignificant extent on the 1st candidate and to a significant extent on the 2nd. (27 ref)—*Journal abstract.*

6372. Schneler, Craig E. (U Colorado) **Behavior modification in management: A review and critique.** *Academy of Management Journal*, 1974(Sep), Vol 17(3), 528-548.—Reviews the management literature concerning the use of operant principles and of behavior modification techniques. Included are studies explaining organizational research testing operant principles and work done to date regarding applications of behavior modification in organizations. (117 ref)

6373. South, John C. (Duquesne U) **Achievement motivation among managers of small businesses, corporation managers, and business students.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 509-510.—A questionnaire measure of achievement motivation by H. J. Hermans that was originally tested on college students in the Netherlands was administered to 45 business college students, 41 small business managers, and 36 corporation managers. In addition, category scores were developed to reflect the more specific components of the need for achievement (n-Ach) construct. Item analyses and Kuder-Richardson 20 estimates were adequate. Intercorrelations among the category scores were significantly lower for the student sample, which suggests the n-Ach construct may be less differentiated among older managers. Managers differed significantly from business students on several components of n-Ach.—*Journal abstract.*

6374. Taylor, Ronald N. & Dunnette, Marvin D. (U British Columbia, Vancouver, Canada) **Relative contribution of decision-maker attributes to decision processes.** *Organizational Behavior & Human Performance*, 1974(Oct), Vol 12(2), 286-298.—Studied individual and joint contributions to decision processes of psychological and demographic attributes of decision-makers in 79 male industrial managers. Performance in decision-making was determined by the Personnel Decision Simulation, a simulated managerial decision problem which measures 8 decision processes. The cognitive attributes contributed heavily to the evaluative aspects of decision-making (i.e., judging information diagnosticity and integrating it into a high quality solution) particularly to predecision and decision point behavior. Motivational and personality attributes (measured by a battery of 14 tests) influenced stylistic or idiosyncratic behaviors leading to a choice (e.g., amount of information sought and processing rate) and was especially influential on post-decisional behaviors (e.g., decision confidence and decision flexibility). (20 ref)—*Journal abstract.*

6375. Taylor, Ronald N. & Dunnette, Marvin D. (U British Columbia, Vancouver, Canada) **Influence of dogmatism, risk-taking propensity, and intelligence on decision-making strategies for a sample of industrial managers.** *Journal of Applied Psychology*, 1974(Aug), Vol 59(4), 420-423.—Used the Rokeach Dogmatism Scale, Choice Dilemmas Questionnaire, and Personnel Classification Test to assess the relative influence of dogmatism, risk-taking propensity, and intelligence on strategies adopted in a decision-making exercise for 79 male industrial managers. Results support previous findings that dogmatism is associated with a decision-making strategy characterized by rapid and confidently held decisions following limited information search. High propensity for risk was associated with an information-seeking strategy involving rapid decisions made on the basis of little information, but involved deliberate information processing. Intelligence was positively correlated with efficiency in processing information, accurate choices, and cautiousness in changing decisions in the face of adverse consequences.—*Journal abstract.*

6376. Templer, Andrew J. (Standard Telephones & Cables, Boksburg, South Africa) **Self-perceived and others-perceived leadership style using the Leader Behavior Description Questionnaire.** *Personnel Psychology*, 1973(Fal), Vol 26(3), 359-367.—Studied the relationship between self-perceived and others-perceived management style, and briefly examined some of the personality correlates of leadership style. The Leader Behavior Description Questionnaire (LBDQ) and 3 other measures were administered to 60 male middle-managers from a large South African firm. Results are interpreted as casting doubt on the validity of the LBDQ as a measure of leadership style. The LBDQ did not measure independent dimensions of leader behavior, and self-rating and supervisor ratings differed. Implications for the assessment of managers are discussed and suggestions for alternative approaches to management evaluation are presented. (16 ref)—*R. S. Albin.*

6377. Tosi, Henry L. (Michigan State U) **The effect of the interaction of leader behavior and subordinate authoritarianism.** *Personnel Psychology*, 1973(Fal), Vol



26(3), 339-350.—Evaluated an aspect of leader behavior and a personality trait of a subordinate, i.e., authoritarianism, and how it relates to the attitudes and performance of the subordinate. The interaction between the level of authoritarianism and tolerance for freedom on the part of the leader were examined. Questionnaire data from 488 managers of retail finance offices in a large consumer finance firm were evaluated for authoritarianism, job satisfaction, job threat and anxiety, role ambiguity, tolerance for freedom, and productivity. It was found that leader tolerance for freedom and subordinate authoritarianism were not related to performance measures.—*R. S. Albin.*

### Organizational Structure & Climate

6378. Chattopadhyay, Gouranga P. The use of a group dynamics laboratory in process consultation: A case study set in the Bank of Calcutta: II. *Journal of Management Studies*, 1973(Feb), Vol 10(1), 15-24.

6379. Johnston, H. Russell. (Wake Forest U, Babcock Graduate School of Management) Some personality correlates of the relationships between individuals and organizations. *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 623-632.—Used data from the Thematic Apperception Test and nondirective interviews with 39 professionals employed by a consulting firm to study the link between 3 personality dimensions and the individual's perceptions of his relationship with the organization. Results show that individuals with active or high-task orientation perceive a more positive relationship with the organization generally and with specific features of the organization than do passive or low-task peers. Differences along the interpersonal dimension were not significant. Results raise questions concerning more effective matching of individuals and organizations.—*Journal abstract.*

6380. Khaliq, Nazre. (U Karachi, Pakistan) Bureaucratic orientation: A cross-cultural study. *Psychologia: An International Journal of Psychology in the Orient*, 1974(Jun), Vol 17(2), 71-74.—Compared 174 Pakistani education students of both sexes with their American and Japanese counterparts. Scores were tested for normality and homogeneity of variance, and the resulting data were tabulated. No significant sex differences appeared among the 3 cultures as to preferences for bureaucratic values. Pakistani female students were more bureaucratically oriented than their American counterparts.—*R. D. Nance.*

6381. Teiger, C.; Laville, A. & Duraffourg, J. (CNRS, Paris, France) [The nature of skilled work: A study in the electronics industry.] (Fren) *Orientation Scolaire et Professionnelle*, 1974(Jan-Mar), No 1, 7-21.—Investigated the requirements of work on an assembly line for TV sets in a French factory and their effects on the female operators. It was found that piece work is highly variable and physically demanding, entailing considerable mental activity, particularly in information processing and decision making under severe time constraints. Physiological, social, and psychological behavior syndromes seem to be related to the work situation.—*M. G. Strobel.*

### Human Factors Engineering & Safety

6382. Allen, John A.; Schroeder, Stephen R. & Ball, Patricia G. (U North Carolina, Highway Safety Research Ctr, Chapel Hill) Effects of head restriction on drivers' eye movements and errors in simulated dangerous situations. *Journal of Applied Psychology*, 1974(Oct), Vol 59(5), 643-648.—2 groups of 15 undergraduates each tracked a segment of a life insurance company driver-training film by manipulating the controls of a Drive-Trainer station. One group had their heads restricted during the session, the other did not. Restriction of the head resulted in more driving errors and fewer (a) long eye movements; (b) driving adjustments to critical events to the left of the driver's field of view; and (c) fixation errors, especially overshoots. Eye-movement frequency was positively correlated with driving adjustments and negatively related to driving errors. It is concluded that (a) driving performance is better when the eye-head compensatory system is able to move freely, (b) head restriction may bias the distribution of fixation locations, and (c) the frequency of shifting fixations may be negatively correlated with driving errors.—*Journal abstract.*

6383. Ashley, C. & Rao, B. K. An equal sensation study of differential vibration between feet and seat. *Ergonomics*, 1974(May), Vol 17(3), 331-342.—Conducted 4 experiments with a total of 20 healthy male adults in which (a) measurements of random foot and body vibration yielded contours for sinusoidal foot and body vibrations and (b) the 2 contours were compared on an equal-sensation basis. Results substantiate the equal-sensation technique and could find application in the field of vehicle ride research. (German summary)

6384. Biberman, Lucien M. (Inst for Defense Analysis, Arlington, VA) Fallacy and fact of sampled imagery displays. *Human Factors*, 1974(Jun), Vol 16(3), 286-299.—Demonstrates that factors long considered to be of primary importance to the visual performance of observers of displays of sampled imagery are dependent upon, subordinate to, or no more important than other factors largely overlooked. In TV displays, sharp raster lines interfere with the true image to form false images, and "shades of gray" and "resolution," often treated as independent variables, depend directly upon the signal-to-noise ratio in the imagery as a function of spatial frequency. Experimental and theoretical work in the area is briefly reviewed, and some implications for system design criteria are pointed out.—*Journal abstract.*

6385. Cheney, R. L. & Spencer, J. (U Wales, Inst of Science & Technology, Cardiff) Dimensional information on engineering drawings. *Ergonomics*, 1974(May), Vol 17(3), 343-363.—Examined how the lay-out of dimension values on engineering drawings affects the ability of people reading them to extract specified values accurately and rapidly. Results of 2 experiments show that the degree to which performance was subject to random influences was almost wholly dependent on the precise form of question posed about a drawing feature. Evidence indicates that a hybrid abstracted form of dimension lay-out shows promise. (German summary)

6386. Phanér, Gunilla & Hane, Monica. (U Uppsala, Sweden) Seat belts: Relations between beliefs, attitude, and use. *Journal of Applied Psychology*, 1974(Aug), Vol

59(4), 472-482.—A sample of 368 car owners answered a mailed questionnaire constructed on the basis of a model of attitudes toward seat-belt use. A factor analysis yielded a belief pattern interpreted in terms of 5 factors—Discomfort, Worry, Risk, Effect, and Inconvenience. The model appeared useful since an independent measure of attitude to seat-belt use could be predicted ( $r = .84$ ) from a linear combination of these factor scores. The correlation between the attitude measure and reported use of seat belts was .56, or about the same as that between the belief factor combination and reported use. The combination of the Discomfort and Effect factors gave near optimal predictions ( $r = .52$ ). Results were replicated on a new sample of 105 drivers. A model of seat-belt use is suggested in which conceptions about discomfort of belt usage and effects of belts in an accident are regarded as determinants of usage. (16 ref) —*Journal abstract.*

6387. Finley, Brian H.; Webster, Robert G. & Swain, Alan D. (Sandia Lab, Albuquerque, NM) **Reduction of human errors in field test programs.** *Human Factors*, 1974(Jun), Vol 16(3), 215-222.—Gathered data on errors and error-likely situations in field tests from 3 sources: test documents, interviews with test personnel (22 engineers and supervisors), and observations of a human factors specialist who participated in several field tests. Data are summarized and recommendations made on how the likelihood of such errors can be reduced by using human factors observers with duties as described in this report.—*Journal abstract.*

6388. Gould, John D. & Drongowski, Paul. (IBM Research Ctr, Yorktown Heights, NY) **An exploratory study of computer program debugging.** *Human Factors*, 1974(Jun), Vol 16(3), 258-277.—30 experienced FORTRAN programmers debugged 12 1-page FORTRAN listings, each of which was syntactically correct but contained 1 nonsyntactic error. 3 classes of bugs in each of 4 different programs were debugged. Key results show that debug times were short. The "information aids" groups did not debug faster than the control group; programmers adopted their debugging strategies based upon the information available to them. Results suggest that programmers often identify the intended state of a program before they find the bug. Debugging was at least twice as efficient the 2nd time programmers debugged a program (though with a different bug in it). A simple hierarchical description of debugging is suggested, and possible principles of debugging are identified. (30 ref)—*Journal abstract.*

6389. Gustafson, David H.; Huber, George P. & Delbecq, Andre L. (U Wisconsin, Madison) **Field testing medical decision-aiding systems.** *Human Factors*, 1974(Jun), Vol 16(3), 229-237.—Made 2 studies concerned with the valuation of computer-supplemented medical decision-aiding systems to derive and illustrate guidelines for designing, conducting, and analyzing field tests of medical systems. The guidelines presented are not exhaustive and are intended to supplement those commonly found in books dealing with research evaluation.

6390. Harrigan, John E. (California Polytechnic State U, San Luis Obispo) **Human factors information taxonomy: Fundamental human factors applications for**

**architectural programs.** *Human Factors*, 1974(Aug), Vol 16(4), 432-440.—Identification of user expectations and requirements, which is vital to the successful implementation of architectural programs, can be achieved through the application of behavioral science and human factors techniques to the professional practice of architecture. A 27-item taxonomy of informational objectives is presented which stresses analytic techniques based on direct observation of user behavior. A review by the individual designer will determine which items are important for his specific architectural program. (16 ref) —*Journal abstract.*

6391. Hirsch, Joseph. (US Naval Undersea Research & Development Ctr, Pasadena, CA) **Rate control in man-machine systems.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Describes the operation of tactile control systems and suggests that tactile signals can be used to present rate information in man-machine control systems as an alternative to quickening a visual display. Suitable systems for unmanned vehicles are outlined, and experiments on compensatory control and the effects of tactual rate signals are reported. Issues in machine tool design are also noted. (15 ref)

6392. Howarth, C. I.; Routledge, D. A. & Repetto-Wright, R. (U Nottingham, England) **An analysis of road accidents involving child pedestrians.** *Ergonomics*, 1974(May), Vol 17(3), 319-330.—Obtained measures of exposure from interviews with 168 male and 168 female 5-11 yr old children and from traffic density counts on the roads they crossed in the previous 24 hrs. Results show that the raw accident figures greatly underestimate the relative risk to children aged 5, 6, and 7 yrs, that the greater number of accidents to males of this age is not due to their greater exposure to traffic, and that by the age of 8 yrs, males are no more at risk than females. (German summary)

6393. Ince, Fuat & Williges, Robert C. (U Illinois) **Detecting slow changes in system dynamics.** *Human Factors*, 1974(Jun), Vol 16(3), 278-285.—Performed 2 experiments, each with 4 male undergraduate volunteers, to study the human operator's adaptive behavior in manual control of slowly changing system dynamics. In Exp I the dynamics changed from rate to acceleration control. In Exp II the control-stick sensitivity slowly increased or decreased from a standard level. Tracking performance on a compensatory task demonstrated that the human operator lags in adapting to the changing system dynamics, but he does adapt when given sufficient time. As the rate of change increases, the human operator needs a larger change for detection of the change and less time to detect the changing system dynamics.—*Journal abstract.*

6394. Johnson, Edgar M. & Baker, James D. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Field testing: The delicate compromise.** *Human Factors*, 1974(Jun), Vol 16(3), 203-214.—Selectively compares human factors field testing with laboratory experimentation. Although each is derived from the scientific method, it is demonstrated that there are critical differences between the 2 research settings. Field testing is not a simple extension of the laboratory into an operational setting. Techniques,



procedures, and research strategies differ; a technology is evolving to bridge the gap between the 2 research domains. (21 ref)—*Journal abstract*.

6395. Kassab, Samuel J. (Erie Community Coll, North Campus, Williamsville) **Research note: Reduction of muscular fatigue associated with repetitive light assembly operations by means of arm counterbalancing.** *Human Factors*, 1974(Jun), Vol 16(3), 323-326.—The muscular effort required to perform a light assembly task was monitored by electromyography on each of 14 female Ss first with the arms unsupported and then with the weight of the arms counterbalanced. A highly significant difference was found, indicating that muscular effort can be reduced approximately 50% by counterbalancing the weight of the arms.

6396. Luria, S. M. et al. (US Naval Submarine Base New London, Naval Submarine Medical Research Lab, Groton, CT) **Vision through various scuba facemasks.** *Human Factors*, 1974(Aug), Vol 16(4), 395-405.—Comparisons of 5 commercially available facemasks, using 150 Ss, showed significant differences among the masks for every visual process tested. Some masks were superior for one purpose and inferior for another (e.g., the mask which had lenses designed to compensate for the optical distortions found under water, improved size and distance estimates and hand-eye coordination but degraded acuity and stereoacuity). Results are not explained on the basis of differential susceptibility to fogging. (20 ref)

6397. Roscoe, Stanley N. (U Illinois) **Assessment of pilotage error in airborne area navigation procedures.** *Human Factors*, 1974(Jun), Vol 16(3), 223-228.—To establish the accuracy of use and freedom from pilot blunders associated with systems employing various configurations of displays and controls it is stressed that both simulator and flight experimentation are necessary. An automatically adaptive cockpit side task provides a saturating level of pilot workload and allows sensitive and statistically reliable measurement of a pilot's residual attention as a common metric for area navigation system assessment. (16 ref)

6398. Siegel, Arthur I.; Federman, Philip J. & Burkett, James R. (Applied Psychological Services, Wayne, PA) **Increasing and evaluating the readability of Air Force written materials.** *US AFHRL Technical Report*,

1974(Aug), No 74-28, 88 p.—Describes how to apply techniques—including the cloze and Flesch methods, SMOG grade, FORCAST, and the Automated Readability Index—that have been used in measuring the readability-comprehensibility and reading level of textual materials. Instructions are provided, in a step-by-step fashion, for determining the reading level of written material and for presenting subject matter material through methods other than prose. Procedures for simplifying written material are presented, and experimental methods for determining the effectiveness of written material are described. Multisensory presentation of US Air Force training material is examined. (35 ref)—*Journal abstract*.

6399. Snyder, Harry L. (Virginia Polytechnic Inst & State U) **Image quality and face recognition on a television display.** *Human Factors*, 1974(Jun), Vol 16(3), 300-307.—5 observers were asked to match faces presented singly on a TV display with 1 of 35 faces presented on a photographic display. The probability of correct recognition and the time required to recognize the single face were related to the quality of the TV image. Image quality was varied by changing the square-wave response of the TV system and the video signal-to-noise voltage ratio. A derived unitary metric of image quality, the square-wave modulation transfer function area, correlated highly with both measures of observer performance. The utility of this metric for systems design is discussed.—*Journal abstract*.

6400. Triggs, Thomas J.; Levison, William H. & Sanneman, Richard. (Bolt Beranek & Newman, Cambridge, MA) **Some experience with flight-related electrocutaneous and vibrotactile displays.** In *Conference on cutaneous communication systems and devices*. Austin, TX: Psychonomic Society, 1974. vi, 122 p.—Reports a series of experiments which evaluated various design parameters of quantized tactual displays for the presentation of information important in flight control. Findings from studies of tactual vs visual tracking, tactile display location, types of cutaneous stimulation, and step-input tracking are presented. Tactual displays produced significantly worse performances than standard visual displays and therefore may be more suitable for fewer wide-band inputs. (30 ref)

## BRIEF SUBJECT INDEX

Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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## KEY TO THE TEXT

The examples of different types of *Psychological Abstracts* records presented here are number coded to provide definition of their elements.

### JOURNAL ARTICLE ABSTRACT

<sup>1</sup>8327. <sup>2</sup>Howard, R. Lee.; Glendenning, Robert L. & Meyer, Donald R. <sup>3</sup>(Ohio State U) <sup>4</sup>Motivational control of retrograde amnesia: Further explorations and effects. <sup>5</sup>*Journal of Comparative & Physiological Psychology*, 1974(Feb). Vol 86(2), 187-192. <sup>6</sup>Reports 5 investigations of variables related to the motivational control of retrograde amnesia for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer<sup>7</sup>(see PA Vol 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. <sup>8</sup>(<sup>9</sup>) <sup>10</sup>(15 ref). <sup>11</sup>*Journal abstract*.

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- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author/editor only.
- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
- 5 - Primary publication title and bibliographic data.
- 6 - Text of abstract.
- 7 - Reference to a previous entry in *Psychological Abstracts*. If an abstract number is unavailable at time of publication, the issue number is given. Consult the Author Index of the PA issue noted in order to determine the record number for the article.
- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

### BOOK ANNOTATION

<sup>1</sup>8328. <sup>2</sup>Chase, William G. <sup>3</sup>(Ed). <sup>4</sup>(Carnegie-Mellon U) <sup>5</sup>Visual information processing. <sup>6</sup>New York, NY; <sup>7</sup>Academic, <sup>8</sup>1973. <sup>9</sup>xiv, <sup>10</sup>555 p. <sup>11</sup>\$17.50. <sup>12</sup>Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Designation of editor.
- 4 - Affiliation of first named author/editor only.
- 5 - Book title: If the book is in a foreign language, the original title is given followed by a translated title and the language of the book is indicated in parentheses.
- 6 - Place of publication.
- 7 - Publisher.
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

### BOOK CHAPTER CITATION

<sup>1</sup>8329. <sup>2</sup>Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. <sup>3</sup>(Stanford U) <sup>4</sup>On the meeting of semantics and perception. <sup>5</sup>In W.G. Chase (Ed), *Visual information processing*, New York, NY: Academic, 1973. xiv, 555 p. \$17.50.

- 1 - Record number.
- 2 - Author(s) of cited chapter. As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

## ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH	= adrenocorticotrophic hormone	NREM	= nonrapid eye movement
DNA	= deoxyribonucleic acid	REM	= rapid eye movement
E	= experimenter	RNA	= ribonucleic acid
EEG	= electroencephalogram or -graph	S	= subject
ESP	= extrasensory perception	TV	= television
Exp	= experiment	US	= United States
IQ	= intelligence quotient	USSR	= Union of Soviet Socialist Republics
LSD	= lysergic acid diethylamide	WAIS	= Wechsler Adult Intelligence Scale
MMPI	= Minnesota Multiphasic Personality Inventory	WISC	= Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., ALGOL, COBOL, FORTRAN, IBM 360.

Language abbreviations used after translated titles are:

Afri	= Afrikaans	Geor	= Georgian	Port	= Portuguese
Alba	= Albanian	Germ	= German	Romn	= Romanian
Arab	= Arabic	Grek	= Greek	Russ	= Russian
Bulg	= Bulgarian	Hebr	= Hebrew	Slov	= Slovene
Chin	= Chinese	Hung	= Hungarian	Slok	= Slovak
Czec	= Czech	Iran	= Iranian	Span	= Spanish
Danh	= Danish	Ital	= Italian	Sscr	= Serbo-Croatian
Duth	= Dutch	Japn	= Japanese	Swed	= Swedish
Finn	= Finnish	Lith	= Lithuanian	Turk	= Turkish
Flem	= Flemish	Norg	= Norwegian	Ukrn	= Ukrainian
Fren	= French	Polh	= Polish	Yugo	= Yugoslavian

\*Consult Webster's New Collegiate Dictionary

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# PSYCHOLOGICAL ABSTRACTS

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## GENERAL

6401. Berry, Patricia. **On reduction.** *Spring*, 1973, 67-84.—Discusses Jung's attitude to the reductive process, suggesting he intuited something much deeper about the essential nature of the process than was apparent in its practice. Jung was both critical of Freud's reductionism and assumed its need. In his later work in alchemy, Jung returned to reduction but not with its Freudian associations. It is felt that a psychological reduction, one freed of all literalism, would be a way of arriving at the irreducible—the quintessence of one's nature.—A. Farrell.

6402. Bozarth, Jerold. (U Iowa) **Reactions on evaluation.** *Journal of Applied Rehabilitation Counseling*, 1974(Fal), Vol 5(3), 143-146.—Discusses the differences between "research" and "evaluation," and presents methods for strengthening evaluation programs by clarifying questions and developing those which are designed to help rather than those which seek to determine the worth of a program.

6403. Bricke, John. (U Kansas) **Hume's associationist psychology.** *Journal of the History of the Behavioral Sciences*, 1974(Oct), Vol 10(4), 397-409.—The details of D. Hume's associationism have often been either misunderstood or neglected and many of his anticipations of later associationists have gone unnoticed. These defects are corrected and the scope and the limits of Hume's laws are delineated.

6404. Buhler, Charlotte. **The scope of humanistic psychology.** *Education*, 1974(Fal), Vol 95(1), 2-8.—Notes that in its short history since 1962, the American Association of Humanistic Psychology and its ideas and practices spread unexpectedly quickly and widely. The present article presents systematically the theories and practices which belong to its scope. Studies on the definition of mental health, human existence, and definitions of the goal of life are reviewed. The relation of these with developmental psychology and the study of life histories is shown. The simultaneous development of a novel approach to psychotherapy is discussed, as well as its recent connection with sensitivity training, group therapy, encounter groups, and growth center procedures. The Association's international development and its transpersonal division are noted. (17 ref)—*Journal abstract*.

6405. Calder, Bobby J. & Rowland, Kendrith M. (U Illinois) **A FORTRAN IV program for presenting optimally ordered paired comparison stimuli.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 506.

6406. Creelman, C. Douglas. (U Toronto, Ontario, Canada) **Software management of timing in computer-**

**controlled on-line experiments.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 488-492.

6407. de Lannoy, J.-D. (U Louvain, Belgium) [Skinner, Lorenz, Piaget: Comments on the article by M. Richelle, "Conditioning methods and behavior theory."] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 399-406.—According to Richelle (see PA, Vol 53:Issue 4), when ethologists account for behavior by saying it is innate they are putting the explanation in an unknowable past. He further claims that J. Piaget's descriptions of stages of development are not explanations. The present article seeks to refute these criticisms and concludes that B. Skinner, K. Lorenz, and Piaget provide 3 perspectives focused on different aspects of conduct; they explain at different levels. Currently we do not have a frame of reference which will unify these different perspectives.—S. S. Marzolf.

6408. Diamond, Solomon (Ed.). (California State U, Los Angeles) **The roots of psychology: A sourcebook in the history of ideas.** New York, NY: Basic Books, 1974. xvii, 781 p. \$24.95.—Contains 28 chapters that trace the development of psychological theories regarding illusions, space perception, brain localization, memory, instinct, thought, child development, dreams, emotion, motivation, personality, mental illness, and social psychology.

6409. East, Robert. (Kingston Polytechnic, Kingston-upon-Thames, England) **A methodological suggestion for the study of re-evaluation of alternatives.** *European Journal of Social Psychology*, 1973, Vol 3(3), 329-332.—Reviews criticisms of cognitive dissonance research in the area of rating preference and re-evaluation in which Ss have been discarded because of unpredictable performance. A methodology and mathematical formula for using the discarded Ss is proposed and successfully applied.

6410. Fedida, P. (U Paris VII, France) **A metapsychology of the soma: Seminar in the curriculum of the U.E.R. Clinical Behavioral Sciences.** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 647-655.—Describes a seminar which re-evaluated the meanings of the soma in the light of teachings from psychoanalysis and from modern biology.

6411. Franck, Robert. (U Louvain, Belgium) [Note on Marc Richelle and on Burrhus Frederic Skinner.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 407-410.—The 3 aspects of operant conditioning discussed by Richelle (see PA, Vol 53:Issue 4)—experimental, theoretical, and applied—are considered to be unrelated. It is suggested that the Skinnerian theory of behavior is not grounded on laboratory experiments; the experimental mechanisms of operant conditioning have no theoretical foundation; and the



applications are not justified either by theory or by laboratory successes.—S. S. Marzolf.

6412. H. D. **Tribute to Freud: Writing on the wall: Advent.** Boston, MA: David R. Godine, 1974. xiv, 194 p.—Presents an account of the poet Hilda Doolittle's (HD) sessions with Freud in 1933. A biography of HD and 6 letters from Freud to her are included.

6413. Hayes, John & Pulliam, Robert. (URS/Matrix Co, Falls Church, VA) **Development and evaluation of video systems for performance testing and student monitoring.** *US AFHRL Technical Report*, 1974(Jul), No 74-67, 210 p.—Experimentally evaluated a video performance monitoring system in 3 technical training settings: jet aircraft mechanic, power lineman, and instructor training. Using input from 1 to 8 video cameras, the system provided a flexible combination of signal processing, direct monitor, recording, and replay options. The design was based on hypothesized benefits or manpower savings in technical training, achieved by the monitoring of trainee performance and the standardization of measurement criteria using recorded performance samples. Research findings and recommendations are reported, and instructions for further use of the system are developed.—*Journal abstract.*

6414. Hillman, James. "Anima." *Spring*, 1973, 97-132.—Examines the concept of anima, noting that since Jung's original work on the anima notion no further contributions have been made. However, it is felt that precision in regard to anima is now particularly relevant. Anima and sexuality, eros, feeling, the feminine, and the psyche are discussed. Consciousness based on anima is considered to be inseparable from life, nature, the feminine, fate, and death. It is suggested that a more adequate description of consciousness and its activities would stem from the use of metaphors familiar to the alchemy of analytical practice (e.g., fantasy, image, reflection, and insight). The article is concluded in a subsequent issue.—A. Farrell.

6415. Holt, David. **Jung and Marx.** *Spring*, 1973, 52-66.—Discusses Jung's view of a coincidence between depth psychology and alchemy and attempts to show why the theories of Jung and of Marx should be considered together. Marx's view of a self-betrayal common to both man and nature is set forth; it is this central theme which is compared with Jung's psychology of alchemy. A vision of the world divided against itself is contrasted with a vision of creation divided against itself. It is held that Jung's psychology of alchemy must be understood as a materialism "baptized in the holy," i.e., matter as having life.—A. Farrell.

6416. Jung, C. G. **Religion and psychology: A reply to Martin Buber.** *Spring*, 1973, 196-203.—Disputes Buber's labeling of the author as a Gnostic. A primary interest in empirical research is expressed, with the question of religious label considered to be irrelevant. Dogma is contrasted with scientific study.

6417. Jung, C. G. **Three early papers.** *Spring*, 1973, 171-187.—Presents Jung's views on certain important psychological questions in 3 recently translated early papers. The 1st paper discusses Freud's ideas on dreams. The 2nd comments on a book dealing with sex and urging liberation in the widest sense. Finally, comments are presented on certain controversial features of a case

of catatonic attacks accompanied by fantasies.—A. Farrell.

6418. Kallen, Horace M. (New School for Social Research) **Creativity, imagination, logic: Meditations for the eleventh hour.** New York, NY: Gordon & Breach, 1973. x, 212 p. \$14.50.—Presents a philosophical analysis and discussion of the relationship between past, present, and future and the renewal of this relationship in terms of modern science and conceptions of creativity. The role of creativity in existence and survival value systems is also examined.

6419. Kimble, Gregory A.; Garnezy, Norman & Zigler, Edward. (U Colorado) **Principles of general psychology.** (4th ed.) New York, NY: Ronald Press, 1974. xii, 724 p. \$11.75.—This is the 4th edition of an introductory psychology textbook for undergraduates, which includes new material on recent developments in the field (e.g., biofeedback, behavioral genetics obesity, and behavior therapy).

6420. Kvale, Steinar. (U Oslo, Inst of Psychology, Norway) **The technological paradigm of psychological research.** *Journal of Phenomenological Psychology*, 1973(Spring), Vol 3(2), 143-159.—Examines the basis for the prevalence of the positivist assumption that the natural science conceptions and methods developed for the study of inanimate nature and of animals are adequate to the psychological study of man. It is held that the positivism of psychologists, being incapable of withstanding critical analysis, can only be promulgated to disguise their adoption of a technological-capitalist paradigm based on assembly-line working conditions and on the money system. Psychologists of this persuasion are conceived as promoting the interest of technological-capitalist society in the prediction and control of behavior. Structural analogies between the psychological laboratory and the assembly line, the positivist socialization of students, and the practical ineffectiveness of positivist methods are discussed. Phenomenology, which rejects the positivist assumption, is presented as the method appropriate to the psychological study of the actual experience and behavior of man in the world, despite the fact that it has yet to explore issues such as the contradictions of ideology and power. (28 ref)—B. Lindsey.

6421. Legrand, Michel. (Ctr de Psychologie Différentielle et Clinique, Louvain, Belgium) **[Skinner and psychoanalysis: Attempt at a confrontation.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 411-421.—Proposes that a discussion of B. Skinner in relation to psychoanalysis (see PA, Vol 53:Issue 4) must be on a philosophical level since the 2 domains do not have a common scientific frame of reference. In terms of modern antipositivist epistemology the traditional objections that the analyst arbitrarily selects facts and is dogmatic in theory must be renounced. Skinner also selects only those data as facts which are relevant to his hypotheses. Both Skinnerians and analysts must be evaluated in terms of the extent to which the promised applications of their theories are fulfilled. Skinner eschews mentalism since it is nonphysiological. Since he also refers to mentalistic concepts as internal, this would seem to make them physiological. Science may be ethically neutral but both Skinner and

the analysts must consider the ethical question of what behavior is desirable.—S. S. Marzolf.

6422. Levy, Charles E. (Duquesne U) **Toward primordial reality as the ground of psychological phenomena.** *Journal of Phenomenological Psychology*, 1973(Spring), Vol 3(2), 173-186.—Articulates M. Merleau-Ponty's notion of primordial reality as a viewpoint which reconciles the partial truths of realism and idealism by eliminating their radical separation of subject and object. In realism the individual is seen merely as a certain type of object produced by the world. It is opposed by idealism, which sees the world merely as an appearance produced by the mind of the individual as subject. From the viewpoint of primordial reality there is a mutual interpenetration of the individual and the world in an overall, creatively unfolding structure. Primordial reality entails an ambiguity in the relation of the individual and world which blurs their clarity and distinctiveness. The presence of both realism and idealism in a current research psychology article and the conclusions to which they necessarily lead are examined. The authors of the article are regarded as having created an artificial laboratory phenomenon having no general implications, and an attempt is made to recapture the true phenomenon from the perspective of primordial reality.—B. Lindsey.

6423. Lyons, John O. (U Wisconsin) **The invention of the self.** *Hacettepe Bulletin of Social Sciences & Humanities*, 1973(June), Vol 5(1), 57-78.—Describes the discovery, or the invention, of the concept of the individual self, about the middle of the 18th century. Its origins in philosophy, religion, politics, and the arts are discussed, its manifestations in many forms of literature, and its influence on every form of human activity. (38 ref)—R. J. Anderson.

6424. Miklich, Donald R.; Purcell, Kenneth & Weiss, Jonathan H. (National Asthma Ctr, Denver, CO) **Practical aspects of the use of radio telemetry in the behavioral sciences.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 461-466.—Presents a practical guide for the technologically unsophisticated behavioral researcher who wishes to use voice radio telemetry (RTel). Points discussed include how to determine suitability of RTel for a project, selection of consultants, suitable locales for RTel, costs, ethical-legal issues, and operating procedures.—Journal abstract.

6425. Nealis, Perry M. (U Wisconsin, Madison) **Has neurophysiology resurrected the Platonic soul?** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 611-619.—Previous authors have argued that the objective of psychological experimentation should be one of furthering the understanding of the processes by which human knowledge is acquired. However, there are those who argue that many hypothetical constructs employed by contemporary psychologists, in contrast to their assessments, reflect an epistemology embraced by Plato centuries past. The present author takes a different position, maintaining that modern psychological research is more characteristic of the Aristotelian position in contrast to Platonic doctrine. The viability of these traditional epistemologies is discussed in view of research in the areas of perception and neurophysiology. It is suggested that the Aristotelian approach to the resolution of the paradox of knowing about knowing is both

philosophically substantive and, unlike the Platonist position, operationally feasible.—Journal abstract.

6426. Pastore, Nicholas. (Queens Coll, City U New York) **Reevaluation of Boring on Kantian influence, nineteenth century nativism, Gestalt psychology and Helmholtz.** *Journal of the History of the Behavioral Sciences*, 1974(Oct), Vol 10(4), 375-390.—E. G. Boring, in *A History of Experimental Psychology* (1957), traces a direct line of descent from I. Kant to the 19th century nativists G. Müller, E. Hering, and C. Stumpf and thence to M. Wertheimer and W. Köhler. This sequence is re-evaluated, the relation of nativism to gestalt psychology is considered, and H. Helmholtz's Kantist tendencies of 1855 are discussed.

6427. Richelle, Marc. (U Liège, Belgium) [Remarks on the articles by J.-D. de Lannoy, R. Franck, and M. Legrand.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 423-426.—The 3 articles (see PA, Vol 53:Issue 4) represent 3 approaches and 3 categories of objection. Both Franck and Legrand object, but in opposite directions, to Richelle's relating conditioning methodology to theory and application. Arguing against 1 objection seems to support the other; both are right and both wrong. De Lannoy's views on phylogenesis are correct, and they do not conflict with those of Richelle. Operant conditioning is not incompatible with J. Piaget's laws of development. A response incompatible with Franck's affective reaction would only do violence to Franck. The epistemological questions raised by Legrand merit further examination; they relate to psychoanalysis as well as to conditioning and to all scientific theorizing.—S. S. Marzolf.

6428. Richelle, Marc. (U Liège, Belgium) [Conditioning methods and behavior theory.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 379-398.—Operant conditioning, demonstrated by the Skinner box, is a refinement of E. Thorndike's earlier work, and serves as a useful laboratory method, as a point of departure toward a theory of behavior, and as a procedure having wide applications in education and psychotherapy. The criticisms by ethologists (K. Lorenz), psycholinguistics (N. Chomsky), and those who investigate the ontogenesis of intellect (J. Piaget) are examined and answered. Operant conditioning is not reductionist and does not deny consciousness or mental events. The latter are not used as explanatory concepts; they are simply a kind of behavior. Most psychotherapies can simply remove negative controls and permit the appearance of desired behavior. Diagnosis of malfunction tends to place the fault in the individual rather than in the social or educational environment. The psychologist must take responsibility for bringing scientific methodology to bear upon social problems.—S. S. Marzolf.

6429. Ritsema, Rudolf. **The pit and the brilliance: A study of the 29th and 30th hexagrams in the I Ching.** *Spring*, 1973, 142-170.—Attempts to evoke the image-concepts of the Chinese terms in 2 interrelated hexagrams. In translating from the Chinese work, each English word is given the task of representing 1 particular Chinese character, allowing the reader to discover exactly where the same Chinese ideogram occurs. Hexagram 29, K'AN (the pit), is seen as related to a critical time in life. Its attribute, both as trigram and



hexagram, is falling. Glaring light is viewed as the prime feature of hexagram 30, LI (the brilliance). It reportedly refers to both cosmic and human spirit, to consciousness that, through brightness, brings about clear distinctions. —A. Farrell.

6430. Simmerman, Scott J. & Newlin, Robert J. (U North Carolina, Chapel Hill) **A simple interface to operate electromechanical equipment with digital logic.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 514.

6431. Smith, Gary R. & Wasson, Samuel L. (Lafayette Clinic, Detroit, MI) **Modular solid state behavioral training system.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 481-487.—Describes a system of modules to perform most behavioral training schedules which takes advantage of integrated circuit size, speed, reliability, economy, and sophistication to overcome the problems inherent in relay systems. The usual complexity of changing from one program to another is reduced to the simplicity of turning a switch.

6432. Sokal, Robert R. (State U New York, Stony Brook) **Classification: Purposes, principles, progress, prospects.** *Science*, 1974(Sep), Vol 185(4157), 1115-1123.—Analyzes the principles and procedures of scientific classification. The influence of electronic computers is traced. It is noted that the specification of data for classification by computer will enhance objectivity but not eliminate cultural and subjective biases. Techniques of cluster analysis and ordination also are discussed, and progress in classification is reviewed.

6433. Tversky, Amos & Kahneman, Daniel. (Hebrew U, Jerusalem, Israel) **Judgment under uncertainty: Heuristics and biases.** *Science*, 1974(Sep), Vol 185(4157), 1124-1131.—Describes 3 heuristics employed to assess probabilities and to predict values: (a) representativeness, (b) availability of instances, and (c) adjustment from an anchor. Biases to which these heuristics lead are enumerated, and the implied and theoretical implications are discussed. It is concluded that a better understanding of these heuristics and their resulting biases could improve judgments and decisions in situations of uncertainty.—R. Hall.

6434. Vitulli, Nicholas & Reynolds, James H. (Colgate U) **Use of an algebraic language in laboratory control programming with small (4K) computers.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 493-496.—Describes an implementation of the FNEW program sequence that permits execution of multiple user-written machine language subprograms within a FOCAL program. Use of this capability in the context of process-control problems in the behavioral laboratory is discussed and illustrated.

6435. Weinberg, Charles B. (Stanford U, Graduate School of Business) **The change agent game (A computerized game in BASIC for use on time sharing terminals).** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 505.

6436. Wicks, Jerry W. (Bowling Green State U) **PYRAMID: A program designed to construct population pyramids on a computer terminal.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 504.

6437. Wicks, Jerry W. (Bowling Green State U) **BALANCE: A FORTRAN IV program for computing the**

demographic "balancing equation" on a computer terminal. *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 504.

6438. Wilden, Anthony. (U California, San Diego) [Freud, Signorelli, and Lacan: Repression of the signifier.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 427-465.—Continues the analysis of the forgetting of the proper name "Signorelli," a fragment of Freud's autoanalysis, by referring to the autobiographical passages of Freud's work and to the theories and formulations of J. Lacan about the unconscious. Analysis of the "Signorelli" forgetfulness has a theoretical and personal importance: it enables us to discover all the unconscious extensions through the subjective discourse and associations, and to work out a theory of the unconscious and repression on a linguistic and structural basis. (Flemish & English summaries) (32 ref)—*Journal summary*.

6439. Wolf, Ernest S. & Trosman, Harry. **Freud and Popper-Lynkeus.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 123-141.—Examines Freud's relationship with J. Popper-Lynkeus, whom he held in high esteem but never met, in the light of the link between narcissistic transformation and psychological creativity. The nature of the Freud-Popper relationship suggests that narcissistic trends toward idealization and the formation of an alter ego may have wider applicability in the investigation of creative individuals. In Freud's case there are indications of an intense need to idealize and to establish a relationship with a man whom he saw as a double. The double counteracts the sense of isolation and estrangement which accompanies revolutionary discoveries. On the other hand, the presence of the double threatens the creative individual with sudden regressive pulls toward fragmentation and loss of the cohesive self. (32 ref)—*Journal summary*.

6440. Woolger, Roger. **Against imagination: The via negativa of Simone Weil.** *Spring*, 1973, 256-272.—Sketches certain ways in which the Weil doctrine is believed to repudiate the cultivation of imagination, felt to be a cornerstone of Jungian practice. It is suggested that this doctrine can be found in all religions where mysticism has flourished.

6441. Yáñez Cortés, Roberto. (U Buenos Aires, Argentina) [Phenomenological reduction on the formation of eidetic psychology.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 173-179.—Discusses the formation of an eidetic psychology as a science of pure experience of conscience by the phenomenological reduction of 2 stages: the eidetic-logical and the neutral-eidetic-ontological stage.

6442. Zoja, Luigi. **Observations in transit between Zurich and Milan.** *Spring*, 1973, 274-281.—Considers whether the passage of years might bring to Jung's views a progressive loss of actuality. Topics include the thief as an archetypal role and as a moralistic label, Puer and the related mother complex, and Mediterraneanity as a polarity. Views of Swiss, Germans, and Italians are examined and contrasted. It is held that each person is in a unique relationship with his origins, country, duties, and destiny. This relationship, viewed as having a fundamentally archetypal character, raises certain problems.—A. Farrell.

## PSYCHOMETRICS AND STATISTICS

6443. American Psychological Association. (Washington, DC) **Standards for educational & psychological tests**. Washington, DC: American Psychological Association, 1974. 76 p.—Presents a revision of the 1966 *Standards for Educational and Psychological Tests and Manuals*. Topics include the appropriateness of certain tests for certain populations, guidelines in the administration and interpretation of tests and other assessment techniques, standards for reporting the reliability and validity of tests, and standards for the use of tests in various settings (e.g., clinical or occupational evaluations).

6444. Corman, L. [Identification responses on projective tests: Their significance.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14). 737-746.—Discusses the functions of certain categories of "identification" responses in testing situations, with special reference to selected projective tests.

6445. Hubert, B. (U Reims, France) [Studies of the formation of attitudes toward education and of measured changes in such attitudes, using the MTAI.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14). 755-764.—Reviews US research on the use of the Minnesota Teacher Attitude Inventory (MTAI). Findings are presented in the form of sets of hypotheses. (91 ref)

6446. Lapi, A.; Cattania, F. & Forti, A. [Clarifications on the Kohs Modified Cubes Test.] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1460-1480.—Describes each cube in series A through F with notes on relative difficulty. Suggestions are made on administration and evaluation of performance with regard to underendowed, phrenasthetic, and normally endowed Ss. (French, English, & German summaries)

6447. Marshall, Jon C. & George, Rickey L. (U Missouri, St Louis) **The interrelations of CPQ scales**. *Journal of Instructional Psychology*, 1974(Spring), Vol 1(2), 46-51.—Intercorrelations were determined for the scales of the Children's Personality Questionnaire (CPQ) using a sample of 113 4th-grade children. Of the 14 CPQ scales, the intelligence scale was the only one which did not significantly relate with any of the other scales. The remaining scales were able to be grouped into 3 constellations, identified as Sociability-Associability, Autonomy-Heteronomy, and Social Extroversion-Social Introversion.—*Journal abstract*.

6448. Terborg, James R. & Peters, Lawrence H. (Purdue U) **Some observations on wording of item-stems for attitude questionnaires**. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 463-466.—Conducted a study with 50 undergraduates to examine whether mean differences in endorsement rate to reversed item-stems of the same attitude statement can occur independent of acquiescence, and whether these observed differences have any effect when summed in relation to an outside criterion. Using 2 within-group designs, a significant number of mean differences between item-stems were found. Analyses showed that these observed differences were not due to the effects of acquiescence. However, for both groups, total scores based on items where mean

differences in endorsement were observed correlated significantly with total scores based on items where no mean differences in endorsement were observed. Also, minor variations in mean rate of endorsement due to the direction of the item-stem wording had little effect on the correlations between the summated attitude scores and the outside criterion.—*Journal abstract*.

## Test Construction &amp; Validation

6449. Bartussek, Dieter. (U Hamburg, Psychologisches Inst, W Germany) [Note on the reliability and factorial validity of the German 16 PF.] (Germ) *Diagnostica*, 1974, Vol 20(2), 49-55.—Reports item and scale statistics of the German edition of the 16 Personality Factor Questionnaire (16 PF) obtained from a sample of 283 soldiers. The item stabilities, item-scale biserial correlations, and scale reliabilities obtained were low, and a factor analysis of the 6 or 7 most stable items per scale failed to replicate the original factor structure. However, a survey of 9 factor analyses of German translations of the 16 PF scales led to the conclusion that 3 of the 2nd-order factors are replicable.—*M. Morf*.

6450. Bhushan, V. (U Laval, Quebec, Canada) [Validation of l'Inventaire Minnesota des Opinions de l'Enseignant.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 747-754.—Examined the validity of the French edition of the Minnesota Teacher Attitude Inventory administered to 509 elementary school teachers in Quebec. Results indicate that the French version did not measure the same factors as the English version; test content did not apply to the French-Canadian culture. (18 ref)

6451. Campo, V. & Vilar, N. [Clinical utility of the animal test.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 355-357.—Presents preliminary work on the development of a test where the S's task is to draw any animal that he wishes.

6452. Christensen, Kathleen C.; Gelso, Charles J.; Williams, Rebecca O. & Sedlacek, William E. (U Maryland) **Variations in the administration of the Self-Directed Search, scoring accuracy, and satisfaction with results**. *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 12-16.—Examined the effects of the test administrator's attitudes toward Holland's Self-Directed Search, the size of the group taking the instrument, and whether monitors were used during the administration on both self-scoring accuracy and satisfaction with results on the Self-Directed Search. Over 25% of the 184 college freshmen who took the instrument during orientation made scoring errors resulting in incorrect high-point codes, and over 50% obtained incorrect summary codes. Of the 3 independent variables, only monitoring reduced self-scoring errors, and none affected satisfaction. Questions are raised about whether, even with monitoring, error rates are too high and satisfaction too low to warrant the use of the instrument as a self-counseling device.—*Journal abstract*.

6453. Elliott, Colin. (U Manchester, England) **The British Intelligence Scale project: Phase II**. *AEP (Association of Educational Psychologists) Journal*, 1974(Spring), Vol 3(6), 9-13.—Describes the present status of the British Intelligence Scale. Most of the major issues have yet to be resolved: the final form of the scale is



undecided, the reliability and validity of the scale are unknown, and even its title may ultimately be altered. However, it is noted that if the scale succeeds even partially in its major aim of being a test of special abilities, it will represent a marked advance on any previously published test and will enable psychologists to define the cognitive strengths and weaknesses of children with greater precision, confidence, and scientific rigor than is currently possible. (16 ref)—*Journal summary*.

6454. Fischer, Manfred & Wiedl, Karl H. (U Trier-Kaiserslautern, I Div of Psychology, W Germany) [Variation-motivation.] (Germ) *Psychologische Beiträge*, 1973, Vol 15(4), 478-521.—Discusses variation motivation—the need for novelty and stimulus variation—as a general and differential psychological construct. The development of psychometric concepts and methods aiming to measure the need for variable stimuli input also are examined. The development of stimulus-variation-seeking scales and subscales and the use of tests and questionnaires is described. An appendix suggests a 132-item variation-motivation questionnaire in the German language. (English & French summaries) (6 p ref)—T. Fisher.

6455. Froese, Arthur; Vasquez, Ernesto; Cassem, Ned H. & Hackett, Thomas P. (Massachusetts General Hosp, Boston) Validation of anxiety depression and denial scales in a coronary care unit. *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 137-141.—Attempted to validate the Holland-Sgroi Anxiety-Depression Scale (designed to measure mental status, anxiety, and depression in medical patients) and the Hackett-Cassem Denial Scale (designed to quantitate behavior reflecting denial in critically ill medical patients). 51 male and 14 female inpatients randomly selected from a coronary care unit were interviewed to find out the medical history of their illness and their responses to it. Following the interviews the investigators independently rated the patients on the 2 scales and classified them in 3 categories of anxiety: none to mild, moderate, and marked. One-way analysis of variance showed the relationship between the rating scale scores and the clinical judgments to be highly significant ( $p < .001$ ). W. G. Shipman.

6456. Goodman, John T.; Streiner, David L. & Woodward, Christel A. (McMaster U, Hamilton, Ontario, Canada) Test-retest reliability of the Shipley-Institute of Living Scale: Practice effects or random variation. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 351-354.—104 1st-yr female nursing students were group administered the Shipley-Institute of Living Scale for Measuring Intellectual Impairment. Retesting was conducted on subsamples at 2-wk, 1-mo, 2-mo, 3-mo, and 4-mo intervals with subsample sizes of 17-19 Ss. Although the actual differences were relatively small, consistent and significant increases were found for Abstractions raw score, Conceptual Quotient, and WAIS-equivalent IQ. No significant differences were found for Vocabulary raw score. Results are discussed within the context of test-retest reliability, magnitude of the actual differences, and the problem of practice effects. (15 ref)—*Journal abstract*.

6457. Hiesel, Erich & Lück, Helmut E. (U Köln, Inst für Sozialpsychologie, W Germany) [Construction of a short scale to measure scientific interest.] (Germ)

*Diagnostica*, 1974, Vol 20(2), 76-83.—Reports construction and validation of a 7-item scale to measure scientific interest (the WIS). On a sample of 793 females biserial correlations greater than .45, endorsement proportions between 28 and 64%, and a reliability of .81 were obtained. These values were generally replicated on school and university students and teachers. Correlations between the WIS and 12 personality and attitude measures were nonsignificant, with the exception of extraversion and attitude to psychological experimentation.—M. Morf.

6458. Kilpatrick, Dean G. & Smith, Alma D. (Medical U South Carolina) Validation of the Spence-Helmreich Attitudes Towards Women Scale. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 461-462.—To evaluate the validity of the Spence and Helmreich Attitudes Towards Women Scale, 13 women members of the National Organization of Women (NOW) were administered the scale, which purports to measure attitudes towards the rights and roles of women in contemporary society. In comparison with normative data for female college students and mothers of college students reported by J. T. Spence and R. Helmreich (1972), the attitudes of the NOW members were significantly more feminist, suggesting that the scale is a valid measure of such attitudes.—*Journal abstract*.

6459. Larkin, Kevin C. & Weiss, David J. (U Minnesota) An empirical investigation of computer-administered pyramidal ability testing. Minneapolis, MN: University of Minnesota, Dept of Psychology, 1974. 59 p.—Administered 3 pyramidal adaptive tests and a conventional peaked test to undergraduates, using a time-shared computer. Results of 6 different pyramidal scoring systems are presented, as well as the degree of relationship among scoring methods and between scoring methods and the conventional test. Findings generally favor pyramidal testing, although further study of its psychometric characteristics is necessary. (30 ref)

6460. Linden, Kathryn W.; Linden, James D. & Bodine, Robert L. (Purdue U) Test bias: Fuss n' facts. *Measurement & Evaluation in Guidance*, 1974(Oct), Vol 7(3), 163-168.—Discusses racial and sex bias in existing measurement tools as a function of both interpretation and usage and test structure. It is suggested that tests be selected with regard to the relevance and adequacy of their norms and the reliability and validity of their scores for given populations.

6461. Löhr, Gerhard & Walter, Adelheid. [A scale to measure subjective satisfaction with life in old age.] (Germ) *Diagnostica*, 1974, Vol 20(2), 83-91.—Reports construction of a scale to measure subjective satisfaction with life in Ss older than 59 yrs. The content of the items covers positive self-evaluation, optimistic attitude to S's old age, and satisfaction with current daily activities. Endorsement proportions, point biserial correlations between items, and scale score are reported for an original item pool of 42 items from which the 20 items of the final scale were derived. The point biserial correlations of the final items ranged from .33 to .65.—M. Morf.

6462. Marschner, Günter. (Erschweiler Bergwerks-Verein, Alsdorf b. Aachen, W Germany) [The standardization and validation of the Büro-Test (BT): New norms for crafts and technical vocations, and further validity

data.] (Germ) *Diagnostica*, 1974, Vol 20(2), 55-62.—Reports new norms and validation data for G. Marschner's Büro-Test (1967), a designed to measure clerical skills and ability to manage office work. The sample consisted of 707 Ss in 6 groups ranging from semi-skilled workers to middle-level executives. The mean scores of the groups increased with the level of responsibility assigned to them, and significant differences in BT scores in the expected direction were obtained between Ss rated by supervisors as suitable or not suitable for further training and Ss whose qualifications were rated high or low.—*M. Morf*.

6463. Martuza, Victor R. & Kallstrom, Dale W. (U Delaware) **Validity of the State-Trait Anxiety Inventory in an academic setting.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 363-366.—Used the multitrait-multimethod procedure to assess the validity of the C. D. Spielberger et al (1970) dual conceptualization of anxiety and the interpretation of his scales based on that conceptualization. Ss were 58 education graduate students. Results support the state-trait conceptualization of anxiety and provide evidence of the validity of the State-Trait Anxiety Inventory scales within a graduate-level, educational environment.—*Journal abstract*.

6464. McBride, James R. & Weiss, David J. (U Minnesota) **A word knowledge item pool for adaptive ability measurement.** Minneapolis, MN: University of Minnesota, Dept of Psychology, 1974. 81 p.—Administered a series of 4 vocabulary naming tests to undergraduates to develop a large, homogeneous pool of vocabulary test items for a computer-administered adaptive testing research program. Data on reliability, dimensionality, test order effects, factor structures, and generalizability of the final item pools are presented, along with an outline for the design of future norming studies in adaptive testing. (26 ref)

6465. Overall, John E.; Johnson, James H. & Lanyon, Richard I. (U Texas, Medical Branch, Galveston) **Factor structure and scoring of the PSI: An application of marker variable analysis.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 407-422.—Investigated the factor structure of the Psychological Screening Inventory (PSI) using a newly developed method of factor analysis to define an oblique simple structure. Item responses of 400 male and 400 female Ss in the original PSI normative samples were analyzed. The 2-fold objectives included interest in the factor structure of the PSI and interest in evaluating the utility of the marker variable method of factor analysis. 5 factors were defined to yield a good oblique simple structure. The analysis was repeated using different sets of marker variables to verify that the same solution would result.—*Journal abstract*.

6466. Pertejo, Jesusa. **[Relative worth of items on tests of graphic expression.]** (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 329-334.—Presents methods of analyzing graphic items, relating them to ego functions.

6467. Rosenzweig, S.; Ludwig, D. J. & Adelman, S. **[Test-retest reliability of the Rosenzweig Picture Frustration Test and of analogous semiprojective tests.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(3), 181-196.—Reports significant test-retest consistency for the main scoring categories of the Rosenzweig Picture

Frustration Test. Analysis of variance and split-half methods, which assume item homogeneity and internal consistency, are contra-indicated for this and other projective tests.

6468. Ryman, David H.; Biersner, Robert J. & La Rocco, James M. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Reliabilities and validities of the mood questionnaire.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 479-484.—Scales were constructed for a 40-item mood questionnaire which was then administered to 1,140 Navy recruits. The questionnaire was shown to be similar to others in content and reliabilities. Construct, concurrent, and predictive validities of the scales with several criteria in a number of testing situations are also presented. Findings emphasize the usefulness of this questionnaire as a criterion measure or as a predictor of objective behavioral criteria under field-testing conditions.—*Journal abstract*.

6469. Schümer-Kohrs, Anke & Schümer, Rudolf. (U Mannheim, Fakultät für Sozialwissenschaften, W Germany) **[Data on the Wort-Bild-Test (WBT).]** (Germ) *Diagnostica*, 1974, Vol 20(2), 63-76.—Reports scale statistics of the Wort-Bild-Test (H. Anger et al, 1971), a nonverbal intelligence test, applied to a random sample of 660 Ss. The range of obtained scores equaled the possible range of scores from 0 to 45; the mean score was 29.5 and the standard deviation 9.6. Split-third reliabilities, not corrected for attenuation, were .84, .83, and .83; the retest reliability, over a 3-mo period, was .76. Demographic variables accounted for 36% of the variance.—*M. Morf*.

6470. Schwebcke, Axel; Lück, Helmut E. & Jandron, Earl. (Rhineland Pedagogical Coll, Div of Health Education, Cologne, W Germany) **[Problems and experience with the adaptation of tests constructed in a foreign language.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 434-470.—Discusses the problems of intercultural research, particularly difficulty of adapting foreign-language tests in such a way as to gain psychologically valid and equivalent measures. The Personal Orientation Inventory (POI) of Shostrom is described in detail and recommended. It has been translated into German and retranslated, and the original and the translated versions were tested with 3 groups of students. Results show a highly satisfactory correspondence between the original and the translation. (5 p ref) (English & French summaries)—*T. Fisher*.

6471. Semin, G. R. & Rogers, R. S. (U Sussex, Brighton, England) **The generation of descriptive-evaluative responses in scale answering behaviour: A model.** *European Journal of Social Psychology*, 1973, Vol 3(3), 311-328.—Developed a model of S behavior in scale-answering situations allowing S to describe how much of some attribute an object possesses which he may internally represent. It also allows S to give an honest expression to his internal representation. 2 basic parameters (representation and description) characterized the process by which S gave a descriptive-evaluative response to E. The parameters of the model were demonstrated by 2 studies using a psychometric person-ality scale. In Study 1, object substitution was shown by contrasting self-referent and other-referent responses



using a personating technique. In Study 2, response modification was found to operate despite a scale format specially designed to eliminate such biases. 2 major implications of the model are discussed: (a) The nature of the descriptive-evaluative responses rendered the construction of nonfakable descriptive scales impossible. (b) Many experiments using descriptive scales are dubious tests of their stated hypotheses since there are no controls of descriptive and representative parameters. (33 ref)—*M. K. Phifer.*

6472. Smith, Gudmund J. & Nyman, G. Eberhard. (U Lund, Psykologiska Inst, Sweden) **The validity of the serial color-word test: A reply to Lennart Sjöberg.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 238-240. Replies to L. Sjöberg's (see Pa. Vol 52:8951) conclusion that the reliabilities and validities of the serial Color-Word Test are at best moderate. The present paper claims that, given reliable and adequate criteria, the validities are high. Hence, the true reliabilities can hardly be low. Supporting data are presented. However, the test should not be used merely to identify psychiatric syndrome groups, but rather to broaden knowledge about them by unveiling their adaptive strategies.—*Journal abstract.*

6473. Westbrook, Bert W. (North Carolina State U, Raleigh) **Content analysis of six career development tests.** *Measurement & Evaluation in Guidance*, 1974(Oct), Vol 7(3), 172-180.—Identified a total of 117 behaviors for the 609 items found on 6 career development tests. The behaviors were arranged in an outline of career development behaviors. The 6 tests were compared in terms of their coverage of the major career development components and in terms of the specific learner behaviors included in the outline. It is suggested that this procedure demonstrated that a specific test provided an appraisal of only certain behaviors.—*Journal abstract.*

6474. Zimmerman, Irla L. & Woo-Sam, James. **A note on the current validity of the renormed (1972) Stanford Binet LM.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spring), Vol 3(6), 34-35.—Compared 2 samples of school children given the Wechsler Preschool and Primary Scale of Intelligence and the Stanford-Binet Intelligence Scale, using both the 1960 and 1972 norm tables. The new norms uniformly reduced Binet scores, resulting in closer correspondence with the Wechsler. A side effect of the new Binet norms was a marked reduction in children identified as "gifted."

### Mathematical Models & Statistics

6475. Bolsmier, James D. (U Nebraska, Medical Ctr, Omaha) **On the two forms of the law of initial values.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 349-350.—Demonstrates that given the regression equation of either the raw-score form or the change-score form of the law of initial values, the other form can be derived algebraically. If the graph of a given form of the law is linear, the graph of the alternative form may be determined easily.

6476. Browne, M. W. (U South Africa, Pretoria) **Gradient methods for analytic rotation.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 115-121.—Employs gradient methods in orthogonal and oblique analytic rotation. Constraints are

imposed on the elements of the transformation matrix by means of reparameterizations. (16 ref)

6477. Deegan, John. (Rice U) **Specification error in causal models.** *Social Science Research*, 1974(Sep), Vol 3(3), 235-259.—Extended a typology of model specification errors, initially devised for single-equation multiple regression models, to include systems of equations embodied in recursive causal models. Results for the error forms identified are presented, inadequacies of traditional causal inference methods are discussed, and an alternative strategy for constructing recursive causal models is described.

6478. Feild, Hubert S. & Armenakis, Achilles A. (Auburn U) **On use of multiple tests of significance in psychological research.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 427-431.—The evaluation of a series of statistical tests in psychological research is a common problem faced by many investigators. As the number of statistical tests increases, the probability of making a Type-I error (i.e., of rejecting the null hypothesis when in fact it is true) increases as well. To help researchers evaluate their results, tables were constructed which show the probability of obtaining  $k$  or more significant results due to chance in a series of  $K$  independent statistical tests. Recommendations are also given for avoiding the problems of a Type-I error.—*Journal abstract.*

6479. Felson, Marcus. (U Illinois) **Standardization of scales in social science research: Breaking the routine.** *Social Science Research*, 1974(Sep), Vol 3(3), 261-265.—Reviews shortcomings of reporting regression coefficients in their original metric or standardized  $\beta$ 's. Some more flexible standardization procedures are suggested which facilitate computation, interpretation, and comparison.

6480. Finn, Jeremy D. (State U New York, Buffalo) **A general model for multivariate analysis.** New York, NY: Holt, Rinehart & Winston, 1974. xiii, 423 p.—Presents an overview of the rationale and procedures of multivariate analysis. Topics include the algebra of matrices, estimation and tests of significance in multiple regression analysis, correlational techniques, and models of analysis of variance. (3½ p ref)

6481. Golding, Stephen L. & Seidman, Edward. (U Illinois, Urbana-Champaign) **Analysis of multitrait-multimethod matrices: A two step principal components procedure.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 479-496.—Presents a relatively simple technique for assessing the convergence of sets of variables across method domains. The technique, 2-step principal components analysis, empirically orthogonalizes each method domain into sets of components, and then analyzes convergence among components across domains. The proposed technique is directly compared with D. N. Jackson's (see PA, Vol 43:12045) multimethod factor analysis in the analysis of data from a battery of psychometric measures (including the Strong Vocational Interest Blank) administered to 231 male undergraduates. Both techniques produced evidence of cross-domain convergence. However, Jackson's method had several undesirable mathematical and interpretational consequences. The 2-step procedure appears to be a promising technique for the systematic, empirical analy-

sis of multitrait-multimethod matrices. (30 ref)—*Journal abstract*.

6482. Hakstian, A. Ralph. (U British Columbia, Vancouver, Canada) **The development of a class of oblique factor solutions.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 100-114.—Reviews C. W. Harris and H. F. Kaiser's (see PA, Vol 39:9008) class of oblique factor solutions, referred to as Case II, and develops it further. Certain features of the component matrices are explicated, an iterative procedure is presented for their simultaneous solution, and illustrative examples are given.

6483. Hakstian, A. Ralph; Osborne, John W. & Skakun, Ernest N. (U British Columbia, Vancouver, Canada) **Comparative assessment of multivariate association in psychological research.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1049-1052.—Develops the notion of multivariate association among the variables in a set. Procedures stemming from an earlier inferential test are presented for comparing, between 2 populations, the strength of association that is present simultaneously in all pairs in a set of variables. Results are outlined of an investigation, using computer simulation methods, of the test statistic's sampling properties. The statistic is shown to follow closely the central  $F$  distribution, thus permitting adequate control of Type-I error. Applications are discussed.—*Journal abstract*.

6484. Hall, Charles E. (Abt Assoc Inc, Cambridge, MA) **Studies of single samples and whole populations: The point biserial and its generalizations.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 447-459.—Reviews the point biserial correlation statistic, reviews some past generalizations of it, generalizes it further, and shows how these correlations are useful for studying the characteristics of observations in single samples or whole populations. The distinctions between analysis of variance techniques and complex point serial correlation analyses are examined in considerable detail.—*Journal abstract*.

6485. Hays, James E. & Taylor, William. (American U) **A PL 1 program to perform multiseriate correlation.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 507.

6486. Howell, John F. & Games, Paul A. (Springfield Public Schools, MA) **The effects of variance heterogeneity on simultaneous multiple-comparison procedures with equal sample size.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 72-81.—Investigated the robustness of 3 multiple-comparison procedures (multiple  $t$  test, Tukey Wholly Significant Difference Test, and Scheffé  $S$  test) to the violation of the homogeneous population variance assumption using 3 different standard error estimates. The universal use of the Behrens-Fisher statistic with the Welch solution for critical values is recommended as yielding procedures highly robust to variance heterogeneity. (15 ref)

6487. Hubert, Lawrence. (U Wisconsin) **Spanning trees and aspects of clustering.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 14-28.—Uses the concept of a spanning tree for a weighted graph to characterize several methods of clustering a set of objects. Relationships between

spanning trees, single-link and complete-link hierarchical clustering, network flow, and 2 divisive clustering procedures are described. (24 ref)

6488. Hubert, Lawrence. (U Wisconsin, Madison) **Problems of seriation using a subject by item response matrix.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 976-983.—Aspects of the problem of sequencing  $S$ s on the basis of point dichotomous items are reviewed, as are several extensions to more general items. A majority of the results that are presented have been developed by qualitatively oriented archaeologists who are faced with the task of sequencing artifacts along a time continuum; the difficulties encountered in these attempts turn out to be formally equivalent to some of the problems psychologists face in sequencing  $S$ s on the basis of item responses. Comments are also included on the specialization to a more restrictive Guttman scale, and suggestions are given for reformulating some of the necessary terminology within a graph theory context. (22 ref)—*Journal abstract*.

6489. Jennrich, Robert I. (U California, Los Angeles) **Simplified formulae for standard errors in maximum-likelihood factor analysis.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 122-131.—Expresses standard errors for maximum-likelihood estimates of factor loadings in terms of the inverse of an augmented information matrix. The problem is viewed as one in constrained maximum-likelihood estimation. Results are given for canonical rotation and analytic rotations in the orthomax family.

6490. Jensema, Carl J. (Inst for Research on Exceptional Children, Champaign, IL) **An application of latent trait mental test theory.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 29-48.—Uses empirical and Monte Carlo data to find solutions for problems in applying A. Birnbaum's (1968) 3-parameter logistic mental test model through Bayesian tailored testing.

6491. Kaiser, Henry F. (U California, Berkeley) **A note on the equamax criterion.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 501-503.—Presents a desirable property of the equamax criterion for analytic rotation in factor analysis.

6492. Kleiter, Ekkehard & Fillbrandt, Hartmut. (Pedagogical U, Flensburg, W Germany) **[Hypothesis-oriented formation of categories and hierarchical cluster analysis.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(4), 603-633.—Applies scientific theories to calculation methods for multivariate ordinals. Development of multitrait, multimethod testing procedures is advocated. It is suggested that hypothetical classifications of variables can be investigated by means of hierarchical cluster analysis. (French & German summaries) (31 ref)—*English summary*.

6493. Larsson, Bernt. **The stability of results: Some examples of the effects of scale transformations.** *Didaktometrie*, 1974(Oct), No 42, 20 p.—Presents simple examples of stability for 1 factor and  $2 \times 2$  factorial analyses of variance, for reliability, and for correlations. The findings are very different: from superstability (no transformation whatsoever can change the result) to almost total instability. Applications of the method to multivariate analysis are included. The technique can



also be used for scaling variables to obtain a best fit to mathematical models other than those involved in usual statistical analysis.—*Journal abstract.*

6494. **Lienert, G. A. & Krauth, J.** (U Düsseldorf, Psychologisches Inst, W Germany) [**Configural frequency analysis.**] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974, Vol 22(1), 3-17.—Configural frequency analysis can serve as a simple nonparametric tool for evaluating clinical trials which are treated by multivariate analysis of variance under parametric conditions. By means of an interaction structure analysis those factor combinations may be discovered which are most effective in producing configurations of observations. (English summary)

6495. **Lindman, Harold R.** (Indiana U) **Analysis of variance in complex experimental designs.** San Francisco, CA: W. H. Freeman & Co, 1974. xi, 352 p. \$15.

6496. **Marks, Edmond.** (Pennsylvania State U, Office of Budget & Planning) **Analysis of variance techniques for unbalanced data.** *Review of Educational Research*, 1974(Sum), Vol 44(3), 351-364.—Suggests that the application of a linear model to unbalanced data requires a thorough understanding of the nature of the substantive problem, the data, and the methodology employed, and great care in framing and interpreting hypotheses. (25 ref)

6497. **Maxwell, A. E.** (Inst of Psychiatry, London, England) **The logistic transformation in the analysis of paired-comparison data.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 62-71.—Demonstrates the desirability that scores on a preference scale should be additive. It is shown that when the logistic transformation of the proportion of preferences for an object in a paired-comparison experiment is used as a scoring device, additivity is achieved when preferences between pairs of objects are made independently and when the preferences are consistent. An example is given to show how the analysis of paired-comparison data may conveniently be carried out, a test of additivity is performed, and scale values for the objects are derived.—*Journal abstract.*

6498. **McDonald, Roderick P. & Ahlawat, Kapur S.** (Ontario Inst for Studies in Education, Toronto, Canada) **Difficulty factors in binary data.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 82-99.—Describes an artificial experiment in which nonlinear item characteristic curves yield a difficulty factor, whereas linear item characteristic curves do not, even when in the latter case the items differ markedly in difficulty and phi coefficients are employed. (19 ref)

6499. **Meyer, J. A.** (Inst National de la Santé et de la Recherche Médicale Groupe de Recherches U 123, Le Vesinet, France) **CONTEL: A FORTRAN IV program for factor and cluster analysis of mixed data.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 506.

6500. **Novick, Melvin R. & Jackson, Paul H.** (U Iowa) **Statistical methods for educational and psychological research.** New York, NY: McGraw-Hill, 1974. xi, 456 p. \$16.50.—Presents a textbook on statistical principles and procedures for students in education and psychology which covers problems, data, and probability models,

elementary Bayesian methods, and Bayesian methods for comparing parameters. Additional topics include regression and correlation with applications to the estimation of ability, the logical basis of Bayesian analysis, and regression and the bivariate normal model.

6501. **Rock, Donald A.** (Educational Testing Service, Developmental Research Div, Princeton, NJ) **Appropriate method for the least squares analysis of categorical data.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1012-1013.—Attempts to clarify some issues that have stemmed from J. E. Overall and D. K. Spiegel's (see PA, Vol 44:1534) article on least squares analysis, as well as from a number of subsequent articles. C. E. Werts and R. L. Linn (1971) provided a logical basis for selecting Method 3 from the Overall and Spiegel article. The present article outlines statistical as well as substantive arguments for the choice of Method 3. A variation of Method 3 is also suggested.—*Journal abstract.*

6502. **Rubin, Donald B.** (Educational Testing Service, Princeton, NJ) **Estimating causal effects of treatments in randomized and nonrandomized studies.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 688-701.—Presents a discussion of matching, randomization, random sampling, and other methods of controlling extraneous variation. The objective was to specify the benefits of randomization in estimating causal effects of treatments. It is concluded that randomization should be employed whenever possible but that the use of carefully controlled nonrandomized data to estimate causal effects is a reasonable and necessary procedure in many cases. (15 ref)—*Journal abstract.*

6503. **Shaffer, Juliet P.** (U Kansas) **Multiple comparisons with unequal sample sizes.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 572-574.—Notes that the use of C. Y. Kramer's (1956) proposed approximate method for multiple-range tests with unequal sample sizes may result in lower power for these tests than for the Tukey *A* test, a reversal of the situation for equal-sized samples. A modification of Kramer's procedure proposed by D. B. Duncan (1957) results in multiple-range tests which are more powerful than the Tukey *A* test.—*Journal abstract.*

6504. **Signorelli, Anthony.** (Union Coll) **Statistics: Tool or master of the psychologist?** *American Psychologist*, 1974(Oct), Vol 29(10), 774-777.—Examines the influence of statistics on the design and interpretation of psychological experimentation, the development of theory, and the construction of instrumentation. It is suggested that a statistical conceptualization of the universe and the objects that inhabit it is more akin to an Aristotelian mode of thinking than to a Galilean one. Psychological modes of thought and procedure which are largely based on statistical principles do not deviate from this generalization. The need for a reevaluation of the role of statistics in the development of psychological principles is discussed.—*Author abstract.*

6505. **Slater, Patrick.** (St George's Hosp Medical School, London, England) **Cluster analysis versus principal component analysis: A reply to E. E. Rump.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 427-430.—Argues that E. E. Rump's 1974 advocacy of McQuitty's method of cluster analysis based on the comparison with principal components is based on a logical, although inconclusive,

argument. The suitability of both analytical procedures for different types of data is discussed.

6506. **Smith, A. F. & Payne, C. D.** (U Oxford, England) **An algorithm for determining Slater's *i* and all nearest adjoining orders.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 49-52.

—Presents a new procedure for determining P. Slater's *i* statistic (1960, 1961). Results agree with those of J. P. Phillips (1967, 1969), but the new procedure involves less work and is suited to computer implementation. A computer program is available.

6507. **Stewart, Thomas R.** (U Colorado) **Generality of multidimensional representations.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 507-519.—Uses the term "generality" to refer to the degree to which a dimensional representation for a set of objects can be used to account for behavior in a variety of tasks or situations. A method using a factor analytic procedure in conjunction with multidimensional scaling to investigate generality is suggested, and an example of its use is presented. (34 ref)

6508. **Tuanga, L. N.** (U Gauhati, India) **A scaling formula for bounded mark intervals.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 53-61.—Presents a method for the adjustment of examiners' marks for a single test when the scripts are marked by several independent examiners, each of whom is assigned a different but statistically equivalent set of scripts.

## PERCEPTION AND MOTOR PERFORMANCE

### Perceptual Processes

6509. **Aaronson, Bernard S.** (Bureau of Research in Neurology & Psychiatry, Princeton, NJ) **ASCID trance, hypnotic trance, just trance.** *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 110-117.—Responses of Ss on the altered states of consciousness induction device (ASCID) were scored for depth of hypnosis on the LeCron-Bordeaux Scale to compare ASCID with hypnotic experience. Similar data were obtained with a group of Ss asked to experience themselves in a trance, although the relative frequencies of specific experiences were different. Both seemed related to conventional hypnosis but different from it and one another.—*M. V. Kline.*

6510. **Bizzi, Emilio.** **The coordination of eye-head movements.** *Scientific American*, 1974(Oct), Vol 231(4), 100-106.—Describes the sequence of events in the nervous system that coordinates eye and head movements in fixating a visual target. Initiation of movements following introduction of an unexpected target is based on a central nervous system motor program. As the head turns, vestibular motion receptors initiate signals leading to counterrotation of the eyes, thus maintaining target fixation. Other modes of coordination of eye-head movements and plasticity in the organization of the eye-head motor system are discussed.—*P. Tolin.*

6511. **Coe, William C.** (California State U, Fresno) **Experimental designs and the state-nonstate issue in hypnosis.** *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 118-128.—Reviews 5 experimental

approaches currently employed in hypnosis research. They are discussed in terms of limitations and applications, major empirical findings, and their relationship to the investigator's theoretical position in the state-nonstate issue about the nature of hypnosis.

6512. **Curton, Eric D. & Lordahl, Daniel S.** (Florida State U) **Effects of attentional focus and arousal on time estimation.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 861-867.—Studied time estimation as a function of 2 variables, degree of attention directed to the stimulus interval and type of arousal treatment employed. 60 college students were assigned in equal numbers to the 4 cells of a  $2 \times 2$  design. Results show that (a) time estimates were reliably lower for Ss performing an attention-demanding task during the interval than for those engaged in a task designed to focus attention on the passage of time, (b) the 2 methods of arousing Ss interacted with the tasks employed in their effects on estimates, (c) the index of arousal used (pulse rate) did not correlate well with changes in time estimation, and (d) performance rates on the attention-demanding task did correlate positively with time estimates. (16 ref)—*Journal abstract.*

6513. **Ehrenwald, Jan.** (Roosevelt Hosp, New York, NY) **Out-of-the-body experiences and the denial of death.** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 227-233.—An out-of-the-body (OOB) experience is an altered state of consciousness in which the S claims that he leaves his body, that he sees it and its usual environment from a vantage point apart from it, and that he journeys to distant places before being reunited with his physical self. A representative sample of OOB experiences, ranging from frankly pathological cases of depersonalization and derealization in delirious, neurotic, and organic cases to 2 clinically normal Ss, is reviewed. It is suggested that OOB experiences derive from the age-old quest for immortality and the need to deny or defy death. At the same time they may occasionally serve as vehicles for so-called psi phenomena. Some of the parapsychological implications of the OOB experience are discussed. (16 ref)—*Journal abstract.*

6514. **Fairbank, Benjamin A.** (New Mexico State U) **The subjective representation of numerical magnitude as indicated by digit inequality judgments.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 189-199.—Examined J. Parkman's (see PA, Vol 47:8230) scanning model which suggests that subjective representation of numbers may be described by a negatively accelerated curvilinear function of the numerical magnitude of denotative numbers. 2 university students were presented with 72 possible pairs of digits 1-9, omitting equal pairs, 3 times per session for 20 sessions. The time Ss required to select the larger (or smaller) of 2 digits was taken as an indicator of the similarity of the subjective representations of numbers. Those times were treated by a scaling procedure which allowed the preparation of a tentative scale of subjective magnitude. The resulting scale was increasing, curvilinear, negatively accelerated, and possibly logarithmic. (19 ref)—*Journal abstract.*

6515. **Gregory, R. L.** (U Bristol, Brain & Perception Lab, England) **Concepts and mechanisms of perception.** New York, NY: Charles Scribner's Sons, 1974. xl, 669 p. \$40.—Presents a collection of experimental reports.



descriptions of apparatus, and an analysis of the philosophy involved in the author's study of perception over the last 20 yrs. Topics include studies of perception in simulated space conditions; a case study of a man who, after being blind since infancy, had his sight restored in middle age; a device for reducing atmospheric image interference in telescopes; and a speculative account of brain function in terms of probability and induction. (15½ p ref)

6516. Griffiths, I. D. & McIntyre, D. A. (Atkins Research & Development, Epsom, England) **Sensitivity to temporal variations in thermal conditions.** *Ergonomics*, 1974(Jul), Vol 17(4), 499-507.—Conducted an experiment in which 32 college students each experienced 4 levels of change in temperature and reported their sensations. Changes were of 0, 3, 6, and 9°C and were symmetrical about a centerpoint of 23°C and linear over an exposure period of 6 hrs. Changes occurred in both upward and downward directions. Ss reported their warmth sensations at hourly intervals, gave a summary assessment on 11 semantic differential scales at the end of the period of exposure, and then completed the Eysenck Personality Inventory. The smallest rate of change was reliably detected, and changing environments were reported to be less pleasant and more uneven than the steady state. Degree of extraversion of the Ss and direction of changes in temperature were nonsignificant variables. A method of estimating the degree of dissatisfaction produced by temperature changes is briefly described. (French & German summaries) —*Journal abstract.*

6517. Gur, Ruben C. & Gur, Raquel E. (U Pennsylvania) **Handedness, sex, and eyedness as moderating variables in the relation between hypnotic susceptibility and functional brain asymmetry.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 635-643.—The number of eye movements to the right in response to verbal and spatial questions in an E-facing-S situation correlated moderately with measured hypnotic responsiveness for a sample of 30 male and 30 female right-handed undergraduates. This finding confirms earlier indications that hypnotic responsiveness may be a right hemisphere function in right-handed Ss. The correlation was not significant for 19 male and 11 female left-handed Ss. Further breakdowns of the sample produced much higher correlations with hypnotizability, indicating the roles of sex, handedness, and eyedness as moderating variables. Right-handed males yielded a correlation of .68 and left-handed females a correlation of .58, while the correlations for right-handed females and left-handed males were nonsignificant. Left-handed males, if also left-eyed, showed a correlation of .52. Left-handed males who were right-eyed, however, showed a correlation of .41. Right-handed females who were left-eyed and right-eyed produced correlations with appropriate opposite signs, but the differences were not significant. (45 ref) —*Journal abstract.*

6518. Gur, Ruben C. (U Pennsylvania) **An attention-controlled operant procedure for enhancing hypnotic susceptibility.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 644-650.—Describes a procedure which consists of instructing the S to press a button every time the word "relax" is mentioned in the hypnotic

instructions in order to avoid an electric shock. An experiment was conducted to assess the effect of this procedure, as well as its durability and generalizability, on 64 undergraduates varying in initial responsiveness to standard group inductions (as determined by the Harvard Group Scale of groups, Susceptibility). The effect existed and generalized only for Ss who showed at least some hypnotic responsiveness during pretest, but not for totally nonresponsive would (32 ref)—*Journal abstract.*

6519. Kirman, Jacob H. (Queens Coll, City U New York) **Tactile apparent movement: The effects of number of stimulators.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1175-1180.—Judgments of tactile apparent movement as well as judgments of simultaneity and successiveness were obtained from 6 undergraduates as a function of variation in the number of sequentially activated vibratory stimulators. Interstimulus onset interval (ISOI) and stimulus duration were also varied. It was found that the frequency of judgments of continuous movement increased monotonically as the number of stimulators increased from 2 to 8. Longer durations also increased the frequency of apparent movement judgments, and when long durations were combined with a large number of stimulators, good apparent movement was obtained over the entire range of ISOIs tested. Increases in apparent movement resulting from larger numbers of stimulators were accompanied by decreases in simultaneous judgments, with successiveness judgments unaffected. Increases in apparent movement due to lengthening stimulus duration, however, were associated with decreases in successiveness judgments, while simultaneous judgments did not significantly change.—*Journal abstract.*

6520. Landrigan, David T. & Forsyth, G. Alfred. (Fordham U) **Regulation and production of movement effects in exploration-recognition performance.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1124-1130.—Active vs passive conditions for processing information were investigated with a procedure involving tactual exploration of a psychophysically dimensioned random polygon followed by a visual recognition test. Ss were 108 female undergraduates. The investigation sought to establish the existence of separate regulation-of-movement and production-of-movement variables underlying the active-passive distinction. The physical dimensions on which perceptual recognitions might be made were systematically varied to determine the nature of the relationship between regulation-of-movement and production-of-movement across various physical dimensions. Results indicate that regulation-of-movement is an important variable underlying the active-passive distinction in tactual exploration of form. Production-of-movement differences were not evidenced. An interaction of regulation-of-movement with stimulus dimensions and production-of-movement demands the inclusion of a concern for stimuli in future investigations, and indicates that it is important to consider physical activity for its effect on the cognitive regulation of exploratory movements. (18 ref)—*Journal abstract.*

6521. McCurdy, John D. (Pennsylvania State U) **Synergetic perception.** *Journal of Phenomenological Psychology*, 1973(Spring), Vol 3(2), 217-246.—Presents an

analysis of synergetic perception (sensory communion) in terms of conceptions set forth by M. Merleau-Ponty (1962). It is held that however nonidentical and distinguishable the particular senses may be, they should be regarded as systematically interchangeable and reversibly equivalent by virtue of being specializations of the common sense constituted by the living body. The common sense is the respect in which sense perception is originally unspecialized; it gives sensation a primary unity and intelligibility which depends upon neither synthesis nor association. The isolation of special sensibles by the particular senses, and the movement from them toward a generality which unifies the special sensibles as the perspectival appearances of a more common sensible, are described. An analysis of the process by which visual sensations in the left and right eyes are unified is offered as an analogy for understanding the process of interchange among the particular senses.—*B. Lindsey.*

6522. McGurk, Harry & Lewis, Michael. (U Surrey, England) **Space perception in early infancy: Perception within a common auditory-visual space?** *Science*, 1974(Nov), Vol 186(4164), 649-650.—As part of a larger study of the development of audiovisual integration, 35 1-7 mo old human infants were exposed to modifications of the normal spatial relationship between their mothers' face and voice. There was no evidence that such modifications were experienced by the infants as violations of a preexisting expectancy for face and voice to occupy the same spatial location.—*Journal abstract.*

6523. Pastore, R. E. & Scheirer, C. J. (State U New York, Binghamton) **Signal detection theory: Considerations for general application.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 945-958.—Notes that while there exist a number of papers describing the theory of signal detection, it appears that many psychologists are not aware of the ease with which signal detection theory can be applied, the range of applications possible, or the limitations of signal detection theory. This paper briefly summarizes the assumptions of signal detection theory and describes the procedures, the limitations, and practical considerations relevant to its application. A worked example of an application of signal detection theory to the study of cognitive processes is included. (46 ref)—*Journal abstract.*

6524. Spanos, Nicholas P. & McPeake, John D. (Medfield Foundation, MA) **Involvement in suggestion-related imaginings, experienced involuntariness, and credibility assigned to imaginings in hypnotic subjects.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 687-690.—94 undergraduate hypnotic Ss were administered an arm-catalepsy suggestion. Half were challenged to bend an arm, and half were not. Thus, only the challenged Ss had an objective criterion (arm bending) for determining whether they passed the suggestion. All Ss rated the extent of imaginative involvement, experienced involuntariness, and credibility of imaginings generated by the suggestion. Under both conditions, ratings of imaginative involvement correlated with experienced involuntariness, degree of credibility assigned to imaginings, and hypnotic suggestibility. Findings indicate that the interrelations among the variables assessed were not simply a function of Ss' self-observa-

tions that they either passed or failed the catalepsy suggestion. Results also support the contention that imaginative involvement plays an important role in mediating hypnotic suggestibility.—*Journal abstract.*

6525. Willis, Jerry; Duncan, Joan & Udofia, Joni. (U Guelph, Ontario, Canada) **ESP in the classroom: Failure to replicate.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 582.—Results of a study with introductory psychology students failed to replicate M. Johnson's (see PA, Vol 51:4167) finding that students who answered test items attached to sealed envelopes which contained additional test information gave more correct responses than students whose envelopes did not contain the information.

### Auditory Preception

6526. Deutsch, Diana & Roll, Philip L. (U California, San Diego) **Error patterns in delayed pitch comparison as a function of relational context.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1027-1034.—Describes 2 experiments with a total of 31 undergraduates. Ss made delayed pitch comparisons when the tones to be compared were accompanied by tones of lower pitch. Results show that the pitches of these accompanying tones were chosen so that in some conditions the intervals formed by the standard and comparison combinations were identical, and in others they differed. This was true both when the standard and comparison tone pitches differed and also when these were identical. Although Ss were instructed to attend only to the standard and comparison tones, a substantial effect of relational context was manifested. When the standard and comparison tones differed, but were in an equivalent relational context, an increased tendency for their pitches to be judged as identical resulted. When the standard and comparison tones were identical, but were in different relational contexts, an increased tendency for their pitches to be judged as different resulted.—*Journal abstract.*

6527. Erickson, Milton H. **A field investigation by hypnosis of sound loci importance in human behavior.** *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 92-109.—Conducted 3 field investigations, each involving 1 S, using hypnosis to determine the possible significance of minor alterations of the loci of origin of sounds.

6528. Handel, Stephen. (U Tennessee, Knoxville) **Perceiving melodic and rhythmic auditory patterns.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 922-933.—Conducted 2 experiments to investigate the perception of repeating auditory patterns; Ss were a total of 467 college students. Results show that in Exp I, the pattern elements differed along 1 sensory dimension (frequency, intensity, duration, or interval between elements). For these patterns, the pattern description was determined by an element preference and by organizing principles based on runs of identical elements. In Exp II, the pattern elements differed along 2 sensory dimensions achieved by overlaying 2 types of patterning used in Exp I (frequency-interval and frequency-duration). For these patterns, organization was based on the structural simplicity of the component patternings, with Ss tending to organize by the simpler



patterning. Results suggest that although the organization of different types of temporal patterns may be analyzed empirically, no fixed a priori set of principles will be sufficient.—*Journal abstract.*

6529. Horii, Yoshiyuki. (Purdue U) **A control program for a Glace-Holmes speech synthesizer.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 505.

6530. Kuhn, Gary M. (Haskins Lab, New Haven, CT) **The phi coefficient as an index of ear differences in dichotic listening.** *Cortex*, 1973(Dec), Vol 9(4), 450-457. —Proposes the phi correlation coefficient as an index of ear differences in dichotic listening tests, specifically for the 2-response paradigm, where, as an index of ear difference over all trials, it would be statistically appropriate for correlation with overall performance. Using the same computational formula, the phi index may also be applied to the results of a 1-response, directed-recall listening test. The interest of the index lies in the fact that for a constant size of response set and number of dichotic trials, its values may be directly compared for statistical significance.—*R. Gunter.*

6531. Locke, Simeon & Kellar, Lucia. (Boston State Hosp, Neurological Unit, MA) **Categorical perception in a non-linguistic mode.** *Cortex*, 1973(Dec), Vol 9(4), 355-369.—Assessment of categorical perception in a nonlinguistic mode was undertaken to evaluate the "uniqueness" of the speech analyzing mechanism and its relation to the predicate that perceptual mechanisms employed in the analysis of language are lateralized to the left hemisphere and "innate." Identification and discrimination function was assessed in 15 musicians and 18 nonmusicians employing synthetically generated triads as stimuli. Categorization was considerably more prominent in the musicians, and discrimination more closely paralleled the prediction from the characterization curves than was true for nonmusicians. Evidence for some analysis of musical function in the hemisphere nondominant for language is reviewed and the suggestion is made that categorical perception is not unique for language nor limited to the left hemisphere.—*R. Gunter.*

6532. Yokoyama, T.; Osako, S. & Yamamoto, K. **Temporary threshold shifts produced by exposure to vibration, noise, and vibration-plus-noise.** *Acta Otolaryngologica*, 1974(Sep-Oct), Vol 78(3-4), 207-212.—In a study with 8 male medical students and teachers, changes in auditory sensitivity were recorded with a Békésy audiometer technique following exposure to (a) vibration in each of 300 cyc/min (5 Hz) and 1,000 cyc/min (16.7 Hz), (b) broad-band noise of 82 db sound level, and (c) both. Vibration at a frequency of 300 cyc/min and an amplitude of 6 mm, or at a frequency of 1,000 cyc/sec and an amplitude of 3 mm, were applied until the S could no longer tolerate them (a 20-min period) by a noise-controlled vibration exciter. There was no significant change in threshold sensitivity after exposure to vibration alone. Exposure to vibration and noise simultaneously caused greater threshold shifts and longer recovery time than exposure to noise alone. This was especially true with 1,000 cyc/min vibration. It is suggested that the effects of the combined noise and vibration might be the results of some disturbances of physiological homeostasis or possible mechanical inter-

actions with its blood supply. (French & German summaries)—*Journal abstract.*

### Visual Perception

6533. Alexander, Kenneth R. (Illinois Coll of Optometry, Chicago) **Sensitization by annular surrounds: The effect of test stimulus size.** *Vision Research*, 1974(Nov), Vol 14(11), 1107-1113.—Results of a study with 4 Os show that, as the diameter of the probe was increased from 4.8' to 2°, scotopic spatial sensitization could still be demonstrated. With increasing probe size, sensitization decreased and the peak of the function shifted to a larger diameter of background disc, with the background producing the highest threshold tending to be the same size as the probe. (French, German, & Russian summaries)

6534. Bagrash, Frank M.; Thomas, James P. & Shimamura, Keiko K. (U California, Los Angeles) **Size-tuned mechanisms: Correlation of data on detection and apparent size.** *Vision Research*, 1974(Oct), Vol 14(10), 937-942.—Obtained detection thresholds for uniformly illuminated and nonuniformly illuminated (disk-annulus) stimuli. The stimuli were presented at threshold, and 2 of the authors and a 3rd well-practiced O attempted to discriminate between uniform and nonuniform stimuli and made judgments of the apparent size of each stimulus. The uniform and nonuniform stimuli were not discriminated. Changes in apparent size were correlated with changes in detection thresholds. Findings support a multiple size-tuned mechanism interpretation. (French, German, & Russian summaries)—*Journal abstract.*

6535. Bryden, M. P. (U Waterloo, Ontario, Canada) **Perceptual asymmetry in vision: Relation to handedness, eyedness, and speech lateralization.** *Cortex*, 1973(Dec), Vol 9(4), 419-435.—Administered 3 tests of visual perceptual asymmetry—letter recognition, form recognition, and localization—to 32 right-handed and 32 left-handed Ss. Letter recognition was better in the right visual field for right-handed but not left-handed Ss. Neither form recognition nor dot localization showed a significant visual field effect, or any relation to handedness. Consideration of cerebral speech lateralization as assessed by a dichotic listening procedure did not improve the prediction of visual asymmetries. However, both sighting dominance and acuity dominance were related to the laterality effect, at least on the letter recognition task. Results emphasize the difficulty of obtaining stable laterality effects with nonverbal visual material, and indicate the importance of factors related to eye dominance. They suggest that the laterality effects obtained in letter recognition are unrelated to those obtained with dichotic listening, and therefore are mediated by a different mechanism.—*R. Gunter.*

6536. Buckley, Paul B. & Gillman, Clifford B. (U Wisconsin, Madison) **Comparisons of digits and dot patterns.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1131-1136.—Investigated the process of numeric comparison by asking 4 groups of 10 college students to judge which of 2 digits or which of 2 dot patterns was numerically larger. Stimuli were either digits or dot patterns in familiar, unfamiliar, or random configurations. Mean reaction time was systematically

related to the difference between logarithms of the stimulus values. A single numeric comparison process gave good account of the data for all stimulus types. This process was well described by a random walk model with variable step size and fixed boundaries. Reaction time matrices were further analyzed using J. B. Kruskal's 1964 multidimensional scaling program MD-SCAL, and the recovered stimulus configurations were successfully simulated from a simple version of the model. (15 ref)

—*Journal abstract.*

6537. Carpenter, R. H. (U Cambridge, Physiological Lab, England) **An inexpensive servo-controlled "wedge."** *Vision Research*, 1974(Nov), Vol 14(11), 1269-1270.—Describes an easily constructed, automated variable neutral-density filter (wedge) for providing background stimulus conditions or for threshold or other S-controlled visual presentations in visual experiments. The device is a reliable computer peripheral.

6538. Cheng, M. & Outerbridge, J. S. (Royal Victoria Hosp, Otolaryngology Research Lab, Montreal, Quebec, Canada) **Inter-saccadic interval analysis of optokinetic nystagmus.** *Vision Research*, 1974(Nov), Vol 14(11), 1053-1058.—As the intensity of nystagmus, measured in 7 Ss, decreased, the interval histogram changed from being symmetric monomodal, to asymmetric monomodal, and finally to a multimodal form in which the high order modes were integral multiples of the basic mode. This characteristic change was distinctly altered when the S followed the optokinetic stimulus voluntarily. (French, German, & Russian summaries) (17 ref)

6539. Cohn, Theodore E. (U California, School of Optometry, Berkeley) **A new hypothesis to explain why the increment threshold exceeds the decrement threshold.** *Vision Research*, 1974(Nov), Vol 14(11), 1277-1279.—Presents an hypothesis—based on the idea that quantum fluctuations set the limit on an individual's ability to see changes in a steady background light—that only relatively few ganglion cells have the task of summing photons over a wide region and that they receive signals from a very small fraction of the receptors in their receptive field.

6540. Comerford, James P. (York U, Downsview, Ontario, Canada) **Stereopsis with chromatic contours.** *Vision Research*, 1974(Oct), Vol 14(10), 975-992.—Conducted an experiment with 3 normally seeing, paid adult Ss in which stereopsis occurred for stimuli defined by chromatic contours. A chromatic contour was defined as one formed by a spatial chromatic change with the chromatic components heterochromatically equated using the criterion of a minimally distinct border. Discrimination differed for different combinations of target and background hue. Discrimination was better when the stereoscopic target was at a 30' binocular disparity than at a 7' binocular disparity. It is suggested that the discrimination level was related to the distinctness of border of the target against the background for a given magnitude of binocular disparity. Several theories of the cue to stereopsis are discussed with relation to the results. (French, German, & Russian summaries) (18 ref)

—*Journal abstract.*

6541. Di Lollo, Vincent; Lowe, D. G. & Scott, J. P. (U Western Australia, Nedlands) **Backward masking and interference with the processing of brief visual displays.**

*Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 934-940.—Conducted 3 experiments in which 2 spatially separate rows of letters were displayed to 3 male college students and 1 female research assistant in a tachistoscope either simultaneously or sequentially. A tone cue, indicating the row to be reported, was differentially timed to allow comparison of performance under the 2 modes of presentation at identical delays of cue. Performance on the temporally leading row was substantially impaired relative to performance on the corresponding row under simultaneous display conditions. It is suggested that the onset of the 2nd display interferes with the processing of the 1st display. Parallels with backward visual masking by a spatially superimposed pattern are discussed.—*Journal abstract.*

6542. Dwyer, William O. & White, Carol S. (Memphis State U) **Peripheral area-intensity interaction in simple visual reaction time.** *Vision Research*, 1974(Oct), Vol 14(10), 971-974.—2 normally seeing female Os performed simple reaction-time responses to peripheral stimuli of varying intensity and angular subtense. The area-intensity combinations were calculated which produced each of several criterion reaction times. An analysis of these combinations indicated that the area-intensity reciprocity was not in accordance with the theory of C. H. Graham et al (1939). An analysis of L. E. Hufford's (see PA, Vol 39:3525) data on spatial summation in reaction time produced similar conclusions. The present data and those of Hufford indicate that for small stimulus sizes, area has a greater effect than intensity in determining reaction-time responses. (French, German, & Russian summaries)—*Journal abstract.*

6543. Ellis, Hadyn D. & Shepherd, John W. (U Aberdeen, Scotland) **Recognition of abstract and concrete words presented in left and right visual fields.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1035-1036.—Both abstract and concrete words were better recognized by 12 right-handed Ss when they were presented in the right visual field (RVF) than when presented in the left visual field (LVF). Concrete words were significantly better recognized than abstract words when they fell in the LVF.

6544. Eriksson, E. Sture. (U Uppsala, Psykologiska Inst, Sweden) **A theory of veridical space perception.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 225-235.—Proposes a theory of veridical space perception based on the principles of movement parallax. Since optical changes are ambiguous with regard to veridical distances it is suggested that veridicality is obtained on the basis of an interaction between optical information and information from the body-state system. The optical system generates size and shape constancy on the basis of proximal common motions described by a vector-derivative model. The body-state system is thought to register information in a similar manner, and the interaction between the 2 subsystems is assumed to function according to the vector-derivative principle. (23 ref)—*Journal abstract.*

6545. Frith, C. D. & Nias, D. K. (Inst of Psychiatry, London, England) **What determines aesthetic preferences?** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 163-173.—88 male and female Ss rated for



personal preference 18 computer-constructed designs of quantitatively defined content. Principal component methods were used to extract the main dimensions along which the designs were perceived. The first principal component was identified as contour (amount of edge elements), an attribute that has hitherto been confounded with "information theory" definitions of complexity. The preference ratings indicate that Ss generally preferred the simplest designs. This contrasts with previous work that reports a preference for intermediate degrees of complexity. It is suggested, however, that the same conclusion would have emerged from the present research if it had not been possible to distinguish amount of contour and complexity. Thus it is suggested that contour is an important and basic dimension of perception that must be controlled in studies of aesthetic preferences. (19 ref)—*Journal abstract*.

6546. Gibbs, Thomas & Lawson, R. B. (U Vermont) **Simultaneous brightness contrast in stereoscopic space.** *Vision Research*, 1974(Oct), Vol 14(10), 983-987. —Manipulated the depth and lateral displacement between the test and inducing fields of a classical simultaneous brightness contrast configuration presented to 7 normally seeing, experienced adult Os. Depth separation varied with the binocular disparity carried by the test fields, whereas directional displacement arose from decentration of the test fields. Neither depth nor lateral displacement influenced the magnitude of simultaneous brightness contrast although stereoscopic size extent distance varied directly with disparity. Results indicate that simultaneous brightness contrast is not affected by depth adjacency. (French, German, & Russian summaries) (15 ref)—*Journal abstract*.

6547. Heggelund, Paul. (U Trondheim, Norway) **Achromatic color vision: II. Measurement of simultaneous achromatic contrast within a bidimensional system.** *Vision Research*, 1974(Nov), Vol 14(11), 1081-1088. —Measured the contrast effect within the bidimensional system of achromatic colors which was detailed in Part I (see PA, Vol 53:Issue 4). 2 experienced Os with normal vision were the Ss. Results show that different combinations of test and inducing luminance produced uniquely different achromatic colors of the test field. Although the different combinations could give the same achromatic quality or the same color strength, they could not give both together. The results are related to the question of color constancy, and it is shown that there is a consistent relationship between albedo and achromatic quality, and between illumination and color strength. Hence, achromatic color vision provides independent information about albedo and illumination through achromatic quality and color strength. (French, German, & Russian summaries) (24 ref)—*Journal abstract*.

6548. Heggelund, Paul. (U Trondheim, Norway) **Achromatic color vision: I. Perceptive variables of achromatic colors.** *Vision Research*, 1974(Nov), Vol 14(11), 1071-1079. —Achromatic colors are usually considered to be specifiable by a single perceptive variable, although a few bidimensional systems for specification of such colors have previously been presented. Some of the most important concepts of achromatic color are reviewed and evaluated against the color variations observed by 1 S (the author) in a disc-

ring configuration of fields. 4 different types of achromatic color variations were distinguished. It is shown that the unidimensional concept is untenable, and several limitations of the previous bidimensional systems are noted. A new bidimensional system is introduced which, contrary to the former, incorporates both the aperture and the surface colors within an orthogonal structure and accounts for both the intensive and qualitative variations encountered in both modes. (French, German, & Russian summaries) (40 ref)

6549. Hershberger, Wayne A.; Carpenter, David L.; Starzec, James & Laughlin, Nellie K. (Northern Illinois U) **Simulation of an object rotating in depth: Constant and reversed projection ratios.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 844-853. —In 4 experiments, a total of 144 college-student Os viewed 2 types of pseudopolar motion projections (i.e., moving pictures) of a row of dots rotating in depth about one end and sweeping through limited sectors devoid of previously identified cues to rotation direction. One type incorporated a stimulus gradient of displacement-to-acceleration ratios, with the direction of the gradient being opposite to that found in normal polar projections which yield veridical impressions of rotation direction; the other type had no such gradient. As predicted, the former type yielded illusory judgments of rotation direction and the latter yielded judgments of chance accuracy, i.e., the dotted line's momentary orientation in depth (which end appeared momentarily nearer the O) was illusory and equivocal, respectively, when the displacement-acceleration gradient was reversed and absent. It is suggested that displacement-acceleration gradients in transformations of the retinal projection (image) mediate kinetic depth effects, i.e., are perceived as objective depth rather than objective motion. (15 ref)—*Journal abstract*.

6550. Hogben, John H. & di Lollo, Vincent. (U Western Australia, Nedlands) **Perceptual integration and perceptual segregation of brief visual stimuli.** *Vision Research*, 1974(Nov), Vol 14(11), 1059-1069. —6 experiments with 4 normally seeing males required the Ss to identify or guess the location of the missing dot when 24 of the 25 dots forming a  $5 \times 5$  matrix were presented in random order. In Exps I and II, dots were presented successively, at regular intervals in time. It was found that Ss's performance deteriorated as presentation of dots was strung out over greater intervals; most errors were the result of Ss' misidentifying one of the early presented dots as missing. These results are explained in terms of stimulus persistence. Exps III-VI examined the effect of inserting a temporal gap in the presentation sequence under conditions in which each dot was presented only once. When the temporal gap was greater than 30-50 msec, Ss reported the occurrence of 2 distinctly separate percepts, and the difficulty of the task was greatly increased. These results are interpreted on the basis of the concurrent operation of processes of stimulus persistence and of perceptual segregation. (French, German, & Russian summaries)—*Journal abstract*.

6551. Iwata, Junichi. [The effect of sensory-motor clues on transformation of spatial representation in children.] (Japa) *Japanese Journal of Educational Psy-*

chology, 1974(Mar), Vol 22(1), 21-30.—Groups of 112 children 4-9 yrs old predicted how objects would be perceived from different positions. Exp I provided 3 experimental situations: turning a covered landscape 180°, moving around it, and imagining it from the opposite position. Moving around the landscape was found most effective on the transformation of the perspectives. Exp II provided 4 different situations: observing the landscape after turning it 180°, moving around it 90° and 180°, verbalizing right-left and front-rear relations from various positions, and observing from various positions without verbalizing the spatial relations. Moving around the landscape was found most effective on transformation of spatial representations in children. No effect of verbalization was found. (English summary)—S. Choe.

6552. Kaiser, Peter K. (York U, Downsview, Ontario, Canada) **Determination of CIE chromaticity coordinates of colored lights produced by a projection color mixer.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 473-476.

6553. Kerr, Larry. (Pennsylvania State U) **Detection and identification of monochromatic stimuli under chromatic contrast.** *Vision Research*, 1974(Nov), Vol 14(11), 1095-1105.—Detection thresholds for monochromatic stimuli superimposed on an achromatic background were determined for 2 experienced adult Os under conditions of simultaneous color and brightness contrast. Chromatic annuli selectively raised the thresholds for stimuli of similar wavelength composition relative to that of stimuli of different wavelength composition. The stimuli were then equated for detectability at near-threshold intensity levels under all annulus conditions, and their discriminability from one another was evaluated. All the stimuli were readily discriminated at threshold intensities under all annulus conditions, indicating that the chromatic mechanisms were active at threshold levels. The different annulus conditions did not differentially affect stimulus discriminability beyond the selective effect on detection thresholds. The selective effects on the detection thresholds may therefore have occurred within the chromatic visual mechanisms rather than the achromatic mechanism. (French, German, & Russian summaries) (15 ref)—*Journal abstract*.

6554. Lakner, Edward. (U Illinois, Survey Research Lab) **Recognition of numerals imbedded in words, pronounceable nonwords, and random sequences of letters.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1086-1091.—The numerals 2-9 were randomly imbedded at 1 of 3 locations within words, pronounceable word fragments, and random sequences of letters which were presented tachistoscopically in random order to a total of 24 undergraduate or graduate students in a 3 × 3 repeated measures design. Mean recognition time was shortest for numerals imbedded within words, while type of sequence interacted significantly with location of the imbedded numeral. Threshold differences were attributed to intraorganismic factors, since the experimental design controlled for differences in the response and the code used by Ss to report the tachistoscopically exposed stimuli.—*Journal abstract*.

6555. Larimer, James; Krantz, David H. & Cicerone, Carol M. (Temple U) **Opponent-process additivity: I.**

**Red/green equilibria.** *Vision Research*, 1974(Nov), Vol 14(11), 1127-1140.—A red-green equilibrium light is one which appears neither reddish nor greenish (i.e., either uniquely yellow, uniquely blue, or achromatic). A subset of spectral and nonspectral red-green equilibria was determined in 7 color-normal Os for several luminance levels to test whether the set of all such equilibria is closed under linear color-mixture operations. The spectral loci of equilibrium yellow and blue showed either no variation or visually insignificant variation over 1-2 log<sub>10</sub> units. It is concluded that spectral red-green equilibria were closed under scalar multiplication; consequently they were invariant hues relative to the Bezold-Brücke shift. The additive mixture of yellow and blue equilibrium wavelengths, in any luminance ratio, is also an equilibrium light. Small changes of the yellowish component of a mixture toward redness or greenness had to be compensated by predictable changes of the bluish component of the mixture toward greenness or redness. It is concluded that yellow and blue equilibria are complementary relative to an equilibrium white, that desaturation of a yellow or blue equilibrium light with such a white produce no Abney hue shift; and that the set of red-green equilibria is closed under general linear operations. (French, German, & Russian summaries) (15 ref)—*Journal abstract*.

6556. Lawson, R. B.; Cowan, Elisabeth; Gibbs, T. D. & Whitmore, Cynthia G. (U Vermont) **Stereoscopic enhancement and erasure of subjective contours.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1142-1146.—The Kanizsa pattern yields subjective contours without binocular disparity even though a depth impression may arise from the monocular interposition cue. 6 Ss (mean age = 32 yrs) estimated stereoscopic depth and contour clarity arising from disparate Kanizsa patterns. Results indicate that the clarity of subjective contours was enhanced by crossed disparities and attenuated by uncrossed disparities. Stereoscopic depth varied directly with disparity.—*Journal abstract*.

6557. Lefton, Lester A. (U South Carolina) **Internal contours, intercontour distance, and interstimulus intervals: The complex interaction in metacontrast.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 891-895.—Tested 40 college students to examine the extent of metacontrast as a function of introducing the extent of metacontrast into the target, intercontour distance internal contours into the target, intercontour distance between the target and mask, and interstimulus intervals between the target and mask. Results show that (a) introducing internal contours made the targets more susceptible to metacontrast, (b) intercontour distance produced increases in accuracy, and (c) accuracy was a monotonic function of the delay of a masking ring. The data are discussed in terms of a lateral inhibitory model of metacontrast.—*Journal abstract*.

6558. MacKay, D. M. & MacKay, Valerie. (U Keele, England) **Do curvature-contingent chromatic aftereffects require "detectors for curvature"?** *Vision Research*, 1974(Nov), Vol 14(11), 1285-1287.—Reports results of experiments which found no significant results of experiments which curved similarly to those in L. A. Rigg's (see PA, Vol 51:4213) study. It is proposed that Rigg's results are ambiguous and that, if there is a curvature-specific component in Rigg's effects, it must



be weaker than that attributable to simple orientational adaptation.

6559. MacLeod, Donald I. & Hayhoe, Mary. (U California, San Diego) **Rod origin of prolonged afterimages.** *Science*, 1974(Sep), Vol 185(4157), 1171-1172. —Tested 1 normal and 3 rod monochromatic Ss to determine the origin within the eye of prolonged afterimages. The normal S was asked to find an intensity of a substituted background such that no afterimage at all was visible at the changeover of backgrounds. It is shown that after bleaching, once the cones have had time to recover their sensitivity, differently colored backgrounds (indistinguishable by rods but different for cones) were interchanged without reviving the afterimage. It is therefore concluded that this afterimage must be generated by rods alone.—*R. Hall.*

6560. MacLeod, Iain D. & Rosenfeld, Azriel. (U Maryland, Computer Science Ctr) **The visibility of gratings: Spatial frequency channels or bar-detecting units?** *Vision Research*, 1974(Oct), Vol 14(10), 909-915. —Interprets existing experimental data as evidence for the presence in the human visual system of channels selectively sensitive to narrow bands of spatial frequencies. A simple space-domain model is presented which accounts for much of the data. The model assumes the presence in the visual system of bar-detecting units whose receptive fields have various sizes and orientations, with the maximum response from any unit to a given stimulus determining the visibility of that stimulus. (French, German, & Russian summaries) (37 ref) —*Journal abstract.*

6561. Marquer, P. (U René Descartes, Experimental & Comparative Psychology Lab, Paris, France) **[Effect of the environment on the Müller-Lyer illusion.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 572-577. —Examined the influence of ecological factors on the intensity of the Müller-Lyer illusion among Congolese youngsters. Ss were 4 groups of 25 youngsters each, 2 from an urban and 2 from a rural environment. One group from each environment had a mean age of 7½ yrs, one of 11½ yrs. All Ss completed an experimental perceptual task. No significant differences were found between the 11½ -yr-old urban and rural groups in strength of the illusion, but 7½ -yr-olds in the rural group perceived the illusion with greater strength than those in the urban group. The illusion became slightly weaker with increasing age in the rural groups. (34 ref)—*Z. M. Cantwell.*

6562. Matin, Ethel. (Columbia U) **Saccadic suppression: A review and an analysis.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 899-917. —Reviews the history of saccadic suppression and describes the suggested causes of the phenomenon. Primary emphasis is placed on "ordinary" saccadic suppression (i.e., decreased sensitivity for stimulation received from the outside environment either during or within a few hundred milliseconds of the time of occurrence of a saccade). However, the suppression of afterimages and entopic images is also considered. Some suggestions are made about the role of suppression in maintaining a stable visual world (constancy of visual direction) when voluntary saccades occur. (98 ref)—*Journal abstract.*

6563. McCann, J. J.; Savoy, R. L.; Hall, J. A. & Scarpetti, J. J. (Polaroid Corp, Vision Research Lab, Cambridge, MA) **Visibility of continuous luminance gradients.** *Vision Research*, 1974(Oct), Vol 14(10), 917-927. —A plateau of illumination was modulated with various patterns of gradual change: linear slopes and small numbers of low spatial frequency sinusoidal oscillations. Over the range of parameters tested with 8 Os, the threshold contrast necessary for the detection of these modulations was largely independent of the steepness of the gradient, the frequency of the sinusoids, and the size of the target on the retina. Visibility was a function of the fractional change in luminance across the target (contrast) and the pattern of the modulation (characterized by the number of cycles of sinusoid. (French, German, & Russian summaries) (21 ref) —*Journal abstract.*

6564. Murch, Gerald M. (Portland State U) **Color contingent motion aftereffects: Single or multiple levels of processing.** *Vision Research*, 1974(Nov), Vol 14(11), 1181-1184. —The monocular spiral aftereffect can be observed in the stimulated and unstimulated eye. When the aftereffect is made contingent upon a specific color, transfer does not occur. Results of 3 experiments with a total of 15 graduate student Ss show this to be the result of separate coding for color and movement, whereby the color coding occurred prior to binocular interaction. (French, German, & Russian summaries)—*Journal abstract.*

6565. Nachmias, Jacob & Sansbury, Richard V. (U Pennsylvania) **Grating contrast: Discrimination may be better than detection.** *Vision Research*, 1974(Oct), Vol 14(10), 1039-1042. —Postulates, in discussing results from earlier experiments, that a transducer function with a threshold-like nonlinearity exists prior to the point where psychophysical decisions are made. Models which do not favor an early threshold-like nonlinearity are also discussed, and it is concluded that insufficient evidence exists to favor any of these hypotheses.

6566. Nyborg, Helmuth. (U Aarhus, Psykologisk Inst, Risskov, Denmark) **Light intensity in the Rod-and-Frame Test reconsidered.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 236-237. —Data collected by H. Nyborg (see PA, Vol 51:157) on the perception of the vertical in the rod-and-frame test (RFT) were reanalysed according to the method of signed errors presented by Nyborg (1974). Regression analysis showed that there was no systematic relationship between light intensity and frame dependence, and that the effect of light intensity on the perception of vertical in the RFT in general was negligible, thus confirming the conclusions drawn originally.—*Journal abstract.*

6567. Östberg, Olov & Stone, Peter T. **Methods for evaluating discomfort glare aspects of lighting.** *Göteborg Psychological Reports*, 1974, Vol 4(4), 19 p. —After a review of the different attempts to relate physiological mechanisms to discomfort glare, brief summaries are given of all techniques of subjective scaling of discomfort glare reported in the literature from 1900 to 1973. The main sources of assessment variance, as well as means of controlling them, are also discussed. Analysis shows that none of the scaling techniques presently in use can be appointed the rank of final

standard, especially since individual variability has not been dealt with properly. (83 ref)—*Journal abstract.*

6568. Pantle, Allan. (Miami U) **Motion aftereffect magnitude as a measure of the spatio-temporal response properties of direction-sensitive analyzers.** *Vision Research*, 1974(Nov), Vol 14(11), 1229-1236.—In 2 experiments with 9 and 8 undergraduates, respectively, the Os inspected spatially periodic, adapting patterns which were moved at different speeds in different experimental conditions. The magnitude of the motion aftereffect which was generated in each condition was measured. There was an interaction between pattern characteristics and adapting speed. For a variety of patterns the temporal frequency, rather than the velocity, of the adapting patterns was the critical determinant of aftereffect magnitude. The psychophysical results suggest (a) that the responses of direction-sensitive analyzers in humans are controlled by the temporal frequency of drifting patterns rather than their velocity and (b) that the peak response frequency of direction-sensitive analyzers is about 5 Hz under low photopic levels of illumination. (French, German, & Russian summaries)—*Journal abstract.*

6569. Regan, D. (U Keele, England) **Electrophysiological evidence for colour channels in human pattern vision.** *Nature*, 1974(Aug), Vol 250(5465), 437-439.—Spectral sensitivity curves for the red- and green-sensitive human visual channels were measured by evoked potentials (EP). 28 Ss viewed black-red checkerboard patterns, attenuated by superposed desensitizing disks of different wavelengths at increasing intensities. EP amplitudes were recorded as a function of time, and Fourier-analyzed for running averages. Results show that increasing intensity of desensitization did not affect amplitude, at first, or occasionally increased it slightly and then decreased it in proportion to the log intensity. Different desensitizing wavelengths showed similar amplitude effects but shifted response curves along the intensity axis. Comparing EP amplitudes with sensitivity curves obtained by heterochromatic flicker photometry showed visual effectiveness not to be directly proportional to luminance for pattern EPs. Implications concerning color-channel segregation and pattern-sensitive neurons are discussed. (24 ref)—*A. Cerf-Beare.*

6570. Remole, Arnulf. (U Waterloo, School of Optometry, Ontario, Canada) **Relation between border enhancement extent and retinal image blur.** (Germ) *Vision Research*, 1974(Oct), Vol 14(10), 989-995.—3 normally seeing Ss perceived a bright field on a dark ground as having a region of enhanced brightness adjacent to its borders. The spatial extent of this region was compared with the extent of blur of the borders in the retinal image. In agreement with Mach band theory, the 2 variables were closely related. Only for large entrance pupils was the enhancement extent markedly smaller than half the blur zone. It is suggested that this is because it followed the physiologically effective portion of the blur zone rather than the oblique incidence light constituting the periphery of the optical spread. (French, German, & Russian summaries)—*Journal abstract.*

6571. Rentschler, Ingo & Arden, Wolfgang. (Laboratorio di Neurofisiologia del CNR, Pisa, Italy) **Edge detection in luminance and colour discrimination.**

*Vision Research*, 1974(Oct), Vol 14(10), 1043-1045.—Discusses results of experiments on the transfer of luminance differences, concluding that the color discrimination mechanism seems to be similar, at all blur conditions, to that of luminance discrimination at very diffuse boundaries and therefore that edge detection is not essential for the transfer of color differences. (15 ref)

6572. Riggs, L. A.; Merton, P. A. & Morton, H. B. (National Hosp, Dept of Applied Electrophysiology, Queen Square, London) **Suppression of visual phosphenes during saccadic eye movements.** *Vision Research*, 1974(Oct), Vol 14(10), 997-1011.—In experiments with 3 Ss, a loss of visual sensitivity accompanied a saccadic eye movement even under conditions of total darkness. Optical factors were eliminated by the use of electrically produced phosphenes, rather than flashes of light, to test the changes in visual threshold. Separate experiments matching the brightness of electrical phosphenes to real lights allowed the threshold changes to be expressed in terms of real light. Results point to the conclusion that a substantial portion of saccadic suppression was neural, rather than optical in its origin. The time course of the suppression is consistent with electrophysiological studies in cat and monkey in which inhibition of nerve impulses occurs over a period that includes, but is considerably longer than, the duration of the eye movement. No correlation has yet been shown, however, between the occurrence of saccadic suppression and identifiable features of the human visually evoked occipital responses. (French, German, & Russian summaries) (50 ref)—*Journal abstract.*

6573. Ross, John & Hogben, J. H. (U Western Australia, Nedlands) **Short-term memory in stereopsis.** *Vision Research*, 1974(Nov), Vol 14(11), 1195-1201.—A new stochastic dot stereogram method for producing depth scenes from random point trains to each separate eye was used in 2 experiments to measure the time for which information is held to enable stereopsis. The authors and a student served as Os. Results indicate that one signal train may lag behind the other by 36-72 msec without affecting clear perception of form in depth. They suggest the existence of a visual memory system for stereopsis holding input to one eye for up to 50-70 msec but losing information about the input rapidly thereafter. The suggestion is confirmed by results with other less novel methods. (French, German, & Russian summaries)—*Journal abstract.*

6574. Rule, Stanley J.; Laye, Ronald C. & Curtis, Dwight W. (U Alberta, Edmonton, Canada) **Magnitude judgments and difference judgments of lightness and darkness: A two-stage analysis.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1108-1114.—Investigated the exponent for magnitude estimation of darkness to determine whether its negative value was attributable to an input or output transformation. 2 groups of 16 summer school students judged either lightness and lightness differences or darkness and darkness differences of Munsell grays. Difference judgments were subjected to a scaling solution derived from the 2-stage model of magnitude estimation. For the darkness data, scale values were related to reflectance by a power function with a positive exponent, while the exponent of a power function relating magnitude estimation and



scale values was negative. This result is consistent with a positive input exponent and a negative output exponent for magnitude estimation of darkness. For the lightness data, both input and output exponents were positive. (18 ref)—*Journal abstract*.

6575. Ward, Frank & Boynton, Robert M. (U Rochester, Ctr for Visual Science) **Scaling of large chromatic differences.** *Vision Research*, 1974(Oct), Vol 14(10), 943-949.—Evaluated minimally distinct borders (MDB) between juxtaposed heterochromatic fields by equivalent achromatic contrasts or by subjective ratings and subjected each to the Shepard-Kruskal multidimensional scaling analysis. Results of analyzing data from 2 Os show that the original stimuli could be arrayed in a 2-dimensional space on the basis of their sensory differences. Objective and subjective border ratings produced similar results. The MDB technique produced color scaling data that closely resemble those obtained by S. L. Guth (1971) with the subthreshold additivity method. The data provide additional information concerning the scaling of large sensory differences between spectral colors. (French, German, & Russian summaries) (15 ref)—*Journal abstract*.

6576. Weisstein, Naomi & Harris, Charles S. (State U New York, Buffalo) **Visual detection of line segments: An object-superiority effect.** *Science*, 1974(Nov), Vol 186(4165), 752-755.—14 Os identified a briefly flashed line segment more accurately when it was part of a drawing that looked unitary and 3-dimensional than when the line was in one of several less coherent flat designs.

6577. Wenderoth, Peter & Curthoys, Ian. (U Sydney, NSW, Australia) **On the non-additivity of visual tilt illusions.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 549-555.—Conducted 3 experiments with 14 undergraduate Ss in each to test whether single inducing figure (IF) lines tilted toward +60 or -30 would induce negative test settings relative to pretests and whether both IF lines presented together would induce more positive settings. In Exp I the visual tilt illusion induced by 2 orthogonal lines differed from the sum of the illusions induced by each line independently. The length of one of the orthogonal-inducing lines was varied in Exp II with the other inducing line remaining a fixed length. As length increased from zero (no line) to 100%, the size of the illusion increased monotonically. The increase in illusion was not due to the increasing length of the variable line alone since, in the absence of the line of fixed length, increasing the length of the variable line produced no significant trend in the illusion.—*Journal abstract*.

6578. Wijngaard, W.; Bouman, M. A. & Budding, F. (State U Utrecht, Netherlands) **The Stiles-Crawford colour change.** *Vision Research*, 1974(Oct), Vol 14(10), 951-957.—To obtain the Stiles-Crawford color change, the absorption of guided and unguided light by a cone outer segment as a function of the angle of incidence is estimated. The measurements by W. S. Stiles (1937) are fitted with reasonable success, both for the intensity effect and for the color change, using the phenomenon of self-screening to explain the color change. (French, German, & Russian summaries) (25 ref)

6579. Wyatt, Harry J. (Washington U, Medical School) **Singly and doubly contingent after-effects involving color, orientation and spatial frequency.** *Vision Research*, 1974(Nov), Vol 14(11), 1185-1193.—In 3 experiments with groups of informal and formal Ss, 2 singly contingent aftereffects were observed: an orientation effect contingent on spatial frequency and a spatial frequency effect contingent on orientation. These effects may be interpreted in terms of channels specific for orientation and spatial frequency. 2 doubly contingent aftereffects were also observed: a color effect contingent jointly on orientation and frequency and a color effect contingent on apparent frequency contingent on orientation. These effects may be interpreted in terms of channels specific for color, orientation, and spatial frequency. (French, German, & Russian summaries) (19 ref)—*Journal abstract*.

### Motor Processes & Performance

6580. Cratty, Bryant J. (U California, Los Angeles) **Psycho-motor behavior in education and sport: Selected papers.** Springfield, IL: Charles C Thomas, 1974. viii, 193 p.—Relates psychomotor activity to athletics and to therapeutic strategies and programs. Included are topics on intelligence in sports and physical education, movement abilities in early childhood, the theory and practice of modifying movement attributes, and psychological considerations for the athlete. (40 ref)

6581. Fenz, Walter D. & Jones, G. Brian. (U Waterloo, Ontario, Canada) **Cardiac conditioning in a reaction time task and heart rate control during real life stress.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 199-203.—On the basis of ratings by 2 jumpmasters, the 12 best and 12 worst parachutists of a group of 30 were studied. Heart rate was continuously recorded up to the time of the jump. The heart rate of the poor performers was generally somewhat higher than that of good performers. Good performers showed an increase in heart rate at the beginning of the jump sequence which leveled off, while poor performers showed a steady increase. The cardiac deceleration and the concomitant facilitation in performance seem to be centrally mediated.—*W. G. Shipman*.

6582. Roy, Eric A. & Marteniuk, Ronald G. (U Waterloo, Ontario, Canada) **Mechanisms of control in motor performance: Closed-loop vs motor programming control.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 985-991.—Examined the generality of the closed-loop theory and the motor program theory as explanations for the control of motor responses. 30 undergraduates learned to move a cursor along a track in 1 sec, using a fast or slow response. The methodology used involved comparing performance, following acquisition, under changed or interrupted feedback conditions to a control condition in which feedback was the same as that in acquisition. Results suggest that the motor programming theory explained performance control in the fast response, while closed-loop theory explained performance control in the slow response, since only in the slow response were there large effects of manipulating feedback. These findings strongly suggest that the type of theory used to explain performance control depends on the type of response. (24 ref)—*Journal abstract*.

6590. Kantowitz, Barry H. (Purdue U) Double stimulation with varying response requirements. *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1092-1107.—Conducted 3 experiments with a total of 60 female undergraduates to test the unitary assumption of B. H. Kantowitz's 1974 response conflict model, which states that the same mechanism is responsible for both reaction time effects ( $RT_1$  and  $RT_2$ ) in double stimulation. Response conditions called for response ( $R_1$  and/or  $R_2$ ) to first stimuli ( $S_1$ ) and second stimuli ( $S_2$ ), to only  $S_1$ , or to only  $S_2$ . In Exp I,  $S_2-R_2$  was a subset of the  $S_1-R_1$  set such that  $S_1-R_1$  was characterized by 2 bits of uncertainty while  $S_2-R_2$  had 1 bit. Similar interactions

6586. Bradshaw, John L. (Monash U, Clayton, Vic, Australia) **Peripherally presented and unreported words**



between interstimulus interval (ISI) and response conditions were obtained for both RT<sub>1</sub> and RT<sub>2</sub>. In Exp II, S<sub>2</sub>-R<sub>2</sub> was not a subset of S<sub>1</sub>-R<sub>1</sub>. Both interactions obtained in Exp I disappeared. In Exp III, similar interactions between S<sub>1</sub>-R<sub>1</sub> information and ISI were obtained for both RT<sub>1</sub> and RT<sub>2</sub>. These similar patterns of interaction and additivity for both RT<sub>1</sub> and RT<sub>2</sub> support the unitary assumption. (26 ref)—*Journal abstract*.

6591. Lauer, L. W. (Texas A&M U) **Cognitive geography: A preliminary statement.** *New Scholar*, 1974(Spr), Vol 4(2), 205-210.—The field of cognitive geography seeks to relate objective environments and behaviors in terms of a subjective cognitive domain lying between them. A model is presented which outlines the basis for some continuity between the 3 realms of the geographical universe: physical, perceptual, and behavioral.—*Journal summary*.

6592. Rabbitt, P. M. & Vyas, S. M. (U Oxford, Queens Coll, England) **Interference between binary classification judgments and some repetition effects in a serial choice reaction time task.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1181-1190.—Hypotheses to explain the repetition effect in serial choice reaction tasks have suggested that on each consecutive trial S compares the percept of the current signal against his memory trace of the last. A direct test was made of this hypothesis, requiring a total of 34 college students in a serial self-paced choice reaction time task to classify each signal as being the same or different from its predecessor. Results of 3 experiments show that the nature of successive judgments interfered with the selection of successive responses made to implement them. Reaction times were also affected by the nature of comparisons between successive signals. Repetitions of signals, repetitions of responses, and repetitions of judgment were all shown to contribute to sequential effects. The hypothesis of identity between processes underlying repetition effects and those underlying binary classification of successive signals was shown to be untenable and, in view of the complexity of the interactions obtained, far too simple to be of use in interpreting experimental data. The nature of the interactions obtained raises difficulties for recent popular methodologies and for the decompositions of reaction time data obtained from these methodologies on the assumption of simple additivity of reaction times of component processes to give overall observed reaction time.—*Journal abstract*.

6593. Sivik, Lars. **Color meaning and perceptual color dimensions: A study of color samples.** *Göteborg Psychological Reports*, 1974, Vol 4(1), 31 p.—Presents a revised and comprehensive report of the author's 1970 study of the relations between semantic variables and perceptual color parameters. 71 color samples were judged by 168 passersby using 26 semantic differential scales, and results were factor analyzed. The factors of meaning were congruent with those of earlier studies. It is claimed that the relations between colors and meanings are advantageously illustrated and understood by means of so-called isosemantic mapping of the color-descriptive model used. Isosemantic patterns based on factor scores for each of the 4 factors and for each of the 4 elementary hue triangles were analyzed. Localized

variations of semantic dimensions within the color world show complex though systematic relations within the color variables, indicating the importance of "secondary" color areas (e.g., brown, orange, and pink). (19 ref)—*Journal abstract*.

6594. Vereb, Christine E. & Voss, James F. (U Pittsburgh) **Perceived frequency of implicit associative responses as a function of frequency of occurrence of list items.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 992-998.—Investigated whether frequency judgments of implicit associative responses (IARs) vary as a function of frequency of occurrence of the word assumed to elicit an IAR (critical word, CW). 2 sets of CWs were presented to 200 undergraduates in a list, with frequencies of CW occurrence equal to 1, 2, 4, 8, or 16 in both sets. Data indicate that mean judged IAR frequencies were approximately 1-2 regardless of CW presentation frequency, whereas frequency estimates of CW occurrence increased appreciably as a function of CW occurrence. This finding suggests that IARs do not tend to occur with repeated CW presentations. In addition, more Ss gave nonzero judgments in the IAR experimental condition than in the control; and of the nonzero judgments, mean frequency estimates were greater at frequencies of 8 and 16 in the experimental than in the control conditions. The latter results suggest that an IAR occurs to the 1st presentation of a CW and the S then tends to discriminate the CW from the IAR. Subsequent IAR occurrences tend to be very few and are more likely to occur with a high frequency of CW presentations, thus suggesting a temporary loss of the discrimination.—*Journal abstract*.

#### Learning & Thinking & Conditioning

6595. Arai, Kunijiro. (Tokyo U of Education, Japan) **[The effects of visual illustrations on learning.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Mar), Vol 22(1), 45-49.—Studied the effect of stimulus variations on the concrete-abstract continuum. In Exp I, 4 groups of 72 2nd graders who had not attained the concept of a superordinate-subordinate relationship performed the concept learning tasks under 4 different stimulus conditions: concrete objects, geometric, linear, and verbal representations. The proposed difficulty levels were not confirmed; however, the result was in the expected direction. In Exp II, similar tasks were given to 3 groups of children: 1st and 2nd graders, 3rd and 4th graders, and 5th and 6th graders ( $N = 1,237$ ). Significant group differences of performance were found between the stimulus conditions. Age was positively correlated with the difficulty level of the stimulus conditions.—S. Choe.

6596. Arnberg, Peter W. **Observing and verbal behavior in simple problem solving after complex pretraining: Case studies.** *Reports from the Psychological Laboratories, University of Stockholm*, 1972(May), No 351, 19 p.—In a study of problem solving with tactile stimuli, responses and observing behavior of 12 university psychology students were recorded electrically, and the resulting information was processed via an event recorder. After discrimination pretraining, Ss were given another pretraining session in which they were to sum the values assigned to the 2 stimulus objects involved, in

order to arrive at the cue for the correct response. Ss were then given a problem where they only had to find out which one of 4 dimensions was relevant in order to get the correct cue. As could be expected after the more complex pretraining, Ss worked with hypotheses about the solution which were similar to the correct rule in the previous pretraining. This delayed the verbalization of the correct solution, and in 2 cases it was entirely prevented. This method made possible the study of gradual and seemingly unconscious learning of direction of selective attention and the effect of the changed direction on correct verbalization. (29 ref)—*Journal abstract*.

6597. Baumeister, Alfred A. & Blouke, Peter. (U Alabama) **Response pretraining in subject-paced paired-associate learning.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 295-299.—Attempted to (a) replicate the response pretraining phenomenon observed by W. Runquist and J. English (1964), (b) determine whether the effect could be generalized across different types of material, and (c) establish whether transfer effects are essentially negative or positive. 2 studies of 90 undergraduates indicate that under S-paced conditions, irrelevant response pretraining led to greater positive transfer. This effect was observed both for words and for consonant-vowel-consonants as responses.—*Journal abstract*.

6598. Blomkvist, Anna-Christina. **Figurative and numerical presentations of probabilities in rating games.** *Göteborg Psychological Reports*, 1974, Vol 4(7), 24 p.—In 3 studies, a total of 49 male probationary-institution inmate volunteers were given stimuli in the form of partly shaded geometrical figures and were asked to give ratio estimates of the shaded parts to the whole. The same stimuli were separately presented as illustrations of probabilities when Ss were asked to rate the favorableness of given games of chance. When Ss were presented games with probabilities in the form of illustrations (circles or rectangles) on the one hand, and numerical values on the other, the ratings did not differ in terms of Kendall's  $\tau$  Ratio estimates and ratings tended to be higher for stimuli in the form of rectangles than for stimuli in the form of circles. (15 ref)—*Journal abstract*.

6599. Carlin, Albert S.; Post, Robin D.; Bakker, Cornelis B. & Halpern, Lawrence M. (U Washington, Seattle) **The role of modeling and previous experience in the facilitation of marijuana intoxication.** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 275-281.—40 male 21-34 yr old Ss without previous experience with marijuana smoked marijuana or placebo cigarettes in the presence of a model who exhibited marijuana-intoxicated behavior or did not. Marijuana-naïve Ss' self-ratings of intoxication were differentially affected by drugs and placebo, but were not affected by modeling. Performance on 4 of 6 cognitive measures (e.g., color-naming and alternate uses tasks) was impaired by drug consumption. On 1 additional task, performance was impaired by modeling in conjunction with consumption of the active drug. To clarify the nature of the relationship between previous experience with marijuana and self-ratings of intoxication, analyses were carried out which compared performance, symp-

toms, and ratings of marijuana-naïve and experienced Ss. Results indicate that previous experience is a socialization process through which individuals learn to discriminate and label the drug state as intoxication.—*Journal abstract*.

6600. de Montpeller, Gérard. (U Louvain, Lab de Psychologie expérimentale, Belgium) **[Temporal conditions in intentional and incidental learning: Effect of presentation time and inter-item interval.]** (Fren) *Psychologica Belgica*, 1974, Vol 14(1), 11-17.—Conducted 7 experiments with a total of 280 Ss to study paired-associate learning of words paired with nonsense syllables. The independent variables were (a) item presentation time, (b) interitem interval, and (c) incidental vs intentional learning. Results show that intentional learning was better than incidental learning in all conditions. This difference was greater for long interitem intervals. Higher presentation times favored recall more in the incidental than in the intentional learning condition. (English abstract)—S. Slak.

6601. Diveley, Sally & Rabinowitz, F. Michael. (Tulane U) **Modality and the transformation problem in paired-associate learning of children.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 907-912.—Used a modified study-test procedure to investigate possible modality transformation problems in the paired-associate learning of 96 3rd-grade children. Ss were asked to point to the correct test-response item. Stimulus mode (picture vs word), study-response mode (picture vs word), and test-response mode (picture vs word) were factorially combined on both the original learning and transfer tasks. On the transfer task, given after S reached original learning criterion, the test-response mode was changed from pictures to words or vice versa. Consistent with the conceptual peg hypothesis, pictures, as compared to words, required less trials to criterion in both the stimulus and test-response modes during original learning. Evidence of modality transformation difficulties was obtained in the transfer analyses, as different response modes on the study and test trials interfered with transfer performance.—*Journal abstract*.

6602. Earhard, Marcia. (Dalhousie U, Halifax, Nova Scotia, Canada) **Free-recall transfer and individual differences in subjective organization.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1169-1174.—Conducted 2 experiments with a total of 112 undergraduates to determine whether whole-part and part-whole transfer depended on the learner being a good or a poor subjective organizer during free recall. Subjective organization was assessed by a free-recall pretest. When high organizers organized and performed better during the initial learning task, they had some difficulty transferring for a few trials and then achieved a better final level of learning than did the low organizers. When there was no difference in performance or in organization between high and low organizers in their acquisition of the 1st list, high organizers transferred better to the 2nd task whether it consisted of altogether new or some old and some new items. Results are discussed in terms of the organizational interpretation of the negative transfer from whole to part and from part to whole lists, and in terms of the basis for individual differences in



subjective organization and free recall. (21 ref)—*Journal abstract*.

6603. Galanter, Eugene & Owens, J. A. (Columbia U, Psychophysics Lab) **The independence of the simple reaction time on key force.** New York, NY: Columbia University, Psychophysics Lab, 1974. 12 p.—Reports a reaction-time experiment which assessed the influence of different key pressures on response distributions. Reaction-time distributions for 3 well-practiced Ss did not differ across force levels, indicating that the effect of changes in the design of a response key is an irrelevant variable in a reaction-time experiment. (18 ref)

6604. Grabitz, Hans J. & Grabitz-Gniech, Gisla. (U Mannheim, W Germany) **[The cognitive process foregoing decisions: Theoretical approaches and experimental investigations.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(4), 522-549.—Examines the various theoretical concepts regarding predecisional cognitive processes and discusses the methods applied to investigate and test them. The concepts surveyed include cognitive dissonance theory of L. Festinger; the conflict-theory approach of I. L. Janis and L. Mann; the reactance theories of R. A. Wicklund, and D. E. Linder and K. A. Crane; and the choice-certainty theories of J. Mills and A. Ross. Results of experiments testing these theories are described. The problems and difficulties connected with certain theoretical approaches and experimental schemes are scrutinized and explained. (English & French summaries) (3½ p ref)—T. Fisher.

6605. Haroche, Claudine. (U Paris VII, Lab de Psychologie Sociale, France) **[Experimental study of the role of an irrelevant specification in a question.]** (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol 21(4), 167-170.—Notes results of a study of responses of 160 French secondary school students to questions containing qualifiers having no bearing on the sense of the original question. Results suggest that the concept of irrelevance can be quite variable and the importance of subjective interpretation of presumably irrelevant qualifiers is suggested.

6606. Johnson, Edgar M. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Numerical encoding of qualitative expressions of uncertainty.** *US Army Research Institute for the Behavioral & Social Sciences, Technical Paper*, 1973(Dec), No 250, 22 p.—14 US Army enlisted men and 14 college students numerically encoded on a 0-100 scale each of 15 probability phrases that systematically covered a wide range of probabilistic meaning within 3 sentence contexts: weather forecast, prediction of personal success, and an intelligence report. Results show no difference in encoding of phrases into numerical equivalents between the 2 groups or as a function of age, sex, or educational level. It is concluded that individuals are relatively consistent and that their numerical encodings indicate an underlying asymmetric probability scale comprised of a small number of scales. Findings suggest that direct use of numerical scales is most promising and would facilitate the use of tools of probability theory and decision theory in intelligence analysis.—A. J. Drucker.

6607. Koffman, Elaine C. & Weinstock, Roy B. (Mary Washington Coll) **Total time hypothesis in low-meaningful serial learning: Task, age and verbalization instruc-**

**tions.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1210-1213.—Rate of studying consonant-vowel-consonant items was factorially combined with task (serial or modified serial learning), age (adult or child), and verbalization instructions (nonverbalized or verbalized). Rate had no effect on number correct. Verbalization and modified serial learning impeded learning, and verbalization influenced the serial position curve.

6608. Leahey, Thomas H. & Wagman, Morton. (Virginia Commonwealth U, Academic Ctr) **The modification of fallacious reasoning with implication.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 277-285.—Divided 48 Ss into 4 groups based on experimental-control procedures and affirmation of consequent-denial of antecedent treated. Ss gave truth judgments on 2 verbal statements, one implicative and one disjunctive. They performed an inference task involving cards about which implication rules were read such that on most items one of the fallacies could be made. Results show an equivalent improvement on both treated and untreated fallacies for all groups. Most Ss treated implications as if it were the biconditional. It is suggested that findings support Piaget's theory of formal operations.—*Journal abstract*.

6609. Lindahl, Maj-Britt. (U Uppsala, Psykologiska Inst, Sweden) **Concept learning and the intradimensional spread of the relevant values of the instances: I. Effects of intraclass variability.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 207-214.—Studied concept learning in 20 undergraduates, using 2 ranges of the concerned intraclass variability, one about twice the other. Depending upon the learning strategy used by the Ss, the smaller intraclass variability had a limited facilitating effect on concept learning. Some facilitation occurred when strategies involved a rather unselective attention to the appearance characteristics of the instances but not when they involved selective focusing on these characteristics, or on elements of relevant knowledge established pre-experimentally. Results are discussed in relation both to relevant stimulus-response conceptions and information-processing models of concept learning. It is concluded that automatic generalization as described in stimulus-response theories might have to be integrated into the information-processing models for some categories of learning.—*Journal abstract*.

6610. Lindahl, Maj-Britt. (U Uppsala, Psykologiska Inst, Sweden) **Concept learning and the intradimensional spread of the relevant values of the instances: II. Effects of extreme values and position of class border.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 215-224.—Employed 30 undergraduates in an experiment with instances, the values of which varied continuously intradimensionally, which in turn resulted in continuously varying intradimensional differences between instances belonging to different classes. Results support the hypothesis that with Ss attending selectively to specific before-the-eyes characteristics of the instances, 1 hypotheses-testing routine may be described as follows: the Ss first select and test intradimensional differences for relevance in the order of their relative sizes, and then, on finding some such differences

presumably relevant, proceed to hypothesize midpoints or other easily registerable points on the involved dimension as class borders. This routine is concluded to (a) integrate various lines of thought within concept learning dealing with the effects on learning of intradimensional value separation and relative frequencies of relevant attributes and (b) represent a memory structure. (18 ref)—*Journal abstract*.

6611. Martin, David W. & Kelly, Richard T. (New Mexico State U) **Secondary task performance during directed forgetting.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1074-1079.—2 experiments with a total of 40 undergraduates examined the processing demands during a short-term memory task in which Ss were instructed to forget part of a list of stimulus words. This directed forgetting technique permitted variation of the memory load while holding list size constant. A simple reaction time (RT) task was performed concurrently with the encoding, retention, and serial recall of word lists. Results comparable to those reported in similar studies using pupillary response were obtained using RT as a secondary task. Within 4 sec following cues to forget a portion of the word list, secondary task performance was found to improve correspondingly. No evidence was found to indicate that the secondary task measure was influenced by verbalization.—*Journal abstract*.

6612. May, William W. (Appalachian State U) **A re-examination of the hierarchy-of-difficulty finding under conditions of reduced within-task interference.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 237-244.—Employed 1 between-Ss and 2 within-Ss designs to study the relative influence of task size and type of concept name on the hierarchy of difficulty (HOD) finding reported by E. Heidbreder (1947). The concepts used varied along one of their relevant dimensions of concrete object, spatial form, and number. Ss were 40 undergraduates. Results indicate that most efficient learning occurred when 2 concepts per dimension were used with monogram names; however, the HOD was not affected by reduced within-task interference. Object concepts remained easier to identify than forms, and forms were easier than numbers. A 2-stage mediation hypothesis is advanced to account for the results.—*Journal abstract*.

6613. May, William W. (Appalachian State U) **Reexamination of the contiguity hypothesis in a multiple-concept-attainment task.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 603-609.—Examined B. J. Underwood's (see PA, Vol 27:2544) hypothesis that conceptual behavior is facilitated as instance contiguity of like concepts is increased, using concepts which varied in difficulty. Ss were 60 undergraduates. Results do not support this hypothesis; a moderate mixture of instances tended to facilitate performance more than a condition of completely unmixed contiguity.—*Journal abstract*.

6614. McGuigan, F. J. & Winstead, C. L. (Hollins Coll) **Discriminative relationship between covert oral behavior and the phonemic system in internal information processing.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 885-890.—Attempted to determine the relationship between electromyographic (EMG) measures of covert oral response patterns and class of

linguistic input. 12 right-handed Ss, aged 11-20 yrs, silently performed tasks (reading, viewing, memorizing, and recalling) that primarily involved bilabial verbal material (designed to heighten covert lip activity); they also covertly performed lingual-alveolar tasks (intended primarily to increase tongue activity). Results indicate that covert lip EMGs were especially prominent only during bilabial tasks, and that covert tongue EMGs were relatively prominent only for the lingual-alveolar tasks. Preferred-arm EMGs were consistently heightened during both kinds of tasks, but left-arm EMGs and leg EMGs were not. It is suggested that the speech and other musculature may participate in central-peripheral circuits by generating afferently carried phonetic codes that retrieve phonemes from a central store. While the neural phonetic code is not itself meaningful, it may facilitate semantic processing by differential retrieval of phonemes that do make differences in meaning.—*Journal abstract*.

6615. McNicol, D. & Gosbell, J. J. (U New South Wales, Kensington, Australia) **Effects of context and imagery on original and interpolated learning: Confusion of list markers, or reduction of interference?** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1006-1013.—Conducted 2 experiments, using 144 undergraduates, to investigate changes in interference as a function of differences between original learning (OL) and interpolated learning (IL) in an A-B, A-C paradigm. In Exp I, the contexts of OL, IL, and the recognition tests were varied, and it was found that similar OL and IL contexts reduced discrimination between OL and both IL and extralist (EX) items. Changes in recognition context did not affect performance. In Exp II, OL and IL lists were learned by rote or with visual imagery. It was found that OL-IL and OL-EX discrimination was better when OL occurred with imagery, and that OL-IL and OL-EX discrimination was worse when IL occurred with imagery. Results support an interference model which postulates suppression of OL responses during IL, rather than a list marker model which assumes that similarity in OL and IL results in confusions about list membership at the time of retrieval.—*Journal abstract*.

6616. Meazzini, Paolo. (U Trieste, Inst Psicologia, Italy) **[The von Restorff effect: Experimental test of Green's hypothesis.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 164-185.—Green's hypothesis that the von Restorff effect is the result of a structural change brought about by the first heterogeneous item of a list was checked through a replication of Green's study and control over confounding meaningfulness with heterogeneity. When the confounding of these 2 variables was avoided the retention of the heterogeneous item was no longer favored, supporting a primacy view of the effect.—L. L'Abate.

6617. Miller, Lance A. (IBM, Thomas J. Watson Research Ctr, Yorktown Heights, NY) **Conjunctive concept learning as affected by prior relevance information and other informational variables.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1220-1222.—Manipulation of prior relevance information led to superior performance by undergraduates in the relevance-certainty vs relevance-uncertainty condition. Concomitant manipulation of 2-dimensional value



variables (number and kind) resulted in the predicted absence of reliable performance effects.

6618. Noizet, G.; Gary, A.; Benedetti, M. & Bouttin, J. (U Provence, Ctr d'Aix, France) [The determinants of time of rest during problem resolution.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 765-773.—Tested the hypothesis that the "resting time"—the interval between the presentation of a stimulus and the response to it—can be divided into segments: the process of collecting and analyzing information, and the process of making a decision. Ss were 60 female elementary school students, each assigned to 1 of 4 experimental conditions. The experimental task, to discover in a set of elements (letters) the element not belonging, was presented in 3 variations. Results of data analysis support the hypothesis; the "resting time" included a period for collection and treatment of information which was distinct from the period of decision making.—Z. M. Cantwell.

6619. Norman, Kent L. (U Alabama) Rule learning in a stimulus integration task. *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 941-947.—Studied 40 undergraduates to examine learning of simple linear and configural rules in a stimulus integration task. Ss learned to produce horizontal motor movements that represented a weighted average biased toward either the shorter or longer distance or the 1st or 2nd movement in a sequence of 2 fixed movements. On each trial Ss reported which of the 4 rules they thought was correct. Results indicate that overall learning rates for the 2 configural relationships dependent on relative magnitude were slightly superior to those for the 2 linear relationships dependent on temporal order. Differences in learning were ascribed to a hypothesis-sampling model in which Ss test 1 mode of bias at a time and learn the form of the rule in an all-or-none manner.—*Journal abstract*.

6620. Peterson, Lloyd R. (Indiana U) Learning. Glenview, IL: Scott, Foresman, 1975. 134 p. \$3.25.—Presents an introductory survey of classical and contemporary approaches to the study of learning. Topics include the theory behind, the measurement of, and research designed to test classical conditioning, instrumental conditioning, reinforcement, retention, verbal learning, and skilled performance concepts. (10% p ref)

6621. Pomm, Hermann P. [A mathematical interpretation of levels of learning.] (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 387-395.—Discusses the process of learning motor skills, learning curves, learning plateaus, etc. Learning plateaus are seen as periods of arrested progress, a time of revising, reorganizing, and switching to new methods and approaches. A mathematical model for the entire process is presented: the time of temporary decrease in the curve of growth and progress is interpreted graphically and based on mathematical formulas. As defined mathematically, the learning process is a process of disintegration which may cause a temporary standstill or decrease of achievement. (English & French summaries)—T. Fisher.

6622. Rigney, Joseph W. & Lutz, Kathy A. CAI and imagery: Interactive computer graphics for teaching about invisible processes. *Behavioral Technology Laboratories, U Southern California, Technical Report*,

1974(Oct), No 74, 43 p.—Reviews some theorizing about internal and external, digital and analog representational systems. The possibility that there are 2 overlapping internal analog representational systems, one for organismic states and the other for external world dimensionalities and objects, is considered. The concept of a working memory, or "mind's eye," and its importance in learning is described. Some conceptions of how this might serve in the generation of mental imagery from digital propositional information stored in long-term memory are noted. Research bearing on the use of external imagery for facilitating learning and improving retention is reviewed. A project to use the Plato IV system for automatically running Ss and collecting and analyzing data anywhere in the Plato IV network is described.—*Journal abstract*.

6623. Roberge, James J. (Temple U) Effects of negation on adults' comprehension of fallacious conditional and disjunctive arguments. *Journal of General Psychology*, 1974(Oct), Vol 91(2), 287-293.—41 adult Ss evaluated conclusions for 2 types of fallacious conditional arguments and their logically equivalent disjunctive forms. The presence of the negative "not" was varied systematically within the major premise of each argument. Results indicate that negation in the major premise had a significant effect on reasoning, and that this effect varied significantly according to the type of reasoning. A significant interaction between the type of reasoning and principle of inference was also obtained. The patterns of erroneous responses were consistent with those found in previous studies with children and adults. (18 ref) —*Journal abstract*.

6624. Robert, M. (U Paris VIII, France) [Psychological modeling and learning under a program of fixed interval reinforcement and training in time estimation.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 563-571.—Investigated the effectiveness of psychological modeling in learning under variations of conditioning. Ss were 50 male and female medical students 20-25 yrs old, randomly assigned to 4 experimental groups which were differentiated by conditioning situations and types of preliminary training (modeling or direct). Ss were given 3 types of training in estimating the duration of a series of time intervals. The 3 types involved variations in time intervals and task reinforcement. It was hypothesized that Ss in the modeling groups would show a positive transfer effect and that the modeling groups trained at fixed time intervals would perform better than those trained at variable time intervals, irrespective of whether or not beginning and ending of task were fixed to reinforcers, although those receiving training under a fixed condition would perform best. Results indicate no difference in attainment of criteria of acquisition among different conditioning groups. However, the less rigid the training, the better the transfer effect. A positive correlation was found between the attainment of the criteria of acquisition and the correct identification of the statement under fixed time interval training.—Z. M. Cantwell.

6625. Rouquette, Michel-Louis. (U Paul-Valéry, Lab de Psychologie, Montpellier, France) [The analysis of poorly defined problems.] (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 3-9.—Proposes 3 fundamental types of

problem-solving situations for use in the study of poorly defined tasks: (a) Both the material of the problem and the requirements of the solution are specified. (b) The requirements of the solution are specified, but not the material to be treated. (c) The material is specified but the requirements of the solution remain indeterminate. In this categorization, material solutions have a descriptive value permitting characterization of the structure of any conceivable problem. The specification concept applies to both and is the basis for distinguishing between subcategories. Construction of the language was based on analysis of 47 statements of poorly defined problems from the literature of creativity. Examples illustrating use of the taxonomy are given. (English summary)—E. E. Brown.

6626. Santesson, Anna. (U Stockholm, Inst of Applied Psychology, Sweden) **The perception of logical principles in a test of reasoning ability.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 45, 10 p.—Asked 32 16-49 yr old Ss (predominantly university graduates) to group items whose solution, according to their opinion, was ruled by the same logical principle. Individual categorizing was limited to those items to which S had responded in a testing session prior to the experiment. The number of actual occurrences of each of the combinations of items was expressed as a percentage of the number of possible occurrences. The resulting matrix was treated by a method of cluster analysis, in turn yielding 3 interpretable clusters. When plotting the items belonging to these 3 clusters in a graph which related estimated item difficulty to the item sequence of a test based on decreasing solution frequencies, there was great variation within the clusters in both perceived and objective difficulty. Difficulty could not be said to have influenced the Ss in the sorting task. Within each of the obtained clusters an increase of objective difficulty had its correspondence in an increase of perceived difficulty. Thus, the same kind of relation was found within clusters as had previously been found between the 2 measures concerning the total test. (24 ref)—*Journal abstract*.

6627. Schmeck, Ronald R. (Southern Illinois U) **A tendency toward error repetition produced by previous experience with inconsistent feedback.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 221-229.—In a paradigm comparable to discriminative instrumental conditioning, 40 undergraduates performed 2 tasks employing the same "instrumental response"—the word "yes" spoken whenever a stimulus was thought to be correct. On Task 1, Ss were given inconsistent feedback (told that they were wrong when they were actually right); following Task 1, half of the Ss were informed that the apparatus had been malfunctioning but that the flaw had been corrected. Results indicate that the experience of inconsistent feedback on Task 1 had a tendency to increase the probability that Ss would repeat their errors while learning Task 1. A. Amsel's model (see PA, Vol 38:2017) was used to explain the data.—*Journal abstract*.

6628. Schwartz, Marian & Walsh, Michael F. (U Wisconsin, Madison) **Identical subject-generated and experimenter-supplied mediators in paired-associate learning.** *Journal of Experimental Psychology*, 1974(Nov),

Vol 103(5), 878-884.—Conducted 2 experiments in which a total of 120 college students were tested with materials and instructions that made the generated verbal mediators highly predictable (in Exp II, 100% predictable). This made it possible not only to supply mediators identical to the generated ones but also to maximize the probability that the supplied mediators would be the same as those which the supplied Ss would have generated for themselves. Results indicate that mediator origin per se had no significant effect on recall. It is suggested that in earlier studies a bias was operating against the supplied condition because the supplied mediators were, in a substantial proportion of instances, different from those which the supplied Ss would have generated for themselves.—*Journal abstract*.

6629. Seybert, Jeffrey A. & Weiss, Robert F. (U Oklahoma) **The negative reinforcing functions of nonconformity.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 791-795.—Used N. E. Miller's (1959) general approach called "extension of liberalized stimulus-response theory" in 2 experiments with 108 undergraduates. Results show that Ss would learn an instrumental response, the reinforcement for which was the opportunity to escape from a situation in which they were a nonconformist. When the nonconformity situations were presented on an intermittent basis, speed of the response was a function of the percentage of nonconformity trials ( $p < .001$ ). When the opportunity to escape was delayed, response acquisition was an inverse function of the length of the delay ( $p < .001$ ). Results correspond to data collected in instrumental escape conditioning experiments on delay of reinforcement and intermittent shock using similar procedures. (29 ref)—*Journal abstract*.

6630. Stinessen, Lelf. (U Trondheim, Psykologisk Inst, Norway) **Verbalization of discovered principles for solving match-stick problems.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 203-206.—Studied the problem-solving performance of a total of 78 high school and university students in 4 groups. The 3 experimental groups were taught part of a principle under conditions differing with respect to the amount of hints given as to the nature of the missing part of the principle. Ss' performance was compared to that of a control group that was taught the full principle. After practice, those who were taught the principle partially were asked to state the missing part of the principle, or any other general method found for solving the problems. Ss who were taught the full principle solved most problems, while performance under experimental conditions varied with the preciseness with which the stated principle specified relevant parts of the problems to be solved. The hints failed to influence performance with respect to both problem solving and ability to state principles.—*Journal abstract*.

6631. Swanson, James M. (U Texas) **The neglected negative set.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1019-1026.—Studied 18 Ss to investigate the effect of the negative set on the form of the functional relationship between RT and positive set size. Random forms were used as stimuli in S. Sternberg's (see PA, Vol 40:10810) memory scanning paradigm, and the type of negative set was varied. A linear



function relating RT and positive set size was obtained using the Sternberg-type (complementary) negative set; a log function was obtained using the G. Briggs- and J. Swanson-type (fixed) negative set; a flat function was obtained when unfamiliar items comprised an unknown negative set. These data support the hypothesis that dual classification processes operate under certain conditions in stimulus classification.—*Journal abstract.*

6632. Tarry, Roger M. (Bucknell U) **Basic principles of learning.** Glenview, IL: Scott, Foresman, 1975. 261 p. —Presents an overview of the fundamental principles of learning theory, their derivation, procedures for measurement, and empirical evidence of their validity. Avoidance, classical and instrumental conditioning, punishment, extinction, secondary reinforcement, and generalization are all discussed. (27 p ref)

6633. Thomas, David R. & Thomas, Doris H. (U Colorado) **Stimulus labeling, adaptation level, and the central tendency shift.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 896-899.—3 groups of female undergraduates ( $n = 20$ ) were presented a 60° training stimulus (TS) line and subsequently were tested for recognition (i.e., generalization), either symmetrically with values of 40-80°, or asymmetrically with values of 40-60°. One of the 2 asymmetrical test groups was instructed to label the TS line in terms of its position on a hypothetical clock face. Results show that the symmetrical test group yielded a decremental gradient peaking at the TS value, whereas the asymmetrical control (i.e., no label) group showed a central tendency shift with maximal responding displaced to 50°. The asymmetrical clock-face group showed no shift but rather a sharp decremental gradient peaking at the TS value. Results are discussed in terms of both verbal mediation and adaptation level theory.—*Journal abstract.*

6634. Twitmyer, Edwin B. (U Pennsylvania) **A study of the knee jerk.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1047-1066.—Knee-jerks to the sound of a bell were obtained from 6 college students after 150-238 trials, during which the 2 patellar tendons were struck 0.5 sec after the sound of the bell. These knee-jerks to the bell alone were not the result of S's voluntary effort, and attempts to inhibit the kicks were wholly unsuccessful. With increased numbers of paired stimulations, the regularity of responding to the bell alone was greatly increased, and the pattern of the knee-jerks was exactly the same as that of knee-jerks resulting from blows to the patellar tendon. The knee-jerks to the bell can be explained only in terms of reflex action, wherein repeated association of the functioning of the motor cells of the lumbar segment of the spinal cord with excitation of centers of the medulla resulting from the sound of the bell resulted in the development of an unusual reflex arc.—*Journal abstract.*

6635. van Kreveld, D. (U Leyden, Psychological Inst, Netherlands) **Changeability of the transitivity schema for influence structures.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 569-581.—Conducted 3 experiments to test the hypotheses (a) that the more transitive a previously learned structure, the smaller will be the number of errors in learning a new structure, and (b) that a reduction in

errors caused by the transition (transfer) of a previously learned structure will be obtained for large "learning distances" and "position-effects." Ss were 45, 96, and 75 students, respectively, for the 3 experiments, which measured the association of names of imaginary persons with the names of towns. In Exp I, which tested the content of the material and degree of transfer, the transfer effect in terms of "position" and "distance" was not found. In Exp II, the measurements indicated the degree of transfer in learning the names of variable dyads and transitive and intransitive triples. Exp III repeated the pattern of Exp II with easier and smaller structures. Results of the experiments did not confirm the hypotheses. Experience with transfer did not result in a general overall saving in learning a transitive structure.—*A. J. Ter Keurst.*

6636. Vidal-Madjar, A. (U Paris X—Nanterre, France) **[Guided discovery using simulation: Relation to the elaboration of procedures for the solution of problems.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 606-621.—Conducted a study of guided discovery learning in which simulation was available to assist S in problem solution. Ss were 27 13-15 yr old students who were presented with 5 problems of increasing difficulty. Each problem was worked on in a 40-min session in which an S was paired with an O. Simulation materials were present in each session and their use was directed by either S or O to clarify problem solution for the S. Ss fell into 3 groups: (a) those able to discover a new operation at least in the 2nd problem; (b) those able to discover a new operation in problems 3 and 2; (c) those able to discover a new operation in problems 2, 3, and 4. Efficacy of simulation varied considerably among Ss. Details of observed behavioral differences among groups in approaches to problem solution and use of simulation are reported.—*Z. M. Cantwell.*

6637. von Thun, Friedemann S. (U Hamburg, Psychologisches Inst, W Germany) **[Intelligibility of informational texts: Measurement, improvement and validation.]** (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(2), 124-132.—Studied comprehension and retention of written information. Intelligibility theory states that comprehension and retention depend on the text's simplicity, organization and structure, brevity and conciseness, and supplementary stimulation (elements of style that arouse the reader's interest). 8 previously published articles were revised with close attention to three principles. 64 female students were given 4 original and 4 revised articles. For 6 of the 8 articles, students reading the revised articles had significantly higher comprehension and retention scores.—*English abstract.*

6638. Wickens, Delos D. & Dalezman, Joseph. (Ohio State U) **Spontaneous recovery and clustering of first-list responses.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1067-1073.—Conducted 2 experiments in which, following A-B, A-D learning, a total of 200 undergraduates were presented with a 32-item free-recall (FR) list with either the List-1 or List-2 response terms embedded randomly within it. This FR list was given either 2 or 20 min after completion of List-2 training. List-1 response term recall was found to be inferior to List 2 at 2 min, but was equivalent or slightly better than List-2 recall at a 20-min retention interval.

Similarly, List-1 response clustering was inferior to List 2 at 2 min but superior to List 2 at 20 min. Results are interpreted as support for the response class suppression hypothesis of retroactive interference. (17 ref)—*Journal abstract*.

6639. Wilcove, W. Gregg & Miller, Joseph C. (MacMurray Coll) **CS-UCS presentations and a lever: Human autoshaping.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 868-877.—Conducted 6 experiments with 30 college students to investigate similarities and differences between animal and human behavior under autoshaping procedures. The naive, uninstructed Ss were placed in a room containing a lever, a translucent panel, and a slot for pennies. Within an experimental session, the translucent panel was lit (conditioned stimulus) for 5-sec duration on a variable-interval 20-sec schedule for 5 min and was then paired with penny delivery for 12 min. It is concluded that in the present experimental situation, humans (a) brought a prepotent response to the situation which became temporally controlled by a neutral stimulus predictive of reinforcement; (b) behaved as if environmental events (usually the unconditioned stimulus, UCS) were under response control and appeared to test hypotheses about response production of the UCS; and (c) demonstrated that human autoshaping processes are different from rat or pigeon autoshaping processes, although both animals and humans show similarities in response tendency. (17 ref)—*Journal abstract*.

6640. Yukawa, Takako. (Kyoto U, Japan) **[Identification as a motivational factor in learning: I. Effect of model on a choice behavior.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Mar), Vol 22(1), 11-20.—The 1st of 2 groups of 40 2nd graders, matched in terms of sex, IQ, and personality traits, performed a set of learning tasks with the personal assistance of a model during 3 20-min sessions 10 days apart. For Group 2, a model was present and gave demonstrations without any personal interactions. One wk after the last session, with a similarly matched group added as a control, Ss' identification and imitating behavior were rated in a test session in which 2 models, one familiar to the 1st group, the other unfamiliar to all groups, were present. Results show that identification with a model significantly facilitated children's imitation of the model's cognitive characteristics. (English summary)—*S. Choe*.

6641. Zajano, Michael J. & Grant, David A. (U Wisconsin, Madison) **Response topography in the acquisition of differential eyelid conditioning.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1115-1123.—Defining a criterion that identified that block of 8 training trials during which S first began to respond more frequently to the reinforced (conditioned) stimulus (CS+) than to the nonreinforced stimulus (CS-) identified 55 of 80 undergraduates as "discriminators" and permitted comparison of pre- and postdiscrimination frequency and topography of conditioned responses (CRs) to CS+ and CS-. Results show that on prediscrimination trials 2 Ss with V-topography gave a high frequency of CRs to both CS+ and CS-, achieving discrimination by suppressing CRs to CS-. Ss with C-topography Cs initially gave a low frequency of CRs to both CS+ and CS- and achieved discrimination by

increasing their response rate to CS+. Those Ss who changed from predominantly V to C or from C to V topography changed their response bias accordingly. Average topographic features of CRs to CS+ were different from those to CS- even before conditioned discrimination was evidenced by differential frequency of responding to CS+ and CS-. Findings indicate that there may be at least 4 distinct stages in the acquisition of the differentially conditioned eyelid response. They involve stimulus detection, stimulus identification, response selection, and response modification. (17 ref)—*Journal abstract*.

6642. Zajano, Michael J.; Grant, David A. & Schwartz, Marian. (U Wisconsin, Madison) **Transfer of differential eyelid conditioning: Effects of semantic and formal features of verbal stimuli.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1147-1152.—Following 80 differential eyelid-conditioning trials during which members of a set of 4 4-letter names of mammals were reinforced with the airpuff and members of a set of 4 7-letter names of birds were not (or vice versa), 80 undergraduates were given 40 transfer trials with 8 new words all paired with a delayed airpuff. The transfer words were 2 4-letter and 2 7-letter names of mammals, and 2 4-letter and 2 7-letter names of birds. Each S was classified as a V or a C in terms of his conditioned response topography. Both Vs and Cs may have encoded the training stimuli in terms of taxonomic category rather than in terms of word length, but only the Vs transferred their conditioned discrimination to the new words by responding more frequently to the taxonomic category that had been reinforced during training. There was no evidence that Vs transferred in terms of the word length that had been reinforced, and the Cs showed no differential transfer. The findings provide further evidence of the nature of the differences between Vs and Cs in eyelid conditioning.—*Journal abstract*.

#### Attention & Memory

6643. Anderson, John & Hastie, Reid. (U Michigan) **Individuation and reference in memory: Proper names and definite descriptions.** *Cognitive Psychology*, 1974(Oct), Vol 6(4), 495-514.—Investigated selected aspects of J. Anderson and G. Bower's (1973) human associative memory (HAM) model. 16 undergraduates received simple predicated facts about an individual person—some facts referred to him by proper name and others by his profession. In a "before" condition, Ss learned that the profession and name referred to the same individual before learning the facts, while in an "after" condition, they learned the identity after learning the facts. Subsequent to learning the facts and identities, Ss verified sentences based on what they had learned. Verification latencies indicated that in the before condition, one memory node was created to represent the individual, but 2 nodes were set up in the after condition. Asymmetries between proper names and professions indicate that the 2 types of referring expressions are treated differently in long-term memory.—*Journal abstract*.

6644. Anderson, John R. (U Michigan, Human Performance Ctr) **Retrieval of propositional information from long-term memory.** *Cognitive Psychology*,



1974(Oct), Vol 6(4), 451-474.—Presents 3 experiments in which a total of 54 undergraduates learned 26 sentences of the form, "A hippie is in the park." The experiments manipulated the number of such propositions involving a particular person (e.g., hippie) or a particular location (e.g., park). After learning the material, Ss were asked to judge whether particular probe propositions were from the study set. Results indicate that times to make these judgments about probe propositions increased with the number of study propositions involving the person or location used in the probe proposition. A model is presented which assumes an S simultaneously accesses memory from all concepts in a probe proposition and serially searches through all study propositions involving each concept. The model also assumes that search of memory terminates as soon as one search process from a concept finds the probe proposition or exhausts the study propositions attached to that concept. (17 ref) —*Journal abstract.*

6645. Bock, J. Kathryn & Brewer, William F. (U Illinois) **Reconstructive recall in sentences with alternative surface structures.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 837-843.—Tested 40 undergraduates to examine recall for sentences admitting optional surface transformations. Results show that such sentences were consistently more difficult to recall correctly than were control sentences which did not admit optional transformations. There were strong biases in the degree to which the 2 surface forms of an optional-transform sentence were correctly recalled. The recall biases showed little relation to the transformational status of the sentences, but showed a strong relation to speech production preference ratings, supporting a theory of memory which postulates that sentences are remembered in terms of their underlying meanings and that in recall the speech output system is used to reconstruct new surface structures for these retained meanings. (21 ref)—*Journal abstract.*

6646. Ciccone, Donald S. & Brelsford, John W. (Rice U) **Interpresentation lag and rehearsal mode in recognition memory.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 900-906.—Attempted to evaluate the contribution of rehearsals to 36 college students' performance on a continuous recognition task. Using 3-digit numbers as stimuli to minimize encoding variability, the spacing between successive item repetitions was systematically manipulated in variable rehearsal (VR) and constant rehearsal (CR) conditions. Performance on the 3rd presentation of critical items in both rehearsal conditions was observed following a constant long-term retention interval of 25 items. Results show that (a) the VR condition resulted in an inverted U-shaped lag function; (b) the CR condition, while attenuating any systematic effect of lag, produced a higher overall level of retention; and (c) rehearsals in both CR and VR conditions paralleled the performance data quite closely. These findings suggest that when contextual variability is reduced, performance on a recognition task may be mediated via rehearsal frequency. (20 ref)—*Journal abstract.*

6647. Coltheart, Max; Lea, C. David & Thompson, Keith. (U Reading, England) **In defence of iconic memory.** *Quarterly Journal of Experimental Psychology*,

1974(Nov), Vol 26(4), 633-641.—Evaluates D. Holding's (1970) objections to G. Sperling's (1960) model of visual information-processing. Findings of 3 experiments with 6 Ss support Sperling's model. (17 ref)

6648. Derks, Peter L. & Bauer, T. Michael. (Coll of William & Mary) **Study and response time for the visual recognition of "similarity" and identity.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 978-984.—4 Ss (3 college students and 1 professor) compared successively presented pairs of line patterns for a match between any lines in the patterns (similarity) and for a match between all lines (identity). The patterns were presented in adjacent locations and were separated by a 0- or 5-sec delay. Conditions were varied between sessions. The exposure duration for the 1st pattern (study time) and the 2nd pattern (response time) was controlled by S's behavior. Results show that (a) for identity judgments, both study and response times were independent of the number of elements in the patterns; (b) for similarity judgments with 0-sec interval, both study and response times increased with the number of elements to be processed; and (c) for similarity judgments with a 5-sec interpair interval, some Ss were able to study the patterns with no increase in time for an increase in the number of elements. Qualitative differences within and between Ss were most evident in study times. (17 ref)—*Journal abstract.*

6649. Elliott, Maxwell C. (Simon Fraser U, Burnaby, British Columbia, Canada) **Physical size shift and release of proactive inhibition in short-term memory.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1216-1217.—Changed the physical size of a stimulus on the 4th trial of a short-term memory task with college students. A significant release of proactive inhibition effort was obtained. The possibility of the same mechanism being involved in the Von Restorff isolation effect found in long-term memory studies is discussed.

6650. Federico, Pat-Anthony & Montague, William E. (US Navy Personnel Research & Development Ctr, San Diego, CA) **Recognition memory for shapes as a function of encoding strategy.** *US Navy Personnel Research & Development Center Technical Report*, 1974(Sep), No 75-3, 19 p.—Investigated how imaginal and verbal encoding strategies interact with various stimulus characteristics to enhance or retard recognition performance; the secondary purpose was to test H. C. Ellis's (1972) conceptual coding hypothesis. A between-groups multivariate factorial analysis of covariance experiment with 96 undergraduates, and a within-S multivariate factorial analysis of variance experiment with 44 Ss, were conducted. In Exp I it was found that low codability (LC) shapes were better recognized under the verbal rather than the imaginal encoding set; high codability shapes were equally recognized under the imaginal and verbal encoding sets. However, in Exp II, where instructional set was a within-S factor, it was found that LC shapes were not better recognized under the verbal than the imaginal encoding set. Findings are discussed within the context of the studies, theories, and models brought to light in the extensive review of the relevant literature which had been conducted previously. (49 ref)—*Journal abstract.*

6651. Fijalkow, J. (U Quebec, Chicoutimi, Canada) **Research on lexical content in long-term memory: Antonym, synonym and frequency.** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 601-605.—Tested the hypothesis that the order of production of synonyms and antonyms would reflect their frequency in use. Ss were 2 groups of college students of 50 students each. The same list of 48 words was presented to each group; 1 group was asked to supply synonyms, the other antonyms, for the same list of 48 words. The order of production of synonyms and antonyms did follow the order of use frequency, verifying the hypothesis.—Z. M. Cantwell.
6652. Fisher, Judith L. & Harris, Mary B. (U New Mexico) **Effect of note-taking preference and type of notes taken on memory.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 384-386.—To study the effect of note-taking, type of notes taken, and review on recall, 112 male and female college students were randomly assigned to 4 treatment groups using different combinations of note-taking and review. No treatment effects were found, but preference for detailed notes was significantly positively correlated with recall for those assigned to take detailed notes, more weakly correlated with recall for those assigned to take no notes, and nonsignificantly negatively correlated with recall for those assigned to take only notes on main points.—*Journal abstract*.
6653. Franks, Jeffery J. & Bransford, John D. (Vanderbilt U) **Memory for syntactic form as a function of semantic context.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1037-1039.—Investigated some effects of semantic context on the ability of 18 undergraduates to remember the syntactic form of certain input sentences. Results support D. Slobin's findings (see PA, Vol 43:3735) when considering short passives for which no actor was supplied by extrasentential semantic context. However, in the case of short passives for which extrasentential context supplied information about the actor, verbatim memory for the short passives was greatly reduced, and Ss tended to recognize alternate sentential forms (actives and full passives) expressing the meaning of the short passives plus the contextually given actor.—*Journal abstract*.
6654. Hacker, Michael J. & Hinrichs, James V. (U Iowa) **Multiple predictions in choice reaction time: A serial memory scanning interpretation.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 999-1005.—12 undergraduates in a 4-stimulus, 2-response reaction time study were required to name the stimuli that they felt to be 1st and 2nd most likely to be presented on each trial. Responses following correct 1st predictions were faster than those following correct 2nd predictions, which in turn were faster than responses to unpredicted stimuli. Consistent with previous verbal prediction results, stimulus rather than response anticipation was the main component of the prediction effect for both the 1st- and 2nd-prediction data. Results also support a previously proposed prediction axiom for a serial, self-terminating memory scanning model.—*Journal abstract*.
6655. Hall, Douglas C. (Stanford Research Inst, Menlo Park, CA) **Eye movements in scanning iconic imagery.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 825-830.—Investigated the relationship between eye movements and iconic imagery in 5 undergraduates. A stimulus consisting of 3 rows of 3 letters each was tachistoscopically presented. Recall of particular rows was directed by tone cues sounded immediately after stimulus presentation, and eye movements were observed during recall. Eye movements during recall suggest spatial scanning of the iconic image, since Ss had a strong tendency to look where the requested stimuli used to be. (21 ref)—*Journal abstract*.
6656. Hunt, R. Reed & Ellis, Henry C. (U New Mexico) **Recognition memory and degree of semantic contextual change.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1153-1159.—Recent speculations concerning the mechanism of recognition failure underlying the context effect in recognition memory have emphasized the importance of establishing similar functional encodings of the to-be-recognized item in training and testing. The purpose of the present experiment was to examine this suggestion by manipulating the similarity of the semantic interpretation of polysemous nouns at training and testing through contextual variations. Ss were 75 undergraduates. The general trend of recognition performance was consistent with previous reports of context variation, but some of the specific comparisons appeared to raise problems for the encoding specificity explanation of recognition failure. An alternative explanation in terms of decision processes is suggested.—*Journal abstract*.
6657. Jenkins, James J. (U Minnesota) **Remember that old theory of memory? Well, forget it.** *American Psychologist*, 1974(Nov), Vol 29(11), 785-795.—Contrasts the position of associationism—that psychological phenomena are capable of analysis into basic relations between basic units—with the position of contextualism—that the relevance of any analysis depends upon the purpose for which the quality of a particular event is being explicated. Important aspects of the position of contextualism are illustrated in a discussion of 3 types of experiments in the domain of memory. The contextual approach is shown to provide a more adequate account of the experimental data than the associative approach. (21 ref)—B. Lindsey.
6658. Johnson, Ronald E. (Purdue U) **Abstractive processes in the remembering of prose.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 772-779.—Reports that the patterning of recall of linguistic subunits of textual prose by 58 undergraduates was strongly related to the semantic dimensions of abstractness-concreteness, specificity of denotation, comprehensibility, and interest. Attesting to the generality of the findings, the relationships between the textual dimensions and recall were evident with 2 textual passages, with 2 methods of measuring the semantic dimensions, and at immediate and delayed retention intervals. Remembering was characterized as being both a reconstructive and an abstractive process. (22 ref)—*Journal abstract*.
6659. Jones, Bill. (U Waterloo, Ontario, Canada) **Response bias in the recognition of pictures and names by children.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1214-1215.—In general, 1st



graders adopted a rather lax criterion for names and a somewhat more conservative one for pictures. Recognition of pictures and names together generally resulted in unbiased performance. Results are discussed in terms of the iconic-verbal memory distinction.

6660. Klein, Gary A. & Klein, Helen A. (Wright-Patterson Air Force Base, Personnel & Training Requirements Branch, OH) **The influence of serial retention and theme identification paradigms on encoding.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 556-560.—Compared auditory and semantic encoding of 96 undergraduate Ss under a serial retention task and a theme identification task. Encoding features were evaluated with surprise recognition tests. Greater auditory encoding was obtained for the stimulus words in the serial retention condition than for the same words in the theme identification condition. Semantic encoding was only obtained in the theme identification condition. —*Journal abstract.*

6661. Lefton, Lester A. (U South Carolina) **Probing information from briefly presented arrays.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 958-970.—Conducted 5 probe experiments to investigate the extraction of information from briefly presented arrays of letters. Ss were a total of 88 undergraduates. The 1st 2 experiments used a spatial single-item bar marker procedure. Results show a W-shape function of accuracy with stimulus position. The last 3 experiments investigated the use of a single item probe in which Ss examined each item in the array to indicate the presence or absence of a critical target; reaction time was the dependent measure. Results show that search through brief arrays of letters proceeded item by item and from left to right, as evidenced by an increase in reaction time from left to right and an increase in reaction time for the negative responses. A small order of approximation effect was exhibited in all experiments; this effect was attributed to guessing and was a precategorical analysis of the visual information. (17 ref)—*Journal abstract.*

6662. Liepmann, Dirk & Saegert, Joel. (American U, Beirut, Lebanon) **Language tagging in bilingual free recall.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1137-1141.—2 groups of 25 Arabic-English bilingual undergraduates learned 15 lists of 16 items each. The lists were constructed from a pool of only 32 items, so that there was a high degree of item overlap across lists. For 1 group all the items were presented in 1 language, while for a 2nd group mixed-language lists were used with the language of each item randomly varied across successive lists. It was hypothesized that if Ss store items as concepts independently of the language of input, the bilingual-list group would do more poorly than the unilingual-list group on recall of later lists; however, if Ss store items as language-specific units, the bilingual-list group would be expected to do better than the unilingual-list group. Data support the hypothesis of language-independent storage. The occurrence of increasing numbers of translation errors across lists was also interpreted as being consistent with this view. —*Journal abstract.*

6663. Light, Leah L. & Berger, Dale E. (Pitzer Coll) **Memory for modality: Within-modality discrimination is not automatic.** *Journal of Experimental Psychology*,

1974(Nov), Vol 103(5), 854-860.—In 2 experiments, investigated the automaticity of attribute memory; Ss were a total of 78 high school and college students. Results show that when instructed to attend to the case and color in which words were presented, Ss' retention input mode improved, but their recognition performance was depressed. Allocating attention to input mode thus appears to result in diminished attention to semantic aspects of words. When case and color were uncorrelated with taxonomic category, memory for mode of input dropped to chance levels. When case and color were redundant with taxonomic category, memory for mode of input was better than chance. Findings suggest, however, that this result was due to rule learning rather than to memory for input mode for individual items. —*Journal abstract.*

6664. Loiseau, Lucien. [Masking effect on the span of apprehension for verbal stimuli at different ages.] (Fren) *Psychologica Belgica*, 1974, Vol 14(1), 55-66.—Investigated the effect of combined proactive and retroactive masking on the span of apprehension for letters presented for 228 msec. In Exp I, 4 Ss 8½ yrs old, 8 Ss 11½ yrs old, and 12 Ss 17½ yrs old were used. Stimuli were zero-order or 2nd-order approximations to French with or without masking. Span of apprehension was greater for 2nd-order approximation, but the masking effect was not significant. In Exp II, 8, 8, and 12 Ss in the same age groups were used, with masking as independent variable and stimuli being letters in text-order, resulting in a significant masking effect. Results are interpreted as showing the probable masking effect in reading at different ages. The span of apprehension was interpreted as a limitation of verbal memory capacity. (English abstract)—*S. Slak.*

6665. Nelson, Douglas L.; Wheeler, Joseph W.; Borden, Richard C. & Brooks, David H. (U South Florida) **Levels of processing and cuing: Sensory versus meaning features.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 971-977.—Compared retrieval cuing effectiveness of strong and weak rhymes and synonyms as a function of variations in the conditions associated with the coding of the target words, using 160 undergraduates. The 2 types of cues were presented either only during the test trial, or they were located on both the study and the test trial. Presentation during study was either fast (1.2 sec) or slow (3.0 sec). Results show that reliable cuing effects were obtained with both types of cues, and strong cues were superior to weak cues. Manipulations of coding conditions influenced the effectiveness of synonyms, but had no effect on rhymes. Presenting cues during study and increasing the length of study time significantly enhanced the utility of meaning cues but not of sensory cues. Results are explained by a model incorporating ideas derived from the levels-of-processing conception, from the encoding-specificity principle, and from generation-recognition models of cuing. —*Journal abstract.*

6666. Nilsson, Lars-Göran. (U Uppsala, Sweden) **Further evidence for organization by modality in immediate free recall.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 948-957.—Conducted 2 experiments to investigate organization by modality. In Exp I, mixed lists of words were presented to 30

undergraduates auditorily and visually, by male and female voices, and by uppercase and lowercase letters. Ss were asked for immediate free recall after each list and were to indicate the mode of presentation for each word they could recall. Ss could tag the words to the same degree for each of the 3 types of list presentation. However, the degree of organization for modality was higher than for the other 2 types of variation. In Exp II, 60 undergraduates in 3 instruction conditions were presented words in the auditory and visual modalities orthogonally combined with 2 semantic categories. In immediate free recall, Ss could organize the words by modality or by category, depending upon instruction. In final free recall, organization by category increased and organization by modality decreased.—*Journal abstract.*

6667. Ornstein, Peter A. & Trabasso, Tom. (U North Carolina, Chapel Hill) **To organize is to remember: The effects of instructions to organize and to recall.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 1014-1018.—Conducted 2 experiments to investigate G. Mandler's (1967) finding that organization and recall instruction led to the same degree of recall. Exp I employed taxonomically related materials, and Exp II used unrelated words; Ss were a total of 40 male college students. To minimize anticipation of a recall test unless Ss were specifically instructed, degree of organization was varied within Ss, while recall instruction was a between-Ss variable. A concept learning task was employed such that all Ss classified some, but not all, of the words on a list that was subsequently tested for recall. Only half of the Ss were given prior instructions about the recall task. In both experiments, organized material was recalled better than nonorganized material, and prior recall instructions did not lead to further increments in the recall of the organized items. However, these instructions did not invariably lead to enhanced recall of the items that were not classified; in fact, recall instructions seemed to be effective only when it was possible for Ss to organize implicitly the noncategorized items. In this sense, organization and recall instructions were not invariably equivalent.—*Journal abstract.*

6668. Potts, George R. (Dartmouth Coll) **Storing and retrieving information about ordered relationships.** *Journal of Experimental Psychology*, 1974(Sep), Vol 103(3), 431-439.—Conducted 3 experiments with undergraduate Ss ( $N = 47$ ), who learned and answered questions about 4- or 6-item linear orderings (e.g., Tom is taller than Dick who is taller than Sam, etc). Such an ordering is comprised of some adjacent pairwise relations that are necessary to the establishment of the ordering (e.g., Tom is taller than Dick, Dick is taller than Sam) and some remote relations that are deducible (e.g., Tom is taller than Sam). Reaction time (RT) to the remote relations was consistently shorter than RT to the adjacent relations. This effect reflects the operation of 2 separate factors. First, RT is very short to test sentences which begin with one of the end terms of the ordering. Second, with end term effects eliminated, RT is a simple monotonic decreasing function of inferential distance; the more remote, the shorter the RT.—*Journal abstract.*

6669. Powers, Marjorie & Kumar, V. K. (U Rochester, Nursing School) **Scaling words on degree of arousal and short- and long-term retention.** *Journal of Experimental*

*Psychology*, 1974(Nov), Vol 103(5), 1039-1042.—In Exp I, 40 undergraduates assigned scale values to 7 words, using the paired-comparison method. 45 percent of the Ss recalled the word with the highest scale value on a free-recall test following the scaling task and 90% recalled it after 24 hrs. Exp II involved a paired-associate task with another 40 undergraduates. The design conformed to a  $2 \times 2$  factorial design—cued or free-recall test, short- or long-term test following a single learning trial. Recall of pairs was very poor in all conditions. Results support the notion that stimulus and response terms are processed independently rather than as a unit.—*Journal abstract.*

6670. Read, J. D.; Read, Gayle & Excell, Ian. (U Lethbridge, Alberta, Canada) **Effects of probe-digit positions and feedback on item retrievability in short-term memory.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1207-1210.—In a short-term memory experiment with college students using the sequential probe technique, it was found that increased item retrievability was a function of the presentation of feedback about the correct target digit and not probe position alone.

6671. Resta, G. (Genoa Commune Medico-Psychological & Pedagogical Ctr, Italy) **[Forgetting as a means of remembering.]** (Ital) *Neuropsychiatria*, 1972(Jan), Vol 28(1-2), 25-36.—Examines and discusses the many clues leading to the supposition that it is possible to distinguish 2 aspects or different processes at work in memory reproducing. One of these tends to divide and select and consequently to inhibit any mnemonic material believed dangerous. Connected to this mnemonic process are factors such as removal and isolation. The other process tends to associate mnemonic traces with related information, whether recent or remote (i.e., formed by other mnemonic traces). Association with recent information makes understandable such processes as recognition of the objects perceived, while association with remote information (based on other mnemonic traces) explains the formation of short- and long-term memory storehouses. The mechanisms of identification and projection are also linked to special combinations and balances in the mnemonic processes, characterized by division-selection and association-integration. (French & German summaries) (17 ref)—*English summary.*

6672. Ritter, Walter & Buschke, Herman. (Albert Einstein Coll of Medicine, Yeshiva U) **Free, forced, and restricted recall in verbal learning.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1204-1207.—Forced recall by undergraduates resulted in greater retrieval than standard free recall and increased the retrieval of items without significantly increasing the intrusion rate. It is concluded that the inclusion of different, new items on each trial interferes with retrieval of repeated items from long-term storage.

6673. Scribner, Sylvia. (Rockefeller U, New York, NY) **Developmental aspects of categorized recall in a West African society.** *Cognitive Psychology*, 1974(Oct), Vol 6(4), 475-494.—Conducted 2 experiments among 96 West African 6-12 yr olds and 102 West African high school students and adults to determine the relationship between preferred mode of organization of categorizable material and use of organization in recall. Results show



that various child and adult groups differed in the types of organization they imposed on the material in a sorting task, with those exposed to school and modernizing influences showing a preference for taxonomic organization. All Ss, however, used their own form of organization to order their subsequent recall of the material, supporting the idea that organizing processes in recall are universal. (20 ref)—*Journal abstract*.

6674. Shapiro, Shelly R. & Erdely, Matthew H. (Douglass Coll, Rutgers State U) **Hypermnesia for pictures but not words.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1218-1219.—Investigated the time course of recall for pictorial and verbal inputs with undergraduates. A hypermnesic (incremental recall) effect was found for pictures but not words, and was shown to be independent of multiple-recall trials. Reasons for past difficulties in incremental memory research are offered.

6675. Strommes, Frode J. & Nyman, Jean. (U Turku, Finland) **Immediate and long-term retention of connected concrete discourse as a function of mnemonic picture-type sequence and context.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 197-202.—2 stories, each containing 30 sentences of connected, concrete discourse, were presented to 30 Swedish high school students with or without an illustrating picture preceding each sentence, and with or without within-story context. Immediate paced recall with pictures or empty frames was demanded. With the with-context material, paced recall and free recall was also studied after the lapse of 1 yr. Story 1 was made according to the en-route mnemonic scheme and Story 2 according to the within-a-building scheme. On immediate recall, pictures as well as context had a strong positive effect. There was no interaction between pictures and context, which may be interpreted to mean that these factors may be intrapsychically identical. Recall after 1 yr was generally poor, but indicated that the en-route mnemonic scheme may be more effective in long-term memory. Very little reconstruction from the pictures seems to have taken place. (17 ref)—*Journal abstract*.

6676. Thorndyke, Perry W. & Bower, Gordon H. (Stanford U) **Storage and retrieval processes in sentence memory.** *Cognitive Psychology*, 1974(Oct), Vol 6(4), 515-543.—In 2 experiments, investigated the amount of time 24 undergraduates took to verify a sentence with respect to a set of subject-verb-object (SVO) propositions they had learned. 3 triplets of SVOs provided differing degrees of equivocation, including (a) unique SVOs, (b) a V with 3 SOs, and (c) an SV with 3 Os. A general class of models was proposed regarding the representation of propositional trees in memory and an algorithm by which a probe tree might be verified against a set of trees in memory. In Exp I, verification times were least for Condition (a), and were slower and equal for Conditions (b) and (c). In Exp II, a 4th condition, an SO with 3 Vs, produced verification times as slow as those in Condition (c). Of several models considered, the closest-fitting one assumed parallel search processes proceeding simultaneously from S, V, and O positions of the probe, scanning through memory trees structured according to the human associative memory (HAM) theory of J. Anderson and G. Bowers (1973).—*Journal abstract*.

6677. Thurner, Ronald D. & Mauldin, Michael A. (Cornell U) **Effects of delayed performance on a word association task upon ongoing short-term recall.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1202-1204.—Ss presented a list of numbers followed by a list of words were then cued to (a) recall numbers only; (b) recall numbers then words; (c) recall words then numbers; or (d) recall numbers, then perform a word association task. W. Epstein's 1969 only effect—(a) greater than (b)—was obtained. Also, recall in (a) was greater than (d).

### Motivation & Emotion

6678. Alegria, Jesus. (U libr  de Bruxelles, Belgium) **The time course of preparation after a first peak: Some constraints of reacting mechanisms.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 622-632.—Conducted 2 experiments with a total of 17 university students to study the time-course of preparation when a 2-choice stimulus arrives, in a predictable or unpredictable manner, after the moment at which it was expected. Ss watched the screen of an oscilloscope on which a spot moved horizontally. Vertical lines marked (a) the starting point of the spot's course,  $t_0$ , and (b) the points in time at which the stimulus could arrive. In Exp I, 5 intervals between  $t_0$  and  $t_1$ , ranging from 150 to 900 ms, were used in different blocks of trials. In Exp II, 3  $t_0$ - $t_1$  intervals, ranging from 100 to 400 ms mixed in a random way, were used. In both cases Ss were asked to react as fast as possible when the stimulus was presented at moment  $t_1$ . The time course of preparation was studied when the stimulus arrived at moment(s)  $t_1$ . Results show that reaction time reached a maximum 250 ms after  $t_0$ , irrespectively the predictability of the  $t_0$ - $t_1$  interval. It is also shown that an interval of about 1 sec was necessary to obtain reaction times as rapid as those observed at moment  $t_1$ . Results are discussed in terms of the evolution of an hypothetical state of preparation after a maximum which remains unused. (16 ref)—*Journal abstract*.

6679. Amerio, Piero. (U Torino, Inst di Psicologia Sperimentale F. Kiesow, Italy) **[Structural dimensions of the process of dynamic interrelations between personality, behavior, and social situation.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 186-208.—Obtained structural dimensions of the dynamics of motivation-conflict-decision-action through a factor analysis (varimax rotation) of 24 variables, using a model based on Lewin's level of aspiration. The 104 Ss were homogeneous for age, sex, and cultural level. 7 factors were found, grouped in 3 main dimensions: (a) goal feeling as specific motivation; (b) adaptation to reality; (c) present specific situation feeling. These results are discussed from a cognitive-structural viewpoint.—L. L'Abate.

6680. Biller, J. D.; Olson, P. J. & Breen, T. (Devereaux Schools of California, Santa Barbara) **The effect of "happy" versus "sad" music and participation on anxiety.** *Journal of Music Therapy*, 1974(Sum), Vol 11(2), 68-73.—Conducted an experiment to evaluate (a) the effect of "happy" and "sad" music on anxiety, and (b) the effect on anxiety of active participation in that music by the S. 22 male and 38 female undergraduate

psychology students served as Ss. The music selected was judged by independent observers as having the Gestalt "happy" and "sad." Ss were given a percussion accompaniment instrument, the tambourine, with which to become actively involved with the music. The Spielberger-Gorsuch-Lushene (1970) State Trait Anxiety Inventory was used to measure anxiety. The "happy" music did not appear to produce higher levels of state anxiety than no music. There was a strong tendency, however, for "sad" music to lessen state anxiety more than did "happy" music.—F. O. Triggs.

6681. Boutwell, Richard C. & Fennell, Patrice. (Florida State U, Instructional Design & Development Program) **Investigation and theoretical consideration of the "blue-seven" phenomenon.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 301-302.—A study of 128 students supports W. Simon's (see PA, Vol 47:6129) "blue-seven phenomenon" in that 27% of Ss chose 7 from number 1-10, and 48% chose the color blue in a free-choice situation. Results are discussed in terms of societal and cultural influences which may have affected Ss' responses.

6682. Boutner, John & Cooper, Chris. (U Adelaide, SA, Australia) **The effect of a low rate of regular signals upon the reaction times of introverts and extraverts.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 263-276.—In an RT (reaction time) task in Exp I involving responding to infrequent, regular signals, 8 undergraduate extraverts (from scores on the Maudsley Personality Inventory) produced higher proportions of missed signals and lengthened RTs than 8 introverts did. This result was only obtained after some time on task and is evidence that inhibitory states were formed more rapidly in extraverted Ss under low stimulation conditions. In Exp II mean RT was longer in 8 extraverted than 8 introverted Ss (from scores on the Eysenck Personality Inventory) in the 2nd half of the experiment, though there was no significant difference between the groups in the 1st half. Findings show that extraverts generated stronger inhibitory potential in continuous responding tasks, or that their characteristic arousal level may have been lower than that of introverted Ss. The need to distinguish between the different explanatory constructs is discussed, and a simple model amalgamating the major theoretical positions is outlined. (36 ref) —*Journal abstract.*

6683. Davenport, W. G. & Middleton, M. A. (U British Columbia, Vancouver, Canada) **A model for the prediction of nonrepeatable decisions.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 201-207.—Attempted to set up a variation of H. Feger's (1968) stochastic model to predict a nonrepeatable decision—participation or nonparticipation in a psychology experiment. Ss were 80 college students. Analysis by means of stepwise discriminant functions shows that this prediction could be made at significantly better than a chance level. It is suggested that such a model may be generally applicable for making similar decisions.—*Journal abstract.*

6684. Desportes, Jean-Pierre & Dequeker, Annie. (U Paris, Lab de Psychologie Sociale, France) **[Effects of the presence of the experimenter on performance as a function of the anxiety of subjects and of task structure.]** (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol

21(4), 157-160.—Examined performance on a coding task of 31 university students who had been classified as anxious or nonanxious using the Taylor Manifest Anxiety Scale. Ss who had either been given instructions suggesting that their performance would be compared to that of others or who worked in the presence of the E did better than Ss given neutral instructions and left to work alone. Performance of anxious and nonanxious Ss did not differ. The importance of task structure is discussed.—R. L. Cook.

6685. Gaussin, José (U Louvain, Belgium) **[An attempt to extend signal detection theory as a model for decisions under risk.]** (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol 21(4), 145-156.—Considers the validity of signal detection theory as a general model for decision-making in probabilistic binary choice situations. A series of pilot studies, 4 Ss in each, examined the usefulness of signal detection theory in the context of (a) tactual discrimination, (b) probability estimation, and (c) letter sequence identification, with the latter 2 experiments being repeated with multiple observations and multiple observers. Results confirm the appropriateness of the method. The potential advantages of signal detection theory are discussed. (English & Spanish summaries) (27 ref)—R. L. Cook.

6686. Gearty, Lawrence J. (Western Carolina U) **Differential reactions of male versus female aggression as a function of censure of vicarious aggression.** *Bulletin of the North Carolina Psychological Association*, 1973(Spring), 26-29.—Studied the effect on 35 male and 38 female college students of listening to a taped dialogue between an offensive man and a nonassertive woman who finally became very hostile in reaction to the man; Ss then heard 1 of 3 commentaries on the woman's response, one censuring it, one justifying it, and one neutral, and were then asked to indicate on a self-rating scale the degree of hostility that they themselves felt after the experience. Females indicated more hostility than males, but there were no differences among the commentary groups. It is concluded that experimental manipulations were effective in producing sex differences in hostile reactions. However, the hypothesis that censure of vicarious aggression leads to subsequent aggressive feelings was not supported.—R. S. Albin.

6687. Glover, Carl B. & Cravens, Richard W. (Virginia Polytechnic Inst & State U) **Trait anxiety, stress, and learning: A test of Saltz's hypothesis.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 243-253.—Tested behavioral predictions from E. Saltz's, K. W. Spence's, and C. D. Spielberger's interpretations of trait anxiety in a complex verbal learning task. 53 high-anxious and 52 low-anxious (from scores on the Taylor Manifest Anxiety scale) male undergraduates were randomly distributed to test conditions of failure-stress, pain-stress, or neutral instructions. The learning data revealed that high-anxious-failure and low-anxious-pain Ss were disrupted, and supported Saltz's hypothesis; self-reported anxiety (A-State scale, State-Trait Anxiety Inventory) was observed only in high-anxious-failure Ss and supported Spielberger's theory of the arousal of state anxiety as a function of trait anxiety. However, the contradiction between self-reported anxiety and learning behavior in low-anxious-pain Ss indicated that the verbal



report of these Ss was an inaccurate or insensitive index of arousal. (31 ref)—*Journal abstract*.

6688. **Görlitz, Dietmar.** (Technical U Berlin, Inst of Psychology, W Germany) **[Motivation: Consensus of opinion and disagreements regarding its determinations: Preliminary remarks regarding a possible way for systematizing relevant conceptions.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(4), 575-602.—Discusses the psychology of motivation. Various definitions and theories are examined and the urgent need for a systematization of terms and concepts is emphasized. (English & French summaries) (31 ref)

6689. **Hollender, Marc H. & McGehee, James B.** (Vanderbilt U, Medical School) **The wish to be held during pregnancy.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 193-197.—50 women 16-31 yrs old were administered a questionnaire used to obtain a body contact score during their pregnancies. More than half of the women noted a change in the desire to be held and, of those who did, almost 3 out of 4 experienced an increase.

6690. **Horowitz, Mardi J. & Becker, Stephanie S.** (Mount Zion Hosp & Medical Ctr, San Francisco, CA) **Cognitive response to stress: Experimental studies of a "compulsion to repeat trauma."** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 258-305.—Tested the theory that stressful events which are incompletely assimilated and accommodated lead to intrusive and repetitive cognitive representations of the event and responses to it. Groups of male and female college students and a group of Navy hospital corpsmen viewed a film depicting a stressful event and a neutral film. Ss were asked to perform a perceptual task and to give introspective mental reports before and after both films. It was found that the Ss' mental reports contained more film references, intrusions, and visual images after the stress film than after the neutral film. No significant differences in performance of the perceptual task were found. It is concluded that even persons without psychiatric illness experience intrusive and repetitive thoughts after exposure to mild or moderately stressful stimuli. It is suggested that these cognitive processes represent an effort to complete an interrupted stress-processing program. (3 p ref)—*J. Kelly*.

6691. **Kobayashi, Yukiko.** (Tokyo U of Education, Faculty of Education, Japan) **[The effects of decision and the number of alternatives on information gathering.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 215-222.—Divided 144 9th graders into 4 equal groups who were alike as to their previous knowledge of evolution. All Ss were given preliminary information about evolution and were asked to give additional information under 4 different experimental conditions, consisting of combinations of 2 or 4 theories of evolution and a pre- or postdecision as to which theory each S judged to be correct. Results indicate that more information was sought when fewer alternative theories were available before commitment to 1 theory, but after commitment to 1 theory had been made, more information was sought when more alternative theories were available. (English summary)—*S. Choe*.

6692. **Leplat, J. & Pailhous, J.** (Ecole Pratique des Hautes Etudes, Lab de Psychologie du Travail, Paris,

France) **[Comments on the origin of errors.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 729-736.—Describes the function of error in goal-setting behavior, with particular reference to learning. The focus is on selected elements which aid in making error a means of analyzing the individual's goal-directed activity. The following issues are discussed with respect to the implications of error: (a) possibilities of choice for the S, (b) possibilities of regulation of action, and (c) the concept of a norm and of its domains. Error was not independent of goal-directed behavior in learning, or of perceptions of the learner compared to those of a mentor in regard to the latter's goal-directed behavior. Further, error was found to have a role in the execution and control of action (toward a goal).—*Z. M. Cantwell*.

6693. **Loftis, Jack & Ross, Lee.** (State U New York, Buffalo) **Effects of misattribution of arousal upon the acquisition and extinction of a conditioned emotional response.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 673-682.—Conducted 2 experiments to demonstrate that misattribution procedures can alter Ss' physiological response to a conditioned source of fear or arousal. A total of 89 female undergraduates served as Ss. Exp I demonstrated that extinction of a conditioned galvanic skin response is facilitated when Ss are led to attribute their arousal to a loud white noise present continuously throughout extinction. In Exp II, a similar misattribution manipulation was introduced during acquisition. No effect of the manipulation was apparent during acquisition, but misattribution Ss showed fewer responses than control Ss during extinction, when the misattribution source had been terminated. Results suggest that self-perception and attribution processes play an important role in the maintenance of emotional response. (30 ref)—*Journal abstract*.

6694. **Loftis, Jack & Ross, Lee.** (State U New York, Buffalo) **Retrospective misattribution of a conditioned emotional response.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 683-687.—Replicated and extended prior experiments by J. Loftis and L. Ross dealing with misattribution and emotion (see PA, Vol 53:Issue 4), using 24 female undergraduates as Ss. Results show that extinction of a conditioned galvanic skin response was facilitated when Ss are led, after the completion of acquisition trials, to misattribute the source of the arousal they previously experienced during acquisition. These results demonstrate that self-perception and attribution processes may mediate the influence of past emotional experience and behavior upon future emotional response. The relevance of the present findings to alternative interpretations of misattribution research is also discussed. (17 ref)—*Journal abstract*.

6695. **Matlin, Margaret W.** (State University Coll New York, Geneseo) **Serial position, perceived serial position, and affect.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 245-258.—Investigated the influence of serial position on Ss' affect ratings of stimuli. 48 undergraduates saw nonsense words presented 1 or 10 times in 1 of 4 serial positions. Ss rated the words and then tried to recall their serial positions. Results indicate that (a) Ss' accuracy in identifying serial position was greatest for 1st and last items and least for middle items; (b) affect was a function of true serial position for high

frequency items only, with most positive affect for 1st and last items; and (c) affect was correlated with perceived serial position, with most positive affect for those items believed to have been seen last.—*Journal abstract*.

6696. **Matlin, Margaret W.** (State University Coll New York, Geneseo) **Frequency-affect relationship in a simultaneous spatial presentation.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 379-383.—72 college students saw a spatial display in which nonsense-word stimuli occurred 25, 10, 5, 2, 1, and 0 times. Occurrences of a given stimulus were either massed or distributed throughout the display. After a 4-min viewing period, Ss rated all stimuli on a 7-point good-bad scale. Affect was a linear function of frequency, corroborating R. B. Zajonc's 1968 results with temporal presentation of stimuli that high-frequency items are preferred to low-frequency items. However, mode of presentation of these stimuli (massed vs distributed) had no direct effect or interaction with their frequency.—*Journal abstract*.

6697. **Pasciak, Julian & Williams, Robert.** (Florida State U) **Note on the "blue seven phenomenon" among male senior high students.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 494.—Replicated and extended to high school students W. E. Simon's (see PA, Vol 47:6129) and W. E. Simon and L. H. Primavera's (see PA, Vol 49:4229) findings that elementary school, junior high, and college Ss, when requested to write down a number between 1 and 10 and the name of a color, most frequently wrote "blue" and "seven."

6698. **Raben, Charles S.; Wood, Michael T.; Klimoski, Richard J. & Hakel, Milton D.** (Ohio State U) **Social reinforcement: A review of the literature.** *US AFHRL Technical Report*, 1974(Aug), No 74-9(1), 61 p.—Summarizes major studies and theoretical positions within the incentive-motivation field in order to present an integrated picture of past and present research. Special emphasis is placed on delineating social reinforcement variables in an attempt to explicate their relative importance within the context of social reinforcement theory. However, little emphasis is placed on strategies which have investigated different combinations of these variables. A summary of social reinforcement concepts and research is included. (19 p ref)—*Journal abstract*.

6699. **Shibles, Warren.** (U Wisconsin, Whitewater) **Emotion: The method of philosophical therapy.** Whitewater, WI: Language Press, 1974. 492 p. \$9(cloth), \$7(paper).—Presents an analysis of traditional concepts of emotion in terms of contemporary research in both philosophical and experimental psychology and psychiatry. Topics include emotion as context; the relationship between emotion, language, and reason; and critiques of prominent theories of emotion and arousal. (16 p ref)

6700. **Sieber, Joan E.** (California State U, Hayward) **Effects of decision importance on ability to generate warranted subjective uncertainty.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 688-694.—In a multiple-choice testing situation, 40 college students were required to assign to each alternative of each item a probability value corresponding to their subjective estimate of the correctness of the alternative. 2 levels of test importance were employed: Half of the students believed that they were participating in their last chance

at taking a midterm examination, while the other half believed that they would be allowed to retake the midterm if they failed to earn a grade of A in this attempt. As predicted, Ss who responded under conditions of high importance, relative to those who believed they would have a 2nd chance at the examination, generated less response uncertainty, assessed less accurately their state of knowledge, and tended to err through overestimation of the probability of correctness of high-probability alternatives and underestimation of the probability of correctness of low-probability alternatives. (29 ref)—*Journal abstract*.

6701. **Staats, Arthur W. & Warren, Don R.** (U Hawaii) **Motivation and the three-function learning: Food deprivation and approach-avoidance to food words.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1191-1199.—In 2 experiments with a total of 188 undergraduates, food words were considered as conditioned stimuli that elicit an appetitive emotional response. The emotional response—according to the 2-process, 3-stimulus-function learning theory involved—should be capable of mediating instrumental behavior toward the words. Motivational principles elaborated in the context of the 3-function theory predicted that Ss deprived of food would learn to respond more quickly with an approach instrumental response to food words than would deprived Ss whose task was to make an avoidant response. Moreover, this difference should be of a lesser magnitude with nondeprived Ss. In addition, in Exp II it was predicted that food-deprived Ss would learn to make an approach response to food words with less latency than nondeprived Ss. These expectations were supported. The findings contribute to the specification of motivational characteristics for the construct of a mediating emotional response (or state) in 2-process learning studies (e.g., transfer of control and auto shaping), and suggest a means for integrating relevant animal and human research. (24 ref)—*Journal abstract*.

6702. **Stang, David J.** (Queens Coll, City U New York) **Intuition as artifact in mere exposure studies.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 647-653.—The role of demand characteristics in the relationship between repeated exposure and affect was explored in 2 role-playing studies and internal analyses of 2 real mere exposure experiments. In the 1st 2 studies, a total of 237 undergraduates made affect ratings of Turkish words or patterns that they imagined they had seen in varying frequencies. Results suggest that the findings of previous mere exposure experiments are intuitive, since role playing produced the same exposure effects as real experiments. In 2 experiments, 96 undergraduates made affect ratings of Turkish words actually seen in varying frequencies and then indicated what hypothesis they believed the E was testing. Internal analyses indicate a close relationship between the S's intuitions and ratings. Results raise questions about the role of demand characteristics in previous mere exposure experiments. (19 ref)—*Journal abstract*.

6703. **Stang, David J.** (Queens Coll, City U New York) **Methodological factors in mere exposure research.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1014-1025.—Statistical analyses of the literature on the



effects of exposure frequency on changes in evaluative meaning indicate that 2 previously unrecognized variables are significantly related to the outcome of these previous experiments, while a previously suggested variable is probably not related. The analyses suggest that enhanced evaluative meaning is more likely to result from repeated exposure if a brief delay intervenes between exposure and rating than if no delay occurs, and is more likely with paralogues, ideographs, and portraits than with abstract visual and auditory patterns. The nature of the exposure sequence has typically been confounded with rating delay and does not seem to have an effect independent of the delay factor. 2 recent theories are used to account for the findings. (77 ref)—*Journal abstract.*

6704. Wallace, Anthony F. & Carson, Margaret T. (U Pennsylvania) **Sharing and diversity in emotion terminology.** *Ethos*, 1973(Spring), Vol 1(1), 1-29.—Examined semantic inconsistencies in terminology used to describe emotions, particularly in attempts to assign emotional labels in physiological studies. A wide variation was found in the emotional terms 10 adult Ss chose to describe a large number of sample stories. Each S used a core vocabulary of 2'-2' words describing emotions and a total vocabulary of emotional terms of 2'-2' words. Ss also exhibited a basic method of taxonomic categorization of their responses that was based on the dimensions of violence and intensity. A combination of individual and (more importantly) terminological diversity is postulated as the cause of these differences. Implications for psychological research are discussed. (32 ref)—C. Wright.

6705. Wilhelmy, Roland A. (U California, San Diego) **The role of commitment in cognitive reversibility.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 695-698.—Tested the proposition that dissonance reduction reversal is produced by decommitting the S from future dissonance-arousing behavior rather than by the removal of the incentives offered for commitment to the behavior. Ss were 80 male undergraduates. The effects of 2 levels of monetary incentive, the presence or absence of decommitment, and whether or not the monetary incentive was withdrawn were examined in a 2 x 2 x 2 factorial design. A dissonance effect was produced and was shown to be reversible by decommitment acting alone or in combination with withdrawal of incentive. Withdrawal of incentive by itself produced results similar to those of other high-dissonance treatments.—*Journal abstract.*

## NEUROLOGY AND PHYSIOLOGY

6706. Balbi, R. (U Napoli, Clinica delle Malattie Nervose e Mentali, Italy) **[Neurobiology and mental health.]** (Ital) *Acta Neurologica*, 1973(Sep-Oct), Vol 28(5), 610-624.—Contends that neurobiological factors have been underestimated in mental hygiene. Like psychiatry, neurobiology is a multidisciplinary science which should do more than develop methods and provide statistical, demographic, and sociological data. Neurobiology is fundamental for the primary and secondary prevention of neuropsychic illnesses whose

pathogenesis is organic. Secondary prevention, the hygienic education of the public, is particularly emphasized. Neurobiological factors must also be especially considered in sociological investigations. Because mental hygiene and neurobiology are related to other sciences, investigations must be integrated with those of other disciplines. (Italian & English summaries) (56 ref)—M. J. Stanford.

6707. Dement, William C. (Stanford U) **Some must watch while some must sleep.** San Francisco, CA: W. H. Freeman, 1974. xiii, 148 p. \$5.95.—Presents an introduction to the scientific study of sleep, dreams, and insomnia. Topics include the effects of differing amounts of sleep, circadian rhythms, characteristics of rapid eye movement (REM) and non-REM sleep, sleep disorders and their treatment, and creativity during sleep. (10 p ref)

6708. Dimond, Stuart J. & Beaumont, J. Graham (Eds.). (University Coll Cardiff, Wales) **Hemisphere function in the human brain.** New York, NY: John Wiley & Sons, 1974. xiii, 398 p.—Presents a collection of 15 empirical and discussion papers on the role of the brain in guiding and controlling human behavior, how functions within the brain are organized, why one area is dominant over another, the effects of brain disorder, the problems of assessing consciousness, and the control and regulation of behavior.

6709. Giora, Zvi & Elam, Zohar. **What a dream is.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 283-289.—A review of literature on the nature and function of dreams suggests that EEG indices alone fail to identify mental activity during REM sleep and should thus be abandoned as the method of proving cortical arousal during sleep. H. Bergson's (1902) concept of mental effort, which suggests that mentation is ongoing during sleep, is discussed as a basis for future research. (30 ref)

6710. Higenbottam, John A. (Ontario Hosp School, Blenheim, Canada) **Relationships between sets of lateral and perceptual preference measures.** *Cortex*, 1973(Dec), Vol 9(4), 403-410.—Examined the hypothesis that a common cerebral asymmetry dimension is reflected in sets of both lateral and perceptual preference measures. A set of 8 limb and ocular preference measures and a set of 9 visual and auditory perceptual preference measures were administered to 33 dextrals, 29 nonfamilial sinistrals, and 27 familial sinistrals. Multivariate analyses of variance suggest that groups of dextrals and sinistrals may be discriminated by a combined set of lateral and perceptual preference measures, although familial and nonfamilial sinistral groups cannot be discriminated. Results further suggest that perceptual preference patterns vary according to handedness classification and are relatively independent of each other if different sensory modalities are compared.—R. Gunter.

## Neuroanatomy & Electrophysiology

6711. American Society of Electroencephalography Technologists. **8th International Congress of Electroencephalography and Clinical Neurophysiology: Technicians program issue.** *American Journal of EEG Technology*, 1974(Jun-Sep), Vol 14(2-3), 96 p.—Reports

a symposium on EEG techniques and applications: instrumentation, assessment, recording methods, patient responses, reporting, terminology, and ethics.

6712. **Blom, Bernhard E. & Craighead, W. Edward.** (Pennsylvania State U) **The effects of situational and instructional demand on indices of speech anxiety.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 667-674.—Assessed the effects of contextual (experimental location) and instructional cues on behavioral, self-report, and physiological indices of speech anxiety. 42 male and 48 female undergraduates were randomly assigned within sex to 1 of 4 conditions in the  $2 \times 2$  design: (a) fear-anxiety clinic, (b) fear-speech laboratory, (c) simulate relaxation therapy-anxiety clinic, and (d) simulate relaxation therapy-speech laboratory. The clinic setting produced more behavioral anxiety than the laboratory setting. The fear test instructions produced both more behavioral and self-report anxiety than the simulate relaxation therapy instructions. The fear-clinic condition produced the greatest behavioral anxiety. No significant differences were obtained for the physiological measures. The demand and expectancy effects were comparable to those obtained for rat, spider, and snake phobic Ss in earlier studies. (26 ref)—*Journal abstract*.

6713. **Blum, Baruch.** (Tel-Aviv U, Sackler School of Medicine, Israel) **Collateral inhibition in the sensorimotor cortex of the cat and the squirrel monkey: Its role in control of neuronal discharges.** *Brain, Behavior & Evolution*, 1974, Vol 9(4), 237-247.—Recordings were taken with multiple microelectrodes from 10 cats' and 4 squirrel monkeys' sensorimotor cortices, aided by the use of collision techniques. Results provide some direct evidence for the operation of surround collateral inhibition including recurrent collateral inhibition. Data were also obtained hinting at a possible role of this later mechanism in the limitation of late or repetitive neuronal discharges. Thus, by the prevention of the antidromic responses of some neurons, it was possible to show a causal relationship between the silence of such neurons and the action of other neighboring neurons, and between their activity and the silence of their neighbors. These phenomena are interpreted as due to surround collateral inhibition. (30 ref)—*Journal abstract*.

6714. **Borda, Robert P. & Hablitz, John J.** (Methodist Hosp, Houston, TX) **A technique for recording the electroretinogram (ERG) from chronically implanted electrodes in animals.** *Vision Research*, 1974(Nov), Vol 14(11), 1219-1221.—Describes ERG recordings made in 2 rhesus monkeys from electrodes surgically implanted in the supraorbital bone. Response wave-forms had a high correlation with those recorded simultaneously from a corneal-wick electrode. The technique should be more convenient than the corneal wick for prolonged recording sessions or repeated measurements from the same animal. (French, German, & Russian summaries)

6715. **Böttge, Horst & Holoch, Jürgen.** (Technical U Munich, Inst for Ergonomy, W Germany) **[An identification system of spectral patterns in a spontaneous electroencephalogram and its application in vigilance research.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 341-374.—Studied changes in the spectral parameters of the spontaneous EEG as indicators of various levels of psychophysical activity and performance. To

test their state of vigilance, 4 Ss were exposed to a series of 8 2-hr Mackworth Clock tests consisting of 4 12-signal 30-min test periods following each other without any interruption. 2 repeat tests were conducted 6 mo later. 4 states of vigilance were defined and measured: nondirected vigilance (open eyes, no task); directed vigilance (closed eyes, expecting signal, reaction to signal); reduced vigilance (eyes open, expecting signal, no reaction to signal) and vigilance with incorrect reaction (eyes open, reaction without any signal). The identification system for spectral patterns is explained and the 10 criteria developed for a flexible technique of analysis are discussed in detail. It is stated that the analysis of the 1st test measurements and the evidence of stimulus-nonspecific parameters in the spontaneous EEG activity describing the various states of vigilance indicate that the outlined system is workable and should be studied more extensively. (3 p ref) (English & French summaries)—*T. Fisher*.

6716. **Calissendorf, B.; Knave, B. & Persson, H. E.** (Karolinska Inst, Stockholm, Sweden) **Cyclic variations in the c-wave amplitude of the sheep ERG.** *Vision Research*, 1974(Nov), Vol 14(11), 1141-1145.—The c-wave amplitude in sheep changed as a function of time, and these alterations were dependent on frequency of the stimulus flash used. A slow oscillation was observed using 1-sec light stimuli and long flash intervals. Shorter flash intervals gave rise to oscillations with a frequency of about 2/hr, which were of relatively large amplitudes and reached a constant level after about 100 min. (French, German, & Russian summaries) (37 ref)

6717. **Clarke, Peter G.** (U Oxford, Lab of Physiology, England) **Are visual evoked potentials to motion-reversal produced by direction-sensitive brain mechanisms?** *Vision Research*, 1974(Nov), Vol 14(11), 1281-1284.—Results of study of the human averaged visual evoked potential (VEP) demonstrating direction-dependent adaptation to motion, together with other evidence, indicate that the motion-reversal VEPs were produced by direction-sensitive mechanisms within the brain. It is suggested that the hypothesized mechanisms might correspond to the directionally selective neurons reported in monkey visual cortex. (15 ref)

6718. **Cornwell, Anne C.** (Albert Einstein Coll of Medicine, Rose F. Kennedy Ctr for Research in Mental Retardation & Human Development, Yeshiva U) **Electroretinographic responses following monocular visual deprivation in kittens.** *Vision Research*, 1974(Nov), Vol 14(11), 1223-1227.—Studied changes in retinal function in kittens following light or pattern deprivation for brief periods of time. Monocular light deprivation in 2-5 mo old Ss for 1 wk or more resulted in a subsequently reversible reduction of the b-wave of the electroretinogram to light flashes during Nembutal anesthesia. Virtually no change occurred following monocular pattern deprivation for comparable periods of time. Predeprivation electroretinograms from each eye were normal. Posttests of light-deprived Ss to repetitive light flashes accentuated the difference between the 2 eyes. (French, German, & Russian summaries) (17 ref)—*Journal abstract*.

6719. **Harter, M. Russell; Seiple, William H. & Musso, Mario.** (U North Carolina, Greensboro) **Binocular**



**summation and suppression: Visually evoked cortical responses to dichoptically presented patterns of different spatial frequencies.** *Vision Research*, 1974(Nov), Vol 14(11), 1169-1180.—The effects of continuous dichoptic presentation of different sized grid patterns to the 2 eyes on monocular and binocular averaged visually evoked cortical responses (VERs) were investigated in 5 visually acute adults. Patterns were continuously presented to both eyes by means of a haploscope, and VERs were elicited by a momentary increase in the brightness of the grid viewed by the left or right eye (monocular VERs) or both eyes (binocular VERs). Greater amplitude VERs were obtained when grids with elements subtending 15' and 30' were flashed for both monocular and binocular flash conditions. The effects of pattern presented to one eye depended on the pattern presented to the other eye. Binocular VER amplitude and binocular summation were greatest when identical sized pattern elements were presented to the 2 eyes and least when different sized pattern elements were presented to the 2 eyes. Monocular VERs were influenced both by variations in pattern size presented to the eye receiving the increment in brightness and by the pattern size presented to the other eye which was not flashed. Monocular VER amplitude to the flashed eye progressively decreased as the elements presented to other nonflashed eye were varied in size, particularly when the flashed eye viewed diffuse light. There was a tendency for the effects of eye flashed, interocular suppression, and binocular summation to be greater in VERs recorded over the right than the left cerebral hemispheres. (French, German, & Russian summaries) (58 ref)—*Journal abstract*.

6720. Hawley, T. T.; Stern, J. A. & Chen, S. C. (Washington U) **Computer analysis of eye movements during reading.** *Reading World*, 1974(May), Vol 13(4), 307-317.—Describes the application of a computer-based analysis system to the evaluation of electro-oculographically recorded eye movements during reading. Using this technique, 5 eye movement patterns were identified which could be discriminated both qualitatively and quantitatively from normal forward-going reading patterns. The computer-analysis system is detailed and an example of its use in eye movement research is presented.—C. K. Miller.

6721. Johnston, Victor S. & Chesney, Gregory L. (New Mexico State U) **Electrophysiological correlates of meaning.** *Science*, 1974(Dec), Vol 186(4167), 944-946.—Recorded frontal and occipital evoked potentials in 7 student volunteers during a speed task in which they were required to identify numbers and letters in the form of context-sensitive symbols. This technique offers an appropriate methodology for investigating the representation of meaning in the brain. The approach revealed that late components of frontal, but not occipital, evoked potentials reflected the change of meaning of a symbolic stimulus when it appeared in different temporal contexts. (18 ref)—*Journal abstract*.

6722. Kien, J. (Technischen Hochschule, Darmstadt, W Germany) **Sensory integration in the locust optomotor system: II. Direction selective neurons in the circumoesophageal connectives and the optic lobe.** *Vision Research*, 1974(Nov), Vol 14(11), 1255-1268.—The responses of the optomotor neurons (M1, M2, B1,

and B2) of female adult Australian plague locusts to movement of a single edge compare well with responses predicted by the behavioral model formulated in Part I (see PA, Vol 53:Issue 4) and confirm the necessity for the new optomotor model in the locust. (French, German, & Russian summaries) (25 ref)

6723. Maxwell, A. E.; Fenwick, P. B.; Fenton, G. W. & Dollimore, J. (Inst of Psychiatry, London, England) **Reading ability and brain function: A simple statistical model.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 274-280.—Presents a simple statistical model of the way the brain may function, suggested by the analysis of intelligence test results in 150 children (mean age = 7 yrs). The model describes the statistical behavior of an ideal array of elements, representing the brain, during tests of cognitive ability. Predictions from the model indicate that comparison of the EEG recording taken from groups of children who were good or poor readers would show amplitude differences. These were found between the groups when the eyes were open but not when the eyes were closed—a result explained by the model.—*Journal abstract*.

6724. Moller, Aage R. (Karolinska Inst, Dept of Physiology II, Stockholm, Sweden) **Responses of units in the cochlear nucleus to sinusoidally amplitude-modulated tones.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 104-117.—The coding of small rapid changes in amplitude of pure tones in single units in the cochlear nucleus of the rat was studied using sinusoidally amplitude-modulated tones. The variation in the reproduction of the amplitude modulation of the sound in the discharge frequency of the units as a function of sound intensity was compared with the variation of the mean discharge frequency with sound intensity. In most units the mean discharge frequency had no or only a slight dependence on the sound intensity at intensities higher than 10-20 db above threshold. Stimulus-response curves for 50-msec tone bursts were different from those for continuous tones in that the latter reached a saturation level at a much lower intensity than the former. The modulation of the discharge frequency was determined from cycle histograms of the discharge, locked to the modulation waveform. The ratio between the modulation of the histogram and the tones was studied in a wide sound-intensity range. The ratio between modulation of the histogram and the modulation of the sound amplitude decreased only slightly with increasing sound intensity over the entire intensity range studied.—*Journal abstract*.

6725. Mosko, Sarah S. & Jacobs, Barry L. (Princeton U) **Midbrain raphe neurons: Spontaneous activity and response to light.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 589-593.—Analysis of rat midbrain raphe units shows that the discharge of these neurons is slow in rate, rhythmic, and stable across time, suggesting that serotonergic neurons may serve a pacemaker function in the central nervous system. The response of raphe neurons to light and dark conditions shows an effect of light which warrants further investigation—a subtle alteration in discharge rate could possibly be of functional significance. (27 ref)

6726. Orne, Martin T. & Paskewitz, David A. (Inst of the Pennsylvania Hosp, Unit for Experimental Psychia-

try, Philadelphia) **Aversive situational effects on alpha feedback training.** *Science*, 1974(Nov), Vol 186(4162), 458-460.—In an experiment with 22 male undergraduates, anticipation of electric shock did not depress alpha activity in a feedback situation though it was associated with reported anxiety and heightened arousal indexed by greatly increased heart rate and number of spontaneous skin conductance responses. Contrary to previous reports, a reduction in alpha activity is not a necessary consequence of apprehension or heightened arousal.—*Journal abstract*.

6727. **Pirch, James H. & Osterholm, Karen C.** (U Texas Medical Branch, Galveston) **Operant conditioning of cortical steady potential responses in rats.** *Life Sciences*, 1974(Aug), Vol 16(4), 723-732.—Investigated whether amplitudes of cortical steady potential (SP) responses to an auditory stimulus could be altered by operant conditioning procedures using food reinforcement with 7 implanted female Holtzman albino rats. The negative SP responses to the 5-sec tone alone diminished with repeated presentation of the stimulus. When food reinforcement was given immediately following the tone, SP response amplitudes increased and stabilized after 4-5 sessions. Thereafter, the Ss were required to increase or decrease the amplitudes of response in order to obtain reinforcement. 2 of 3 Ss required to increase amplitudes were successful, and 3 of 4 Ss required to decrease amplitudes were successful. It is concluded that changes in cortical SP responses can be operantly conditioned. (21 ref)—*Journal abstract*.

6728. **Quy, Roger J. & Kubiak, Edward W.** (U Keele, England) **A comparison between "aware" and "naive" conditions in the suppression of GSR activity.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 561-565.—Aware (A) and naive (N) groups ( $n = 10$  undergraduates in each) received different instructional sets, the former being informed both of the nature of their task and the response-reinforcement contingency. Negative reinforcement was given to these groups whenever a spontaneous galvanic skin response (GSR) was emitted during 4 4-min trial periods. 2 corresponding yoked-control groups, CA and CN, received noncontingent reinforcement over the same periods. Results indicate that the contingent reinforcement groups both showed learned suppression of spontaneous GSR activity, but comparison between the A and N groups revealed a significant Time  $\times$  Instructional Set interaction. It is suggested that the "aware" instructional set had an inhibitory effect upon learning.—*Journal abstract*.

6729. **Ratcliff, Floyd (Ed.).** (Rockefeller U, New York, NY) **Studies on excitation and inhibition in the retina: A collection of papers from the laboratories of H. Keffer Hartline.** New York, NY: Rockefeller University Press, 1974. xx, 668 p.—Presents a collection of 35 research papers published between 1932 and 1972 on neural activity generated by single photoreceptor units in the eye of the horseshoe crab (*Limulus*), the activity of single optic nerve fibers of the vertebrate retina, and the dynamic and steady state characteristics of inhibitory interaction in the lateral eye of the horseshoe crab.

6730. **Ratcliff, Floyd; Knight, Bruce W.; Dodge, Frederick A. & Hartline, H. K.** (Rockefeller U, New

York, NY) **Fourier analysis of dynamics of excitation and inhibition in the eye of *Limulus*: Amplitude, phase and distance.** *Vision Research*, 1974(Nov), Vol 14(11), 1155-1168.—Results of experiments on the lateral eye of *Limulus* show that 3 basic processes—excitation, self-inhibition and lateral inhibition—govern the dynamics of the eye's neural network. All lateral inhibition may be represented by a single transfer function scaled by the summed lateral inhibitory coefficients. Discharges of impulses from 3 units were recorded simultaneously. Findings show that (a) variation in amplitude of excitation produced proportional variation in amplitude of lateral inhibition on a neighboring unit at a fixed distance but no phase shift, and (b) the amplitude of lateral inhibition varied with distance to the units affected, but there was no phase shift. (French, German, & Russian summaries) (60 ref)—*Journal abstract*.

6731. **Reiman, V.; Korth, M. & Keidel, W. D.** (U Erlangen, Physiologisches Inst, Nürnberg, Germany) **[Correlation analysis of EEG and eye movements in man.]** (Germ) *Vision Research*, 1974(Oct), Vol 14(10), 959-963.—To examine the role of the arhythm in connection with the reafference principle, eye movements and EEG were recorded simultaneously from 13 20-30 yr old Ss and were analyzed by computer. During fixation in the dark, there was high correlation in the frequency range of 8-12 Hz and less correlation at lower frequencies. When Ss viewed a patterned field the reversed effect was observed. This is in accordance with the reafference hypothesis. (French, German, & Russian summaries) (27 ref)—*English summary*.

6732. **Schicht, William W.; Zeiner, Arthur R. & West, Gerald L.** (U Oklahoma, Health Sciences Ctr) **The role of test trial sequences in the development of backward conditioning of the skin conductance response.** *Biological Psychology Bulletin*, 1974(Mar), Vol 3(3), 76-83.—Attempted to replicate backward conditioning of the skin conductance response and to test the hypothesis that a variable, forward trace conditioning accounts for the earlier results. Ss were assigned to 3 independent groups: a random unpaired control group, a backward-conditioning group, and a backward-conditioning group confounded with a forward-conditioning contingency. Both backward-conditioning groups differed from the control but they did not differ from each other. Group differences in motivation and individual differences in activation interpretations were considered unlikely as explanations of the results. (17 ref)—*Journal abstract*.

6733. **Shaw, C.; Yinon, U. & Auerbach, E.** (Hadassah U Hosp & Medical School, Vision Research Lab, Jerusalem, Israel) **Diminution of evoked neuronal activity in the visual cortex of pattern deprived rats.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 42-49.—The "deprived" cortex of 16 monocularly deprived rats showed a considerable diminution in response to specific visual stimuli. Many neurons (57.7%) in the deprived cortex did not respond to any visual stimuli, and 29% reacted nonspecifically to any stimulus anywhere in the visual field. In comparison, 7.4% neurons in the nondeprived cortex were not responsive to visual stimuli, and 41.3% gave indefinite response. In the normal cortex 51.1% of the cells were motion, orientation, or direction selective while the number for the deprived cortex was



handled in a similar way, but in the empty chamber, showed a slight increase in reinfection rate, moderate corticosterone levels and adrenal gland weights, and normal body weight gains. (21 ref)—*Journal abstract*.

6751. Hartung, G. Harley. (Central Missouri State U) **Responses of middle-aged women to maximal cycling exercise.** *American Corrective Therapy Journal*, 1974(Jul-Aug), Vol 28(4), 103-106.—Reviews literature on women's physiological responses to exercise and reports mean blood pressure, oxygen consumption, and heart rate in 29 healthy female Ss aged 33-48 given a work-capacity test on a bicycle ergometer. (17 ref)

6752. Hoehn-Saric, Rudolf et al. (Johns Hopkins U) **Attitude change and attribution of arousal in psychotherapy.** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 234-243.—Studied (a) the effect of arousal without confusion on patients' suggestibility and (b) the role of attribution of the source of arousal on the acceptance of a persuasive communication. Ss were 3 groups of 42 psychoneurotic outpatients. 2 groups received 3 adrenalin arousal sessions during which a persuasive communication was given. One group was told that they were receiving an arousing inhalant, the 2nd group did not know that the inhalant was arousing, and the 3rd group was a control group and received an inert inhalant. Short-term attitude change, measured by the semantic differential technique, was identical in the informed and uninformed adrenalin groups. The combined adrenalin groups, however, showed a regular response pattern to the intervention and more directional attitude change significantly more frequently than the control group. Although adrenalin arousal had some effect on suggestibility, ratings of therapist performance and patient responses suggest rather complex interactions. Adrenalin patients, not the controls, showed increased cardiac lability to topics which had been discussed under adrenalin arousal in previous sessions.—*Journal abstract*.

6753. Johnson, J. & Lockwood, P. (U Hosp of South Manchester, England) **EEG evaluation of a sleep recorder.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 265-267.—Compared the duration of sleep as estimated by a sleep recorder with estimation of sleep made simultaneously in 14 Ss with EEG monitoring. The recorder underestimated the total duration of sleep by 10%. This was largely due to retained capacity for making responses in Stage I sleep, early Stage 2 sleep, and REM sleep.—*Journal summary*.

6754. Lader, Malcolm. (U London, Inst of Psychiatry, England) **The peripheral and central role of the catecholamines in the mechanisms of anxiety.** *International Pharmacopsychiatry*, 1974, Vol 9(3), 125-137.—Anxiety is both an emotional state and a personality trait and may be either normal or pathological. Data from the literature are discussed which show that the physiological changes of anxiety can be induced by sympathomimetic agents, but the accompanying psychological changes may not be typical of anxiety. Conversely, the physiological concomitants can be attenuated using  $\beta$ -adrenoceptor blocking agents, although psychic anxiety may be only partly ameliorated. The central biochemical aspects of anxiety are poorly understood. Catecholamines rather than indoleamines appear to be

involved in stress reactions. The locus coeruleus, a structure in the brainstem projecting widely to the cerebral cortex, has mainly adrenergic neurones and can be postulated to play a key role in the genesis of anxiety. In the treatment of anxious patients a combination of a central anxiolytic such as a benzodiazepine and a peripheral  $\beta$ -blocker such as propranolol may be most efficacious. (38 ref)—*Journal abstract*.

6755. Lynch, James J. & Katcher, Aaron H. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Human handling and sudden death in laboratory rats.** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 362-365.—Studied the effect of human handling on the survival of laboratory rats immersed in a tank of agitated water (the Richter water chamber). 12 of 22 male Holtzman rats who had been handled died while all of the unhandled rats survived. The death of the handled rats followed diving in the water tank. Findings suggest that it would be helpful to re-examine experimental procedures that purport to show a connection in infrahuman studies between aversive emotional states (e.g., helplessness-hopelessness) and psychosomatic pathology and abnormal behavior.—*Journal abstract*.

6756. McKinlay, Sonja M. & Jefferys, Margot. (Boston U) **The menopausal syndrome.** *British Journal of Preventive & Social Medicine*, 1974(May), Vol 28(2), 108-115.—Results of a postal questionnaire survey of 638 45-54 yr old women living in the London area indicate, consistent with other recent surveys, that hot flushes and night sweats are clearly associated with the onset of a natural menopause and that they occur in the majority of women. Hot flushes were reported to occur more frequently (usually daily) and over more of the body by women whose menstrual flow showed evidence of change or cessation. For 25% of those women whose menses had ceased for at least 1 yr, hot flushes persisted for 5 yrs or more. The other 6 symptoms specified—headaches, dizzy spells, palpitations, sleeplessness, depression, and weight increase—showed no direct relationship to the menopause but tended to occur together, each being reported by approximately 30-50% of the respondents with little variation according to menopausal status. None of the 6 sociodemographic variables investigated—employment status, school-leaving age, social class, domestic workload, marital status, and parity—had any marked association with the reported frequency of symptoms. The majority of respondents did not anticipate or experience any difficulties and only about 10% expressed regret at the cessation of menses. Despite embarrassment and/or discomfort from hot flushes, reported by nearly 75% of those experiencing this symptom, only 20% had apparently sought medical treatment. (21 ref)—*Journal abstract*.

6757. Minneman, Kenneth P.; Lynch, Harry & Wurtman, Richard J. (Massachusetts Inst of Technology) **Relationship between environmental light intensity and retina-mediated suppression of rat pineal serotonin-N-acetyl-transferase.** *Life Sciences*, 1974(Nov), Vol 15(10), 1791-1796.—Studied the dose-response relationship between intensity of ambient lighting and pineal biosynthetic activity by measuring serotonin-N-acetyl-transferase activity in pineals of male Sprague-Dawley rats

exposed to strong light for 2 days, and then to darkness or to various light intensities for 3 hrs. As little as .5  $\mu$  watts/cm<sup>2</sup> caused a greater than 50% suppression of serotonin-N-acetyl-transferase activity; maximum inhibition was obtained with 15  $\mu$  watts/cm<sup>2</sup>. (16 ref)—*Journal abstract*.

6758. Parker, David M. & Howard, Marthe. (California State U, Northridge) **Effects of repeated administration of the psychophysiological test for motion sickness susceptibility.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 273-276.—Results show that when 12 undergraduates were exposed repeatedly to D. Parker's psychophysiological test for motion sickness susceptibility, the susceptibles showed decremental skin conductance responses. After the 2nd trial, Ss' scores indicate that they could not be classified as susceptibles under the previously established criteria. It is concluded that a time-related effect was operating which reduced scores on repetitions of the test. It is suggested that Ss be screened for recent experience before taking the test.—*Journal abstract*.

6759. Powell, D. A.; Lipkin, M. & Milligan, W. L. (VA Hosp, Columbia, SC) **Concomitant changes in classically conditioned heart rate and corneoretinal potential discrimination in the rabbit (*Oryctolagus cuniculus*).** *Learning & Motivation*, 1974(Nov), Vol 5(4), 532-547.—Corneoretinal potential (CRP) and heart-rate changes of a total of 76 New Zealand rabbits were measured in 3 differential classical conditioning experiments in which the directionality of the heart-rate response was related to CRP acquisition and the certainty or uncertainty of the stimulus situation. Results suggest that heart-rate decelerations were associated with stimuli that predicted upcoming aversive events, while heart-rate accelerations were associated with asymptotic CRP responding late in conditioning. Findings are interpreted in terms of (a) changes in general somatic activity and (b) the cue properties associated with conditioned stimuli which predict aversive events. (28 ref)—*Journal abstract*.

6760. Simpson, G. C.; Cox, T. & Rothschild, D. R. (U Nottingham, England) **The effects of noise stress on blood glucose level and skilled performance.** *Ergonomics*, 1974(Jul), Vol 17(4), 481-487.—32 healthy male, young adult students were randomly assigned to 1 of 4 groups. Groups A and B were preloaded with glucose; Groups C and D were not. Groups A and D carried out a pursuit rotor task under 50-dB (nonstressful) white noise. Groups B and C carried out the same task under 80-dB (stressful) white noise. Blood samples were taken from each S, and blood glucose levels as well as time on target were measured. Statistical analysis of the results showed that noise stress impaired performance and that preloading with glucose attenuated the impairment. This change in performance was accompanied by a reduction in the high blood glucose level caused by preloading. Preloading in the nonstressful condition impaired performance without an associated fall in the high blood glucose level. It is suggested that blood glucose levels may be used as an indicant of stress. (French & German summaries)—*Journal abstract*.

## Genetics

6761. Hogarth, Robin M. (European Inst of Business Administration, Fontainebleau, France) **Monozygotic and dizygotic twins reared together: Sensitivity of heritability estimates.** *British Journal of Mathematical & Statistical Psychology*, 1974(May), Vol 27(1), 1-13.—Examines the method of estimating the heritable component of behavioral traits by comparing observed similarities between pairs of MZ (monozygotic) twins as opposed to DZ (dizygotic) twins. The technique of sensitivity analysis is used to investigate the importance of assumptions made to calculate heritability estimates. This permits not only the investigation of specific assumptions, but also the effects of different combinations of assumptions. The assumptions examined include the level of assortative mating, degree of intrainpair environmental similarity of MZ as opposed to DZ twins, and the presence of genotype-environment covariance. It is noted that estimates of genetic variance—although large—are sensitive to small changes in these assumptions and that different combinations of assumptions can produce similar estimates of genetic variance. Although this work is effected within the classical twin method, its implications are valid for more sophisticated analyses of the "nature-nurture" problem. (25 ref)—*Journal abstract*.

6762. Roubertoux, P. (U René Descartes, Differential Psychology Lab, Paris, France) **[Genetic diversity and individual differences.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 552-562.—Reviews research in behavior genetics, especially genetic analysis of behavior concerned with (a) studies of the heritability of measurable behavioral characteristics, including breakdown of phenotypic variation and determination of composition of genotypic variation; and (b) contributions of the life sciences and the behavioral sciences to studies of "controlled evolution." (43 ref)—Z. M. Cantwell.

6763. Smith, Roy H. & Connor, James L. (Mary Washington Coll) **The inheritance of behavioral wildness in house mice (*Mus musculus* L.).** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 249-256.—Ranked 14 behavioral measures according to their ability to differentiate performances of a wild population of 36 mice from 3 domestic inbred strains. These "wildness" rankings were then analyzed for their ability to predict genetic and Genotype  $\times$  Environment interactions. Genetic parameters were derived from analysis of C57/BL6, DBA/2, and A/J strains ( $n = 36$ ) and 20 Ss from each of their hybrid crosses via the diallel technique of genetic analysis. Genotype  $\times$  Environment interactions were assessed both as mean differences in stock performances resulting from rearing in a laboratory vs naturalistic environment and as differences in environmental variability within stock genotypes. Behavioral characters ranking high on "wildness" failed to demonstrate any unitary pattern of Genotype  $\times$  Environment interactions. The diallel genetic analysis revealed many examples of additive variation but relatively few examples of dominant variation. An extremely wide range of interactions occurred between genotype and rearing environments, with "wildness" and "developmental homeostasis" concepts both failing to account for all the observed interactions. (22 ref)—*Journal abstract*.



# PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

6764. Larsson, K.; Feder, H. H. & Komisaruk, B. R. (U Göteborg, Unit of Psychobiology, Sweden) **Role of the adrenal glands, repeated matings and monoamines in lordosis behavior of rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 685-692.—Administered tetrabenazine intraperitoneally to estrogen-primed female Sprague-Dawley rats which were ovariectomized or ovariectomized and adrenalectomized. The drug treatment facilitated sexual receptivity in the nonadrenalectomized Ss but had no such effects in adrenalectomized ones. Injection of saline, the solvent of tetrabenazine, in combination with repeated mating exerted the same facilitatory effect as the drug on the lordosis behavior. As in the case of tetrabenazine the effects only occurred in the presence of the adrenals. The facilitatory effect on the lordosis behavior is interpreted as due to adrenal steroids with progestational action which were secreted as a response to tetrabenazine, saline, or/and repeated mating. (29 ref)—*Journal abstract*.

6765. Schiff, Anshel J. (Purdue U) **An improved electrode system for recording EEG from the skull.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 595-597.—Describes a simple and relatively rapid procedure for constructing and implanting electrodes in rat or rabbit skull which eliminates shortcomings of other techniques.

6766. Smith, Landgrave T. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **The interanimal transfer phenomenon: A review.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1078-1095.—The phenomenon described as interanimal transfer of learned responses from trained donor animals to untrained recipient animals by means of brain extracts has been regarded as problematic by many investigators and has generated extensive literature. Among major issues have been the reproducibility of the phenomenon and the viability of a learning interpretation of the recipients' behavior. The learning interpretation, if correct, makes direct experimental approaches to brain-behavior relationships feasible in the context of learning and memory. The review led to a number of conclusions with respect to the issues and evidence. Reproducibility has become less of a problem but has not been eliminated. Several species have been used successfully, and the effect has been reported over a wide range of tasks. The transfer effect, considered at a behavioral level of analysis, exhibits an empirical relationship with donor training and learning. While there is also evidence of a transfer of a nonspecific arousal factor, it cannot account for all of the data. Given the relatively crude extracts used in many cases, a 2-factor explanation of transfer appears most likely, in which an arousal transfer occurs under one set of conditions, and a learning transfer under others. The behavioral challenge resulting from this notion is the clear separation of the 2 effects. Biological and chemical mechanisms of the effect have not been widely researched, possibly due to a lack of formal consensus about what the transfer effect represents and thus its significance. (3 p ref)—*Journal abstract*.

6767. Zornetzer, Steven F.; Boast, Carl & Hamrick, Michael. (U Florida, Medical School) **Neuroanatomic**

**localization and memory processing in mice: The role of the dentate gyrus of the hippocampus.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 569-575.—Produced long-term (LTM) and short-term memory (STM) deficits in a 1-trial inhibitory avoidance task in a total of 138 male Swiss mice by the disruption of various hippocampal subfields in 2 experiments. Disruption of neural tissue was accomplished by the mere presence of stainless steel electrodes and by the spontaneous deposition of  $Fe^{++}$  ions. LTM was impaired only in Ss with bilateral  $Fe^{++}$  ion deposition in the dentate gyrus. STM was impaired by tissue damage to various other regions of hippocampus. Bilateral deposition of  $Fe^{++}$  ions in the dentate gyrus did not increase the severity of the STM deficit resulting from the concomitant damage to other hippocampal subfields. Data indicate that a high degree of neuroanatomical localization of function regarding memory processing occurred. Possible mechanisms by which  $Fe^{++}$  ion deposition can interfere with the role of the dentate gyrus in information processing are discussed. (37 ref)—*Journal abstract*.

## Brain & Electrical Stimulation & Lesions

6768. Alml, C. Robert & Weiss, Charles S. (Ohio U) **Drinking behaviors: Effects of lateral preoptic and lateral hypothalamic destruction.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 527-538.—The lateral preoptic (LPO) and/or lateral hypothalamic (LHA) areas of 139 male Holtzman albino rats were bilaterally destroyed, and drinking thresholds were measured following subcutaneous NaCl (NC) injection. Also measured were latencies to drink and water intakes following NC and polyethylene glycol (PG) injections and water deprivation (WD). Lesions confined to the LPO were associated with elevated drinking thresholds and elongated latencies to drink following NC, PG, and WD. LPO plus some LHA destruction, in addition to the above, was associated with attenuated intake following NC and PG, but not WD. Minimal LHA damage affected all measures similar to that produced by lesions confined to the LPO, while greater LHA destruction affected the measure like the LPO plus some LHA lesions, with the additional deficit of attenuated WD intake. Gross LHA and simultaneous LPO-LHA lesions resulted in complete adipsia. (28 ref)—*Journal abstract*.

6769. Beyra, M. (U Louvain, Lab de Neurophysiologie, Belgium) **Effects of intracranial reward strength on escape threshold.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 507-511.—Male Wistar albino rats with monopolar electrodes implanted in the lateral posterior hypothalamus were trained for self-stimulation behavior (ICSS). Ss were allowed to self-stimulate in a 2-compartment test chamber. 38 different electrical stimuli were used to maintain ICSS. In 1 compartment, a foot shock of increasing voltage was administered. It was observed that the voltage of the foot shock required to elicit an escape response increased during ICSS. This attenuation of aversive state was related to the strength of the reinforcing effect elicited by brain stimulation. It is concluded that the reinforcing effect involves 2 factors of which only one seems to be responsible for the escape threshold modification. (24 ref)—*Journal abstract*.

6770. Brunner, Robert L.; Haggblom, Steven J. & Gazzara, Russell A. (Purdue U, Lab of Developmental Neurobiology) **Effects of hippocampal X-irradiation-produced granule-cell agenesis on instrumental runway performance in rats.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 485-494.—In Exp I, 10 male Wistar rats in which x-irradiation during early postnatal life had interfered with the acquisition of dentate granule cells ran faster than 10 controls during extinction of a runway response acquired under a consistent food reward schedule. Randomly rewarded and nonrewarded trials increased running speeds to an equal extent in x-irradiated and control groups during extinction. Exps II and III showed that unlike a reported total inability of hippocampal lesioned rats to pattern their running responses appropriate to a single alternation schedule of reward and nonreward, 21 x-irradiated Ss, while impaired in acquiring response alternation, had persistent deficits compared to the 21 controls only when the task was made very simple by reducing the number of daily trials to 2. Results are discussed in terms of an hypothesized reduction in the aversiveness of nonreward and a consequent reduction in the growth of inhibition in x-irradiated rats. (24 ref)—*Journal abstract*.

6771. Buchanan, Denton C. & Caul, William F. (Vanderbilt U Hosp) **Gastric ulceration in rats induced by self-imposed immobilization or physical restraint.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 583-588.—Assessed gastric ulceration in 12 male Holtzman rats after they were placed in a self-immobilization condition in which the unrestrained S could avoid footshock by remaining motionless. 12 Ss received equivalent but unavoidable footshock which was not contingent on movement within the apparatus. A 3rd group of 12 received no shock and served as a deprivation control. The 1st 2 groups showed a similar degree of ulceration which was greater than that observed in the deprivation control Ss. 2 methods of physical restraint were also yoked in series to the shock circuit of the self-imposed condition to assess the influence of different forms of restraint. In 2 groups of 12 Ss, restraint via the legs plus shock condition produced a greater degree of ulceration than did whole body restraint plus shock. Heart rate and body weight changes were evaluated for each of the 5 conditions. (24 ref)—*Journal abstract*.

6772. Burešová, O. & Bureš, J. (Czechoslovak Academy of Sciences, Inst of Physiology, Prague) **Functional decortication in the CS-US interval decrease efficiency of taste aversive learning.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 357-364.—Studied conditioned taste aversion in 160 male hooded Drückrey rats with the cortical spreading depression (CSD) technique. Water-deprived Ss had a 15-min access to water on the familiarization Days 1 and 2. On Day 3 they were offered .1% saccharin (conditioned stimulus; CS) followed after 30-300 min by intraperitoneal lithium chloride injection as the unconditioned stimulus (UCS; .14 M/2% body weight). Saccharin intake on Day 4 increased proportionally to the duration of CS-UCS interval from 40% (30 min) to 86% (240 min) and 103% (300 min) of Day 3 consumption. Bilateral CSD evoked 15 min after CS termination and maintained during the rest of the CS-UCS interval impaired the taste aversion

conditioning with 120- and 180-min delays (85% and 89%) but not with 30- and 60-min delays (32% and 50%). Gustatory experience acquired during unilateral CSD on Day 3 yielded strong conditioned aversion with 20- and 60-min CS-UCS delays (40% and 43%). When bilateral CSD was induced 10 min after hemidecorticate exposure to saccharin, significant aversion was found with the 20- and 40-min delays (38% and 53%) but not with 50- and 60-min delays (95% and 87%). It is concluded that CSD interferes with the short-term storage of the gustatory information acquired with the intact brain. (15 ref)—*Journal abstract*.

6773. Carlsson, Sven & Larsson, Knut. **Self-stimulation and mating behavior in the male rat.** *Göteborg Psychological Reports*, 1974, Vol 4(5), 7p.—Studied a presumed relationship between self-stimulation of the brain and sexual behavior in 2 experiments with a total of 15 male albino rats. In Exp I Ss were allowed self-stimulation during a 5-min period and thereafter were transferred to a mating cage with a female. No effects of the self-stimulation were recorded in the mating behavior. In Exp II Ss were allowed 1 intromission and thereafter presented with a lever for self-stimulation, still having access to the female. The sexual responses were completely inhibited, and self-stimulation at normal rate resumed. It is concluded that there is no necessary link between self-stimulation of the brain and sexual behavior.—*Journal abstract*.

6774. Cooper, Barrett R. et al. (U North Carolina, Medical School, Chapel Hill) **Alteration of avoidance and ingestive behavior after destruction of central catecholamine pathways with 6-hydroxydopamine.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 639-649.—Bilaterally infused a total of 56 male Sprague-Dawley rats with 6-hydroxydopamine (6-OHDA) into the ventral tegmental area containing A-10 dopamine cell bodies, the tegmental segment of the ascending norepinephrine pathways, the globus pallidum, or the caudate-putamen. 50 Ss served in control groups. The maximum antagonism of active avoidance acquisition occurred following placement of 6-OHDA into the ventral tegmental and caudate areas. No effect on either avoidance or ingestive behavioral measures occurred after infusion of 6-OHDA into the norepinephrine pathways. Factor analysis of behavioral and biochemical data suggested that only striatal dopamine content bore a high relationship to avoidance behavior, while ingestive behavioral measures were highly related to both striatal and limbic dopamine content. Results suggest a functional-anatomical of dopamine pathways in brain. (27 ref)—*Journal abstract*.

6775. de Castro, John M. (Georgia State U) **A selective spatial discrimination deficit after fornixotomy in the rat.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 373-382.—Trained 15 fornix-lesioned and 15 sham-operated male Holtzman albino rats in a plus (+)-shaped maze, for food reinforcement, to run to a specific goal arm (position discrimination groups) or to make a specific turn (response discrimination groups). Acquisition and 5 successive reversals of the discrimination were run. Fornix lesions produced a selective impairment in the acquisition and reversal performance of the position discrimination. The response discrimination was not



affected by the lesion. Results indicate that the hippocampal-fornix system is involved in the long-term storage or retrieval of the spatiotemporal relationships of stimuli in the environment. (26 ref)—*Journal abstract.*

6776. Dewar, A. J. (U Edinburgh, Scotland) **Changes in incorporation of ( $^{14}$ C) uridine into uridine nucleotides in rat visual cortex during first exposure to light.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 134-140. —The 1st exposure of newly weaned Piebald Virol Glaxo rats to light resulted in a transient change in the labeling of uridine nucleotides in the visual cortex but not in the frontal cortex. 30 min after exposure to light, the proportion of intraventricularly administered [ $^{14}$ C]uridine incorporated into uridine diphosphate and uridine triphosphate was increased significantly relative to the dark control value. After a 3-hr exposure to light, no differences were seen between the light-exposed experimental and dark-exposed control Ss. (19 ref)—*Journal abstract.*

6777. Goldstein, Melvin L. (Indiana U, Kokomo) **A simple method for determining the shock threshold of the white rat.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 303-304. —Used W. Dixon and F. Massey's (1957) "up and down" technique to determine shock thresholds on 4 male albino rats; the technique involves subjecting S to a series of 1-sec shocks at 60-sec intervals. The thresholds determined for each S were 39, 52, 31.5, and 45.5 v.

6778. Greene, Ernest & Stauff, Chris. (U Southern California) **Behavioral role of hippocampal connections.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 141-160. —Evaluated the functions of particular afferent and efferent connections of the hippocampus in a sequence of learning tasks. 9 male Long-Evans hooded rats with damage to the fornix were impaired in learning to reverse a position habit, learning to alternate position, learning to extinguish running for water reward, and learning a passive avoidance habit. Ss with lesions of the subiculum or of the cingulum ( $N = 12$ ) were impaired in avoidance learning only. Exploration of an open field, learning of the original position habit, and running latencies in performing the maze habits were not significantly affected by any lesion treatment. Results support the position that the hippocampus is involved in separable functions. "Response suppression" may be one of its activities, but the hippocampus also appears to have a special role in the storage and recall of spatial habits. (42 ref)—*Journal abstract.*

6779. Hannon, Roseann & Bader, Arlene. (U of the Pacific) **A comparison of frontal pole, anterior median and caudate nucleus lesions in the rat.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 513-521. —48 CFH strain male hooded rats with frontal pole cortex, anterior median cortex, caudate nucleus, or sham control lesions were tested in 3 experiments on activity, spatial reversal learning, and delayed response learning. Performance of the lesioned groups was compared with that of higher mammals with frontal and caudate lesions on similar problems. Ss with either type of frontal lesion were significantly more hyperactive than controls during the 1st hour of testing but were not impaired on reversal or delayed response learning. Caudate lesioned Ss were significantly more hyperactive than the frontally lesioned

groups, were significantly impaired on the reversal task, and showed some indication of impairment on the delayed response task. (54 ref)—*Journal abstract.*

6780. Hartje, W. & Ettlinger, G. (Aachen Technical U, Faculty of Medicine, W Germany) **Reaching in light and dark after unilateral posterior parietal ablations in the monkey.** *Cortex*, 1973(Dec), Vol 9(4), 346-354. —Undertook a detailed comparison of the accuracy of reaching with the ipsilateral and contralateral hand in the light and in the dark after unilateral posterior parietal ablations in 4 rhesus monkeys. Reaching in the light was impaired only in the contralateral hand, with gross and predominantly medial misreaching. In the dark, reaching with the contralateral hand was even more impaired than in the light, but with no significant tendency toward medial misreaching. Reaching with the ipsilateral hand in the dark was also impaired but much less and not as consistently as with the contralateral hand. A predominance of lateral errors was observed for the ipsilateral hand in the dark. Results indicate that the disorder of reaching found after unilateral posterior parietal ablations in monkeys cannot be explained as a disturbance of visual orientation. The findings suggest the presence of a disorder of visuomotor coordination in addition to a nonspecific spatial disturbance in the dark and a contralateral somatosensory defect.—*R. Gunter.*

6781. Hodos, William & Fletcher, Gordon V. (U Maryland) **Acquisition of visual discrimination after nucleus rotundus lesions in pigeons.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 501-506. —Investigated the effects of lesions of nucleus rotundus thalami in 5 White Carneaux pigeons on the postoperative acquisition of visual intensity and pattern discriminations. Ss were pretrained to peck stimulus discs and obtain grain reward from a dispenser. Following pretraining, bilateral lesions were made in nucleus rotundus. After recovery from surgery, the Ss were given their 1st exposure to the stimuli. The performance of these Ss was compared with the preoperative performance in the same discrimination task of 27 pigeons that were being trained concurrently in another experiment. Results indicate that nucleus rotundus lesions impair original learning as well as retention of established discrimination performances.—*Journal abstract.*

6782. Hoffman, Howard S. & Ratner, Alan M. (Bryn Mawr Coll) **A shock-delivery system for newly hatched precocial birds.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 575-576.

6783. Howard, James L. & Breese, George R. (U North Carolina, Child Development Inst, Biological Sciences Research Ctr, Chapel Hill) **Physiological and behavioral effects of centrally-administered 6-hydroxydopamine in cats.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 651-661. —Intraventricular injections of 6-hydroxydopamine (6-OHDA) into cats produced a greater reduction of brain norepinephrine than dopamine content while producing no change in brain serotonin. The effects immediately after the 1st injection of 6-OHDA included hypothermia, increase in respiratory rate, and in the presence of pargyline, sham rage. Following the 1st injection, a prolonged period of hypophagia and hypodipsia occurred. Subsequent injections produced less hypothermia and greater increases in

respiratory rate. Measurement of sleep-wake ratios indicated that paradoxical sleep was initially reduced by 6-OHDA administration, but eventually recovered to occupy its normal percentage of the cycle. However, wake time was increased and slow-wave sleep time decreased. Ss treated with 6-OHDA had lower baseline heart rates than controls and showed no evidence for acquiring a conditioned heart-rate response, although heart-rate response to shock was potentiated. (29 ref)—*Journal abstract*.

6784. Kling, John O. & Bartley, Kerry S. (Coll of St Teresa) **Effects of frontal ablations on visual discrimination in the rat.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 305-306.—6 rats were given 100 reinforcements on continuous reinforcement and then assigned to either the experimental or control group. Both groups acquired the original discrimination in 4 sessions. The experimental group did not reverse more quickly in any of the 3 test reversals than the control group.

6785. Martin, David G.; Hawryluk, Garry A. & Guse, Linda L. (U Manitoba, Winnipeg, Canada) **Experimental study of unconscious influences: Ultrasound as a stimulus.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 589-608.—Used ultrasound as a stimulus to study its effects on behavior without S awareness. In Exp I evoked responses were elicited in 7 of 24 undergraduates by ultrasonic tones when Ss were reporting the presence of no stimulus. In Exp II with 20 male Ss, galvanic skin response conditioning to a compound stimulus made up of ultrasound and a red light resulted in shorter latencies to the compound stimulus than to the red light alone, during extinction. The differences did not appear among control Ss, supporting the occurrence of conditioning without awareness. In Exp III with 16 Ss, reaction-time performance was disrupted by providing ultrasound as an anticipatory cue for 1 of 2 lights over 150 trials and then reversing the ultrasound-light pairing. The ultrasound did not facilitate reaction time to the paired light during the 1st 150 trials, however. Results support learning without awareness, and the method is discussed as it might be extended to the study of unconscious influences and to clinical applications. (75 ref)—*Journal abstract*.

6786. Neill, Darryl B.; Ross, Joseph F. & Grossman, Sebastian P. (Emory U) **Effects of lesions in the dorsal or ventral striatum on locomotor activity and on locomotor effects of amphetamine.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 697-702.—In 2 experiments electrolytic lesions in the dorsal portion of the anterior striatum of 7 adult male Sprague-Dawley albino rats reliably increased spontaneous wheel running compared to 9 controls and potentiated the stimulant effects of amphetamine on activity in both running wheels and stabilimeters. Comparable lesions in the ventral aspects of the striatum of 8 Ss produced a decrease in spontaneous wheel running and did not modify the activating effects of amphetamine in either wheels or stabilimeters. (31 ref)—*Journal abstract*.

6787. Pager, J. (U Claude Bernard de Lyon, Lab d'Electrophysiologie, Villeurbanne, France) **A selective modulation of olfactory input suppressed by lesions of the anterior limb of the anterior commissure.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 523-526.—Performed

unilateral sections of the anterior limb of the anterior commissure (AAC) on either the right or left sides of 7 male Wistar rats. The specific and selective activation observed in the mitral cell layer of the olfactory bulbs of hungry Ss receiving food odor disappeared in the side of the unilateral section. The nonspecific arousal effect disappeared as well. Results are discussed in terms of the AAC centrifugal modulating role of the olfactory input. (20 ref)—*Journal abstract*.

6788. Sagvolden, Terje & Wester, Knut. (U Oslo, Inst of Neurophysiology, Norway) **Habituation of the startle reflex in rats with septal lesions.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 413-418.—Compared the habituation rate of the startle reflex in rats with septal lesions to the rate in control rats when 27 male albino Moll-Wistar rats were matched according to the initial response amplitude. The lesions were mainly restricted to the dorsal part of the septal nuclei. Ss with septal lesions required more trials than control rats to attain the habituation criterion when the rats were tested 33 or 93 days after the operation, but not when they were tested on the 10th postoperative day. Results may be due to a loss of response inhibition or to increased arousal in the Ss with septal lesions. (16 ref)—*Journal abstract*.

6789. Shibata, M. & Bures, J. (Gifu U, Japan) **Functional decortication employing reverberating cortical spreading depression: Experimental evaluation of advantages and limitations.** *Experimental Neurology*, 1974(Dec), Vol 45(3), 415-423.—Data from 13 male hooded (Druckrey) rats anesthetized with allobarbitol suggest that functional decortication by reverberating cortical depression decreases the amount of externally applied KCl, but that its practical use is limited by long cycle duration, obligatory electrophysiological control, and presence of focal lesion or preservation of activity in the treated area. Implications for behavioral studies are noted. (18 ref)

6790. Stevens, Robin & Cowey, Alan. (U Nottingham, England) **Visual discrimination learning and transfer in rats with hippocampal lesions.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 582-593.—Conducted 2 experiments on 10 male hooded Lister rats with hippocampal brain damage and on a control group of 10 rats with neocortical lesions. In Exp I the hippocampal group learned a difficult visual discrimination as promptly as the controls, and neither group was subsequently impaired by adding relevant or irrelevant background cues to the original stimuli. In Exp II the Ss learned a simultaneous visual discrimination in which the stimuli differed in both brightness and orientation. The hippocampal group was impaired relative to the controls on acquisition and showed poorer transfer to stimuli differing only in brightness or orientation. Results are incompatible with the hypothesis which attempts to explain the effects of hippocampal damage by a widespread reduction in sensory gating, but they are consistent with a more restricted version of the same hypothesis. (27 ref)—*Journal abstract*.

6791. Stoller, William L. (Indiana U) **Food, water and saccharin solution intake in rats with posterior striatal lesions.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 599-602.—Striatal damage in the albino rat did not influence food or water intake, differential consumption



of a saccharin solution and water, or body weight, suggesting that the portion of the posterior striatum which was damaged is of little or no importance in the regulation of food and water intake.

6792. Thomas, John B. & Thomas, Kay A. (Coll of Wooster) **Square-runway avoidance behavior and septal lesions in the rat.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 577-582.—In Exp I 10 septal-lesioned male Wistar rats acquired the square-runway avoidance response significantly faster than did 10 controls. In Exp II 8 lesioned Ss and 8 controls were compared on the acquisition of a regular 1-way avoidance response in the same apparatus. This change in procedure facilitated the avoidance responding of the control Ss and inhibited avoidance acquisition by the Ss with septal lesions. (15 ref)—*Journal abstract*.

6793. Ware, C. B.; Diamond, I. T. & Casagrande, V. A. (State U New York, Downstate Medical Ctr, Brooklyn) **Effects of ablating the striate cortex on a successive pattern discrimination: Further study of the visual system in the tree shrew (*Tupaia glis*).** *Brain, Behavior & Evolution*, 1974, Vol 9(4), 264-279.—Previous studies have shown that tree shrews without striate cortex can easily discriminate between 2 simple patterns presented simultaneously. It has been suggested that these animals cannot actually identify patterns without striate cortex, but simply detect differences between 2 stimuli by scanning. The present study showed that 7 tree shrews with damage to striate cortex, including complete removal, could discriminate horizontal from vertical stripes when presented either simultaneously or successively. This result supports the view that tree shrews do have the capacity to identify patterns in the absence of striate cortex. Results also show that the Ss could perform the same discrimination following damage to the temporal cortex. However, if the lesion included all of the striate cortex plus a large amount of temporal cortex, the Ss failed to discriminate the orientation of stripes even when they were displayed simultaneously. —*Journal abstract*.

6794. Whishaw, Ian Q. & Robinson, T. E. (U Lethbridge, Alberta, Canada) **Comparison of anodal and cathodal lesions and metal deposition in eliciting postoperative locomotion in the rat.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 539-551.—Conducted experiments with a total of 432 male Sprague-Dawley albino rats in which anodal lesions elicited more vigorous running in the first 8 postoperative hrs than cathodal lesions. Vigorous dose dependent running also followed injections of FeCl<sub>3</sub> and CuCl<sub>2</sub> but was less vigorous following H<sub>2</sub>O or HCl injections. Injections of other transition metals and AlCl<sub>3</sub> were ineffective. Particularly active sites for both lesions and injections were the dorsomedial and posterior hypothalamic nuclei, but running also followed anterior hypothalamic-preoptic and anterior lateral hypothalamic lesions. Behavioral tests administered at 24 hrs failed to reveal persistent deficits correlated with effective lesion placements for running, but increasing the lesion size in the caudal hypothalamus decreased postlesion running and increased the occurrence and severity of postlesion akinesia and somnolence. A zone of tissue inflammation surrounded sites of anodal cavitation and sites of FeCl<sub>3</sub>

and CuCl<sub>2</sub> injections. Results suggest that the irritative action of metals deposited by injection or lesion produce postoperative running and tissue inflammation, possibly concurrently. (34 ref)—*Journal abstract*.

6795. Wilburn, Margaret W. & Kesner, Raymond P. (U Utah) **Effects of caudate nucleus stimulation upon initiation and performance of a complex motor task.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 61-71.—Stimulation of the caudate nucleus at either 7 or 100 Hz impaired performance of a complex motor task by 6 adult implanted cats. The disruptive effects on execution of the task occurred at low amperages and appeared to involve interference with temporal programing of response components. Task initiation was impaired by stimulation at higher amperages. Electrical stimulation of anterior sites in the caudate nucleus resulted in impairment of performance at lower stimulation intensities than did stimulation of posterior sites. Although stimulation (7 Hz) of hippocampus, nonspecific thalamic nuclei, or mesencephalic reticular formation also resulted in performance deficits, the topography of interference effects and the threshold intensities required for disruption were different from those resulting from stimulation of the caudate nucleus. (17 ref)—*Journal abstract*.

6796. Yoshimura, H.; Gomita, Y. & Ueki, S. (Kyushu U, Faculty of Pharmaceutical Sciences, Japan) **Changes in acetylcholine content in rat brain after bilateral olfactory bulbectomy in relation to mouse-killing behavior.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 703-705.—Measured acetylcholine (Ach) content in male Wistar King-A rats. 14 Ss with olfactory bulbectomy (OB) exhibited significantly lower Ach levels in the cortex than did 13 intact and 9 sham-operated controls. However, there was no significant difference in Ach level of all brain areas between the killer and nonkiller OB Ss. Results may suggest that cortical cholinergic function was activated by bulbectomy, but the change in cortical Ach level was not related to muricide. (15 ref)—*Journal abstract*.

6797. Zeigler, H. P. & Karten, Harvey J. (Hunter Coll) **Central trigeminal structures and the lateral hypothalamic syndrome in the rat.** *Science*, 1974(Nov), Vol 186(4164), 636-637.—Extrahypothalamic lesions of central trigeminal structures produced a syndrome of aphagia, adipsia, finickiness, and food spillage in 12 Holtzman rats. The similarity of these effects to the lateral hypothalamic syndrome and the location of trigeminal structures within the diencephalon suggest that some components of the lateral hypothalamic syndrome are due to incidental damage to trigeminal fibers of passage. (24 ref)—*Journal abstract*.

### Drug Effects

6798. Alhava, Eeva & Mattila, Mauri J. (U Helsinki, Finland) **Dose-dependent differences of amphetamine levels in brain and heart of adult and developing mice.** *Acta Pharmacologica & Toxicologica*, 1974(Mar), Vol 34(3), 211-221.

6799. Anson, John E. & Chandler, B. J. (Stephen F Austin State U) **Chlorpromazine effects on self-punitive behavior.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 307-308.—64 albino rats were tested in a runway and injected intraperitoneally with chlorpromazine or

saline. The self-punitive effect was shown for all Ss injected with saline early or late in escape training. Ss receiving chlorpromazine either early or late in escape training failed to exhibit sustained performance during punished extinction and performed similarly to chlorpromazine-injected Ss tested in regular extinction.

6800. Antonaccio, Michael J.; Halley, Jeanne & Kerwin, Linda. (CIBA-GEIGY, Pharmaceuticals Div, Summit, NJ) **Functional significance of  $\alpha$ -stimulation and  $\alpha$ -blockade on responses to cardiac nerve stimulation in anesthetized dogs.** *Life Sciences*, 1974(Aug), Vol 16(4), 765-777.—Investigated whether  $\alpha$ -stimulants could inhibit responses to sympathetic nerve stimulation via a feedback inhibition loop mediated by prejunctional  $\alpha$ -receptors. Responses to cardiac nerve stimulation in 54 anesthetized dogs were compared before, during the peak effect of a drug infusion, and during a second drug infusion subsequent to the intravenous administration of phentolamine. The drugs infused were norepinephrine, phenylephrine, clonidine, naphazoline—all  $\alpha$ -stimulants—and guanethidine. All drugs caused marked elevations of blood pressure, an indication of  $\alpha$ -stimulation, but only guanethidine caused significant blockade of responses to sympathetic nerve stimulation. In addition, phentolamine, an  $\alpha$ -receptor blocker, and desipramine, an inhibitor of amine uptake, did not potentiate responses to sympathetic nerve stimulation. Results do not support the hypothesis that sympathetic nerves are under a functionally significant feedback loop mediated by  $\alpha$ -receptors. (16 ref)—*Journal abstract*.

6801. Balthazart, Jacques. (U Liège, Lab de Biochimie Générale et Comparée, Belgium) **Short-term effects of testosterone propionate on the behaviour of young intact male domestic ducks (*Anas platyrhynchos*).** *Psychologica Belgica*, 1974, Vol 14(1), 1-10.—Investigated social displays, sexual behavior, and aggression in 5 male domestic ducks that received intramuscular injections of 79 mg testosterone propionate for 21 days, compared with 5 control males in a group that included 8 females (4 of which received injections of 21.9 mg estradiol monobenzoate). Among injected males a significant increase occurred in sexual behavior and in 5 out of 6 social displays, but not in aggression. Reasons for low aggression and for the nonoccurrence of one social display are discussed. (21 ref)—*S. Slak*.

6802. Baños, Guadalupe; Daniel, P. M.; Moorhouse, S. R. & Pratt, O. E. (Inst of Psychiatry, London, England) **Inhibition of entry of some amino acids into the brain, with observations on mental retardation in the aminoacidurias.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 262-269.—Abnormally high levels of various amino acids were maintained in the bloodstream of Wistar rats, causing saturation of amino acid transport into the brain and partial exclusion from the brain of other amino acids necessary for protein synthesis. Excluded amino acids could be made to enter the brain by raising their concentration in the bloodstream. The possible relevance of these findings to improvements in the dietary treatment of some inborn errors of metabolism is discussed. (28 ref)—*Journal abstract*.

6803. Barrett, James E. (U Maryland) **Conjunctive schedules of reinforcement: I. Rate-dependent effects of pentobarbital and d-amphetamine.** *Journal of the*

*Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 561-573.—Keypecking of 4 adult male White Carneaux pigeons was maintained under conjunctive schedules of food presentation in which both a fixed-interval (FI) and a fixed-ratio (FR) schedule had to be completed before a peck produced food. For 2 Ss, pecks on a single key completed both schedule requirements. For 2 other Ss, each requirement was scheduled on a separate key. On the 2-key schedule, a peck after 5 min on the key scheduling the FI requirement produced food if at least 10 pecks had occurred on the ratio key. When each requirement was scheduled on a separate key, response rates on the FR key were generally higher in the early portion of the interval and declined as the interval progressed; responding on the FI key, once initiated, typically remained at a constant rate throughout the interval. Responding under the single-key schedule was characterized by a high rate early in the interval; this then changed to a lower rate that continued until a peck produced food. For all Ss, increases in response rates with pentobarbital and dextroamphetamine were inversely related to the control rate of responding. When equivalent rates on each key of the 2-key schedule were compared, both drugs increased rates on the FR key less. Although the effects of both drugs were rate dependent, each drug differentially modified the pattern of responding under the single-key schedule. (15 ref)—*Journal abstract*.

6804. Beahrs, John O.; Carlin, Albert S. & Shehorn, Janice. **Impact of psychoactive drugs on hypnotizability.** *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 267-269.—Pretested 11 adult male marijuana smokers for hypnotic susceptibility, and then tested them for hypnotic susceptibility under 4 experimental conditions: (a) after smoking a cannabis cigarette containing 7.5 mg tetrahydrocannabinol and receiving a placebo intramuscular injection; (b) after smoking a placebo cannabis cigarette and receiving 2 mg haloperidol intramuscularly; (c) after receiving a combination of both drugs; and (d) after placebo smoking and placebo injection. The drugs had no systematic effect on hypnotizability as measured by a modified version of the Harvard Group Scale of Hypnotizability.—*M. V. Kline*.

6805. Bond, Alyson & Lader, Malcolm. **The use of analogue scales in rating subjective feelings.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 211-218.—Administered 16 visual analog scales to 8 normal Ss to test the validity of the scales in measuring drug effects; Ss received 150 mg of butobarbital sodium, 15 and 30 mg of flurazepam, and a placebo. Results indicate that (a) there were no significant effects on Factor 1 (Alertness), but there was a tendency for Ss to rate themselves as more alert after placebo; (b) there was a significant Drug  $\times$  Times interaction effect on Factor 2 (Contentedness); and (c) Factor 3 (Calmness) also showed a significant Drug  $\times$  Times interaction effect which was caused by the anti-anxiety effect of flurazepam. (15 ref)—*M. E. Pounsel*.

6806. Booth, D. A. & Nicholls, Joy. (U Birmingham, England) **Behavioral specificity of chloralose-induced feeding in the rat.** *Psychopharmacologia*, 1974, Vol 39(2), 145-150.—Latency of feeding in the satiated crossbred male albino rat was markedly shortened after intraperi-



toneal injection of chloralose. Feeding generally began before the onset of drinking or sedation. The optimum dose to facilitate food intake appeared to be lower at night than by day. It is concluded that chloralose has a primary appetite-inducing effect which is much more powerful than that of 2-deoxyglucose.—*Journal abstract.*

6807. **Borison, Richard L.; Mosnaim, Aron D. & Sabelli, Hector C.** (U Health Sciences/The Chicago Medical School, IL) **Biosynthesis of brain 2-phenylethylamine: Influence of decarboxylase inhibitors and d-amphetamine.** *Life Sciences*, 1974(Nov), Vol 15(10), 1837-1848.—2-Phenylethylamine (PEA) is an endogenous brain amine which probably modulates affective behavior. Using a gas-liquid chromatographic method for the quantification of PEA (as its dinitrophenylsulfonic acid derivative), 340.9  $\pm$  45.8 ng of PEA/g of wet brain was found in white male New Zealand rabbits. Brain PEA levels were markedly decreased by the intraperitoneal administration of 200 mg/kg, 4 hrs before sacrifice, of the levoaromatic amino acid decarboxylase inhibitors  $\alpha$ -methyldopa, levo- $\alpha$ -methyldopa hydrazine (MK-486), or a combination of both. Since MK-486 inhibits only peripheral decarboxylase, brain PEA must be in part of peripheral origin. Another decarboxylase inhibitor, RO-4-4602, failed to affect brain PEA content. Dextroamphetamine (10 mg/kg) induced a small depletion of PEA after 30 min in untreated Ss; when given in combination with RO-4-4602, brain PEA content was markedly decreased. 4 hrs after dextroamphetamine injection, brain PEA levels were markedly increased. This supports the view that amphetamine releases PEA and stimulates its synthesis. (35 ref)—*Journal abstract.*

6808. **Braithwaite, R. A.; Nakra, B. R. & Gaiind, R.** (Guy's Hosp, Poisons Unit, London, England) **Steady-state plasma concentrations during single and multiple dosage schedules of amitriptyline.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 338-341.—Measured plasma amitriptyline and nortriptyline concentrations in 5 healthy adult males who each received 2 different dosage regimes of amitriptyline (Tryptizol) for 14-day periods (25 mg 3 times daily and 75 mg once nightly). Mean steady-state plasma concentrations during the 2 dosage regimes were in close accord. The daily variations in drug-plasma concentrations were only minimal during the 3 times/day dosage regime but during the once nightly dosage regime there was an average decline in total drug plasma concentrations (amitriptyline plus nortriptyline) of about 30%. It is concluded that antidepressant medication with amitriptyline using a single nightly dose schedule might be more reliably taken by patients without there being any significant reduction in therapeutic efficacy. (17 ref)—*Journal abstract.*

6809. **Browne, R. G.; Harris, R. T. & Ho, B. T.** (Texas Research Inst of Mental Sciences, Houston) **Stimulus properties of mescaline and N-methylated derivatives: Difference in peripheral and direct central administration.** *Psychopharmacologia*, 1974, Vol 39(1), 43-56.—Trained 35 male Sprague-Dawley rats in a 2-lever operant chamber to discriminate the drugged (intraperitoneal—ip—mescaline) state from the nondrugged state (saline, ip). On session days following mescaline administration, only responses on the right lever of the operant chamber were reinforced, and on days following saline

only responses on the left lever were rewarded. The degree of discrimination between mescaline and saline was determined by the percentage of responding on the state appropriate lever during extinction. Ss were then tested for stimulus generalization after ip or intraventricular (iv) injections of various doses of mescaline, N-methylmescaline (NMM), N,N-dimethylmescaline (DMM), or saline. Mescaline iv exhibited a dose-dependent generalization to the cue produced by systemically injected mescaline, indicating a central nervous system locus of action. NMM demonstrated only saline responses regardless of the dose or route of administration. DMM at a dose of 50 mg/kg, ip, generated responses characteristic of mescaline, suggesting a similarity in behavioral effects between DMM and mescaline. It is concluded that NMM and DMM, 2 possible metabolites of mescaline, apparently do not play a significant role in the mescaline-induced internal stimuli. (23 ref)—*Journal abstract.*

6810. **Charpy, Jean-Pierre & Guey, Nicole.** (UER de Marseille-Luminy, Marseille, France) **[Experimental and clinical study of the effects of marihuana.]** (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 31-55.—Divided 24 21-30 yr old teachers who had never smoked marihuana into 2 groups of 6 men and 6 women each. One group smoked a placebo, the other smoked 3 g marihuana. Ss were tested before smoking, again the same afternoon after smoking, and 1 wk later. Instruments were 1 projective test, 3 intellectual tests (figure arrangement, immediate recall, and reproduction of the duration of sounds), and 3 sensorimotor tests, one requiring the use of judgment. After smoking marihuana, an increase in productivity on the projective test was noted, correlated with loss of learning effectiveness. Despite increased productivity, vocabulary did not become richer or more precise. Relaxation of expression and control was noted, and in some Ss pathological and morbid responses. These results indicate a global effect of marihuana on the cognitive and affective functioning of the total personality. The nonsignificance of other results may have been a matter of timing. (English summary) (15 ref)—*E. E. Brown.*

6811. **Chesher, G. B.** (U Sidney, NSW, Australia) **Facilitation of avoidance acquisition in the rat by ethanol and its abolition by  $\alpha$ -methyl p-tyrosine.** *Psychopharmacologia*, 1974, Vol 39(1), 87-95.—In 4 experiments with a total of 60 Sprague-Dawley, 30 DA, and 20 Wistar male rats, intraperitoneal ethanol (1.5 or 2.0 g/kg) significantly facilitated the acquisition of a 2-way shuttle box avoidance task. This effect was abolished by the prior administration of the catecholamine synthesis inhibitor,  $\alpha$ -methyl p-tyrosine methyl ester hydrochloride (80 mg/kg). This dose of the inhibitor itself had no effect upon acquisition. Results are consistent with the hypothesis that facilitation of avoidance acquisition by ethanol may be related to this drug's effect on newly synthesized catecholamine. (15 ref)—*Journal abstract.*

6812. **Cox, Verne C. & King, James M.** (U Texas, Arlington) **The effects of estradiol on food intake and weight in ovariectomized rats with amygdaloid lesions.** *Physiological Psychology*, 1974(Sep), Vol 2(3-A), 371-373.—The effects of estradiol on increased food intake and

body weight gain induced by ovariectomy were examined in 8 female Holtzman albino rats with lesions of the cortical and medial amygdaloid nuclei. 16 additional Ss served as controls. Lesioned Ss displayed typical ovariectomy-induced hyperphagia and weight gain. Estradiol injections were effective in maintaining normal food intake and weight gain in ovariectomized lesioned Ss. (29 ref)—*Journal abstract*.

6813. Cushman, Paul & Kreek, Mary J. (St Luke's Hosp Ctr, New York, NY) **Methadone-maintained patients: Effect of methadone on plasma testosterone, FSH, LH, and prolactin.** *New York State Journal of Medicine*, 1974(Oct), Vol 74(11), 1970-1973.—Studied the effects of a single dose of methadone on levels of plasma testosterone, follicle stimulating hormone (FSH), prolactin, and luteinizing hormone (LH). Hormone levels in 8 male methadone patients ranging in age from 25 to 42 yrs were determined immediately before and 2, 4, 24, 26, and 28 hrs following a standard daily dose of methadone. Although some correlation between high plasma methadone levels and low testosterone levels was found, there were no significant changes in levels of plasma testosterone, prolactin, FSH, or LH following ingestion of methadone. It is concluded that daily methadone doses taken by stable tolerant individuals do not adversely effect plasma testosterone or plasma pituitary hormone levels. (20 ref)—*J. Kelly*.

6814. Dandiya, P. C. & Kulkarni, S. K. (SMS Medical Coll, Jaipur, India) **A comparative study of d- and l-amphetamine on the open field performance of rats.** *Psychopharmacologia*, 1974, Vol 39(1), 67-70.—Open-field behavior following the administration of dextro- or levoamphetamine was compared in male Haffkine albino rats ( $n = 25$  in each drug group). A significant difference was found between the effects of the 2 isomers on horizontal activity, dextroamphetamine alone causing horizontal stereotypy. In both cases dose-response relations were curvilinear. Although both isomers produced vertical stereotypy, the dose-response relations were generally monotonic, increasing with no significant differences between isomers. These differential effects on behavior have been explained on the basis of stereospecificity of adrenergic neurons for amphetamine. Results are consistent with earlier hypotheses that the horizontal and vertical stereotyped behaviors of rats in the open field situation are functions of brain noradrenergic and dopaminergic systems, respectively.—*Journal abstract*.

6815. Davis, Michael & Sheard, Michael H. (Yale U, Medical School) **Effects of lysergic acid diethylamide (LSD) on habituation and sensitization of the startle response in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 675-683.—Measured the effect of LSD on the acoustic startle response in a total of 180 male Sprague-Dawley albino rats in 4 experiments. A low dose (20  $\mu\text{g/kg}$ ) facilitated startle but a high dose (160  $\mu\text{g/kg}$ ) at first facilitated but then depressed startle somewhat, relative to an intermediate dose (40  $\mu\text{g/kg}$ ). 2-brom-LSD (160  $\mu\text{g/kg}$ ) had no detectable effect, and 40  $\mu\text{g/kg}$  LSD did not change startle in raphe-lesioned Ss. LSD appeared to augment sensitization rather than act on the startle circuit directly, since it did not increase startle unless given in conjunction with either background noise or repetitive tones.

LSD did not prevent between-session habituation. Relationships between habituation, sensitization, and the midbrain raphe nuclei are discussed. (18 ref)—*Journal abstract*.

6816. de Souza, Maria R.; Karniol, Isaac G. & Ventura, Dora F. (U São Paulo, Brazil) **Human tonal preferences as a function of frequency under  $\Delta^1$ -tetrahydrocannabinol.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 607-611.—Measured tonal preference distributions in 25 normal-hearing, male graduate and undergraduate student volunteers, before and after the ingestion in double-blind conditions of 5, 10, 20, and 40 mg of  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC), an active constituent of marihuana, and placebo. Placebo and 5 mg of  $\Delta^1$ -THC did not change the typical inverted U-shaped distribution of preferences as function of sound frequency. At higher dosages there was a reliable tendency towards preference for the highest pitched tones, and in a few cases, a disruption of the responses. Increase in pulse rate, alterations in time production tasks, and subjective effects were other actions of the higher dosages of the drug. (17 ref)—*Journal abstract*.

6817. Dittich, A. & Woggon, B. (Universitätsklinik Zürich, Switzerland) **[Subjective changes in volunteers without prior experience of cannabis induced by ( $-\Delta^9$ -trans-tetrahydrocannabinol.)** (Germ) *International Pharmacopsychiatry*, 1974, Vol 9(3), 138-151.—27 male and 9 female students (mean age = 25 yrs) received either 350  $\mu\text{g/kg}$   $\Delta^9$ -tetrahydrocannabinol (THC) or placebo orally, in a double-blind study, to assess high-dosage effects of THC. THC caused profound depersonalization and derealization syndromes. Anxious-depressive and euphoric-stimulated states occasionally appeared during 1 intoxication, at approximately the same time, and/or at different times. Some Ss, with their eyes closed, had optical hallucinations which could be influenced by suggestion. The tests used, as well as behavior observation of the Ss, showed a great inter- and intraindividual variability of the intensity of THC effects. 2 hrs after application of the drug, the following subjective side effects were observed: weariness and feebleness, heaviness of the legs, dizziness, and hypersensitivity against cold. While no difference between THC and placebo was found in self-assessed changes in the ability to concentrate, results of the test show a significant decrease of performance under THC. (23 ref)—*English summary*.

6818. Dykstar, Linda A.; McMillan, D. E. & Harris, L. S. (U North Carolina, Chapel Hill) **Antagonism of morphine by long acting narcotic antagonists.** *Psychopharmacologia*, 1974, Vol 39(2), 151-162.—Studied the effects of intramuscular diprenorphine, naltrexone, and naloxone on the schedule-controlled behavior of 8 male White Carneaux pigeons. Naltrexone decreased the rate of responding under the fixed-ratio (FR) and fixed-interval (FI) components of a multiple FI, FR schedule. Naltrexone and diprenorphine were equipotent in blocking the rate-decreasing effects of morphine on schedule-controlled behavior when the antagonists were given immediately before morphine, and both were more potent morphine antagonists than naloxone. Higher doses of all 3 antagonists were required to block the effects of morphine as the time between the administra-



tion of the antagonist and morphine increased. Naltrexone provided a slightly better antagonism of morphine than diprenorphine when morphine was given 2 or 6 hrs after the antagonist, and both antagonists had a longer duration of antagonist action than naloxone. (25 ref) —*Journal abstract.*

6819. Entingh, Dan & Damstra-Entingh, Terri. (U North Carolina, Medical School, Div of Chemical Neurobiology, Chapel Hill) **Avoidance training and incorporation of <sup>3</sup>H-uridine into RNA, UMP and UDP-sugars in mouse brain.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 579-584.—The incorporation of <sup>3</sup>H-uridine into RNA and selected nucleotides of the brains of 14 experimental and 14 control male C57BL/6J mice during avoidance training was assayed using intracranial injections of precursor. The net incorporation of uridine into total brain RNA, as assayed by 3 methods in 2 experiments, was not detectably affected by training. Training induced a decrease in the amount of radioactivity recovered from the brain as uridine monophosphate, while concomitantly increasing the amount of radioactivity in substances that chromatographed as uridine diphosphate sugars. Results suggest that changes in the cerebral metabolism of uridine observed during this form of avoidance training may reflect changes in the cellular uptake of uridine, or the metabolism of carbohydrate compounds, rather than increases in the rate of cerebral RNA synthesis. (23 ref)—*Journal abstract.*

6820. Everitt, Barry J.; Fuxe, Kjell & Hökfelt, Tomas. (U Cambridge, England) **Inhibitory role of dopamine and 5-hydroxytryptamine in the sexual behaviour of female rats.** *European Journal of Pharmacology*, 1974(Nov), Vol 29(1), 187-191.—Administered drugs which interfere with either dopamine (DA), serotonin (5-HT), or noradrenaline (NA) transmission in the central nervous system to 70 estrogen- and 50 estrogen + progesterone-treated female Sprague-Dawley rats and made observations on their sexual behavior. Decreasing either DA or 5-HT transmission enhanced the sexual receptivity of estrogen-treated females, while increasing DA and/or 5-HT-decreasing NA inhibited this behavior to varying degrees in estrogen + progesterone-treated females. Results suggest specific roles for these amines in controlling sexual receptivity. (19 ref)—*Journal abstract.*

6821. Farnsworth, Norman R. (U Illinois, Medical Ctr, Coll of Pharmacy) **Psychotomimetic plants: II.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 83-84.—Presents a list of 43 new species of psychotomimetic plants. Family, genus, species and literature references are indicated. This updates the author's initial listing of 174 such plants (see PA, Vol 51:8695).

6822. Fishkin, Steven M. (VA Hosp, Oklahoma City, OK) **Alcohol and alterations in consciousness.** *Biological Psychology Bulletin*, 1974(Mar), Vol 3(3), 110-112.—Argues for the use of subjective data in the study of altered states of consciousness. Subjective data provide "knowledge of" altered states, whereas behavioral data provide "knowledge about" the phenomena. The 2 approaches complement one another in the study of altered states.

6823. Glick, Stanley D.; Jerussi, Thomas P.; Waters, Donald H. & Green, Jack P. (Mt Sinai School of

Medicine, City U New York) **Amphetamine-induced changes in striatal dopamine and acetylcholine levels and relationship to rotation (circling behavior) in rats.** *Biochemical Pharmacology*, 1974(Nov), Vol 23(22), 3223-3225.—High doses of dextroamphetamine induce rats to rotate to the right or left in a manner similar to the rotation toward the side of the lesion of rats unilaterally lesioned in the nigro-striatal systems. The present experiment tested the hypothesis that there is an intrinsic bilateral imbalance in the dopamine (DA) content of left and right nigro-striatal systems which is accentuated by amphetamine. 12 female Sprague-Dawley rats were injected intraperitoneally with 20 mg/kg dextroamphetamine sulfate; 12 controls were injected with saline. An index of rotation, comparing pre- and postinjection turning to the right or left, was obtained for each S. Amphetamine caused significant rotation (5 Ss to the left and 7 to the right) compared to saline. In vitro determinations showed that amphetamine increased striatal acetylcholine levels and decreased DA and norepinephrine levels. In the amphetamine group only, contralateral to ipsilateral striatal DA levels were directly correlated ( $p < .05$ ) with the magnitude of the rotational difference. There were no significant correlations between any of the other chemical ratios and rotation. Results indicate that there is a normal DA imbalance in the left and right striata and that the potentiation of this imbalance by amphetamine is associated with rotation. —B. McLean.

6824. Greaves, George. (Gallia-Jackson-Meigs Community Mental Health Ctr, Gallipolis, OH) **Toward an existential theory of drug dependence.** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 263-274.—A review of 5 leading theories of drug dependence—acquired drive, avoidance paradigm, metabolic disease, conditioning, and automedication—finds them all lacking. Drug dependence is discussed within the context of "passive euphoria," and it is suggested that persons who become drug dependent are those who are not able, for reasons of attitudes or other factors, to create euphoria in usual ways. It is argued that most drug programs err seriously by failing to help the drug-dependent person to find euphoric alternatives to drugs. Because of the ascetic orientation of most drug programs, they thus tend to undermine the very goal for which they strive. (87 ref)—*Journal abstract.*

6825. Grenngress, Pamela M. & Tonge, Sally R. (Ciba-Geigy Ltd, Basel, Switzerland) **The accumulation of noradrenaline and 5-hydroxytryptamine in three regions of mouse brain after tetrabenazine and iproniazid: Effects of ethinyloestradiol and progesterone.** *Psychopharmacologia*, 1974, Vol 39(2), 187-191.—Conducted an experiment to determine preliminary information on the effects of ethinyloestradiol and progesterone on monoamine synthesis. 4 groups of 5 ovariectomized albino mice were injected with tetrabenazine. 12 hrs later, 1 group was injected with iproniazid, 1 with iproniazid and ethinyloestradiol, and 1 with iproniazid and progesterone. All Ss were killed 4 hrs after the iproniazid injection (16 hrs after tetrabenazine), and noradrenaline (NA) and 5-hydroxytryptamine concentrations were determined in 3 regions: the forebrain (cortex, hippocampus), the middle-brain (hypothalamus,

thalamus, striatum), and the hindbrain (midbrain, pons, medulla, cerebellum). Ethinylestradiol increased the accumulation of NA in the fore- and middle-brain regions; progesterone decreased the accumulation of NA in the fore- and middle-brain regions and of 5-hydroxytryptamine in the middle- and hind-brain regions. It is suggested that the results could help to explain the increased incidence of depressive disorders at times when estrogen levels are suddenly reduced (e.g., postpartum and menopausal depressions), because low NA concentrations seem to be related to depression. —*Journal abstract.*

6826. Harris, Lance; Zucker, Robert A. & Lynn, Edward J. (American Lake VA, Psychology Services, Tacoma, WA) **Some effects of nitrous oxide on fear.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 29-41. —Investigated the fear-reducing potential of nitrous oxide inhalation in 40 female Ss with strong responses to the snake item of the Fear Survey Schedule. 4 groups of 10 Ss were each given varying nitrous oxide doses and individually asked to approach a tame snake. Instruments used included an approach distance measure; the Fear Thermometer; questionnaires recording attitude and expectations, drug use history, and perceptions of the experiment; the Adjective Checklist; and a semantic differential. Results indicate significant fear reduction as a result of initial inhalation, and lack of effect corresponding to dosage level. The greatest fear reduction is reflected in the verbal-cognitive data, the second greatest in the overt-motor response category. (33 ref)—R. Tomasko.

6827. Heacock, Del & Wickle, Robert. (Boise State Coll) **The effect of alcohol and placebo on reaction time and distance judgment.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 265-268. —Observed 20 19-24 yr old Ss' performance on reaction time (RT) and distance judgment (DJ) tasks following 5 doses of alcohol or placebo. The alcohol and placebo groups both showed impairment of RT by trials; DJ was only affected in the alcohol group. It is suggested that alcohol may lead to a misperception of when to react rather than an actual physical impairment of reaction time. —*Journal abstract.*

6828. Herrenkohl, Lorraine R. (Temple U) **Differential effects of progesterone on lactation and nursing behavior in late pregnant and postparturient rats.** *Physiology & Behavior*, 1974(Oct), Vol 13(4), 495-499. —Injected 2-mg doses of progesterone subcutaneously into nulliparous Sprague-Dawley rats from Days 18-23 of gestation. The injections delayed the onset of birth, caused a high mortality among young, and produced young that failed to thrive. Since nursing behavior appeared normal, the difficulties appeared to be with lactation. Because mammary glands contained milk, problems with secretory activation in the glands were ruled out. Even though the pups suckled teats, they got no milk, suggesting dysfunctions in milk release. To determine whether progesterone might alter maternal behavior once it was established after birth, progesterone was injected during the 1st postpartal week. The injections depressed litter weights and increased the latency to crouch over pups. During the 2nd postpartal week, the injections reduced the latency to crouch, causing females to act vigorously toward pups at a time

when maternal behavior typically starts to decline. Thus, depending upon the stage of the reproductive cycle in which progesterone is introduced, it can either inhibit or enhance nursing behavior. The action of progesterone during late gestation appears to be only on milk release. (30 ref)—*Journal abstract.*

6829. Herz, A.; Bläsig, J. & Papeschi, R. (Max-Planck-Inst für Psychiatrie, München, W Germany) **Role of catecholaminergic mechanisms in the expression of the morphine abstinence syndrome in rats.** *Psychopharmacologia*, 1974, Vol 39(2), 121-143. —Studied the effects of dextroamphetamine, cocaine, and levodopa on the precipitated morphine withdrawal syndrome in medium- and highly dependent male Sprague-Dawley rats. Intraperitoneal administration of the drugs shortly before precipitating withdrawal by levallorphan induced a dose-dependent increase of dominant withdrawal signs such as jumping and a decrease of recessive signs such as wet dog shaking; signs such as diarrhea and ptosis decreased, whereas rhinorrhea, salivation, and lacrimation increased. Therefore, the effects of these drugs are interpreted as potentiation of withdrawal. Activation of noradrenergic or dopaminergic mechanisms with desipramine or apomorphine induced an increase in the intensity of withdrawal. When catecholamines (CA) were previously depleted by alpha-methyl-para-tyrosine (AMT), apomorphine lost a great part of its effectiveness. Blockade of CA synthesis by AMT alone resulted in decreased jumping while at the same time writhing largely increased, inducing a profile of signs characteristic for a weak withdrawal. Selective inhibition of noradrenaline synthesis by FLA-63 resulted in a reduction in withdrawal intensity. Ro 4-4602 + levodopa, given after AMT, antagonized and reversed the reduction of withdrawal. It is concluded that brain CA, especially noradrenaline, are involved in the manifestation of the morphine withdrawal syndrome. (45 ref) —*Journal abstract.*

6830. Holtzmann, Stephen G. (Emory U) **Tolerance to the stimulant effects of morphine and pentazocine on avoidance responding in the rat.** *Psychopharmacologia*, 1974, Vol 39(1), 23-37. —Determined dose-response curves for the effects of morphine (3-10 mg/kg) and pentazocine (1.0-30 mg/kg) on continuous avoidance responding in 5 experiments with 10 male CFE rats. Each dose of morphine was retested following 3 days of morphine administration. The pentazocine curve was redetermined after 3 days of treatment with either pentazocine or morphine. Upon initial testing, morphine and pentazocine both generated biphasic dose-response curves. Graded increases in response rates were produced by 3-3.0 mg/kg of morphine and by 1.0-10 mg/kg of pentazocine; behavior was disrupted by 10 mg/kg of morphine and by 30 mg/kg of pentazocine. The stimulant effects of the lower doses of morphine and pentazocine were markedly reduced by 3 days of drug treatment; the disruptive effect of the highest dose of each drug was similarly attenuated. Findings show that each drug can develop to a stimulant component of tolerance can develop to a stimulant component of tolerance in the rat. The development of pentazocine cross-tolerance to morphine provides additional support for the view that a common mechanism mediates the effects of morphine and



pentazocine on avoidance behavior. (29 ref)—*Journal abstract*.

6831. Houser, Vincent P. & Van Hart, Dale A. (VA Hosp, Psychotropic Drug Lab, Perry Point, MD) **Modulation of cholinergic activity and the aversive threshold in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 631-637.—Used the spatial preference technique to measure the analgesic potency of atropine sulfate, eserine sulfate, pilocarpine nitrate, scopolamine methylbromide, and scopolamine hydrobromide in 18 male Sprague-Dawley rats. Enhanced cholinergic tone via the intraperitoneal administration of eserine or pilocarpine in conjunction with scopolamine methylbromide produced significant increments in the aversive threshold. These increments could not be accounted for solely by changes in motor activity or the debilitating effects of enhanced peripheral cholinergic stimulation. Scopolamine hydrobromide (1.0 mg/kg) fully blocked the increments in the aversive threshold noted after the administration of pilocarpine (10.0 mg/kg). Results suggest that agents which enhance cholinergic tone can produce significant analgesia in the rat. While no firm conclusions can be made without further evidence, especially with regard to the antianalgesic effects of the anticholinergics, it is possible that central cholinergic mechanisms may mediate the aversive qualities of electric shock in the rat. (22 ref)—*Journal abstract*.

6832. Houser, Vincent P. (VA Hosp, Psychotropic Drug Lab, Perry Point, MD) **The alternation of aversive thresholds after chronic administration of two tranquilizing agents.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 383-392.—Administered chlorpromazine (.06, .125, and .25 mg/kg), and chlordiazepoxide (2.0, 4.0, 8.0, 16.0, and 32.0 mg/kg), to 3 male squirrel monkeys performing under a titration schedule to ascertain their effects upon aversive thresholds. Both agents reliably raised the aversive threshold to electric shock, but chlorpromazine was more potent in this regard. Chlordiazepoxide was able to augment the aversive threshold to moderate levels only under the middle range (i.e., 8 and 16 mg/kg) of doses tested, while chlorpromazine was able to raise the threshold to maximum levels under the 0.25 mg/kg dosage. Results suggest that chlordiazepoxide may have analgesic properties at moderate doses, while chlorpromazine may raise the aversive threshold by interfering with the execution of the operant response.—*Journal abstract*.

6833. Huang, Jen-Tzaw & Ho, Beng T. (U Minnesota) **Discriminative stimulus properties of d-amphetamine and related compounds in rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 669-673.—Trained 20 male Sprague-Dawley rats to discriminate between 0.8 mg/kg of dextroamphetamine sulfate and saline. During the discriminative training, Ss were shaped to respond to 1 of 2 levers for a food reward when they were given amphetamine and to respond to the other lever when they were treated with saline. Ss receiving low doses (.2-.4 mg/kg) of amphetamine exhibited mostly saline-like responses, but at a dose of .8 mg/kg they produced more than 80% responses on the amphetamine lever. Doses higher than 2.4 mg/kg caused an initial stereotyped behavior, and the Ss showed a

period of latency before responding on the amphetamine lever. In order to elucidate the structural characteristics of amphetamine involved in the production of the discriminative stimulus properties, a number of amphetamine derivatives and related compounds were administered. Levoamphetamine, ephedrine, norephedrine, 4-methoxyamphetamine, and methylphenidate all produced discriminative stimulus properties similar to dextroamphetamine, but doses 2-10 times greater than dextroamphetamine were necessary. Results suggest that most psychomotor stimulants, although having different structures, are likely to produce discriminative stimulus properties similar to dextroamphetamine. (15 ref)—*Journal abstract*.

6834. Huang, Jen-Tzaw & Ho, Beng T. (U Minnesota) **Effects of nikethamide, picrotoxin and strychnine on "amphetamine-state."** *European Journal of Pharmacology*, 1974(Nov), Vol 29(1), 175-178.—Trained 5 male Sprague-Dawley rats to discriminate between dextroamphetamine sulfate (.8 mg/kg) or saline by selectively pressing 2 levers programed on differential response at low-rate 15-sec schedule for food reinforcement. Intraperitoneal nikethamide (25-75 mg/kg), strychnine (.5 and 10 mg/kg), and picrotoxin (1.0 and 2.0 mg/kg) did not produce dextroamphetamine-like responding in the Ss. Results indicate that in order for drugs to produce similar discriminative cues they should possess a specific pharmacological property in common.—*Journal abstract*.

6835. Itil, Turan M. et al. (New York Medical Coll, NY) **"Psychotropic" action of sex hormones: Computerized EEG in establishing the immediate CNS effects of steroid hormones.** *Current Therapeutic Research*, 1974(Nov), Vol 16(11), 1147-1170.—In a series of studies based on quantitative pharmaco-EEG with computerized cerebral biopotentials, and using a series of statistical procedures, the immediate effects of mesterolone, an androgen, and cyproterone acetate, an antiandrogen, on human brain function were demonstrated in healthy male adult volunteers. Effects were determined even in dosages without measurable hormonal effects. According to computer EEG profiles, the effects of high and extremely high dosages of mesterolone on brain function were similar to those of stimulatory tricyclic antidepressants, while in low dosages the effects resembled those of certain psychostimulant compounds such as dextroamphetamine and isocarboxacid. The computer EEG profiles of cyproterone acetate in high dosages were similar to those of anxiolytics, and in low dosages they resembled those of sedative tricyclic antidepressants. Pilot clinical trials with male and female adult patients supported the prediction of the quantitative pharmaco-EEG. Mesterolone was effective in some depressive males, while cyproterone acetate in very low dosages was effective in male anxiety and in high dosages was useful in alleviating the symptoms of the female premenstrual syndrome. (26 ref)—*Journal abstract*.

6836. Jacob, Joseph J. & Michaud, Gérard M. (Pasteur Inst, Lab of Pharmacology & Toxicology, Paris, France) **Acute physical dependence in the waking dog after a single low dose of morphine.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 270-273.—Found that in waking mongrel dogs, a small dose of morphine (0.1 mg/kg intravenously) was sufficient to (a) induce a quite

appreciable state of sedation which might be more closely related to clinical analgesia than experimental nociception; and (b) allow for precipitation of clear-cut signs of abstinence (agitation, tachycardia, tachypnoea, mydriasis, hyperthermia, tremors, salivation, and urination) when naloxone (3 mg/kg subcutaneously) was injected 1.5 hrs later.—*Journal abstract*.

6837. Jacobs, Barry L. (Princeton U) **Evidence for the functional interaction of two central neurotransmitters.** *Psychopharmacologia*, 1974, Vol 39(1), 81-86.—Conducted a series of experiments with a total of 188 male Sprague-Dawley rats in which Ss pretreated with pargyline and then given either levotryptophan or levodopa displayed strikingly similar behavioral syndromes. Especially prominent were tremor, rigidity, lateral head weaving, and reciprocal forepaw treading. Because of the overt similarity in these 2 syndromes, it was hypothesized that they might be dependent upon a common neurochemical substrate. This was tested by observing whether blocking either the biosynthesis of serotonin or dopamine or their receptors was capable of blocking the production of the syndrome produced by precursors of the other transmitter. Pretreatment with  $\alpha$ -methyl-p-tyrosine, a catecholamine synthesis inhibitor, failed to affect either syndrome, whereas *p*-chlorophenylalanine, a serotonin synthesis inhibitor, blocked both. The dopamine receptor blocker pimozide had no effect on either syndrome, while the serotonin receptor blockers cinanserin and methysergide blocked or markedly diminished both syndromes equally. It is concluded that at least a portion of the syndrome that emerges following pargyline and levodopa is mediated by serotonin rather than dopamine.—*Journal abstract*.

6838. Karkischenko, N. N. (Rostov-on-Don Medical Inst, USSR) **The participation of endogenic monoamines in the systemic action of neuroleptics and antidepressants.** (Russ) *Farmakologiya i Toksikologiya*, 1974, Vol 37(3), 271-275.—Used changes in the level of excitability of various brain structures of 54 rabbits in response to electrical stimulation as a measure of the effects of endogenic catecholamines liberated by the introduction of cocaine and amphetamine, and of endogenic serotonin. The effects of a range of doses of aminazine and amitriptyline on these changes were then studied. The depressing action of aminazine was due to adrenolytic, and in part to its antiserotonine activity in the dorsal hypothalamus, amygdala, and nuclei of the basal reticular formation, and to its cholinolytic effects in several brain structures. The stimulating action of amitriptyline was due to its adrenaline- and serotonine-positive effect in the dorso-medial nuclei of the amygdala, posterior hypothalamus, reticular formation, and somato-sensory cortex. Its depressing action was a result of its serotonine-sensitizing effect on tonsil basolateral nuclei and cholinolytic action on most of the brain structures. (English summary)—A. G. Pook.

6839. Khadzai, Ya. I. & Nikolaeva, A. V. (Kharkov Chemico-Pharmaceutical Scientific Research Inst, USSR) **Features peculiar to the development of the somniferous effect of sodium amytal with its rectal administration.** (Russ) *Farmakologiya i Toksikologiya*, 1974, Vol 37(3), 312-315.—Concludes from experiments on 20 rabbits that sodium amytal in doses of 40, 80, and

160 mg/kg, introduced into the rectum exerts a soporific action similar to that achieved by intramuscular and subcutaneous administration, and superior to that following administration through the mouth. (English summary)

6840. Komendantova, M. V. & Eltsova, Z. I. (Moscow Medical Stomatological Inst, USSR) **The action of analgesics in adrenalectomy against the background of hydrocortisone administration.** (Russ) *Farmakologiya i Toksikologiya*, 1974, Vol 37(3), 275-279.—After subtotal adrenalectomy, the analgesic effect of amidopyrine on white rats increased greatly, but the effect of morphine was weakened. The toxicity of both preparations increased. When there was a surplus of hydrocortisone, the analgesic effect of both preparations decreased and the toxicity of amidopyrine was reduced, but that of morphine was unchanged. (English summary) (27 ref)—A. G. Pook.

6841. Kuhn, D. M.; Appel, J. B. & Greenberg, I. (U South Carolina) **An analysis of some discriminative properties of  $\Delta$ -amphetamine.** *Psychopharmacologia*, 1974, Vol 39(1), 57-66.—Trained and tested 6 male Sprague-Dawley albino rats on a 2-lever discrimination task based upon the presence or absence of dextroamphetamine sulfate (1.0 mg/kg). This compound produced strong discriminative cues. A dose-effect function was then ascertained, and the discriminative effective dose was found to be .23 mg/kg amphetamine. To determine the effective duration of amphetamine action, the interval between injection and testing was varied; it was found that the discriminative effects of the drug began to dissipate between 60 and 90 mins postinjection. To compare the discriminative cues of other drugs with those of amphetamine, injections of LSD, psilocybin, tetrahydrocannabinol, mescaline, and caffeine were given during extinction. In all cases, Ss responded predominantly on the saline-related lever. Only methamphetamine produced dextroamphetamine-like responding. Alpha-methyl-para-tyrosine, a compound which depletes brain catecholamines, disrupted the amphetamine-saline discrimination. (27 ref)—*Journal abstract*.

6842. Lagergren, Krister & Levander, Sten. (Karolinska Sjukhuset, Stockholm, Sweden) **A double-blind study on the effects of piracetam upon perceptual and psychomotor performance at varied heart rates in patients treated with artificial pacemakers.** *Psychopharmacologia*, 1974, Vol 39(1), 97-104.—Pacemaker-patients have previously been found to have significantly impaired performance in tests of critical flicker fusion (CFF), 2-choice reaction time (RT), and vernier visual acuity (KVAT) when the heart rate is reduced from 70 to 45 beats/min in sitting position. 12 52-79 yr old patients treated with artificial pacemakers were given 1.6 g piracetam orally 3 times/day for 9 days and placebo for another 9 days. The effects on performance were compared in CFF, RT, and KVAT at heart rates of 70 and 45 beats/min in sitting position. With placebo, there were significant impairments in CFF and RT at 45 beats/min and a similar trend in KVAT. With piracetam, there were significantly fewer impairments in CFF at 45 beats/min and similar trends in RT and KVAT. With piracetam there were also significant increases in



KVAT, irrespective of heart rate, compared with placebo. Results indicate that piracetam had some protective effect against the influence of an assumed cerebral hypoxia at 45 beats/min or a cortical arousing effect, which counteracted the decrement in vigilance associated with the slow heart rate. (22 ref)—*Journal abstract*.

6843. Lawrence, David K.; Pertwee, Roger G.; Gill, Edward W. & Piper, Julian M. (U Oxford, England) Brain levels and relative potency of the 1,2-dimethylheptyl analogue of  $\Delta^1$ -tetrahydrocannabinol in mice. *Biochemical Pharmacology*, 1974(Nov), Vol 23(21), 3017-3027.—Unlabeled and tritium-labeled forms of the 1,2-dimethylheptyl analog of  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -DMHP) were prepared as incompletely separated mixtures of threo- and erythro-isomers. The *n*-heptyl analog (*n*-heptyl- $\Delta^1$ -THC) was also prepared, and this compound and samples of  $\Delta^1$ -DMHP containing different proportions of threo- and erythro-isomers were compared with  $\Delta^1$ -THC using the mouse ring "catalepsy" test. *n*-Heptyl- $\Delta^1$ -THC was twice as active as  $\Delta^1$ -THC. The duration of action of both drugs did not differ from that of  $\Delta^1$ -THC. Brain and blood levels of  $\Delta^1$ -DMHP and its metabolites were measured at various times after injections with  $^3$ H- $\Delta^1$ -DMHP and were compared with the corresponding levels of  $\Delta^1$ -THC and its metabolites. The major metabolite in the mouse of  $\Delta^1$ -DMHP was identified as 7-hydroxy- $\Delta^1$ -DMHP. The brain levels of this metabolite and  $\Delta^1$ -DMHP itself correlated equally well with the behavioral effect and showed that the higher activity of  $\Delta^1$ -DMHP is not due to metabolic or distribution effects, and that the fraction of the injected dose which reached the brain was lower than for  $\Delta^1$ -THC. It is concluded that the differences in the potencies of  $\Delta^1$ -THC and  $\Delta^1$ -DMHP in producing behavioral changes in the mouse are due to differences in activity at the site of action. (19 ref)—*Journal abstract*.

6844. Lecanuet, Jean-Pierre; Deweer, Bernard & Bloch, Vincent. (LPN-CNRS, Gif-sur-Yvette, France) Effects of post-exposure anaesthesia on the retention of imprinting. *Behavioral Biology*, 1974(Nov), Vol 12(3), 365-372.—Data from 2 experiments with a total of 95 hybrid (Harco) chicks show that Ss anesthetized immediately, 6 min, or 15 min after the end of a 20-min imprinting session, exhibited significantly less following behavior than untreated controls, when tested 3 days later. Results are interpreted in terms of consolidation disruption, implying a consolidation period of at least a 15-min duration for this type of perceptual learning. (18 ref)—*Journal abstract*.

6845. Liljequist, R.; Linnoila, M. & Mattila, M. J. (U Helsinki, Finland) Effect of two weeks' treatment with chlorimipramine and nortriptyline, alone or in combination with alcohol, on learning and memory. *Psychopharmacologia*, 1974, Vol 39(2), 181-186.—Used a double-blind crossover design to treat 20 healthy male student volunteers with nortriptyline, chlorimipramine, or placebo for 2 wks. On the 14th day of treatment the effect of drugs and their interaction with alcohol was tested in 2 kinds of learning situations. The presence of the antidepressants in plasma was checked by means of the tyramine pressor test. Alcohol alone significantly increased the numbers of mistakes in the paired-associated

learning test. Nortriptyline alone slightly increased the numbers of mistakes in paired-associated learning and impaired backward recall of digits. Chlorimipramine alone had no measurable effect on learning or memory. Nortriptyline enhanced the deleterious effect of alcohol on the ability to learn new material, whereas chlorimipramine antagonized alcohol in this respect. Both antidepressants significantly shifted to the right the dose-response graph for the tyramine effect on systolic blood pressure. (20 ref)—*Journal abstract*.

6846. Little, Betsy C.; Matta, Raymond J. & Zahn, Theodore P. (U Keele, England) Physiological and psychological effects of progesterone in man. *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 256-262.—Hypothesized that fluctuations in progesterone levels can account for the psychophysiological changes occurring during the luteal phase of the menstrual cycle. Progesterone (10 mg/day) was administered daily to 6 men during either the 2nd or 3rd wk (double blind) of a 4-4½ wk period. Skin conductance (SC), heart rate (HR), and respiration were recorded continuously during rest, presentation of mild tones, and performance of time estimation and reaction time tasks. Body temperature was taken in the morning and the Nowlis Adjective Check List of Mood was given daily. Results show a significant rise in temperature and reaction time and decrease in HR variability during progesterone administration which returned to baseline soon after stopping drug intake. Significant decreases in SC level and increases in the "sluggishness" of spontaneous and elicited SC responses persisted for a week postdrug. Expected increases in base HR and respiration rate and changes in mood were not significant. Data only partially support the progesterone hypothesis of premenstrual tension and suggest that the role of estrogen or some other hormone may be important. (18 ref)—*Journal abstract*.

6847. Livrea, P.; di Reda, L. & Bertolino, A. [Modification of HVA and 5-HIAA levels in the rat brain after acute and chronic treatment with ethanol.] (Ital) *Acta Neurologica*, 1974(Mar-Apr), Vol 29(2), 220-226.—Employed as Ss 3 groups of 10 male rats each. Group 1 were controls, Group 2 was fed ethanol acutely, and Group 3 received ethanol continuously. In the acute group 5-hydroxyindoleacetic acid (5-HIAA) level of the brain increased and the homovanillic acid (HVA) level fell more than in the controls, while in the continuously fed group 5-HIAA level fell and HVA increased more than in the controls. (49 ref)

6848. Luttge, William G.; Hall, Nicholas R. & Wallis, Cleatus J. (U Florida, Medical School, Ctr for Neurobiological Sciences) Studies on the neuroendocrine, somatic and behavioral effectiveness of testosterone and its 5 $\alpha$  reduced metabolites in Swiss-Webster mice. *Physiology & Behavior*, 1974(Oct), Vol 13(4), 553-561.—Conducted 4 experiments with a total of 81 female and 158 male mice in which dihydrotestosterone and 3 $\alpha$ -androstenediol were more potent in feedback suppression of gonadotropin secretion than testosterone and 3 $\beta$ -androstenediol, as assessed by inhibition of ovarian compensatory hypertrophy and by production of testicular atrophy. All 4 of these androgens were potent stimulators of seminal vesicle growth. When dissolved in propylene glycol

vehicle, testosterone was by far the most effective stimulator of male sexual behavior, followed by  $3\beta$ -androstenediol and finally  $3\alpha$ -androstenediol. Dihydrotestosterone failed to stimulate sexual behavior when dissolved in this vehicle; however, when dissolved in an oily vehicle dihydrotestosterone was nearly as potent as testosterone. (62 ref)—*Journal abstract*.

6849. Maitre, Michel et al. (U Louis Pasteur, Strasbourg Cedex, France) **Protective effect of adenosine and nicotinamide against audiogenic seizure.** *Biochemical Pharmacology*, 1974(Oct), Vol 23(20), 2807-2816.—Intraperitoneal injection of adenosine into male RB strain Swiss albino mice sensitive to audiogenic convulsions rapidly produced in proportion to the dose administered: sedation, modification of the EEG, lowering of arterial pressure, and protection against audiogenic seizures. Simultaneous injection of adenosine and nicotinamide produced the most striking protection, the effect being independent of all the others. During the protective period to convulsions, there was an elevation in the energy rich compounds, adenosine triphosphate and phosphocreatine, which was attributable to a reduction in their rate of degradation. During the same period, a diminution in the cerebral level of noradrenaline took place. The pharmacological effects of adenosine appear to oppose those of its structural analog, caffeine with regard to mobility, arterial pressure, basal metabolic rate, and body temperature. (28 ref)—*Journal abstract*.

6850. Mashkovsky, M. D. et al. (Ordzhonikidze All-Union Scientific Chemico-Pharmaceutical Inst, Moscow, USSR) **[A comparative study of the pharmacological activity of some derivatives of the pyrazinoindol group.]** (Russ) *Farmakologiya i Toksikologiya*, 1974, Vol 37(3), 267-271.—In vitro experiments indicate that some pyrazinoindol derivatives, even at very low concentrations, inhibit the activity of liver mitochondria in rats, and selectively block the deamination of serotonin. In vivo experiments show that some of the compounds increased the convulsive effect of tryptamine in intact rats, the head-twitch response to 5-oxytryptophane in mice, and the pressor effects of tyramine and norepinephrine in anesthetized rats. The derivatives were, however, not as powerful monoaminoxidase inhibitors as phenazine. (English summary) (19 ref)—A. G. Pook.

6851. Maugh, Thomas H. **Marihuana: The grass may no longer be greener.** *Science*, 1974(Aug), Vol 185(4152), 683-685.—Reports that research since 1969 has produced a growing body of evidence suggesting that the effects of marihuana use are cumulative and dose-related. It is stated that prolonged heavy use of marihuana (or less frequent use of hashish) is associated with 6 different types of potential hazard, including possible chromosome damage.

6852. Meisch, Richard A. & Thompson, Travis. (U Minnesota, Psychiatry Research Unit) **Ethanol intake as a function of concentration during food deprivation and satiation.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 589-596.—In Exp I the ethanol intake and responding of 6 male Sprague-Dawley albino rats were measured at concentrations of 0 (water control), 2, 4, 8, 16, and 32% during daily 1-hr sessions in operant conditioning chambers. Ss were run first food-

deprived (80% of free-feeding weight) and then food-satiated (free access to food in home cages). Ethanol intake was greater when Ss were food-deprived, but under both food conditions (a) ethanol intake exceeded that of water at all concentrations, (b) quantity (mg) consumed increased with the concentration, and (c) the highest rate of responding occurred at the beginning of the session. In Exp II fixed-ratio responding by the same Ss, maintained by contingent presentation of 32% ethanol, exceeded water control responding. This finding strengthened the conclusion that this concentration can serve as a reinforcer for the food-satiated rat. (31 ref)—*Journal abstract*.

6853. Miller, Lyle H. et al. (Temple U, Medical School) **Polypeptide influences on attention, memory and anxiety in man.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 663-668.—Examined the effects of ACTH<sub>1-34</sub> and ACTH<sub>4-10</sub> on a variety of bioelectric and behavioral measures of attention, memory and anxiety in a total of 40 healthy, male medical students within the context of a disjunctive reaction time paradigm. In 2 experiments ACTH<sub>1-34</sub> had no effect on any of the measures involved; ACTH<sub>4-10</sub>, however, served to improve visual memory, decrease anxiety, reinstate a previously habituated alpha blocking response in the occipital EEG, and generally influence the occipital EEG toward a pattern consistent with increased attention. Results suggest a direct polypeptide influence on central nervous system attentional mechanisms. (20 ref)—*Journal abstract*.

6854. Mitchell, Denis; Parker, Lorne F. & Woods, Stephen C. (U Washington) **Cyclophosphamide-induced sodium appetite and hyponatremia in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 627-630.—In 2 experiments a total of 15 male Long-Evans rats were intraperitoneally administered 100 mg/kg cyclophosphamide. An increase of both sodium preference and consumption resulted in Ss given a choice between water and saline (.15 M) to drink. Measurement of serum sodium concentration revealed that the cyclophosphamide-treated Ss had lower values than the 15 non-drugged controls, indicating that the cyclophosphamide-elicited sodium appetite was caused by a drug-induced need for sodium. (23 ref)—*Journal abstract*.

6855. **National Clearinghouse for Drug Abuse Information.** (Rockville, MD) **Mescaline.** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(May), Ser 15(1), 16 p.—Describes the pharmacology, chemistry, clinical effects, and treatment use of mescaline. A number of articles are reviewed to show the drug's history and legal status, and to present the opinions of experts regarding it. (60 ref)

6856. **National Clearinghouse for Drug Abuse Information.** (Rockville, MD) **Phencyclidine (PCP).** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(Apr), Ser 14(1), 11 p.—Describes the pharmacology, chemistry, clinical effects, uses, and treatment uses of phencyclidine (PCP). A number of articles are reviewed to show the drug's history and legal status, and the treatment of acute intoxication with PCP. (43 ref)

6857. Negrete, Juan C. **[Alcohol and transit.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*,



1974(Apr), Vol 20(2), 132-141.—Outlines the main effects of alcohol on drinking behavior and stresses the hazards of different kinds of drinkers. (26 ref)

6858. Niwaguchi, Tetsukichi; Inoue, Takako & Sakai, Tokiyasu. (National Research Inst of Police Science, First Chemistry Section, Tokyo, Japan) **Studies on the *in vitro* metabolism of compounds related to lysergic acid diethylamide (LSD).** *Biochemical Pharmacology*, 1974(Nov), Vol 23(21), 3063-3066.—Reports results of experiments which investigated the metabolism of several LSD derivatives by rat liver supernatant in order to find clues to the mechanism of the hallucinogenic action of LSD.

6859. Oliverio, Alberto & Castellano, Claudio. (CNR, Lab di Psicobiologia e Psicofarmacologia, Rome, Italy) **Genotype-dependent sensitivity and tolerance to morphine and heroin: Dissociation between opiate-induced running and analgesia in the mouse.** *Psychopharmacologia*, 1974, Vol 39(1), 13-22.—Studied morphine and heroin-induced running activity (running fit), analgesia, and tolerance in 300 male BALB/cJ, C57BL/6J, and DBA/2J mice. Acute tolerance developed in all strains tested within 48 hrs. The effects of the opiates on the running fit and analgesia were strain-dependent, and a negative strain correlation was evident between the 2 measures. The development and the recovery from acute tolerance were also genetically determined. It is concluded that the motor and analgesic effects of morphine in the mouse are 2 distinct phenomena and that the same neuronal and biochemical model cannot explain them. Results are discussed in relation to the brain regional and biochemical differences reported for these strains. (25 ref)—*Journal abstract*.

6860. Paalzow, Gudrun & Paalzow, Lennart. (Uppsala, Biomedical Ctr, Sweden) **Theophylline increased sensitivity to nociceptive stimulation and regional turnover of rat brain 5-HT, noradrenaline and dopamine.** *Acta Pharmacologica & Toxicologica*, 1974(Mar), Vol 34(3), 157-173.—Theophylline decreased the thresholds of nociceptive stimulation (motor response, vocalization, and vocalization afterdischarge) in male Sprague-Dawley rats, the effects being maximal 30 min after administration. Theophylline increased the endogenous level of dopamine (DA) in the telencephalic cortex and decreased the level of noradrenaline (NA) in regions including the diencephalon and the striatum. After inhibition of tyrosine hydroxylase with  $\alpha$ -methyl- $p$ -tyrosine, theophylline decreased the depletion of DA brought about by the inhibitor in the telencephalic cortex, indicating a decreased turnover of DA in this region. Theophylline accelerated the decrease in NA concentration in the diencephalon-striatum region induced by the enzyme inhibition, indicating an increased turnover of NA. The 5-hydroxy-indoleacetic acid content in the telencephalic cortex was decreased by theophylline and increased in the mesencephalon-pons-medulla oblongata regions. Inhibition of tyrosine hydroxylase counteracted the decrease in the threshold of vocalization afterdischarge produced by theophylline. It is suggested that there is a relationship between a reduced turnover of DA and serotonin in the telencephalic cortex and the theophylline-induced decrease of the threshold for vocalization afterdischarge, while the

modulation of the vocalization response may be related to the serotonin metabolism in lower brainstem structures. (35 ref)—*Journal abstract*.

6861. Parker, Lorne F. & Radow, Barbara L. (U Washington, Physiology-Psychology Group) **Morphine-like physical dependence: A pharmacologic method for drug assessment using the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 613-618.—45 female Wistar albino rats maintained on various dosage regimens of morphine showed dose-related taste aversions to a saccharin solution offered to them upon withdrawal from the drug. Maximal saccharin aversions occurred between 72 and 96 hrs after termination of morphine injections and gradually returned to baseline preference levels after 14 days of morphine abstinence. Results suggest that the morphine-treated Ss associated the aversive components of the morphine withdrawal syndrome with saccharin consumption and manifested conditioned aversions to the saccharin solution which extinguished as the withdrawal syndrome subsided. Findings are discussed with regard to the potential use of conditioned taste aversions in determining whether test compounds are capable of causing physical dependence in rats. (33 ref)—*Journal abstract*.

6862. Peres, Vera L.; Gentil, Cleber G.; Graeff, Frederico G. & Covian, Miguel R. (School of Medicine, São Paulo, Brazil) **Antagonism of the dipsogenic action of intraseptal angiotensin II in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 597-602.—Injected .01-2.0  $\mu$ g of angiotensin II (A II) into the medial septal area of 45 unanesthetized male Holtzman rats in normal water balance causing dose-dependent drinking during the 60-min period following drug administration. Pretreatment with 5 and 10  $\mu$ g of locally injected haloperidol, 15 min prior to A II (.3  $\mu$ g), partially antagonized the dipsogenic effects of A II and a dose of 25  $\mu$ g of haloperidol completely blocked this effect. A cataleptic-like state followed haloperidol administration. The injection of doses as high as 25  $\mu$ g of dopamine in the same brain site caused no drinking. Pretreatment with 3  $\mu$ g of intraseptal Sar<sup>1</sup>, Ala<sup>1</sup>, Ile<sup>1</sup>-angiotensin I, a competitive antagonist of A II at peripheral receptors, completely antagonized the dipsogenic effect of A II. The same dose (3  $\mu$ g) of the A II analog alone caused only a mild but significant drinking response. Results suggest that A II acts on specific receptors in the central nervous system that may be similar to peripheral angiotensin receptors. The role of brain catecholamines in the mediation of A II-induced drinking remains uncertain. (44 ref)—*Journal abstract*.

6863. Plotnikoff, Nicholas P.; Kastin, Abba J. & Schally, Andrew V. (Abbott Lab, Experimental Therapy Section, North Chicago, IL) **Growth hormone release inhibiting hormone: Neuropharmacological studies.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 693-696.—Observed significant potentiation of the behavioral effects of DOPA in male Sprague-Dawley ICR mice pretreated with growth hormone-release inhibiting hormone (GH-RIH). In addition, a slight reduction of oxotremorine-induced symptoms was seen. No significant effects of GH-RIH were observed in several other tests involving the central nervous system

(CNS). Results support the authors' concept of the CNS actions of peptides.—*Journal abstract.*

6864. **Pohle, W. & Matthies, H.** (Medizinischen Akademie Magdeburg, Inst für Pharmakologie und Toxikologie, E Germany) **Incorporation of <sup>3</sup>H-leucine into brain cells after learning.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 573-577.—Immediately after a brightness discrimination, <sup>3</sup>H-leucine was administered intraperitoneally to male Wistar rats. One hour after injection the brains were prepared for microautoradiographical examination. In the 7 conditioned Ss, as compared to the 14 controls, the incorporation of leucine into neurons was increased in all structures of the hippocampal formation, in the visual cortex, and in the cingulate cortex, whereas no increase in incorporation was found in other cortical structures or in thalamic and hypothalamic nuclei investigated. (23 ref)—*Journal abstract.*

6865. **Pollock, Steven H.** (Medical Coll of Wisconsin, Milwaukee) **A novel experience with *Panaeolus*: A case study from Hawaii.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 85-89.—Describes the author's hallucinogenic experience with the *Panaeolus cyanescens* mushroom in Oahu, Hawaii. The ingestion of 12 mushrooms is reported to result in an alteration of visual perceptions, a heightened sense of well-being, and an increase in auditory acuity. Botanical information is presented along with results of a paper chromatograph study indicating the presence of psilocybin in the mushrooms. This is the first report of their occurrence in Hawaii. (30 ref)—*R. Tomasko.*

6866. **Quinton, Elton E.** (U Louisville, Neuropharmacology Program) **Effects of pretraining on subsequent cycloheximide induced amnesia.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 585-588.—In Exp I 48 male C57BL/6J mice were trained on a passive avoidance (PA) task, given 1 extinction trial, and then were injected with cycloheximide or saline shortly before retraining on the PA task. On a subsequent test trial, the performance of the cycloheximide group was inferior to the saline group, but superior to a cycloheximide group of 25 Ss not given the pretraining experience. In Exp II 20 Ss were given cycloheximide before each of 2 training sessions while 20 others received cycloheximide before the 1st training session and saline before the 2nd. The group given cycloheximide before each training session was amnesic for both sessions to an equal degree, while the other group was amnesic for only the 1st session. These data seem to indicate that pretraining has limited effect on subsequent cycloheximide-induced amnesia and that such amnesia is the result of impaired memory formation rather than impaired memory retrieval. (20 ref)—*Journal abstract.*

6867. **Raft, David; Gomez, Raoul & Ewing, John A.** (U North Carolina, Medical School, Chapel Hill) **The pentobarbital test dose for depressant drug dependence.** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 366-370.—Evaluated J. A. Ewing and W. E. Bakewell's (1967) single dose pentobarbital test for depressant drug dependence in 24 healthy young college student volunteers. Ss were given 200 mg of pentobarbital or placebo, and mental status and physiological signs were evaluated in 1 hr. Serum pentobarbital levels were

studied hourly. 12 Ss had a history of moderately heavy alcohol consumption while 12 were abstainers. A history of moderately heavy alcohol intake was particularly associated with resistance to the effects of pentobarbital consonant with current concepts of cross-tolerance due to induction of liver enzyme systems. It is concluded that a single 200-mg pentobarbital test can be used to screen out Ss who fall asleep, but that inferences as to tolerance to barbiturates or minor tranquilizers should be drawn cautiously for those who react to the test otherwise. Continuing test doses of pentobarbital offer a more reliable diagnosis in doubtful cases.—*Journal abstract.*

6868. **Renis, M.; Giovine, A. & Bertolino, A.** (Ospedale Psichiatrico "Casa Divina Provvidenza," Lab di Biochimica e Neuropathologia, Bisceglie, Italy) **[The effect of ethanol on the MAO-activity of mitochondrial fractions of rat brain: MAO-DA and MAO-NA.]** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 293-298.

6869. **Rieger, H. & Krieglstein, J.** (U Mainz, Neuro-Psychiatrische Klinik, W Germany) **Quantitative analysis of the EEG effects produced by imipramine, desipramine, promazine, and monodesmethyl promazine in the isolated perfused rat brain.** *Psychopharmacologia*, 1974, Vol 39(2), 163-179.—Preparations of male Sprague-Dawley rat brains were perfused for 30 min with simulated blood containing imipramine, (IM), desipramine, promazine (PMZ), and monodesmethyl PMZ. Control experiments were performed without a drug added to the simplified blood. The EEG was recorded at various times on a magnetic tape and was evaluated visually and quantitatively. EEG effects of IM and PMZ as well as the effects of these drugs with their monodesmethyl metabolites were compared. The drugs produced clear EEG changes compared with the control EEG. An increase of the amplitude and a slowing of the frequency were found for all drugs. Only the changes produced by desipramine were not statistically significant. Furthermore, IM and PMZ provoked grouped sharp waves. The monodesmethyl PMZ caused grouped sharp waves. The pronounced similarity of the EEG effects produced by IM and PMZ as well as the clear difference between the IM and desipramine effects were the most striking results. It is suggested that IM becomes a typical antidepressant in the whole organism after demethylation. (38 ref)—*Journal abstract.*

6870. **Schechter, Martin D.** (Eastern Virginia Medical School, Norfolk) **Effect of propranolol, d-amphetamine and caffeine on ethanol as a discriminative cue.** *European Journal of Pharmacology*, 1974(Nov), Vol 29(1), 52-57.—Trained 14 female albino rats to escape a shock in a 3-compartment chamber contingent upon their ability to discriminate between 2 drug states—1.5 mg/kg ethanol and .9% saline. This discriminative ability was dose responsive and was tested after pretreatment with 1, 5, 10, and 20 mg/kg propranolol, 4.0 mg/kg dextroamphetamine sulphate, and 100 mg/kg caffeine. Results of the pretreatment experiments show that, of the 3 possible antagonists, only amphetamine significantly decreased the S's ability to discriminate between ethanol and saline. (30 ref)—*Journal abstract.*

6871. **Segal, Menahem.** (NIMH, St Elizabeths Hosp, Lab of Neuropharmacology, Special Mental Health Research Div, IRP, Washington, DC) **Lithium and the**



**monoamine neurotransmitters in the rat hippocampus.** *Nature*, 1974(Jul), Vol 250(5461), 71-72.—Investigated iontophoretic Li<sup>+</sup> application to pyramidal cells in locus coeruleus (LC), in interaction with (a) serotonin, (b) noradrenaline, (c) gamma-aminobutyric acid (GABA), and (d) electrical stimulation of LC cells. Of 35 cells from 8 male rats, Li<sup>+</sup> (25–100 nA) excited 3 cells slightly, slowed 2 slightly, and left 30 unaffected. Noradrenaline application (15-sec pulses, 50–100 nA) inhibited spontaneous and acetylcholine-enhanced activity in 15 cells. Concurrent Li<sup>+</sup> application reversibly antagonized inhibition in 7 while in 5 recovery was still incomplete after 10–30 min; 3 cells were unaffected. Inhibitory serotonin action was reversibly antagonized in 3 out of 7 cells after Li<sup>+</sup> application of 2–3 min. 15 cells, inhibited by GABA (0–5 nA), were unaffected by Li<sup>+</sup>, as was unsystematically explored acetylcholine excitation. Inhibition produced by electrical stimulation of LC cells was partially antagonized by Li<sup>+</sup> in 5 out of 6 cells, possibly due to remote location of cell terminals. Data are interpreted as supporting the hypothesis that cyclic adenosine monophosphate (AMP) mediates monoamine response, with Li<sup>+</sup> exerting antagonistic action by changing ionic balance created by monoamines like GABA and noradrenaline. Conclusions concerning psychoactive potential of Li<sup>+</sup> caution against inference for chronic application from that of acute iontophoretic mode.—A. Cerf-Beare.

6872. Silverstein, Melvin J. & Lessin, Phyllis J. (U California, Ctr for the Health Sciences, Los Angeles) **Normal skin test responses in chronic marijuana users.** *Science*, 1974(Nov), Vol 186(4165), 740–741.—The cell-mediated immunity of 22 chronic marijuana smokers showed no difference from that of normal controls when evaluated by in vivo skin testing with 2,4-dinitrochlorobenzene. However, a significant difference was found between the chronic marijuana users, all of whom could be sensitized to 2,4-dinitrochlorobenzene, and age-matched cancer patients, who showed a decreased capacity to be sensitized.

6873. Standley, Kay; Soule, A. Bradley; Copans, Stuart A. & Duchowny, Michael S. (National Inst of Child Health & Human Development, Bethesda, MD) **Local-regional anesthesia during childbirth: Effect on newborn behaviors.** *Science*, 1974(Nov), Vol 186(4164), 634–635.—Studied the possible effects of anesthetics and analgesics administered during normal deliveries on the behavior characteristics of 60 48–72 hr old firstborn, healthy infants. Such administration correlated significantly with newborn behaviors as evaluated by the T. B. Brazelton neonatal assessment scale. 3 days after birth, infants whose mothers received local-regional anesthesia were more irritable and motorically less mature than those infants whose mothers were not medicated.—*Journal abstract.*

6874. Stevens, J.; Wilson, K. & Foote, W. (U Oregon, Medical School, Boston) **GABA blockade, dopamine and schizophrenia: Experimental studies in the cat.** *Psychopharmacologia*, 1974, Vol 39(2), 105–119.—Examined the effects of blocking putative gamma-aminobutyric acid (GABA) inhibition on dopamine cells of origin in ventral tegmental area and substantia nigra of freely moving cats with chronically implanted cannulas and recording

electrodes. Instillation of the GABA blocking agent bicuculline in ventral tegmental area induced arousal, searching, slinking, hiding, evidence of fear, catatonic stance, staring, and sniffing behaviors which were accompanied by spike activity from nucleus accumbens in several Ss. Similar amounts of bicuculline placed in substantia nigra did not induce fear but were followed by ipsilateral grooming, circling, and hyperesthesia, with EEG spiking in caudate nucleus and medial and lateral geniculate nuclei in several Ss. The relationship of these findings to dopamine-induced stereotypies in mesolimbic and nigrostriatal systems and to evidence of dopamine excess or hypersensitivity in limbic striatum in patients with schizophrenic disorders is considered. (35 ref)—*Journal abstract.*

6875. Stix, Allen H. **Chlordiazepoxide (Librium): The effects of a minor tranquilizer on strategic choice behavior in the Prisoner's Dilemma.** *Journal of Conflict Resolution*, 1974(Sep), Vol 18(3), 373–394.—Compared the effects of 2 dosages (25 and 10 mg) on the strategic choice behavior of 108 male graduate students in the Prisoner's Dilemma game. Ss were assigned to either a drug, placebo, or no-capsule control group. Ss given chlordiazepoxide showed more mutual cooperation and less mutual uncooperation than the placebo or no-capsule groups. Although all chlordiazepoxide Ss won more than the other Ss, there was a nonsignificant inverse relationship between the drug dose and the amount won. Sociopharmacology is discussed as a social scientific specialization centered upon the effects of mind-affecting drugs on the person as a social actor and the courses followed by social processes. (18 ref)—L. Gorsey.

6876. Tadokoro, Sakutaro; Higuchi, Yoichiro; Kuribara, Hisashi & Okuizumi, Kiyoko. (Gunma U, School of Medicine, Behavior Research Inst, Maebashi, Japan) **Behavioral suppression induced by oral administration of monosodium L-glutamate in rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 619–625.—24 adult male Wistar rats, trained under a fixed-ratio 30 schedule of food reinforcement, were observed for behavioral changes after administration of monosodium L-glutamate (MSG). Following the administration of more than .5 g/kg of MSG, transient suppression was observed as a function of dose level. Responses were inhibited immediately after MSG, attained the minimum at 20–25 min, and then abruptly returned to the initial level. When MSG 2.0 g/kg was concurrently accompanied by subcutaneous diazepam .25–1.0 mg/kg or oral caffeine 5–20 mg/kg, the MSG-induced suppression was markedly modified. The several minutes suppression observed immediately after MSG was significantly antagonized by these drugs. However, the suppression observed at 15–30 min was significantly enhanced by diazepam in proportion with the dose, and markedly antagonized by caffeine. There were indications that MSG's central action might be involved in the development of behavioral suppression induced by it. The exact nature of the toxic hazards of MSG remain obscure, but present indications are that one should refrain from adding a large dose of MSG to food. (33 ref)—*Journal abstract.*

6877. **Tompkins, E. Crosby.** (Mead Johnson & Co, Evansville, IN) **The use of the immobility reflex (animal hypnosis) as a possible procedure for detecting sedative activity.** *Life Sciences*, 1974(Aug), Vol 16(4), 671-684. —Induced the immobility reflex in Dutch Belted rabbits, and determined the amount of electrical current necessary to interrupt this state before and after intravenous drug administration. Morphine and the major tranquilizers (chlorpromazine, haloperidol, and reserpine) elevated the arousal threshold over a wide dose range, while the minor tranquilizers (chlordiazepoxide and meprobamate) were active over a considerably narrower range. The sedative-hypnotics (phenobarbital, pentobarbital, ethanol, chloral hydrate, and ectylurea) demonstrated approximately the same degree of activity as the minor tranquilizers but resulted in a loss of righting reflex at the higher doses. Dextroamphetamine significantly lowered the arousal threshold. Imipramine, desmethylinipramine, nialamide, aspirin, diphenylhydantoin, chlorpheniramine, and diphenhydramine possessed little, if any, activity. Thus, the drug-induced changes in arousal threshold in rabbits exhibiting the immobility reflex can be used to classify compounds possessing major or minor tranquilizing or sedative-hypnotic activity. (27 ref) —*Journal abstract.*

6878. **Tricklebank, M. D. & Adlard, B. P.** (U Manchester, Medical School, England) **Effects in the suckling rat of chronic treatment with tryptophan and a monoamine oxidase inhibitor.** *Experimental Neurology*, 1974(Oct), Vol 45(1), 79-93. —In 7 experiments, daily administration of levotryptophan (TRY, 150 mg/kg) and tranlycypromine (TCP, 2.5 mg/kg) to developing hooded rats from 10-22 days of age resulted in continuously elevated levels of cerebral 5-hydroxytryptamine (5-HT) throughout this period. This treatment may yield useful information on the possible role of disordered 5-HT metabolism in certain forms of mental retardation. In this study such chronic treatment led to disturbed exploratory behavior in an open field. At 22 days of age, Ss' mean latency to move from the center of the open field was significantly higher than that of controls, as was the mean locomotor activity. Acute TRY/TCP treatment at 22 days of age produced no significant disruption of behavior, despite higher levels of brain 5-HT than in chronically treated Ss. This suggests that abnormal behavior at 22 days was a function of chronic drug treatment. However, these behavioral effects were reversible, since they were not observed 4 wks after termination of treatment. (29 ref) —*Journal abstract.*

6879. **Turek, I. S.; Soskin, R. A. & Kurland, A. A.** (Maryland Psychiatric Research Ctr, Baltimore) **Methylenedioxymphetamine (MDA): Subjective effects.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 7-14. —Studied the effects of MDA on 10 Ss, 9 having previous LSD experience. 75 mg of MDA were taken orally and blood pressure and respiration were recorded hourly. WAIS Digit Span and Digit Symbol subtests were administered and handwriting samples taken. 3 questionnaires were given to assess subjective effects: the Psychedelic Experience, the Subjective Drug Effects, and the Ludwig-Levine Modification of the Linton-Lands. Questionnaire responses indicate the MDA response is characterized by increased introspectiveness, heightened

self-awareness, greater intuitiveness, relaxation, acceptance, calmness, and serenity. MDA is considered less likely than LSD to produce experiences involving sense of ego loss and less likely to provide sense of awareness beyond usual conceptions of time and space. High variability of reactivity in this small sample is noted. Implications for drug-assisted psychotherapy are discussed. (21 ref) —*R. Tomasko.*

6880. **Vachon, Louis; Sulkowski, Adam & Rich, Edwin.** (Boston U, Medical School) **Marihuana effects on learning, attention and time estimation.** *Psychopharmacologia*, 1974, Vol 39(1), 1-11. —10 healthy, young adult male volunteers smoked a marihuana cigarette with 2.5%  $\Delta^9$ -tetrahydrocannabinol ( $\Delta^9$ -THC) and a THC-exhausted placebo cigarette. The marihuana administration was associated with an increase in heart rate, elevation of systolic blood pressure, conjunctival reddening, and specific airway conductance increase; time perception and Automated Digit Symbol Substitution Test performance were impaired. Diastolic blood pressure and attention measured by the Continuous Performance Test were not affected. The placebo preparation produced a subjective pleasant "high" but no physiologic effects nor performance change. The "high" induced by the active preparation was often rated as unpleasant. (32 ref) —*Journal abstract.*

6881. **Wallach, Marshall B.; Hinc, Bromfield & Gershon, Samuel.** (Syntex Research, Palo Alto, CA) **Cross tolerance or tachyphylaxis among various psychotomimetic agents on cats.** *European Journal of Pharmacology*, 1974(Nov), Vol 29(1), 89-92. —2,5-dimethoxy 4-methylamphetamine (DOM), a perception-distorting psychotomimetic agent, elicits a marked behavioral syndrome in cats which is antagonized by pretreatment with DOM. The present experiment with male and female cats examined this tachyphylaxis to determine the ability of various other types of psychotomimetic agents to antagonize the DOM-induced syndrome. Intraperitoneal mescaline and dextro-LSD, but not levo-LSD, could prevent the occurrence of the DOM-induced behavior. Ditrane, tryptamine, and dextroamphetamine did not antagonize DOM. It appears that the perception-distorting psychotomimetic agents exhibited either cross-tachyphylaxis or cross-tolerance and may share a common mechanism of action. —*Journal abstract.*

6882. **Wilson, C. W.; O'Brien, C. & MacAirt, J. G.** (U Dublin, Trinity Coll, Ireland) **The effect of metronidazole on the human taste threshold to alcohol.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 99-110. —Describes methods used in measuring the taste threshold to alcohol in 163 Ss, whose metronidazole and phenylthio carbimide thresholds were also measured. Ss tasted 5 mls of ascending concentrations of alcohol and water for 20 sec, spat it out, and washed out their mouths with diluent water; they were also administered 600 and 800 mg of metronidazole over 14-hr and 20-hr periods, respectively. Results indicate that (a) Ss detected alcohol as sweet and burning tastes at a concentration of  $4.2 \pm$  a Standard Error (S.E.) of .24% alcohol and a mean concentration of  $21.2 \pm$  S.E. 1.22% alcohol respectively; (b) administration of 600 mg of metronidazole caused no change in the taste threshold to alcohol 6 days after the administration of the drug; and (c) a significant elevation of both sweet



and burning taste thresholds followed the 2nd administration of the drug. (36 ref)—*Journal abstract*.

6883. Wilson, Marvin C. & Schuster, Charles R. (U Mississippi, School of Pharmacy) **Aminergic influences on intravenous cocaine self-administration by rhesus monkeys.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 563-571.—Conducted 2 experiments with a total of 17 drug-naïve male monkeys to study how agents known to alter central aminergic systems affect cocaine self-administration. Acute treatment with pargyline (50 and 100 mg/kg) decreased the behavior; alpha-methylparatyrosine (50 mg/kg) increased the behavior. Treatment with the peripheral alpha adrenergic blocking agents phentolamine and phenoxybenzamine (5-8.0 mg/kg) did not significantly alter the behavior. Chronic treatment (5-10 days) with reserpine (1-1.0 mg/kg) produced an initial increase in self-administration to which tolerance developed. Upon discontinuation of reserpine treatment, cocaine self-administration was decreased below baseline levels. Results implicate either dopamine or norepinephrine as mediators of either cocaine-based reinforcement or of the other effects of cocaine which may regulate the frequency of its administration. (17 ref)—*Journal abstract*.

6884. Wright, D. C.; Chute, D. L. & McCollum, G. C. (U Missouri, John M. Dalton Research Ctr) **Reversible sodium pentobarbital amnesia in one trial discrimination learning.** *Pharmacology, Biochemistry & Behavior*, 1974(Sep-Oct), Vol 2(5), 603-606.—Reversal of drug-induced retroactive amnesia, previously observed in passive avoidance, was extended to a task measuring response choice rather than latency. 50 thirsty male Sprague-Dawley rats were given 3 drugged (D) and 3 nondrugged (ND) continuous reinforcement barpress for water sessions in a 2-bar box with 1 bar (B<sub>1</sub>) present. During the 7th session, all Ss were undrugged and both bars were present; 3 non-reversal (NR) groups received a single reinforcement after pressing the originally reinforced bar (B<sub>1</sub>) while 3 reversal (R) groups received a single reinforcement only after pressing the previously unavailable bar (B<sub>2</sub>). All Ss were D or ND injected immediately after this session. All Ss were again injected prior to the 24-hr test with both bars present in extinction. NR Ss performed 80-84% of their test barpresses on B<sub>1</sub> as did R Ss given D postlearning and ND pretest (group R-D-ND). R groups given ND postlearning and pretest (R-ND-ND) or D postlearning and pretest (R-D-D) showed retention with 60-68% B<sub>2</sub> presses in test. The difference between groups R-D-D and R-D-ND suggests that the apparent amnesia shown by R-D-ND results from retrieval failure, not consolidation failure.—*Journal abstract*.

6885. Yamaguchi, Kiyoko & Iwahara, Shinkuro. (Tokyo Metropolitan Inst for Neurosciences, Japan) **Effects of chlordiazepoxide upon differential heart rate conditioning in rats.** *Psychopharmacologia*, 1974, Vol 39(1), 71-79.—20 mg/kg of intraperitoneal chlordiazepoxide (CDP) almost completely blocked classical differential conditioning in heart rate (HR) in 10 unanesthetized male Wistar-Kimichi rats, compared to 12 controls, but it only slightly depressed simple HR conditioning to the same conditioned stimulus (CS). The

simultaneously observed differential conditioning in respiratory rate (RR) was also inhibited by CDP with little effect upon simple RR conditioning. Motor activity as measured by changes in electromyograph records immediately preceding as well as during the CS was not affected either by CDP or by the differential conditioning procedure. Results are explained in terms of the drug's disinhibitory action.—*Journal abstract*.

6886. Zinberg, Norman E. & Delong, James V. (Harvard U) **Research and the drug issue.** *Contemporary Drug Problems*, 1974(Spr), Vol 3(1), 71-100.—Examines the nature and functions of research on psychoactive drugs. Basic drug research is complicated by the influence of set (expectations) and setting (the total social and physical environment) on individual reactions to psychoactive drugs. Research techniques which measure physical risks can not adequately assess the psychic risks of drug use. It is suggested that research on drug use needs to examine the benefits and rewards perceived by drug users as well as the risks and damages resulting from drug use. It is concluded that research can illuminate the consequences of drug use but cannot of itself lead to final drug policy decisions.—J. Kelly.

## ANIMAL PSYCHOLOGY

6887. Bresler, David E. & Bitterman, M. E. (U California, Medical School, Los Angeles) **A shocking grid for pigeons.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 471-472.

6888. Carew, Thomas J. & Kupfermann, Irving. (New York U, Medical School) **The influence of different natural environments on habituation in *Aplysia californica*.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 339-345.—Studied habituation of the defensive-withdrawal reflex in *Aplysia californica* (marine mollusk) in the animal's natural environment. Ss in a calm environment showed a brisk withdrawal reflex which habituated with a time course comparable to controlled laboratory studies. By contrast, Ss in a turbulent environment showed a very weak reflex response which habituated significantly faster than the calm-environment Ss. Ss in a turbulent environment also had a much higher threshold for another defensive response—the inking reflex. Data suggest that different tactile environments significantly influence the animal's behavioral responsiveness, and that habituation is a behavioral modification that normally occurs in the life of *Aplysia*.—*Journal abstract*.

6889. Fox, M. W. (Washington U) **Concepts in ethology: Animal and human behavior.** Minneapolis, MN: University of Minnesota Press, 1974. xvii, 139 p. \$8.50.—Presents an introduction to the origins, history, concepts, and applications of ethology. The author's research on wolves and dogs is used to discuss similarities and differences in the behavior of wolves, dogs, and man. (4 p ref)

6890. Garcia, John; Hankins, Walter G. & Rusiniak, Kenneth W. (U California, Los Angeles) **Behavioral regulation of the milieu interne in man and rat.** *Science*, 1974(Sep), Vol 185(4154), 824-831.—Discusses differences in conditioning between adaptation to beneficial or toxic foods internally and adaptation to external

harmful environments in mammals. Experimental data are reviewed to illustrate acquired aversion to toxic foods, and taste enhancement if recuperation follows ingestion. Rats exposed to harmful or lethal radiation doses, on the other hand, do not learn to avoid the harmful space. Self-regulatory functions in rats and men are reviewed and theoretical and methodological considerations examined. It is concluded that the way food effects are stored in memory may be fundamentally different from the way specific space-time strategies for external contingencies are stored in memory.—R. Hall.

6891. Harlow, Harry F. & Suomi, Stephen J. (U Wisconsin, Madison) **Induced depression in monkeys.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 273-296. —Presents a review of recent studies conducted at the Wisconsin Primate Laboratory which have been directed toward the experimental production and cure of human-type psychopathologies in rhesus monkeys, with the primary emphasis being on depression. Data are presented which (a) identify different procedures used to produce depression (e.g., maternal separation, peer or agemate separation, vertical chamber-induced depression, and isolation); (b) determine the susceptibility of any given monkey to these procedures; and (c) outline methods and modes of therapy. Results suggest that profound depressions can be produced in monkeys relatively easily by a variety of techniques and that these induced depressions either closely resemble human depression or have such similarity that closely correlated human and animal depressive patterns can be obtained with refined techniques. (47 ref)—*Journal abstract*.

6892. Holland, H. C. (Bethlem Royal Hosp, Kent, England) **Displacement activity as a form of abnormal behaviour in animals.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974. viii, 352 p. 45.

6893. Kupfermann, Irving & Carew, Thomas J. (New York State Psychiatric Inst, New York) **Behavior pattern of *Aplysia californica* in its natural environment.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 317-337. —Conducted systematic observations on 4 classes of behavior—feeding behavior, sexual behavior, locomotion, and defensive behavior—in the marine gastropod mollusk. Feeding was the most frequent behavior observed. Although Ss fed during a large proportion of the day, there were periods during which they would not eat, either after a normal meal, or after a meal which was fed to them by the E. Ss showed definite food preferences, but large Ss appeared to exhibit relatively less selectivity. Sexual behavior (copulation and egg laying) occurred at a special location where the same Ss remained over a period of a week or longer. During exposure to air in the intertidal zone, animals were inactive, but otherwise they locomoted over a distance of 10 M or more per day. Ss were typically aggregated into groups. Defensive withdrawal occurred very infrequently and spontaneous inking behavior was never observed. (37 ref)—*Journal abstract*.

6894. Lee, Richard M.; Robbins, Myral R. & Palovcik, Reinhard. (Edsel B. Ford Inst for Medical Research, Detroit, MI) ***Pleurobranchaea* behavior: Food finding and other aspects of feeding.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 297-315. —Conducted 6 experi-

ments to systematically describe aspects of the feeding behavior of *Pleurobranchaea californica*, a marine gastropod mollusk ( $N = 42$ ). The first 3 experiments were concerned with food finding. In contrast to earlier reports, locomotion in the presence of food chemical was not random; reversals in direction were more frequent; and if the chemical gradient were steep enough, Ss turned in the direction of food. The remaining experiments were concerned with the location of chemical receptors, responses to tactile stimuli, and satiation. Food-chemical stimuli elicited feeding responses when the anterior edge of the oral veil and foot, the rhinophore tips, and certain other anterior areas were stimulated. Pieces of meat (squid), when used as tactile stimuli to many anterior body areas, elicited approach responses; but nonfood, tactile stimuli (in the presence of squid extract) had little effect. (20 ref)—*Journal abstract*.

6895. Levenson, Shirley & Wilsoncroft, W. E. (California State U, Northridge) **Gathering behavior in female mice: Effects of experience and parturition.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 519-522. —36 female Swiss-Webster mice, about 60 days old, were tested on 35 consecutive days under pregnancy-lactation, ovariectomy, and intact (no treatment) conditions. Stimulus materials (yarn and paper strips) were systematically dispersed over the floor area of the home cage and 5 min were allotted for gathering. Scoring was in terms of differences in the dispersion of the stimuli. All materials were removed from the cage after the 5-min test. The 3 groups all improved over the 5 wks of testing ( $p < .001$ ), regardless of hormonal condition. The pregnant-lactating group displayed a significant increase in gathering between their pre- and postpartum test days and differed from the other 2 groups only during the postpartum tests. None of these Ss had an opportunity to build or utilize a "nest."—*Journal abstract*.

6896. Mukherjee, R. P. & Saha, S. S. (Zoological Survey of India, Calcutta) **The golden langurs (*Presbytis geei* Khajuria, 1956) of Assam.** *Primates*, 1974(Dec), Vol 15(4), 327-340. —Studied the ecology and behavior of golden langurs in the western forests of Assam. During the survey, 10 groups were observed of which one was an all male group and the rest were bisexual. Group composition, sex ratio of adult males and females, ratio of adult females to juveniles and infants, percentage of females with infants, number of males in each group, daily activity pattern, intra- and intergroup and interspecific relations, reaction to disturbances, and vocalization are described. The similarity and differences in the behavior of golden langurs from those of Hanuman langurs are discussed.—*Journal abstract*.

6897. Pi, Jorge S. (Parque Zoológico, Barcelona, Spain) **An elementary industry of the chimpanzees in the Okorobikó Mountains, Rio Muni (Republic of Equatorial Guinea), West Africa.** *Primates*, 1974(Dec), Vol 15(4), 351-364. —Describes sticks which have been shaped and used by chimpanzees of the subspecies *Pan troglodytes troglodytes* in the mountainous region in central Rio Muni. References are also made to the utilization of these sticks for the obtaining of termites. It is indicated that in Rio Muni this elemental industry is known only to some of the groups of these pongids, inhabiting moreover areas relatively close to each other.



A new map is presented which indicates in summary manner the distribution of the principal elemental industries known to chimpanzees in the wild. (27 ref)—*Journal abstract*.

6898. Sakellaris, Peter C. (U Oregon, Dental School) **An automated system for maintaining small animals on a water-deprivation regimen.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 515-516.

6899. Tuber, David S.; Hothersall, David & Voith, Victoria L. (Ohio State U) **Animal clinical psychology: A modest proposal.** *American Psychologist*, 1974(Oct), Vol 29(10), 762-766.—Describes initial experiences in the development of a field of applied animal psychology dealing with the behavioral problems of pet animals. A team approach is suggested where (a) the pet's problem is analyzed; (b) a remedial training program based on classical and operant conditioning is used; (c) the owner is instructed in the implementation of the program; and (d) a follow-up assessment of the procedure's effectiveness is proposed. The case histories of 3 dogs with behavioral problems are presented.—*Author abstract*.

### Learning & Motivation

6900. Auge, Robert J. (Denison U) **Context, observing behavior, and conditioned reinforcement.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 525-533.—4 White Carneaux and 1 Silver King pigeons made observing responses for stimuli signaling either a fixed-interval 30-sec schedule or a fixed-ratio  $x$  schedule, where  $x$  was either 20, 30, 100, 140, or 200 and the schedules alternated at random after reinforcement. If observing responses did not occur, food-producing responses occurred to a stimulus common to both reinforcement schedules. When the fixed-interval schedule was paired with a low-value fixed ratio, i.e., 20 or 30, the presentation of the stimulus reliably signaling the fixed-ratio schedule reinforced observing behavior, but the presentation of the stimulus reliably signaling the fixed-interval schedule did not. The converse was the case when the fixed-interval schedule was paired with a large-valued fixed ratio, i.e., 100, 140, or 200. Results show that the establishment and measurement of conditioned reinforcement is dependent upon the context or environment in which stimuli reliably correlated with differential events occur. (39 ref)—*Journal abstract*.

6901. Badia, Pietro & Culbertson, Stuart. (Bowling Green State U) **Changeover from unsignaled to signaled avoidance with and without a feedback stimulus in rats.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 278-284.—Conducted 2 experiments with 3 female Sprague-Dawley rats in which, by pressing a lever, unsignaled avoidable shocks could be changed to signaled avoidable shocks for periods of 1 min, after which unsignaled avoidance was automatically reinstated. A correlated stimulus identified the signaled schedule. Under these conditions, Ss changed over at a rate sufficient to remain in the signaled schedule more than 90% of the time. Both experiments showed that changeover performance was under the control of the correlated stimulus. Presenting the signaled schedule without the correlated stimulus did not maintain changing over. Exp II showed that a 1-sec presentation of the correlated stimulus was sufficient to maintain changeover perform-

ance. Results are attributed to the conditioned reinforcing properties of the correlated stimulus.—*Journal abstract*.

6902. Biederman, G. B. et al. (U Toronto, Ontario, Canada) **Memory of conditioned food aversion follows a U-shape function in rats.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 610-615.—Conducted 2 experiments with a total of 160 male Wistar rats to examine the limits of the cholinergic memory hypothesis using conditioned saccharin aversion. Ss drinking saccharin solution for the 1st time were poisoned by injection of lithium chloride and then offered saccharin solution 90 min, 1, 2, 3, 7, 10, or 14 days later. The memory function was U-shaped, with 90-min and 14-day groups retaining the most aversion to saccharin. Intervention with an anticholinesterase (physostigmine) failed to produce a disruption or enhancement of memory, as was expected on the basis of theories that the laying down of memories depends on modification of cholinergic synapses. (17 ref)—*Journal abstract*.

6903. Bronstein, Paul M.; Dworkin, Terry & Bilder, Benjamin H. (Brooklyn Coll, City U New York) **Age-related differences in rats' spontaneous alternation.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 285-288.—37 15-day-old Sprague-Dawley albino rats made random choices in a T maze, while adult levels of alternation (approximately 70%) were noted among 119 30-day-olds. Also, younger Ss were insensitive to a lengthening of the intertrial interval, unlike older Ss whose rate of alternation decreased when a 1-hr delay was interposed between arm entries. Findings are consistent with the hypothesis that hippocampal development is a factor in the ontogeny of postweaning locomotion. The unsystematic pattern of goal-arm selections among 15-day-olds suggests that ontogenetic variation in the utilization of stimuli may underlie developmental shifts in spontaneous alternation. (20 ref)—*Journal abstract*.

6904. Bryant, Donna & Church, Russell M. (U North Carolina, Chapel Hill) **The determinants of random choice.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 245-248.—Conducted an experiment with 12 male Charles River CD albino rats to describe a pattern of reinforcement sufficient to produce an unpredictable pattern of choice response. On each trial 2 levers were inserted into an experimental chamber. If the reinforcement was always contingent upon single alternation (a simple pattern), Ss learned to alternate at significantly better than chance level; if reinforcement was contingent upon alternation on 50% of the trials (an insoluble pattern), Ss developed a position preference. To produce apparently random responding, the less preferred response (an alternation) was differentially reinforced on 75% of the trials. A simple stochastic model adequately describes the results.—*Journal abstract*.

6905. Capaldi, E. J. & Morris, Michael D. (Purdue U) **Reward schedule effects in extinction: Intertrial interval, memory, and memory retrieval.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 473-483.—In 2 experiments a total of 68 Holtzman albino rats were trained in a runway such that partial reward occurred on Trial 1 of the day and consistent reward on subsequent massed trials (Group PRTI), or consistent reward occurred on

Trial 1 of the day and partial reward on subsequent massed trials (Group PRTM). Under spaced (24-hr) extinction, Group PRTI was more resistant to extinction than Group PRTM, and under massed (1-min) extinction, Group PRTM was more resistant to extinction than Group PRTI. Findings suggest that (a) distinctive stimuli were associated with Trial 1 of the day and with subsequent massed trials; (b) these distinctive stimuli functioned as retrieval cues for memories, memory retrieval being independent of intertrial interval; and (c) behavior in extinction was controlled by a stimulus compound consisting of the memory of nonreward plus stimuli which accompanied the memory of nonreward on rewarded acquisition trials.—*Journal abstract.*

6906. Christman, C. L. (US Public Health Service, Rockville, MD) **A digital sequential generator for implementing reinforcement schedules.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 577-580.

6907. Dean, P.; Weiskrantz, L. & Cowey, A. (Dept of Experimental Psychology, Oxford, England) **An apparatus for the automatic presentation of object discriminations to monkeys.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 605-609.—Describes a modification of the Gloster Saro universal vending machine which may aid in the reduction of testing errors in object discrimination experiments. The machine, which has space for up to 371 objects, moves the objects on trays by 2 electric motors, and the control circuits of these are adapted for external operation by relays and modular programming equipment. A series of simple object discriminations or a concurrent (serial) discrimination task can then be given by remote control. The objects are so treated that by touching either of them the animal completes a circuit, enabling the response to be recorded and appropriately reinforced. Learning in the apparatus appears to be about as efficient as in the Wisconsin General Test Apparatus.—*Journal abstract.*

6908. Domjan, Michael & Bowman, Thomas G. (U Texas, Austin) **Learned safety and the CS-US delay gradient in taste-aversion learning.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 409-423.—Decrements in taste-aversion learning produced by extensions of the interval between the conditioned stimulus (CS) flavor and the unconditioned stimulus (UCS) poisoning may be attributed to decay of the CS trace during long CS-UCS intervals. J. W. Kalat and P. Rozin (see PA, Vol 50:10890) alternatively proposed that such decrements occur because during extended CS-UCS intervals Ss learn that the CS is safe. They sought to show that trace decay is not responsible for the CS-UCS delay gradient by demonstrating that learning is disrupted even if the CS is reintroduced during extended CS-UCS intervals. The present 3 experiments with a total of 95 Charles River and 9 Wistar male rats showed that such a 2nd CS presentation during conditioning may (a) enhance subsequent intakes of the CS solution whether or not Ss are poisoned; and/or (b) facilitate aversion learning, the facilitation being greater the closer the 2nd CS exposure is to poisoning. Results question the adequacy of previous evidence for the contribution of learned safety to the CS-UCS delay gradient and suggest that some other process is also involved. (21 ref)—*Journal abstract.*

6909. Dunlap, William P.; Hughes, Larry F.; Dachowski, Lawrence & O'Brien, Thomas J. (Tulane U) **The temporal course of the frustration effect.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 484-497.—General activity of male albino rats subsequent to reward (R) and nonreward (N) was monitored at 5-sec intervals with a stabilimeter in the runway goal box. Activity of never-rewarded control Ss was also measured. In Exp I ( $n = 36$ ) it was found that the frustration effect (difference between N- and R-trial activities) disappeared after about 40 sec of goal box confinement. This disappearance of the frustration effect was due to activity increase on R trials rather than activity decrease on N trials as a function of time. Comparison of N-trial activity with control group activity indicated that frustration did not dissipate within 60 sec. Exp II ( $n = 72$ ) investigated activity following reward and nonreward as a function of reward magnitude. Evidence from these experiments suggests that the late R-trial activity increase results from frustration, possibly conditioned to apparatus cues on N trials. (19 ref)—*Journal abstract.*

6910. Dutch, J. & Brown, L. B. (Victoria U Wellington, New Zealand) **Adaptation to 23.5-hr food and water deprivation schedules in the rat and guinea pig.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 367-370.—Compared 20 male Sprague-Dawley rats and 20 male white guinea pigs on a 23.5-hr water-deprivation schedule and on a 23.5-hr food-deprivation schedule. Rats showed a satisfactory adjustment to both these schedules, while guinea pigs adjusted to the water-deprivation but not to the food-deprivation schedule.—*Journal abstract.*

6911. Dutch, J. (Victoria U Wellington, New Zealand) **Information and incentive characteristics of secondary reinforcement demonstrated in resistance to extinction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 445-446.—After many trials on continuous reinforcement (CRF) or fixed ratio (FR) schedules, male Sprague-Dawley rats were extinguished under 3 conditions. The magazine click was a weak but effective incentive for CRF Ss and a strong incentive for FR-10 Ss. With extended training the click also became an informative stimulus for FR-10 Ss, reducing resistance to extinction.—*Journal abstract.*

6912. Dutch, J. (Victoria U Wellington, New Zealand) **Schedules of secondary reinforcement and resistance to extinction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 443-444.—Following 5,000 trials on a fixed-ratio schedule of 5, 36 male Sprague-Dawley rats were extinguished with secondary reinforcement presented on several schedules. In general, responses made in extinction increased with higher schedules.—*Journal abstract.*

6913. Dysart, Judy; Marx, Melvin H.; McLean, Jim & Nelson, James A. (U Missouri) **Peak shift as a function of multiple schedules of reinforcement.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 463-470.—Studied N. Guttman's (1959) conclusion that an ordinarily positive stimulus can take on negative qualities when a frame of reference is provided by another stimulus and reinforcement schedule. 30 male White Carneaux pigeons were trained to respond to 2 stimuli on the wavelength continuum, 550 nm and 570



nm, each correlated with an independent schedule of reinforcement. The multiple schedule component in effect during the 550-nm stimulus (S1) was always a variable-interval 1-min. During the 570-nm stimulus (S2), the 2nd component of the schedule was either variable-interval 30-sec, or 1-, 2-, or 5-min, or extinction for different groups of birds. Generalization gradients were obtained after this training, with the following results: (a) response rate to S1 during training was related to the reinforcement frequency associated with S2 and (b) the distribution of responding during generalization testing was a function of the schedules of reinforcement used during training and the response rates they produced. Decreases in the relative frequency of reinforcement correlated with S2 resulted in increases in the distribution shift of responses away from S2 during generalization testing.—*Journal abstract.*

6914. Eaton, Newell K.; Crowell, Charles R. & Brown, Judson S. (U Oregon, Medical School) **Acquisition and extinction of runway performance under escape, avoidance, and partial-avoidance procedures.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 293-297.—The acquisition and extinction of locomotor responses of 60 female Sprague-Dawley albino rats in a straight alley were examined for groups trained under escape, partial-avoidance, and avoidance procedures. During acquisition, 1 group (escape) received a 0-sec delay between being dropped into the alley and the onset of shock; 2 groups (partial avoidance) had .5- and 1-sec delays; and 2 groups (avoidance) had delays of 2 and 4 sec. On the final day of acquisition, the partial-avoidance Ss displayed higher running speeds than either the escape- or avoidance-trained Ss. The 4-sec avoidance group was consistently slower than either the escape- or avoidance-trained Ss. The 4-sec avoidance group was consistently slower than all other groups. Speeds for all groups decreased during extinction, with rate of decline showing some relation to terminal acquisition level. Relative group performance levels proved to be consistent with a simple arithmetic model on the assumption that changes in running speeds affect the aversiveness of the situation by altering unconditioned stimulus (UCS) duration, conditioned stimulus duration, and effective UCS length.—*Journal abstract.*

6915. Eiserer, Leonard A. & Hoffman, Howard S. (Bryn Mawr Coll) **Acquisition of behavioral control by the auditory features of an imprinting object.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 275-277.—Presentations of a visible moving object immediately suppressed ongoing distress vocalization in 8 newly hatched Khaki Campbell ducklings, but presentations of only the auditory features of the object initially had no effect. However, as the Ss received more and more exposure to the visible moving object, the object's auditory features gradually acquired the ability to suppress distress calls themselves. These auditory features failed to develop suppressive properties in Ss which received prolonged exposure to those features but never saw the object in motion. The gradual acquisition of behavioral control by the auditory features of a moving object is taken to represent the essence of the imprinting process.—*Journal abstract.*

6916. Follick, Michael J. & Knutson, John F. (U Iowa) **Shock source and intensity: Variables in shock-induced fighting.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 477-480.—Compared AC, DC, and rectified AC shock at 4 shock intensities to assess differential influences on shock-induced fighting in 72 pairs of male hooded rats. At higher shock intensities, the data paralleled B. A. Campbell and F. A. Master-son's (1969) equal aversion function, but at lower shock intensities, differences among shock types with respect to frequencies of shock-induced fighting were obtained. Results suggest that, at lower shock intensities, shock type is a variable in shock-induced aggression research with rats. (24 ref)—*Journal abstract.*

6917. Gonzalez, Fernando A. (New England Regional Primate Research Ctr, Southborough, MA) **Effects of varying the percentage of key illuminations paired with food in a positive automaintenance procedure.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 483-489.—Exposed 3 male White Carneaux pigeons to a positive automaintenance procedure in which each trial began with a brief tone followed by the transillumination of a small central area of the response key for 10 sec. Key illumination was followed by food on 100, 50, 25, 12.5, and 0% of the trials. The effects depended on the dependent variable observed. The mean rate of responding during key illumination rapidly increased and then decreased slightly as the percentage of key illuminations paired with food increased. The number of key illuminations during which at least 1 response occurred increased as a negatively accelerating function of the percentage of key illuminations paired with food, and the mean latency to the 1st response during the key illuminations decreased as a negatively decelerating function of the percentage condition. The mean rate of sustained responding during key illumination was not systematically affected by changes in the percentage condition. (19 ref)—*Journal abstract.*

6918. Halliday, M. S. & Boakes, R. A. (U Sussex, Brighton, England) **Behavioral contrast without response-rate reduction.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 453-462.—Behavioral contrast was obtained in 2 experiments, which both employed a standard free-operant successive discrimination (a multiple variable-interval extinction schedule), without the occurrence of reductions of response rate in the extinction component. In Exp I, a group of 4 male homing pigeons was trained on a multiple schedule in which 1 stimulus was associated with a variable-interval schedule and the 2nd stimulus with response-independent reinforcement on a free variable-interval schedule. Though by the end of this training 3 Ss were responding very little to the 2nd stimulus, when this stimulus was associated with extinction all Ss showed a contrast effect. In Exp II, 8 male homing pigeons were trained extensively to respond to a single stimulus on a variable-interval schedule, before a 2nd stimulus associated with extinction was introduced. This 2nd stimulus was dissimilar to the initial stimulus and 5 Ss never responded in its presence. Nevertheless, all Ss showed a contrast effect and there was no evidence that the effect was smaller in errorless Ss or smaller than in a subsequent discrimination where all Ss made many

errors. Both experiments suggest that response reduction in one component of a multiple schedule is not a necessary condition for the occurrence of contrast. (15 ref)—*Journal abstract*.

6919. Hamilton, Thomas C.; Thompson, Jeffrey M. & Eisenstein, E. M. (U Texas, Austin) **Quantitative analysis of ciliary and contractile responses during habituation training in *Spirostomum ambiguum*.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 393-407.—Gave 10 min of repetitive stimulation (.1 Hz) to 40 *Spirostomum*. Retention stimuli were given at 2, 5, and 10 min after the end of the stimulation period. Several behavioral modifications were observed: (a) A change over time occurred in the probability with which contractions were elicited, such that Ss with a low initial probability of contraction facilitated (increased in contraction probability), while those with a high initial probability habituated. (b) "High" responders remained more responsive than the "low" responders throughout the 10-min stimulation period. (c) The magnitude of contraction decreased by 10% after S contracted to several consecutive stimuli. (d) The magnitude of avoidance reactions decreased over trials. Differences observed in the rate of change for several of the simultaneously occurring behaviors may indicate different underlying mechanisms. (30 ref)—*Journal abstract*.

6920. Hovancik, John R. & Capaldi, Elizabeth D. (Purdue U) **Predictive value of nonrewarded goal-box placements and resistance to extinction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 550.—Investigated whether M. J. Homzie and J. W. Rudy's (1971) finding, that reduction in reward predictive value of a goal-box placement cue results in less resistance to extinction trials preceded by the placement stimulus, was due to variation in the number of placement cue-reward pairings. In the present study with male albino rats, the number of placement pairings was held constant, and the previous results were replicated.—A. Olson.

6921. Jackson, Donald E. & Delprato, Dennis J. (Eastern Michigan U) **Aversive CSs suppress lever pressing for food but not the eating of free food.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 448-458.—In 2 experiments a total of 40 male albino rats received conditioned emotional response (CER) acquisition, half "on the baseline" (response lever present) and half "off the baseline." During initial CER extinction, Ss received (a) normal CER extinction (lever available), (b) free food during conditioned stimuli (CSs) only (no lever), (c) free food during non-CSs only (no lever), or (d) free food during both CS and non-CS periods (no lever). While normal extinction Ss were highly suppressed in the presence of the CS, all free-food groups readily ate but did not differ in eating latencies. On subsequent CER extinction trials on the baseline, those Ss which received free food during the CSs were no less suppressed than other Ss. Data offer no support for W. K. Estes's (1969) reciprocal inhibition explanation of CER and punishment, nor do they support a fear interpretation of CER.—*Journal abstract*.

6922. Jones, R. B. & Nowell, N. W. (U Hull, England) **Latency of approach to food in male mice: Effects of clean and soiled sawdust substrates.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 409-412.—Studied the effects of

clean and soiled sawdust substrates on the latency to food approach using 24 male albino mice. Results show that the use of home cage sawdust as a test substrate resulted in the lowest latency of approach to the food pellet, whereas significant increases were shown when clean sawdust or sawdust soiled by a foreign male conspecific were used, respectively, the clean sawdust affording an intermediate reading. Findings are discussed in terms of exploration and aversion.—*Journal abstract*.

6923. Katsev, Richard D. & Mills, Susan K. (Reed Coll) **Classical conditioning of skeletal avoidance responses in two strains of rats.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 355-360.—Reports that anticipatory skeletal responses can be directly elicited during classical aversive conditioning in the shuttlebox. Under the classical conditioned stimulus-unconditioned stimulus contingency 18 female albino Long-Evans rats shuttled at moderate rates, while 18 female albino Fischer, rats displayed high rates of anticipatory responding, even though the instrumental avoidance contingency was absent. The classical contingency was also exceedingly important in determining the differences between these strains, as well as their initial and terminal rates of anticipatory responding, when the avoidance contingency was present.—*Journal abstract*.

6924. King, Glen D. (Auburn U) **Wheel running in the rat induced by a fixed-time presentation of water.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 325-328.—4 female water-deprived Dublin SDD/DR albino rats were given free access to a running wheel and food in baseline sessions with water present for the 1st 375 sec of each daily 100-min session. In experimental sessions, water was presented intermittently according to a fixed-time 2-min schedule, which delivered water on a periodic basis independently of the S's behavior, resulting in 50 7.5-sec presentations of the water tube. Food consumption did not vary as a function of the experimental condition, whereas running increased for all Ss during the schedule conditions. Increases in running appeared to be the result of increases in both initiations of running and run-burst lengths.—*Journal abstract*.

6925. Klinger, Eric; Barta, Steven G. & Kemble, Ernest D. (U Minnesota, Morris) **Cyclic activity changes during extinction in rats: A potential model of depression.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 313-316.—40 male hooded rats' open-field activity immediately following extinction trials in a runway rose sharply from baseline, then dropped below baseline, and finally recovered. There was no discernible relationship between activity levels and runway performance during acquisition or extinction. Data confirm a theory that a sequence of invigoration, depression, and recovery of noninstrumental locomotor activity (an "incentive-disengagement cycle") may regularly accompany incentive loss, including experimental extinction.—*Journal abstract*.

6926. Lea, S. E. (U Cambridge, England) **The non-occurrence of a stimulus as a signal.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 616-621.—2 groups of 8 female hooded rats each were rewarded for pressing a panel following a varying number of barpresses; a signal following the barpress



indicated whether or not a panel press would be rewarded if made before the next barpress. For 1 group, the signal indicating reward was a flash of light; for the other it was the nonoccurrence of the flash (in the latter case the flash thus signaled nonreward). The 1st group learned to withhold panel presses except when reward was signaled, but the 2nd group did not. This result is related to the "feature positive effect" of H. Jenkins and R. Sainsbury (1970), in which pigeons failed to withhold pecks at a negative stimulus display when it was the same as the positive display except for the addition of a distinctive feature.—*Journal abstract.*

6927. Libby, Myrna E. & Church, Russell M. (Ohio State U) **Timing of avoidance responses by rats.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 513-517.—Trained 3 male albino Norway rats on an unsignaled shuttlebox-avoidance task under 3 response-shock intervals (10, 20, and 40 sec). Under all conditions, Ss developed excellent temporal gradients of avoidance, i.e., response rate was an increasing function of time since last response. Although the response rate at any given interval of time after the previous response was inversely related to the response-shock interval, there was an underlying similarity in the temporal gradients for the 3 intervals. In all cases, response rate relative to the maximum response rate was approximately equal to the proportion of the interval that had elapsed. It is suggested that rats in unsignaled avoidance estimate time from response completion, and that the units of the estimate are proportional parts of the response-shock interval.—*Journal abstract.*

6928. Linden, David R. (U Nebraska, Lincoln) **Transfer of approach responding between punishment, frustrative nonreward, and the combination of punishment and nonreward.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 498-510.—96 Nebraska rats were trained to make an approach response with either partial reward, intermittent punishment, or a combination of partial reward and intermittent punishment, and then were tested for persistence to extinction, punishment with reward, or punishment during extinction. Partial reward, alone or with punishment, produced greatest resistance to extinction, while intermittent punishment, alone or with partial reward, produced greatest persistence to punishment with reward. Transfer of persistence from partial reward to punishment with reward and intermittent punishment to extinction was also demonstrated. However, partial reward alone did not increase persistence to punishment during extinction, whereas intermittent punishment and partial reward combined with intermittent punishment did increase such persistence. Results are interpreted in A. Amsel's (see PA, Vol 33:7687 and 38:2017) conditioning-model theory by extending the hypothesized similarity of frustrative nonreward and punishment.—*Journal abstract.*

6929. Lowe, C. Fergus; Davey, Graham C. & Harzem, Peter. (U Wales, Cardiff) **Effects of reinforcement magnitude on interval and ratio schedules.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 553-560.—Conducted 3 experiments to study the leverpressing behavior of a total of 9 male albino rats on 3 schedules of reinforcement—fixed interval (FI), response-initiated fixed interval, and fixed ratio (FR). In

testing, concentration of the milk reinforcer was varied within each session. On all schedules, duration of the postreinforcement pause was an increasing function of the concentration of the preceding reinforcer. Results indicate that the running rate (response rate calculated by excluding the postreinforcement pauses) increased linearly as a function of the preceding magnitude of reinforcement on FI, showed slight increases for 2 of the 3 Ss on response-initiated fixed interval, and did not change systematically on FR. In all cases, the overall response rate either declined or showed no effect of concentration. The major effect of increasing the reinforcement magnitude was in determining the duration of the following postreinforcement pause, and changes in the response rate reflected this main effect. (25 ref)—*Journal abstract.*

6930. Lydersen, Tore & Crossman, E. K. (Utah State U) **Fixed-ratio discrimination: Effects of response-produced blackouts.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 547-551.—Studied A. J. Neuringer and B. A. Schneider's technique (see PA, Vol 43:12647) of using response produced blackouts to control the real time to complete ratios in a fixed ratio (FR) discrimination procedure. For 3 White King pigeons, reinforcement depended upon a left side-key response after execution of an FR-10 on the center key, and upon a right side-key response after FR-20. Each response during the FR produced a .5-sec blackout. The time between the 1st and last response in FR-10 was then equated with the time between the 1st and last response in FR-20 by increasing the blackout duration. The accuracy of side-key choice was disrupted, thereby suggesting that time, rather than number of responses, controlled choice responding. When the time between the 1st and last response was equated during both ratios, asymptotic accuracy was approximately equal to (for 2 birds) or somewhat higher than (1 bird) that obtained previously. The results of probes with intermediate FRs and blackouts suggests that control of side-key choice had transferred from the time between the first and last response in ratios to blackout duration.—*Journal abstract.*

6931. Mackay, Barry. (Memorial U Newfoundland, St John's, Canada) **Conditioned food aversion produced by toxicosis in Atlantic cod.** *Behavioral Biology*, 1974(Nov), Vol 12(3), 347-355.—In 2 experiments, the ability of codfish ( $N = 22$ ) to associate ingestion of a food with toxicosis was studied. After preliminary training to feed consistently, cod ate food which was followed by a single injection of lithium chloride. Preferences for "safe" nonconditioned food and the conditioned food were tested. Results of Exp I show a greater aversion to the conditioned food compared to nonconditioned food. Though consumption of nonconditioned food was depressed during initial testing, the consumption of conditioned food was significantly less for 6 of 8 test sessions. The drop in consumption of nonconditioned food was attributed in Exp II to incomplete recovery from the drug. An aversion to familiar food was initially weaker compared to novel food and extinguished more rapidly. (18 ref)—*Journal abstract.*

6932. Medin, Douglas L. (Rockefeller U, New York, NY) **Reward pretraining and discrimination learning**

set. *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 305-308.—8 pigtailed monkeys were trained on discrimination problems involving objects that had been previously paired with reward or nonreward, or objects not associated with any pretraining. In 2 separate studies, no differences on these various problem formats were observed, but performance improved considerably with practice. Results are contrary to the theories for learning set formation of K. W. Spence and of D. L. Medin.—*Journal abstract*.

6933. Meltzer, Donald & Niebuhr, Bruce R. (Southern Illinois U) **Additive and suppressive response summation with a chain schedule.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 519-524.—Conducted 2 experiments with a total of 12 male rats to investigate summation using a 2-segment (variable-interval variable interval) chain schedule. In Exp I, 3 Ss had either clicker, light, or clicker plus light as terminal-segment stimuli. All 3 responded at the highest rate when clicker plus light were present, thus showing additive summation. For 3 other Ss initial-segment stimuli were either clicker, light, or clicker plus light. 2 Ss responded at the lowest rate when clicker plus light were present, thus showing suppressive summation. In Exp II 3 Ss had either clicker, light, or neither clicker nor light as terminal-segment stimuli. None of these Ss showed reliable additive summation. 3 other Ss had clicker, light, or neither as the initial-segment stimulus, and all 3 showed suppressive summation. It is suggested that additive and suppressive summation both can be demonstrated with chain schedules, but stimulus parameters may be major variables in producing the effect.—*Journal abstract*.

6934. Miller, Ralph R.; Daniel, David & Berk, Alvin M. (Brooklyn Coll, City U New York) **Successive reversals of a discriminated preference for signaled tailshock.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 271-274.—3 male Sprague-Dawley rats received unmodifiable tailshock at random intervals in a shuttlebox. In a continuous-choice situation, Ss could choose between an auditory signal immediately preceding or immediately following the tailshock. Over repeated daily 3-hr sessions, each S acquired a spatial discrimination indicating a strong preference for the signal preceding tailshock. This preference continued undiminished through 2 successive reversals of the position associated with signaled shock. This demonstration precludes explanations of the preference-for-signaled-shock phenomenon based upon primary reinforcement value or acquired value of the signal, position preferences, and overt modification of the aversiveness of the reinforcer through such means as postural adjustments. An explanation of recent failures to obtain the preference-for-signaled-shock effect is offered. (15 ref)—*Journal abstract*.

6935. Morris, R. G. (U Durham, England) **Pavlovian conditioned inhibition of fear during shuttlebox avoidance behavior.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 424-447.—Conducted 3 experiments with a total of 48 female Lister hooded rats and 104 male and female RHA rats to explore the development and function of conditioned inhibition of fear during the acquisition and maintenance of shuttlebox avoidance behavior. The

development of inhibition to an exteroceptive feedback stimulus was a function of the number of successive avoidance responses to which S had been trained and of the duration of the intertrial interval, a parameter shown also to affect the rate of acquisition of avoidance learning. Master Ss who learned the instrumental avoidance response, and yoked Ss who did not, showed equivalent inhibitory fear conditioning in each experiment. Results of 1 experiment suggest that conditioned inhibition plays no important role in "protecting" fear conditioned to the discrete warning signal during avoidance maintenance. Data indicate that feedback stimuli develop their inhibitory properties by a Pavlovian process and that certain aspects of their function may, therefore, be readily understood within the framework of mediational 2-process learning theory. (53 ref)—*Journal abstract*.

6936. Mueller, Helmut C. (U North Carolina, Chapel Hill) **The development of prey recognition and predatory behaviour in the American kestrel *Falco sparverius*.** *Behaviour*, 1974, Vol 49(3-4), 313-324.—Exposed 9 hand-reared American kestrels (sparrow hawks) to a series of objects, stationary and moving, ranging from a tissue-paper ball, a crude tissue-paper mouse, stuffed and dead mice, and live mice. Only 1 bird responded consistently to paper models, and all attacked live mice, including 5 that had not responded to models or dead mice. 2 of 5 inexperienced birds attacked their 1st live mouse in less than 10 sec. 8 of 9 birds attacked their 1st mouse (live, dead, or stuffed) expertly and all 9 birds achieved consistent, expert performance in less than 6 trials. The inference is drawn that individual experience plays a minor role in the development of recognition, capturing, and killing of mice by kestrels. (German summary) (29 ref)—*Journal summary*.

6937. Patten, Richard L. & Latta, R. Michael. (Bernidji State Coll) **Frustration effect in discrimination: Effect of extended training.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 831-836.—Investigated A. Amsel and J. Ward's finding (see PA, Vol 39:9344) that the frustration effect (FE) in the 2nd runway of a double runway disappeared during prolonged discrimination training in the 1st runway. Using 16 male hooded rats and 16 male albino Wistar rats, conditions preventing the dissipation of frustration in the 1st runway were employed along with the usual dissipation-possible conditions. Measures of activity in the 1st goal box and locomotion in the 2nd runway indicate that FE did not decline over extended discrimination training when frustration-dissipation in the nonreward or reduced reward discriminandum was prevented. The results are interpreted as consistent with a frustration theory of discrimination performance.—*Journal abstract*.

6938. Poley, Wayne. (U Alberta, Edmonton, Canada) **Emotionality related to maternal cannibalism in BALB and C57BL mice.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 241-244.—12 BALB and 12 C57BL female inbred-strain mice were tested for emotional behavior. Half of the Ss had successfully raised their 1st litter to weaning, while the other half had eaten their 1st litter. Cannibalistic females of both strains were found to be more prone to auditory stress than controls. However, the relationship between emotional defecation and



cannibalism interacted with strain, suggesting an optimum level of arousal.—*Journal abstract.*

6939. Prokasy, William F. (U Utah) **Discriminated avoidance vs classical conditioning: A two-phase model analysis.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 257-261.—The acquisition of discriminated avoidance and classically conditioned leg flexions in 28 dogs and of discriminated avoidance leg flexion in 16 cats was examined via a 2-phase model of conditioning. Classically conditioned Ss uniformly required 2 operators during Phase 2, with the limit of the conditioned response (CR) operator being greater than that of the CR operator. Not all avoidance-trained Ss required 2 operators during Phase 2, but those who did also had a higher CR than CR operator limit. The CR operator limit was higher for avoidance than for classical training, while the change rate was greater for classical training. The avoidance behavior of cats paralleled that of the dogs. It is concluded that the data generally conform to views of E. R. Hilgard and D. G. Marquis (1940) and, more recently, of R. C. Bolles et al (1966), but were contrary to what would be expected from 2-factor theory. (21 ref) —*Journal abstract.*

6940. Russell, Alan & Glow, Peter H. (Flinders U, School of Social Sciences, Bedford Park, SA, Australia) **Some effects of short-term immediate prior exposure to light change on responding for light change.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 262-266.—Tested the prediction that short-term immediate prior exposure to one light change will reduce not only the reward value of that light change but also a light change in the opposite direction. The prediction arises from explanations of sensory reinforcement in terms of a single general need for stimulus change. Each 20-min LCBP (light-contingent barpressing) session was divided into halves (exposure and test periods, respectively). 80 female Wistar hooded rats received either light onset or light offset as the reinforcer in the 2 halves. The prediction was confirmed for the 1st 10 of 15 LCBP sessions, but thereafter exposure to one direction of light change had little or no effect on responding for light change in the other direction. Results are interpreted in terms of (a) an increase across sessions in the level of novelty and change the Ss were capable of accommodating and (b) separate reinforcing effects for different sensory changes. (25 ref)—*Journal abstract.*

6941. Shimp, Charles P. & Moffitt, Marilynne. (U Utah) **Short-term memory in the pigeon: Stimulus-response associations.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 507-512.—Conducted 2 experiments to develop a method of studying short-term memory for stimulus-response associations in 3 White Carneaux pigeons; both experiments used a study and a test phase. The study phase in Exp I consisted of 2 stimulus-response pairs presented successively. Each pair consisted of the illumination of a left or right key (the stimulus) and a peck on the lighted side key (the response). The study phase in Exp II consisted of 3 such pairs presented successively. A retention interval, varied between .1 and 4.0 sec, separated the study phase from the test phase. The test phase of a trial began with the illumination of the center key, by 1 of 2 (Exp I) or 3 (Exp II) colors. This color was

the same as the stimulus element of 1 of the pairs in the study phase. A reinforcer was presented if an S then emitted the response element of the indicated stimulus-response pair. Results provide information on the conditions that enable a pigeon to remember the responses most recently emitted in the presence of various stimuli. Results suggest an account of the maintenance of behavior that is temporally noncontiguous with reinforcement.—*Journal abstract.*

6942. Shumake, Stephen A. & Caudill, Charles J. (Denver Wildlife Research Ctr, CO) **Operant conditioning of licking in vampire bats, *Desmodus rotundus*.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 467-470.—4 adult female vampire bats were autoshaped to keypress to obtain .5-ml quantities of defibrinated cattle blood reinforcer. Keypressing required 7 g of force, and response rates were moderately low (500-600 presses/hr). Because of the force requirements, the apparatus was then modified so that licking from a tube would deliver the blood reinforcer. Ss were trained on variable-ratio, fixed-ratio, variable-interval, and fixed-interval schedules. Some of the schedules produced lick-response rates averaging 60/min. With conditioned suppression (light stimulus paired with brief electric footshock), Ss learned within 15 sessions to completely suppress operant licking while the light was on.—*Journal abstract.*

6943. Speelman, Roger D. & Gollub, Lewis R. (U Maryland) **Behavioral interactions in multiple variable-interval schedules.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 471-481.—Conducted 2 experiments to investigate the relationship between the magnitude of response rate changes and the frequency of reinforcement. In Exp I, 2 groups of 4 White Carneaux pigeons each were exposed to multiple schedules in which 1 component was always a variable-interval schedule with a mean interreinforcement interval of 30 or 180 sec. The other component was either an equal variable-interval schedule or extinction. Response rates in the unchanged component always increased when reinforcement was no longer scheduled in the changed component, and decreased in 7 of 8 cases when the variable-interval schedule was reintroduced. The percent rate change in the unchanged component was inversely related to the frequency of reinforcement and to the ongoing response rate in the unchanged component. Rate changes in the unchanged component were not consistently correlated with changes in any single feature of the relative-frequency interresponse-time distributions. In Exp II, the same Ss were exposed to variable-interval schedules and multiple variable-interval variable-interval schedules with equal mean interreinforcement intervals. Response rates were similar under both conditions. (18 ref)—*Journal abstract.*

6944. Starr, Bettie C. & Staddon, J. E. (Duke U) **Temporal control on periodic schedules: Signal properties of reinforcement and blackout.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 535-545.—Conducted 3 experiments with a total of 16 White Carneaux pigeons to investigate the effects on the pattern of keypecking of sequential probability of reinforcement, interval duration, and time to reinforcement opportunity. Ss were exposed to periodic food

reinforcements in which intervals ended with equal probability in either reinforcement or brief blackout. Results show that (a) at short absolute interval durations, time to reinforcement opportunity determined both postreinforcement and postblackout pause (time to 1st keypeck within an interval); (b) at long intervals, postblackout pause was consistently shorter than postreinforcement pause, even if both events signaled the same time to the next reinforcement opportunity (omission effect); and (c) when reinforcement and blackout signaled different times to the next reinforcement opportunity, within the same experiment, there was some evidence for interactions analogous to behavioral contrast. (26 ref)—*Journal abstract*.

6945. Stiers, Michael & Silberberg, Alan. (American U) **Lever-contact responses in rats: Automaintenance with and without a negative response-reinforcer dependency.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 497-506.—Conducted 2 experiments with a total of 14 male hooded rats to (a) replicate G. Peterson et al's (see PA, Vol 49:6305) demonstration of positively automaintained responding in rats; and (b) determine whether Ss would persist in responding during a negative automaintenance version of the G. Peterson et al paradigm. Results show that cuing-lever contacts on the positive automaintenance procedure occurred on a higher proportion of trials and at higher rates when contacts occurred than on the negative automaintenance procedure. Instances of the cuing lever's failure to support responding were more frequent on the negative than the positive automaintenance procedure. The topography and median contact duration of positively automaintained responding differed from negatively automaintained responding. These findings agree substantially with the automaintenance literature on pigeons, suggesting that similar processes may characterize automaintained responding in both pigeons and rats. (16 ref)—*Journal abstract*.

6946. Tarpy, Roger M. & Sawabini, Frederick L. (Bucknell U) **Reinforcement delay: A selective review of the last decade.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 984-997.—Presents a review of data and theories on delay of primary reinforcement in discrete trial instrumental learning. The major areas of investigation that are reviewed include delay of negative reinforcement; measurements of delay effects; cue utilization in acquisition and extinction; resistance to extinction as a function of constant delay, partial delay, and patterns of partial delay; contrast; and discrimination learning. (3 p ref)—*Journal abstract*.

6947. Tarte, Robert D. (U Nevada, Las Vegas) **Extinction of rats' barpressing in the presence of free food.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 289-292.—In 2 experiments, a total of 28 hungry male Wistar rats received 4 extinction sessions in the presence of free food. When the free food was removed for 8 subsequent extinction sessions, the Ss made significantly fewer responses than did control groups which received no intervening sessions. Results are contrary to those of S. Enkema et al (see PA, Vol 48:8694). From the results of groups of Ss which received 4 intervening sessions of free food only, empty chamber, or time in home cage, it

is concluded that the presence of free food caused the diminution in extinction responding.—*Journal abstract*.

6948. Thomas, David R. & Wheatley, Kimbal L. (U Colorado) **Effects of interdimensional training on stimulus generalization: An extension.** *Journal of Experimental Psychology*, 1974(Dec), Vol 103(6), 1080-1085.—32 domestic pigeons were trained to peck a 555-nm stimulus and then were tested for wavelength generalization. Ss then received either discrimination training with 555 nm (reinforced) and a white vertical line (extinguished), 1 of 2 types of nondifferential training with the above 2 stimuli, or continued single-stimulus training. A 2nd generalization test indicated that the intervening discrimination training had sharpened the gradients whereas the nondifferential training had flattened them. The 2 types of nondifferential training differed in reinforcement density yet their Test-2 gradients were similar, suggesting that generalization slope differences between nondifferential and other training procedures are not a consequence of variations in reinforcement density. The gradients of the single-stimulus group showed no change between the 2 tests, indicating that the aforementioned effects of discrimination and nondifferential training were not an artifact of the repeated testing procedure.—*Journal abstract*.

6949. Thomas, Timothy R. (Alma Coll) **Retention of environmental habituation in rats as a function of the environment during the retention interval.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 267-270.—The time course of 30 female Sprague-Dawley rats' habituation to familiar test environments was measured with a resident-intruder paradigm. A resident was permitted 0, 2, 5, 10, or 30 min of environmental adaptation prior to introduction of an intruder, and a dominance test was then conducted in which both Ss were allowed to compete for drops of water. The degree of dominance which the resident attained was a function of the duration of adaptation, reaching a maximum after 5 min. The retention of this habituation was investigated as a function of the type of retention environment and the duration of the retention interval. Retention intervals of 5 or 25 min in unfamiliar environments produced significant loss of habituation, while the same intervals in familiar environments did not produce habituation loss. The degree of similarity between habituated and retention environments did not appear to be an important variable affecting retention. When the retention interval was extended to 25 hrs in a familiar retention environment, no environmental habituation was retained.—*Journal abstract*.

6950. Tyler, Dolores M.; Waag, Wayne L. & Darnall, Joe W. (Texas Tech U) **Acquisition performance as a function of predeprivation running wheel activity.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 259-263.—Recorded predeprivation activity wheel scores for 16 albino rats over a 7-day period. Ss were then placed on 22-hr food deprivation, followed 3 days later by acquisition training procedures in the straight alley runway. During acquisition each S received 8 trials/day for 5 days. On the basis of their activity wheel scores, Ss were equally divided into high and low activity groups. Significant differences in runway performance were found, indicating that the high activity group



produced both quicker start latencies and faster running times.—*Journal abstract.*

6951. Uhl, Charles N. & Homer, Andrew L. (U Utah) **Omission training compared with yoked controls and extinction in multiple-schedule discrimination learning.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 317-324.—After 24 male albino rats were trained on a multiple schedule with variable interval 30-sec reinforcement in both stimulus components, omission, yoked, and extinction procedures were applied in response elimination (S-) while the variable interval continued in response acquisition (S+). In S-, omission training reduced response rate faster and to a lower terminal level than either response-independent yoked reinforcement or extinction, which were approximately equivalent. In S+, the extinction group exhibited elevated response rates representing behavioral contrast, while the omission and yoked groups showed reduced response rates. Results attest to the effectiveness of omission training as a response elimination method. They also contradict theories which posit reduction of response rate in S- to be necessary and sufficient for behavioral contrast. (24 ref)—*Journal abstract.*

6952. Uhl, Charles N. (U Utah) **Response elimination in rats with schedules of omission training, including yoked and response-independent reinforcement comparisons.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 511-531.—After a total of 48 male albino rats were trained to leverpress, response elimination began with factorial combinations of fixed vs variable and adjusting vs constant omission training schedules. A variable time (VT) response-independent reinforcement schedule followed response elimination to test the durability of response cessation. Exp I included groups whose reinforcement was yoked to that received by the omission schedule groups. Rate of response elimination was faster with an adjusting than a constant schedule and slightly faster with a variable than a fixed schedule. Shorter delay of reinforcement tended to increase rate of response elimination. In the subsequent VT durability test all groups displayed near-zero response rates. In Exp II adjusting fixed and variable omission schedules, including yoked groups, were compared with fixed time (FT) and VT reinforcement schedules. Response elimination was slower in the FT and VT groups, and they responded more in a subsequent VT durability test. It is concluded that differential reinforcement of other behavior fails to account for these omission training effects, and suggestions are made for an analysis based on the correlation between response and reinforcement rate. (32 ref)—*Journal abstract.*

6953. Vanderweele, Dennis A. (Occidental Coll) **The effects of taste adulteration, hypertonic, and hyperoncotic solutions on water ingestion in the gerbil.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 309-312.—68 Mongolian gerbils (*Meriones unguiculatus*) were examined for components of thirst in 2 laboratory experiments. The gerbil, reputed to be a desert-adapted rodent, was tested for its response to quinine adulterations of water, hypertonic solutions (1 M sodium chloride, NaCl), and hyperoncotic solutions (40% W/V polyethylene glycol in isotonic saline, PG). Both NaCl and PG were administered intraperitoneally. Ss accepted quinine when

it was the only solution available and food was ad lib, but preferred distilled water to quinine if both were available. Both PG and NaCl produced increased water intakes within the 1st 2 hrs postinjection. PG, however, produced the most reliable and largest increase in water consumption, illustrating that extracellular dehydration is probably a more significant thirst stimulus in gerbils.—*Journal abstract.*

6954. Waller, T. Gary. (U Waterloo, Ontario, Canada) **Constant and variable irrelevant cues during intra- and extradimensional transfer.** *Animal Learning & Behavior*, 1974(Nov), Vol 2(4), 298-304.—Exp I with 48 male Holtzman albino rats compared constant irrelevant (CI), variable-between irrelevant (VBI), and variable-within irrelevant (VWI) cues during an extradimensional (ED) shift discrimination. Performance was better for CI than for VBI and better for VBI than for VWI. Exp II with 48 additional Ss combined CI, VBI, and VWI cues with ED or intradimensional (ID) shifts. Irrelevant-cue conditions did not affect ID performance but did affect ED performance. The typical superiority of ID shifts compared to ED shifts was observed in the VWI condition but not in the CI condition. Implications for mediating-response (i.e., attention or observing-response) theories are indicated. (20 ref)—*Journal abstract.*

6955. Wasserman, Edward A. & Anderson, Patricia A. (U Iowa) **Differential autoshaping to common and distinctive elements of positive and negative discriminative stimuli.** *Journal of the Experimental Analysis of Behavior*, 1974(Nov), Vol 22(3), 491-496.—Conducted a study of 12 hungry homing pigeons to investigate Ss' learning of a discrimination between 2 successively presented compound visual stimuli using a 2-key autoshaping procedure. Common and distinctive stimulus elements were simultaneously presented on separate keys and either followed by food delivery (positive stimulus, S+), or not followed by food delivery (negative stimulus, S-). Results show that Ss acquired both between-trial and within-trial discriminations. On S+ trials, Ss pecked the distinctive stimulus more than the common stimulus; before responding ceased on S- trials, they pecked the common stimulus more than the distinctive one. Mastery of the within-display discrimination during S+ trials preceded mastery of the between-trials discrimination. These findings extend H. Jenkins and R. Sainsbury's (1969) analysis of discriminations based on a single distinguishing feature to discriminations in which common and distinctive elements are associated with both the positive and negative discriminative stimuli. The similarity of these findings to other effects found in autoshaping—approach to signals that forecast reinforcement and withdrawal from signals that forecast nonreinforcement—is also discussed. (21 ref)—*Journal abstract.*

6956. Weiss, Stanley J. & Van Ost, Susan L. (American U) **Response discriminative and reinforcement factors in stimulus control of performance on multiple and chained schedules of reinforcement.** *Learning & Motivation*, 1974(Nov), Vol 5(4), 459-472.—Discriminative control of the response rates of 2 groups of 4 male hooded rats each was equated by training them to cease barpressing in light-out no-tone (T + L) and to respond during tone and light. Multiple-

schedule Ss received food at the same rate for responding during tone or light as for nonresponding in T + L. For the chained-schedule Ss, responding in tone or light only produced T + L where food was received for nonresponding. In extinction tests multiple-schedule Ss emitted approximately twice the responses to tone-plus-light as to tone or light presented individually (additive summation). Ss trained on the chained schedule, in which the tone and light each controlled substantial response rates but were never paired with food, showed no summation when the tone and light were presented together. Results indicate that discriminative control of response rates and reinforcement differences between schedule components determine stimulus control. (15 ref)—*Journal abstract*.

### Social & Sexual Behavior

6957. Altmann, Jeanne. (U Chicago, Allee Lab of Animal Behavior) **Observational study of behavior: Sampling methods.** *Behaviour*, 1974, Vol 49(3-4), 227-267.—Discusses the advantages and limitations of 7 major behavioral sampling techniques used in social situations: ad lib, sociometric matrix completion, focal-animal, all occurrences of some behaviors, sequence, 1-zero, and instantaneous and scan. Information is also given on whether the different techniques sample events or states, on intrinsic and secondary bias, and on recommended uses. (German summary) (84 ref)—S. R. Goldstein.

6958. Bentley, David & Hoy, Ronald R. (U California, Berkeley) **The neurobiology of cricket song.** *Scientific American*, 1974(Aug), Vol 231(2), 34-44.—Describes the structure and development of the neuronal network mediating the generation of cricket songs. Evidence suggests that information specifying song patterns is genetically encoded and that environmental information is not utilized in the determination of song patterns. Preferences of female crickets for calling songs of males of their own species are based on genetically shared information. Studies of specific neural features under genetic control and the role of single genes are described. —P. Tolin.

6959. Denenberg, Victor H. (U Connecticut) **The communication of affect among rodents through mother-young interactions.** In L. Krames, P. Pliner & T. Alloway (Eds), *Nonverbal communication*. New York, NY: Plenum Press, 1974. x, 212 p. \$14.95.—Reviews research on mice and rats concerning infantile experiences and mother-young interactions. It is concluded that clear evidence exists of communication of affective behavior between the mother and her natural or foster offspring. Parallel research by experimenters on animal and human Ss is suggested as a means of understanding the influence of early experience and developmental processes. (23 ref)

6960. Dodd, W. P. & Jones, E. (U Birmingham, Computer Ctr, England) **A program for the analysis of intragroup interaction based on spatial dynamics.** *Behavior Research Methods & Instrumentation*, 1974(Sep), Vol 6(5), 497-503.—Describes the salient features of a computer program used in the analysis of the activity of a group of long-tail macaques, and adaptable to any enclosed group of Ss. The principal feature concerns the

time variation of the separation of selected dyads, although individual activity is also summarized.

6961. Drickamer, Lee C. (North Carolina Dept of Mental Health, Research Div, Raleigh) **A ten-year summary of reproductive data for free-ranging *Macaca mulatta*.** *Folia Primatologica*, 1974, Vol 21(1), 61-80.—Investigated reproduction and population of a provisioned colony of rhesus monkeys on an island off Puerto Rico. Population ranged from 106 to 364, with a mean annual increment of 13.4%. Bands consisted of 20-100 monkeys. 60-69% of mature females gave birth each year, and over 60% of births took place in May and June. Mean age of females first giving birth was 4 yrs. With increasing age a greater proportion of females gave birth, doing so earlier in the season than younger females. Dominance rank was positively correlated with the probability both of giving birth and, among India-born females, of producing an infant which survived 1 yr. There was a 1:1 sex ratio at birth, but after 4 yrs the mortality rate of males was greater than that of females: 26% of males and 60% of females survived 8 yrs. Higher levels of both aggression and group transfer, and occasionally a solitary way of life, were associated with the higher male mortality rate. It is suggested that 2-4 yr old males are the best animals to remove from a colony for laboratory or research purposes. (32 ref)—W. K. Redican.

6962. Dunbar, R. I. (U Bristol, England) **Observations on the ecology and social organization of the green monkey, *Cercopithecus sabaeus*, in Senegal.** *Primates*, 1974(Dec), Vol 15(4), 341-350.—Reports observations made of the green monkey in its natural habitat in West Africa during a 3-mo study. Green monkeys live in multimale groups averaging some 12 individuals. Information is given on home range size, use of habitat, daily activity patterns, diet, and birth seasonality. Social organization is discussed, and data are given on the relationships between age-sex classes, aggression, and leadership. Intergroup relations are discussed, and it is suggested that groups defend their ranges as territories. The ecology and social organization of green monkeys are compared with that of populations of *C. aethiops* studied in East Africa, and they are found to be similar. —*Journal abstract*.

6963. Goosen, G. (Primate Ctr TNO, Rijswijk, Netherlands) **Some causal factors in autogrooming behaviour of adult stump-tailed macaques (*Macaca arctoides*).** *Behaviour*, 1974, Vol 49(1-2), 111-129.—Conducted a series of experiments to test the hypothesis that staying close to another animal and reduction in locomotion are causal factors for autogrooming in stump-tailed monkeys. Individual females served as test Ss while individual males served as stimulus monkeys during 15-min observation periods, in which interanimal distance and contact could be controlled. The presence of the stimulus animal reduced the distance between monkeys, increased autogrooming, and decreased locomotion. The increment in autogrooming varied with distance and time spent close by. A hypothesis about the interaction of causal factors in autogrooming was formulated on the basis of the empirical findings. (German summary)—S. R. Goldstein.



6964. Guyot, Y. [Nonverbal exchanges among animals.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 778-786.—Discusses concepts of animal communication, with reference to the literature, and communication between animals and humans. (23 ref)
6965. Hanby, Jeannette P. & Brown, Conrad E. (MRC Unit on the Development & Integration of Behaviour, Cambridge, England) *The development of sociosexual behaviours in Japanese macaques Macaca fuscata. Behaviour*, 1974, Vol 49(1-2), 152-196.—Studied the development and adult expression of mounting, thrusting, presenting, and ejaculation in a troop of 100 Japanese macaques caught as a unit and released into a 2-acre corral at the Oregon Regional Primate Research Center. At 6 mo old, males oriented to a partner's buttocks and used a double-foot-clasp posture on most mounts. Mount frequency peaked at 4½ yrs but the most efficient and stable patterns were observed in males over 7 yrs old. Females showed early thrusting movements and low mounting frequencies, the latter occurring during play or fighting. Marked seasonal variations in sociosexual activities were also observed. These results are integrated with other research. It is concluded that the mother is the most important element for sociosexual behavior and that factors inhibiting acquisition of intromission delay the development of the young male's ability to distinguish correctly between postures, partners, and situations. (French summary) (64 ref)—S. R. Goldstein.
6966. Hayashi, Susumu & Kimura, Takeji. (U Tokyo, Coll of General Education, Japan) *Sex-attractant emitted by female mice. Physiology & Behavior*, 1974(Oct), Vol 13(4), 563-567.—4 experiments were conducted with a total of 96 male and 6 female ICR-JCL mice to examine the effects of sex-attractant on male mating behavior. Results show that sexually experienced males preferred the odor of estrous females to that of diestrous females, while sexually naive males showed no preference. Further preference tests using urine and several genital organs as odor sources showed that the vaginal smear or vaginal tissue from estrous females contained attractant(s) for experienced males. Smearing of vaginal discharge on the perigenital skin of diestrous females enhanced mounting behavior of experienced males. (20 ref)—*Journal abstract*.
6967. Hazlett, Brian A. & Estabrook, George F. (U Michigan) *Examination of agonistic behavior by character analysis: II. Hermit crabs. Behaviour*, 1974, Vol 49(1-2), 88-110.—Studied the temporal structure of the fighting behavior of hermit crabs (*Paguristes grayi* and *Pagurus marshi*) by the method of character analysis. For each character analysis run, the information content of each act, information in common between acts, and the percent uncertainty reduction about 1 act of knowledge of the previous act, was calculated. The amount of information transmitted was low at the beginning of a fight, higher in the middle, while at the end the absolute values decreased as the relative levels of uncertainty reduction increased. Fight initiators that eventually won altered their behavior more than eventual losers during all phases of aggressive interactions. Methodological and behavioral aspects of character analysis are discussed. (German summary) (16 ref)—S. R. Goldstein.
6968. Kummer, H.; Götz, W. & Angst, W. (Delta Regional Primate Research Ctr, Covington, LA) *Triadic differentiation: An inhibitory process protecting pair bonds in baboons. Behaviour*, 1974, Vol 49(1-2), 62-87.—Conducted enclosure experiments to test the hypothesis that social inhibition prevents male hamadryas baboons from encroaching on each other's females in triadic situations. Simultaneous presentation of an unfamiliar female to 2 males resulted in acquisition of the female by defeat or withdrawal of 1 male. However, no fights and no disruption of the pair bond occurred when an intruder male first watched a male-female troopmate interaction. Alternatively, powerful males from different troops attacked weaker males and took over their females. Possible mechanisms involved in "triadic differentiation" are discussed. (German summary) (17 ref)—S. R. Goldstein.
6969. Larsson, Knut et al. *Delayed onset of sexual activity of male rats subjected to pre- and postnatal malnutrition. Göteborg Psychological Reports*, 1974, Vol 4(2), 10 p.—Male Sprague-Dawley rats were subjected to pre- and postnatal undernutrition and their sexual and locomotive behavior was studied. The underfed Ss were slower in initiating sexual behavior than the intact ones, and some of the Ss never showed any mounting behavior during the period of testing. Occurrence of spermatozoa in a penile smear was delayed in the underfed Ss. The Ss subjected to restricted food consumption showed increased locomotive activity in an open field situation, but habituation occurred at a normal rate.—*Journal abstract*.
6970. LeBoeuf, Burney J. (U California, Santa Cruz) *The hectic life of the alpha bull: Elephant seal as fighter and lover. Psychology Today*, 1974(Oct), Vol 8(5), 104-108.—Describes the dominance struggles and mating practices of the elephant seals. The most successful bull mates with more females than any other bull. In rookeries containing 40 females the dominant bull may do all the copulating. Only the fittest bulls pass on their genes.
6971. Lubin, Y. D. (Smithsonian Tropical Research Inst, Balboa, Canal Zone) *Adaptive advantages and the evolution of colony formation in Cyrtophora (Araneae: Araneidae). Zoological Journal of the Linnean Society*, 1974(Jun), Vol 54(4), 321-339.—Observations of 5 species of spiders, particularly *C. moluccensis* which is the only 1 of the 5 to exhibit a communal level of sociality, suggest that low-level aggressive interactions during prey capture and during web repair and renewal are characteristic of this communal organization. The functions of these interactions as a spacing mechanism to ensure an adequate food supply and as an instance of reciprocal altruism among related colony members are examined. (27 ref)
6972. Phillips, R. R. (State University Coll New York, Oneonta) *The relationship between social behavior and the use of space in the benthic fish Chasmodes bosquianus lacepede (Teleostei, Blenniidae): III. The interaction between attraction/repulsion and prior social experience. Behaviour*, 1974, Vol 49(3-4), 205-226.—Attempted to determine whether male blennies (benthic fish) were attracted to or repulsed by neighboring prior residents. A test fish and stimulus fish were separated by

a transparent barrier and the test male's choice of a nesting enclosure near to, or out of sight of, the stimulus fish was recorded. In addition, enclosure choice was also evaluated with respect to previous dominant-subordinate experience in agonistic encounters. Dominant fish approached the stimulus fish but showed no preference for enclosure site. Subordinate fish exhibited no consistent approach-withdrawal tendency but did exhibit a preference for the far enclosure. It is suggested that male fish may be attracted to each other and still maintain a small territory around their nesting enclosure. (German summary) (22 ref)—S. R. Goldstein.

6973. Smith, James N. (U British Columbia, Vancouver, Canada) **The food searching behaviour of two European thrushes: II. The adaptiveness of the search patterns.** *Behaviour*, 1974, Vol 49(1-2), 1-61.—Studied the adaptiveness of temporal-spatial aspects of the food searching behavior of thrushes in an open meadow. Natural and artificial prey were presented in random, regular, and aggregated distributions at low and high densities. Prey capture was followed by a net change in turn patterning resulting in concentrated search in a prey-rich area. The distribution of the search path matched the distribution of artificial food population and capture rates were roughly proportional to differences in prey density. It is suggested that although predators can adjust their search to match the distribution and density of prey, the basic "unpredictability" of the environment sets limits on optimal search and capture behavior. (German summary) (66 ref)—S. R. Goldstein.

6974. Suomi, Stephen J. (U Wisconsin, Primate Lab, Madison) **Social interactions of monkeys reared in a nuclear family environment versus monkeys reared with mothers and peers.** *Primates*, 1974(Dec), Vol 15(4), 311-320.—4 male and 2 female 4-yr-old laboratory-born rhesus monkeys that had been reared in a nuclear family social environment consisting of mothers, fathers, siblings, peers, and other adults of both sexes were permitted to interact in various combinations with equal-aged monkeys that had been reared in an environment consisting of only mothers and peers. It was found that in most interaction sessions nuclear family Ss exhibited significantly higher levels of dominance and activity behaviors and significantly lower levels of submissive and passive behaviors than the mother-peer-reared Ss. These differences were not evident when Ss were tested within their own rearing groups. The significance of the results with respect to previous and future studies of social development in differential social environments is discussed. (23 ref)—*Journal abstract*.

6975. von Frisch, Karl. **Decoding the language of the bee.** *Science*, 1974(Aug), Vol 185(4152), 663-668.—Presents an English translation of the author's acceptance speech upon receiving the Nobel Prize for Physiology or Medicine at Stockholm, Sweden, December 12, 1973. The development of research in this area is outlined.

6976. Wechkin, Stanley & Breuer, Leslie F. (State University Coll New York, Brockport) **Effects of isolation on aggression in the Mongolian gerbil.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 415-421.—Conducted 2 experiments to determine the effects of prior isolation upon aggression when male

gerbils ( $N = 142$ ) were introduced into the cages of conspecifics. In Exp I isolation sharply increased aggression, and in Exp II olfaction was a critical stimulus dimension accounting for this finding. It is concluded that it was probably the odor of isolates rather than their behavior which was responsible.—*Journal abstract*.

6977. Willott, James F. & McDaniel, Jennifer. (U California, Davis) **Changes in the behavior of laboratory-reared rhesus monkeys following the threat of separation.** *Primates*, 1974(Dec), Vol 15(4), 321-326.—4 heterosexual pairs of 3-yr-old rhesus monkeys were either repeatedly separated from each other for 30-min or not separated. Prior to each separation, a transfer cage was displayed at the front of the cage to serve as a cue that the pair would be separated. After only a few trials, the Ss displayed disturbance, particularly in the form of stereotyped pacing prior to the separation. Practical considerations related to laboratory methodology, a theoretical discussion concerning the fear of separation in monkeys and man, and the need for attention to individual differences in response to separation are emphasized.—*Journal abstract*.

6978. Zayan, René C. (U Louvain, Ctr of Experimental & Comparative Psychology, Belgium) **The role of individual recognition in the stability of hierarchical relations in *Xiphophorus* (Pisces, Poeciliidae).** (Fren) *Behaviour*, 1974, Vol 49(3-4), 268-312.—Tested the hypothesis that individual recognition between fish of the genus *Xiphophorus* is a determinant of the stability of dominance-subordination relationships in male-male pairs. In Phase I of the experiment, 45 individual pairs were allowed to form dominance-subordination relationships during a 24-hr period. This resulted in the formation of 4 test groups; a dominant group subdivided into experimental and control groups, and a subordinate group similarly subdivided. In Phase 2, the original dominant-subordinate pairs were rematched in a new tank in the experimental condition, while dominant and subordinate stranger fish were matched in the control condition. Dominant fish from familiar pairs exhibited a greater tendency, by all measures, to engage in aggressive behavior than dominant fish in unfamiliar pairs. Conversely, submissive fish in unfamiliar pairs showed greater tendencies to engage in aggressive behavior than submissive fish in familiar pairs. Response measures were also more consistent between the 2 phases of the study for the familiar than the unfamiliar pairs, suggesting that individuals of a dominant-subordinate pair recognize each other. The function of individual recognition in regulating aggressive behavior and social hierarchy is discussed. (English summary) (78 ref)—S. R. Goldstein.

6979. Zippelius, Hanna M. (U Bonn, Zoological Inst, W Germany) **Ultrasonic sounds of nestling mice.** (Germ) *Behaviour*, 1974, Vol 49(3-4), 197-204.—Studied the physical characteristics and behavioral consequences of distress calls of the common vole (*Microtus arvalis*), of house mouse (*Mus musculus*), bank voles (*Clethrionomys* sp.), the yellow-necked field mouse (*Apodemus flavicollis*), and the harvest mouse (*Micromys minutus*). The call of *Micromys minutus* was audible to the human ear while the remaining species emitted calls in the ultrasonic range. Frequency, duration, and pattern of



calls were species-specific. Calls were emitted when the young were away from the nest or were exposed to aversive stimulation. Alarm calls engender searching and pup retrieval in the female, who will also respond, while lactating, to the calls of other species. (English summary) —S. R. Goldstein.

### Sensory Processes

6980. Ades, H. W.; Trahiotis, C.; Kokko-Cunningham, A. & Averbuch, A. (U Illinois) **Comparison of hearing thresholds and morphological changes in the chinchilla after exposure to 4 kHz tones.** *Acta Oto-Laryngologica*, 1974(Sep-Oct), Vol 78(3-4), 192-206.—Investigated behavioral, anatomical, and histochemical effects of acoustic overstimulation produced by a 4-kHz tone in 5 monaural chinchillas. In each S, high frequency hearing loss was produced which was related to locus and extent of hair cell loss. Masked audiograms were fairly consistent with those obtained in quiet and with the anatomical data on presence or absence of hair cells. Histochemical and electron microscope examination of selected portions of the cochlear partition revealed a series of changes in hair cells which may or may not influence their functional properties. (German summary) —Journal abstract.

6981. Blake, Randolph; Cool, Steven J. & Crawford, M. L. (U Texas, Graduate School of Biomedical Sciences, Sensory Sciences Ctr, Houston) **Visual resolution in the cat.** *Vision Research*, 1974(Nov), Vol 14(11), 1211-1217.—The ability of 3 adult cats to resolve spatial detail was determined behaviorally by conditioning the Ss to suppress a food-rewarded response in the presence of a grating pattern. By varying spatial frequency it was found that the acuity of the Ss approached 6 c/deg. Contrast thresholds were determined for a number of spatial frequencies covering a 5-octave range. The resulting contrast sensitivity function displayed the high- and low-frequency attenuation which characterizes the human function, although peak sensitivity for the Ss occurred at a lower spatial frequency. These behavioral results compare favorably with indirect estimates of the cat's resolving power, based on electrophysiology. (French, German, & Russian summaries) (27 ref) —Journal abstract.

6982. Campbell, Fergus W. & Maffei, Lamberto. (U Cambridge, England) **Contrast and spatial frequency.** *Scientific American*, 1974(Nov), Vol 231(5), 106-114.—Behavioral and electrophysiological indices suggest that the human visual system is maximally sensitive to low contrast with simple sine wave gratings that have a spatial frequency of about 3 cycles per degree. Maximal sensitivity for cats is approximately .3 cycles per degree. Differences in the visual worlds of humans and cats are suggested.

6983. Ellins, Stuart R. & Masterson, Fred A. (San Bernardino State Coll) **Brightness discrimination thresholds in the bat, *Eptesicus fuscus*.** *Brain, Behavior & Evolution*, 1974, Vol 9(4), 248-263.—Trained 4 echolocating bats in 2 experiments on a brightness discrimination task. It was found that the ability of these Ss to discriminate luminance differences at a fixed dim ambient illumination compared to that of rats and mice. The mean Weber ratio for 4 different standard-compari-

son stimulus sets was .85. When tested under varying conditions of ambient illumination, it was found that brightness discrimination sensitivity was optimal at about 10.44 lx. Sensitivity for distinct luminance differences remained good under conditions of very dim ambient illumination, indicating that echolocating bats may utilize visual cues in their night flight. (21 ref) —Journal abstract.

6984. Gerhardt, H. Carl. (U Missouri, Div of Biological Science) **The vocalization of some hybrid treefrogs: Acoustic and behavioral analyses.** *Behaviour*, 1974, Vol 49(1-2), 130-151.—Compared the physical characteristics of the vocalizations of 3 naturally occurring treefrog hybrids (*Hyla avivoca* × *H. chrysocelis*, *H. femoralis* × *H. chrysocelis*, and *H. cinerea* × *H. gratiosa*) with the vocalization of the parental species and tested the hybrids' auditory discriminative capacity. Sound spectrographs were made of tape-recorded vocalizations and discrimination was tested by the female's initial response to separate loudspeakers simultaneously broadcasting distinct male mating calls. Hybrid calls were composed of features intermediate with respect to the parents, features similar to the parents, and features which were unique. Nonhybrid females preferred conspecific to hybrid calls but responded to the latter when conspecific calls were unavailable. The relation of particular signal features to conspecific recognition is discussed. (French summary) (20 ref)—S. R. Goldstein.

6985. Jacobs, Gerald H. (U California, Santa Barbara) **Spectral sensitivity of the short wavelength mechanism in the squirrel monkey visual system.** *Vision Research*, 1974(Nov), Vol 14(11), 1271-1273.—Results of examining lateral geniculate nucleus cells in the squirrel monkey under chromatic and achromatic adaptation indicate that the spectral sensitivity of the short-wavelength mechanism in the squirrel monkey's visual system is not greatly different from that of other primates' visual systems.

6986. Janssen, Thomas A. & Swenson, Betty. (Virginia Polytechnic Inst & State U) **An ecological correlate of critical flicker-fusion frequencies for some *Anolis* lizards.** *Vision Research*, 1974(Oct), Vol 14(10), 965-970.—Determined the maximum critical flicker-fusion frequency (CFF) for 7 species of anoline lizards. The congeners showed a wide range of CFF values from 26 to 42 which correlated with the general level of insolation in each species' microhabitat—the brighter the habitat, the higher the CFF. (French, German, & Russian summaries) (18 ref)

6987. Kien, J. (Technischen Hochschule, Darmstadt, W Germany) **Sensory integration in the locust optomotor system: I. Behavioural analysis.** *Vision Research*, 1974(Nov), Vol 14(11), 1245-1254.—From study of the optomotor responses of female adult Australian plague locusts, a simple model is formulated for the sensory inputs to the directional neurons. The model provides a basis for an electrophysiological analysis of locust optomotor system. (French, German, & Russian summaries) (26 ref)

6988. Nuttall, A. L. (U Michigan, Medical School, Kresge Hearing Research Inst) **Comparison of cochlear microphonic potentials from albino and pigmented guinea pigs.** *Acta Oto-Laryngologica*, 1974(Sep-Oct), Vol

78(3-4), 187-191.—Recent behavioral tests would seem to indicate that auditory thresholds of albino guinea pigs are significantly lower than the thresholds of pigmented guinea pigs. In the present study, cochlear microphonic  $10\mu\text{V}$  isopotential (CM sensitivity) functions were recorded from the round windows of 6 pigmented and 6 albino anesthetized guinea pigs (*Cavia procellus*) as one measure of the inner ear performance. For 15 of 20 tested frequencies (between 70 and 7,000 Hz), the mean CM sensitivities of albino Ss were not significantly different from the mean CM sensitivities of pigmented Ss. The maximum cochlear potential magnitudes obtainable at 3 frequencies (100, 1,000, and 4,000 Hz) from the 2 groups were also statistically alike. It is concluded that there is no difference between the tested guinea pig strains with regard to the measured parameters of the cochlear microphonic potential. (German summary) (15 ref)—*Journal abstract*.

6989. Rose, L.; Yinon, U. & Belkin, M. (Hadassah U Hosp & Medical School, Jerusalem, Israel) **Myopia induced in cats deprived of distance vision during development.** *Vision Research*, 1974(Oct), Vol 14(10), 1029-1032.—Measured the refraction of the eyes of 12 street cats and of 11 caged cats by retinoscopy and measured the anteroposterior (axial) length of the eyeball by ultrasound. While 87.5% of eyes in street cats were hypermetropic, among cats caged for periods of 8.5-14.0 mo under conditions of near vision, 68.2% were myopic. The anteroposterior length of the eyeball was practically equal in both groups; it was also practically equal for myopic and hypermetropic eyes. The site of the refractive changes is discussed. (French, German, & Russian summaries) (20 ref)—*Journal abstract*.

6990. Thinus-Blanc, Catherine. (CNRS, Inst de Neurophysiologie et Psychophysiologie, Marseille, France) [The spatial behavior of the hamster in structured fields with curved boundaries.] (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 73-78.—Reports the 3rd of 3 studies (see PA, Vol 48:10944) concerning the hamster's knowledge of space as shown by behavior with respect to differences in the size and shape of corona-shaped fields. Experiments were designed to deal schematically with 2 components of behavior in space: (a) immediate and half-mechanical reactions to characteristics of the environment—angles, curves, projections, odor and warmth, among others; (b) functions entering into the knowledge of space, including memorization and synthesis of indices to the space comprehended. Results, analyzed in terms of contacts with concave and convex, internal and external boundaries varying in size and degree of curve are seen as interpretable only in terms, however implicit, of certain processes of a true comprehension of space. Ss showed a tendency to make more contacts with concave and external walls. The curvature factor appeared to predominate when the degree was pronounced, the external-internal factor when the curvature was slight. A sufficiently high degree of relationship between size and shape appeared necessary for an S to effect an integration of spatial indices. References for the 2 prior experiments are given.—E. E. Brown.

6991. von Fieandt, K.; Vuorinen, R. & Liljeqvist, Raija. (U Helsinki, Inst of Psychology, Experimental Research

Lab, Finland) [The behaviour of rats in choice situations with chromatic differences in the respective lighting systems.] (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 375-386.—Conducted a series of forced-choice experiments with 40 3-mo-old albino rats and 8 controls to study their choices between 2 chromatic alternatives while trying to avoid strong white light. Ss were tested in a T maze consisting of a starting chamber illuminated by strong white light and 2 chromatic light chambers. 4 groups of 10 Ss each were tested with 4 chromatic color combinations: Group 1, red and yellow; Group 2, red and green; Group 3, green and yellow; and Group 4, yellow and blue. Each S received about 30 tests. No stimulus or reward system was used; however, the starting chamber had to be converted into an open field in order to make the Ss react more promptly. Results indicate (a) a preference of Ss for the sectors of long light-waves, (b) a tendency to prefer turns to the right, and (c) the least pronounced preference for color in Group 2. (English & French summaries)—T. Fisher.

6992. Yager, Dean. (State U New York, State Coll of Optometry, New York) **Effects of chromatic adaptation on saturation discrimination in goldfish.** *Vision Research*, 1974(Nov), Vol 14(11), 1089-1094.—Investigated saturation discrimination functions in goldfish, following short-wave and long-wave adaptation. Results show that saturation discrimination was better at short wavelengths with short-wavelength adaptation and at long wavelengths with long-wavelength adaptation. Findings are accounted for by a model of color vision that predicts the appearance of the diluting light for different states of adaptation. The analysis also accounts for the results from a color-normal human male tested in the same procedure. (French, German, & Russian summaries)—*Journal abstract*.

## DEVELOPMENTAL PSYCHOLOGY

6993. Bakwin, Harry. **Erotic feelings in infants and young children.** *Medical Aspects of Human Sexuality*, 1974(Oct), Vol 8(10), 200-215.—Describes 3 cases of masturbation in female infants under 1 yr of age. Masturbation was accomplished by friction of the thighs, rubbing the body against an object, or manipulation. These behaviors were accompanied by grunting or flushing and progressed to what appeared to be an orgasm, followed by general relaxation, sweating, or a deep sleep. Masturbation in male infants culminating in orgasm is discussed, as well as various views on eroticism in young children and in primate infants.—*Journal abstract*.

6994. Berlin, Charles I.; Hughes, Larry F.; Lowe-Bell, Sena S. & Berlin, Harriet L. (South Louisiana State U, Medical Ctr, Kresge Hearing Research Lab) **Dichotic right ear advantage in children 5 to 13.** *Cortex*, 1973(Dec), Vol 9(4), 394-402.—Studied 3 aspects of right ear advantage in young children: (a) the magnitude of ear advantage as a function of age and sex, (b) the right ear advantage as a function of age and sex, (c) the nature of the phonetic confusions made by children of various ages, and (d) the total information processed by the children. Findings indicate that dichotically presented nonsense syllables, with strict acoustic and



phonetic control of the stimuli, generate a right ear advantage that is essentially fixed by 5 yrs of age. What seemed to change with age in the sample studied was total accuracy, phonetic content and nature of the errors, and something which might be called the "capacity" of the hypothesized left hemisphere speech processor.—R. Gunter.

6995. Bernbaum, Marcia; Goodnow, Jacqueline & Lehman, Elyse. (George Washington U) **Relationships among perceptual-motor tasks: Tracing and copying.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 731-735.—Asked 39 kindergartners, 16 1st graders, 38 2nd graders, 16 4th graders, and 20 undergraduates to copy, trace, or point to the beginning of a set of shapes. The aim was to determine the extent to which sequential behavior (starting points and stroke progressions) was consistent across tasks. With one notable exception, behavior was consistent. The exception was the extent to which children started at the left rather than the right, a behavior that was far less frequent when tracing or pointing to the beginning of a shape than when copying. Results point to the feasibility of using sequential analyses to explore questions of generality and transfer on graphic tasks.—*Journal abstract*.

6996. Braga, Joseph D. & Braga, Laurie L. **Child development and early childhood education.** Chicago, IL: Model Cities—Chicago Committee on Urban Opportunity, 1973. 121 p.—Presents a guide for parents and teachers for understanding the development and needs of children from birth to age 5. Topics include learning, physical and motor development, language acquisition, cognitive growth, socioemotional development, suggestions for choosing books for children, and resources for additional information about children.

6997. Caldwell, Bettye M. & Richmond, Julius B. **The impact of theories of child development.** In F. Rebusky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reviews theories and theoretical systems about child development. Discussion focuses on 3 systems said to have been major influences on American parents: behavioristic (or social learning), maturational, and psychoanalytic. Their impact on child care in the US is examined.

6998. Dansky, Jeffrey L. & Silverman, Irwin W. (Bowling Green State U) **Play: A general facilitator of associative fluency.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 104.—Tested the hypothesis that children's play can have a general facilitating effect on associative responding. Data from 36 middle-class preschool Ss show that those in the play condition produced significantly more standard and more nonstandard uses for a variety of materials than Ss in either imitation or intellectual task (i.e., verbal cues) conditions.

6999. Eckerman, Carol O.; Rheingold, Harriet L. & Helwig, Richard A. **A laboratory for developmental psychologists.** In F. Rebusky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Describes the floor plan, facilities, and other main features of the laboratories for the study of the behavior of young organisms at Chapel Hill, N.C. It is noted that the rooms are

adaptable to many experimental procedures and types of Ss. The information is intended to serve as a guide for investigators planning similar laboratories.

7000. Flament, F. (U Paris X—Nanterre, France) **[Practical intelligence and laterality: A genetic study of synergy and of hand preference in the neonate.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 681-684.—Summarizes a study of the structuring role of sensory-motor intelligence in hand coordination and in lateralization in 3-12 mo old Ss. The theoretical bases for the study were derived principally from A. Gesell and J. Piaget. Results point to a reorganization of certain manual responses as a function of 2 components of the structure of tasks, cognitive difficulty and perceptual motor properties.—Z. M. Cantwell.

7001. Formanek, Ruth. (Hofstra U) **When children ask about death.** *Elementary School Journal*, 1974(Nov), Vol 75(2), 92-97.—Discusses the child's reaction to the death of a person to whom he has become attached. The young child may interpret death as merely "sleep" from which the person can awaken. The child's reaction illustrates J. Piaget's "ego centrism," by which the youngster fails to comprehend the phenomenon of death in adult terms. In a study of about 300 children less than 7 yrs old, of whom 32% had adequate criteria for distinguishing between the animate and inanimate, only 6% had an adequate understanding of the state of death. Of children 7-9 yrs old, 20% had attained a mature concept of death as universal and final. It is suggested that an adult should deal with the child's view of death by exploring what that finality means to the child.—A. J. Ter Keurst.

7002. Frazier, James R. (North Carolina Memorial Hosp, Child Development Inst, Chapel Hill) **Overshooting of the FR requirement by children under delayed reinforcement.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 610.—Using 7-9 yr olds, an attempt was made to replicate the author's 1973 finding that adults can use the number of responses required in a short fixed ratio (FR) schedule as a discriminative stimulus (counting) for reward. The children overshoot the FR requirement under both delayed and no reinforcement. Attentional factors may account for discrepant results.

7003. Matsumura, Shigeharu. (Tokyo U of Education, Japan) **[Cognition of embedded figures and its relation to difficulties of training-figures in children.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 205-214.—Studied the effect of previous visual perception of embedded figures on later identification of similar figures. 4 age groups of 72 3-7 yr olds were asked in the pretest to identify simple embedded figures of 3 difficulty levels. The posttest performance of all groups showed significant improvement ( $p < .01$ ), and experimental groups given training performed significantly better than control groups ( $p < .01$ ). The older age groups showed more improvement in posttest performance than the younger groups ( $p < .01$ ). (English summary)—S. Choe.

7004. Offer, Daniel & Offer, Judith. (Michael Reese Hosp & Medical Ctr, Inst for Psychosomatic & Psychiatric Research & Training, Chicago, IL) **Normal adolescent males: The high school and college years.** *Journal of the American College Health Association*, 1974(Feb),

Vol 22(3), 209-215.—Conducted an 8-yr, longitudinal study of 73 normal, white, middle-class adolescent males beginning in freshman year of high school. Ss were tested psychologically and periodically evaluated by psychiatrists and teachers. Most demonstrated an ability to experience affects flexibly, to resolve conflicts, and to cope with anxiety, depression, shame, guilt, and anger. Peer relationships were good and adolescents related well to adults. Various psychosocial and behavioral variables evidenced over the study period are reported. Psychoanalytic thought concerning the "turmoil" theory of adolescence is reviewed. It is noted that the study of normal adolescent behavior has relevance to the treatment of adolescent patients. The psychiatric rating scale and the teacher rating scale are appended. (15 ref)—*A. de la Haba.*

7005. Porter, Carol S. (Indiana U, Medical Ctr, James Whitcomb Riley Hosp for Children) **Grade school children's perceptions of their internal body parts.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 384-391.—Used a projective technique, involving a body outline drawing, with 144 1st, 3rd, and 5th graders to determine their perceptions of internal bodily content. Results show that the children knew considerably more about their internal body parts than previous studies had indicated. The parts most frequently named were the heart, brain, and bones. The 3 body systems most frequently represented were the cardiovascular, gastrointestinal, and musculoskeletal. Boys named more parts than girls, contrary to findings of other studies.—*Journal abstract.*

7006. Pringle, Mia K. (National Children's Bureau, London, England) **Born illegitimate—born at risk.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 229-231.—Compares a national group of illegitimate children, born in 1958, with adopted and legitimate children born in the same week. By the age of 7 most of the illegitimately born were living in some kind of 2-parent situation but only 1 in 4 lived with both their natural parents. 3 times as many illegitimate as legitimate children were placed in day care centers and 5 times as many experienced separation from home. The illegitimate had slower development of intellectual abilities. Nearly twice as many illegitimate children had behavior and adjustment problems in school. (23 ref)—*W. G. Shipman.*

7007. Rebellsky, Freda & Dorman, Lynn (Eds.). (Boston U) **Child development and behavior.** (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.

7008. Tennes, Katherine; Emde, Robert; Kisley, Anthony & Metcalf, David. (U Colorado, Medical School, Denver) **The stimulus barrier in early infancy: An exploration of some formulations of John Benjamin.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 206-234.—Discusses Benjamin's stimulus barrier theory, which postulates that infants experience a vulnerable period (approximately between the ages of 3-8 wks) during which they have inadequate neural mechanisms to protect them from environmental stimuli. An investigation of the relationships between levels of irritability, responsivity to stimuli, and measures of neurophysiological maturation was performed using data collected from 12 healthy infants from birth to age 16 wks. Factors studied included fussiness, visual and auditory responsiv-

ity, smiling, Babkin and tonic-neck responses, and mothering ability. Some correlation was found between increased irritability and responsivity to external stimuli. It is suggested that the irritability of the vulnerable period is relieved by the infant's development of positive, pleasurable responses to stimuli, rather than by the development of a neurophysiological barrier to stimuli. It is concluded that the findings are generally consistent with Benjamin's hypothesized schedule of neuromaturation. (2 p ref)—*J. Kelly.*

7009. Webb, James T. & Mayers, Barbara S. (Ohio U) **Developmental aspects of temporal orientation in adolescents.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 504-507.—Investigated whether the development of temporal perspective is continuous or discontinuous and whether its development is sex-related with respect to age levels during adolescence. The Time Reference Inventory, which measures Future Extension, Past Extension, and Mean Age Focus minus Chronological Age, was administered to 20 males and 20 females from each of 5th, 8th, and 11th grade and college freshman groups. Results show that sex differences in temporal orientation were minimal at different adolescent age levels and were significant only in the 8th graders. The 2 younger groups projected their thoughts farther into the future than the 2 older groups, whereas the latter were much more concerned with the present. It was demonstrated that 5th graders had a more reliable grasp on the concept of future extension than has been evident in other studies. (22 ref)—*B. McLean.*

7010. Winett, Richard A.; Moffatt, Sarah A.; Fuchs, William L. & McFarland, Dennis. (U Kentucky) **A preschool screener test for child care and related evaluation research.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 110.—Presents reliability and validity data for the Preschool Screener which was developed to tap school-related skills in children 3-5.5 yrs of age. The 15 items on the test are described, and data from its administration to 124 children are presented which show that the screener is significantly related to more complex, standardized instruments (e.g., Peabody Picture Vocabulary Test) and to the child's age.

7011. Winnicott, D. W. **Playing and reality.** Harmondsworth, England: Penguin, 1971. xiv, 194 p.—Based on the idea that the transient and often neglected phase between subjective infancy and the more objective perceptions of childhood may be the source of later attitudes, dreaming, creativity, cultural experience, and the hidden rivalries between male and female elements are discussed in terms of their connection to the objects of childhood (e.g., teddy bears). Case histories are presented to illustrate these relationships.

7012. Wolff, Peter. (U Wisconsin, Madison) **Autonomous systems in human behavior and development.** *Human Development*, 1974, Vol 17(4), 281-291.—Argues that psychologists tend to regard the relationship between process and activity as arbitrary; a process is thought of as a unitary construct, independent of the behavior from which it is inferred. Research is reviewed which demonstrates that responses from different behavior systems (e.g., autonomic, reflex, voluntary motor, and verbal) to a given stimulus situation may be far from perfectly correlated with each other. These systems



appear to be autonomous, although they interact considerably in the ongoing activity of the organism. The phylogenetic and ontogenetic development of these systems is discussed. It is suggested that the evolutionary task of a species and the developmental task of an individual may consist in bringing these systems into mutual correspondence. (28 ref)—*Journal abstract*.

### Cognitive & Physical Development

7013. Ambron, Sueann R. & Irwin, D. Michelle. (Stanford U, School of Education) **Role taking and moral judgment in five- and seven-year-olds.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 102.—Studied 3 dimensions of role taking (perceptual, cognitive, and affective) and 2 dimensions of moral judgment (intentionality and restitution) in 34 kindergartners and 38 2nd graders. Results show that there was a significant correlation between moral judgment and role taking and indicate the need for precise definitions of these concepts and the use of common instruments if research in this area is to make any progress.

7014. Berman, Phyllis W. & Golab, Paul. (Florida State U) **Children's reconstructions of the horizontal, vertical, and oblique in the absence of a rectangular frame.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 117.—Tested the generality of the P. W. Berman et al findings (1974) which reported that children who were able to construct the horizontal and vertical had difficulty with the oblique when using a rectangular frame apparatus. Data from 24 nursery school children who produced horizontal, vertical, and oblique settings on a rod apparatus show that the comparative difficulty of the 3 settings were the same after observing the initial setting and after E spun the rod to rest at a random setting.

7015. Berzonsky, Michael D. (State University Coll New York, Cortland) **Component abilities of children's causal reasoning.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 111.—Determined, using scalogram analysis, whether there is a constant order in which 84 1st graders mastered skills (e.g., explaining remote and familiar objects) related to 4 component abilities of causal reasoning. Results support a predictable developmental progression in the ability to give naturalistic explanations of remote causal phenomena and suggest that experiences with familiar objects may be necessary before a child can appreciate the role of chance or coincidental factors.

7016. Blank, Marion & Rose, Susan A. (Rutgers State U, Medical School, Piscataway) **Some effects of testing methodology on children's cross-modal performance.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 120.—Tested 40 41-57 mo old children on the number of trials they took to learn the identical form-discrimination problem given in either visual or tactual modalities in either "held" (E gave S the reward) or "platform" (S himself picked up the reward) conditions. It appears that when testing methodology is equated in the 2 modalities, cross-modal transfer of a simple form discrimination is not asymmetrical, but rather is equivalent to the transfer from the tactual to the visual modality.

7017. Bradbury, Hinton. (U Winnipeg, Manitoba, Canada) **Consistency of children's inconsistent prefer-**

**ences attributable to novelty.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 79-86.—Extended the analysis of logical and antilogical influences on preference made by H. Bradbury and T. M. Nelson (see PA, Vol 51:10805) to a consideration of choices by 720 preschool, Grade 4, and Grade 8 children. Further conclusions are drawn concerning the dependence of intransitive preference on the collative variable of novelty in choice context. Using a repetition of a 3-pair exhaustive paired comparison task (i.e., xy, xz, yz, xy, xz, yz), it was shown that contextual influences conducive to the more prevalent of the 2 possible intransitive choices (i.e.,  $x > y$ ,  $x < z$ ,  $y > z$ ) were also responsible for the repetition of that especially inconsistent response shown most frequently by younger children. A high degree of consistency in inconsistent preference attributable to novelty was thus demonstrated.—*Journal abstract*.

7018. Bruner, Jerome S. (U Oxford, Inst of Experimental Psychology, England) **The organisation of early skilled action.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Examines the development of manipulatory skills during the first year of life. It is suggested that the use of the hands for solving problems is a key issue in the study of the evolution of the hominids and the emergence of man. (66 ref)

7019. Buss, Allan R. & Royce, Joseph R. (U Alberta, Ctr for Advanced Study in Theoretical Psychology, Edmonton, Canada) **Ontogenetic changes in cognitive structure from a multivariate perspective.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 87-101.—Outlines 3 prototype factor relation types—divergence, convergence, and parallelism. Additional growth properties considered include major vs minor factor relation types and cumulation vs noncumulation of factors over time. The comprehensive taxonomy of types of change in cognitive structure provide the framework for considering the ontogeny of higher order factors. Several organismic developmental properties and concepts are considered and are seen to be quite compatible with a multivariate developmental approach. It is concluded that the multivariate model is potentially quite powerful for addressing developmental questions. (2 p ref)—*Journal abstract*.

7020. Case, Robbie. (U California, Inst of Human Learning, Berkeley) **Structures and strictures: Some functional limitations on the course of cognitive growth.** *Cognitive Psychology*, 1974(Oct), Vol 6(4), 544-574.—Presents a functional theory of intellectual development that is used to generate specific performance models for Piagetian tasks involving the control of variables. On the basis of these models, it is concluded that intelligent, field independent 7- and 8-yr-olds should be able to acquire the control of variables scheme, even though they have not yet acquired either conservation of weight or the combinatorial system. Preliminary data from 52 6-8 yr olds are presented to support this conclusion. The data are discussed with regard to Piaget's formal theory of intellectual development and the functional limitations of development on learning. (43 ref)—*Journal abstract*.

7021. Collison, G. Omani. (U Ghana, Cape Coast) **Concept formation in a second language: A study of Ghanaian school children.** *Harvard Educational Review*, 1974(Aug), Vol 44(3), 441-457.—A colonial heritage has led many developing nations to use a European language as the primary means of instruction in elementary school. Diverse theories have been developed to account for the inferior attachment of bilinguals. Lansdown's approach to Vygotsky's theory of language and concept development was used as the basis for a comparison of the conceptual level Ghanaian children express in their native languages (Ga or Twi) and in their school language (English). 85 6th graders 12-14 yrs old, who had studied English for about 6 yrs, were trained to manipulate manually and then discuss specially chosen science materials. The untutored statements of the children were then scored and counted. It is concluded that these children functioned at higher conceptual levels in their vernacular than in English. Implications for educational policies in these countries are discussed.—C. M. Franks.

7022. Cummins, J. & Gulutsan, M. (St Patrick's Coll, Ottawa, Ontario, Canada) **Bilingual education and cognition.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 259-269.—Examined E. Peal and W. Lambert's (1962) findings that balanced bilinguals performed at a higher level both on verbal and nonverbal measures of intelligence. 61 6th-grade balanced bilinguals drawn from a French-English bilingual program were found to perform at a significantly higher level than 61 unilinguals, matched for sex, socioeconomic status, and age, on several measures of reasoning and divergent thinking. The performance of children in the bilingual program from French-speaking homes, English homes, and homes where both French and English were spoken was also examined. The French group, despite being most balanced in French and English linguistic skills, performed at a significantly lower level than the other 2 bilingual groups (but not the unilinguals) on a measure of verbal reasoning. (20 ref)—*Journal abstract*.

7023. Curcio, Frank; Robbins, Owen & Ela, Susan S. **The role of body parts and readiness in acquisition of number conservation.** In F. Rebsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed) New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Tested 167 preschoolers on 2 number conservation tasks, 1 for fingers and 1 for external objects. Results show that the 1st task was mastered before the 2nd. Ss then trained to generalize their number conservation ability with fingers to external objects were more successful than Ss lacking this ability who received counting or addition-subtraction training. A flaw in methodology and additional training efforts are discussed.

7024. Dolle, J.-M.; Bataillard, C. & Guyon, J. (U Paris XIII, France) **[Construction of space (volume) by the child: Contribution to the study of the genesis of perspective: I. The cube.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 578-589.—Attempted to discover the stages in the development of the concept of volumetric space in children, and to identify the characteristics of these stages. Ss were 56 youngsters 6-15 yrs old. They were shown a translucent box containing a number of cubes and were asked to describe

the visible and nonvisible aspects of the cubes and to draw the cubes. Analysis of responses indicated 3 stages in the development of the concept of "cube" in children: (a) absence of perspective, 6-9 yrs; (b) empirical perspective, 9-12 yrs; and (c) access to perspective (including 3 substages), over 12 yrs. Behavioral characteristics are detailed for each of the 3 stages, and sample drawings of cubes characteristic of each level are presented.—Z. M. Cantwell.

7025. Dore, John. (Bernard M. Baruch Coll, City U New York) **A pragmatic description of early language development.** *Journal of Psycholinguistic Research*, 1974(Oct), Vol 3(4), 343-350.—Describes a study of children's uses of single-word utterances and analyzes data in terms of "primitive speech acts."

7026. Glusker, Peter. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **The development of cognition and language: A new model of intelligence.** *Biological Psychology Bulletin*, 1972(Sep), Vol 2(1), 6-26.—Critically considers theories of cognitive processes and the development of cognitive function and language. A model is expounded based on the processes of discrimination, memory, and integration.

7027. Katada, Yayoi. (Morioka Junior Coll, Japan) **[The development of life-concept in children: I. The clues and the changes that children use for identifying life.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Mar), Vol 22(1), 31-39.—Asked 154 children 5-11 yrs old to give clues for their identification of living and nonliving objects. Responses were classified in terms of a set of objective criteria for identifying life used in modern biology. Results show that the clues such as movement, food and water intake, and morphological characteristics appeared at 5 yrs of age, and the clues of growth and development at 9 yrs of age. It is concluded that criteria such as movement, change, and function often lead younger children to confuse lifeless objects with living objects, and as they grow older these clues are replaced by more valid ones such as spontaneous movement, food intake, morphological characteristics, and development. (English summary)—S. Choe.

7028. Kavanaugh, James F. (National Inst of Child Health & Human Development, Growth & Development Program, Bethesda, MD) **Issues and needs in research.** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 258-262.—Suggests several areas of the language development that need more research. The major topics include language acquisition and language development in children, prevention of communicative disorders, and language of adolescence.

7029. Keen, Ernest. (Bucknell U) **A five-year-old changes her mind: A phenomenological analysis.** *Journal of Phenomenological Psychology*, 1973(Spring), Vol 3(2), 161-171.—Describes 3 stages in the behavior of a child in a real-life situation. Change of mind is explained in terms of a shift from anticipation to memory as the in terms of the meaning of present events. Differences between the ways in which the child and the adult characteristically structure their experience are related to the behavior of the child.

7030. Kodroff, Judith K. & Roberge, James J. (Temple U) **Developmental analysis of the conditional reasoning abilities of primary-grade children.** *Developmental Psy-*



*chology*, 1975(Jan), Vol 11(1), 21-28.—Administered a conditional reasoning test to 36 1st-3rd graders. Each child was tested individually with a concrete and a verbal presentation of the test items. After his response to each test item, the child was asked to explain the reason for his response. An analysis of variance of the number of correct judgments showed significant main effects for Grade Level, Mode of Presentation, and Principle, and a significant Grade Level  $\times$  Principle interaction. An examination of the explanations for correct judgments revealed that children's problem-solving behaviors varied according to both testing session and principle of inference. (20 ref)—*Journal abstract*.

7031. Kramer, Pamela E.; Koff, Elissa & Luria, Zella. **The development of competence in an exceptional language structure in older children and young adults.** In F. Rebsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Tested 8-20 yr old Ss in 2 studies for competence on an exception to a grammatical rule, the minimal distance principle. No age group tested was found with all Ss competent. Older groups had 2 competent Ss for every S who lacked competence. Stages found by C. Chomsky (see PA, Vol 44:18332) for Ss below 8 were duplicated above age 8. A 2-yr follow-up retest is also reported. (20 ref)

7032. Meacham, John A. (State U New York, Buffalo) **Patterns of memory abilities in two cultures.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 50-53.—Presents evidence that patterns of abilities, rather than absolute differences along a single dimension, are the best cross-cultural evidence for the effects of environment and culture upon memory development. An object and place recall task was administered to 96 5- and 7-yr-old Ss in the US and in a village in Guatemala. Actual vs verbal presentation of the objects and places to be remembered was varied. Place recall was better than object recall in the Guatemalan but not in the American children. Results suggest that environment and culture can contribute to the differential development of various mnemonic abilities. Soviet suggestions regarding the role of external mediators were also supported.—*Journal abstract*.

7033. Mervis, Carolyn B.; Catlin, Jack & Rosch, Eleanor. (Cornell U) **Development of the structure of color categories.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 54-60.—Previous investigators have argued that basic color categories are structured in terms of a universal focal area with varying boundaries. In the present study 2 developmental implications were investigated: (a) that foci for color categories become established and are stabilized earlier than boundaries and (b) that focal judgments are always more stable than boundary judgments. A total of 20 kindergartners, 40 3rd graders, and 40 adults served in 3 color designation experiments modeled after those of B. Berlin and P. Kay (1969). Means and variances of focal and boundary judgments for the 8 basic chromatic terms were determined for the 3 groups. In general, both hypotheses were supported.—*Journal abstract*.

7034. Mounoud, P. (U Genève, Ecole de Psychologie et des Sciences de l'Éducation, Switzerland) **[Physical conservation in the infant.]** (Fren) *Bulletin de Psycholo-*

*gie*, 1973-1974, Vol 27(13-14), 722-728.—Conducted an experiment to assess the applicability of Piagetian concepts which account for the invariants elaborated for the 6-10 yr old child by reference to the conduct of the 6-18 mo old infant. The conservation of weight was experimentally defined at the sensory-motor level as the infant's ability to reproduce a state of contraction of arm muscles adapted to the weight of an object, independent of transformations of the object's form. Ss were 30 infants 6-16 mo old. Each S performed 3 experimental tasks. Conclusions concerning conservation of weight and its genesis at the sensory-motor level were as follows: (a) Weights of objects translated themselves initially for the infant through a property of his original action. (b) Through resistance raised following the action of objects, the infant was able to objectify the property "weight" (or, to identify a given object by its weight). (c) Through a developing accommodation, this property (weight) was differentiated and integrated in a system of transformations and displacements. (d) The infant succeeded in correlating the proprioceptive indices relative to the weights of objects with relative visual indices, regulating the force of his prehension through visual indices and reproducing a definite contraction as a function of transformations of form of a given object.—Z. M. Cantwell.

7035. Newman, Murray A. (Southwest Educational Development Lab, Austin, TX) **A developmental investigation of the priority effect.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 106.—Studied the priority effect in free-recall learning from a developmental standpoint using proper controls for serial position bias. Data from 160 preschool, 2nd-grade, 6th-grade, and adult Ss, which show the absence of the priority effect at the preschool level and the presence of it at elementary and adult levels, strengthen the position that the priority effect reflects the use of a relatively sophisticated learning strategy and that it is not a product of serial position bias.

7036. Palermo, David S. & Molfese, Dennis L. **Language acquisition from age five onward.** In F. Rebsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reviews data on development in language from age 5 to adolescence. It is suggested that this period is relatively neglected, especially in phonological development. Research on phonology, syntax, and semantics is discussed in detail. (3 p ref)

7037. Papandropoulou, Ioanna & Sinclair, Hermine. (U Geneva, Switzerland) **What is a word? Experimental study of children's ideas on grammar.** *Human Development*, 1974, Vol 17(4), 241-258.—To test the hypothesis that "metalinguistic competence" (i.e., the capacity to think about language as an object of knowledge rather than just using it to express knowledge) develops along with general cognitive structuration as described by Piaget, the concept of "the word" was studied with 102 4-10 yr olds. Results show a slow development of this concept from an initial indifferenciation between words and things (at the level of metalinguistic thought and not at the level of know-how) towards the capacity of conceiving the word both as a meaningful constituent

element of larger units and as a unit which is itself built up from smaller elements.—*Journal abstract.*

7038. Peatling, John H. **Cognitive development in pupils in Grades four through twelve: The incidence of concrete and religious thinking.** *Character Potential*, 1974(Oct), Vol 7(1), 52-61.—Studied chronological age, mental age, and grade level in relation to the incidence of concrete and abstract religious thinking. 1,994 students from a 7% random sample of the National Association of Episcopal Schools, grades 4-12, were administered an untimed, criterion-referenced multiple-choice test entitled "Thinking About the Bible." Results generally support the findings of J. Piaget and R. Goldman. The statistical procedures employed demonstrated periods of growth and plateaus (or intermediate periods). In this American sample, abstract religious thinking appeared to begin in Grades 8 and 9, not becoming dominant until Grades 10-12 because of a plateau period. Results for all 3 factors were significant, but grade level gave the clearest indications of change. Implications for religious educators and for needed further research are discussed.—L. W. Barber.

7039. Pizzamiglio, Caterina L. & Pizzamiglio, Luigi. (U Aquila, Italy) **[Psychometric data of some tests of field dependence related to an Italian population of children four and a half to ten and a half years old.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 127-143.—Presents normative and developmental data by children's age, sex, and socio-economic status for visual, tactual, and acoustic embedded figures, and for the Sophistication of Body Scheme developed by Witkin and his coworkers to measure the development of cognitive styles and differentiation.

7040. Price-Williams, Douglass R. & Levine, Robert A. (U California, Los Angeles) **Left-right orientation among Hausa children: A methodological note.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 356-363.—Assessed methods of investigating left-right orientation. 53 Hausa (Nigerian) 4-11 yr olds were administered 2 sets of left-right orientation tests: (a) identification of left and right hands on the S's own body and on the body of an investigator facing him; and (b) subtraction from a group composed of a large middle doll with 2 smaller dolls each side of it, 1st the middle and the smaller on the right, and then the middle and the smaller on the left. In both cases the S was asked to identify which doll was the left and which was the right. Results of the "hands" test are presented in terms of the ages at which the left-right identification was attained, using the criterion of 75%, while results of the "dolls" test are reported in terms of the percentages correctly identifying left and right at different ages. The results and methods are compared with studies using a similar approach. Data show how minor variations in method of assessment can produce significant differences in results.—*Journal abstract.*

7041. Rattan, M. S. (Red Deer Coll, Alberta, Canada) **The role of language, manipulation and demonstration in the acquisition, retention, and transfer of conservation.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 217-225.—Conducted a study of 90 1st-grade nonconservers on tasks including 2-dimensional space,

number, substance, continuous quantity, weight, discontinuous quantity, area, and length. Data show that (a) the concept of conservation was not only acquired by nonconservers, but was also retained over 5-wk periods and was transferred to other conservation tasks; (b) direct activity and observation learning were equally effective for inducing cognitive changes leading to the criteria; and (c) a high degree of verbalization was significantly better than a low degree of verbalization under both direct activity and observation learning. (35 ref)—*Journal abstract.*

7042. Rimoldi, H. J. (Consejo Nacional de Investigaciones Cientificas y Tecnicas, Buenos Aires, Argentina) **[Language and thought processes.]** (Span) *Revista de Psicologia General y Aplicada*, 1974(May-Jun), Vol 29(128), 499-514.—Discusses changes that occur in thought processes during problem solving. With increasing age, children use different logical approaches to problems. (English summary) (25 ref)

7043. Roberts, Gail C. & Black, Kathryn N. **The effect of naming and object permanence on toy preferences.** In F. Reber & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—40 18-22 mo old children were presented with 8 named and 8 unnamed toys, one at a time. Timed preference choices between named and unnamed pairs were then obtained. Stage of object permanence also was assessed. It was found that if Ss had achieved the stage of object permanence where they could follow an object through a sequence of invisible displacements, they manipulated named toys more than unnamed toys. Results are interpreted as being consistent with formulations by both A. R. Luria and Piaget.

7044. Roll, Samuel & Irwin, Marc H. (U New Mexico) **[Manipulation of subject involvement and its effects on the conservation of number and liquid.]** (Span) *Revista Latinoamericana de Psicologia*, 1974, Vol 6(2), 157-160.—Tested 38 2nd graders for conservation of number and liquid. The 15 Ss in the experimental condition were given instructions designed to stimulate a high level of S involvement by making desirable stimuli (quarters and lemonade) even more desirable. The 23 control Ss were tested using conventional stimuli and instructions. The hypothesis that increased involvement would result in fewer conservation responses was confirmed for conservation of both number and liquid.—*English summary.*

7045. Ryan, Joanna. (U Cambridge, Unit for Research on the Medical Applications of Psychology, England) **Early language development: Towards a communicational analysis.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.

7046. Sameroff, Arnold J. **Can conditioned responses be established in the newborn infant: 1971?** In F. Reber & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Evaluates 2 hypotheses to explain difficulties in conditioning the newborn: (a) The newborn is unable to respond to stimulus change. (b) The newborn is able to respond to a general change but not to specific differences in stimulation. A theory is proposed of a progression in cognitive structure based on



differentiation and hierarchic integration of schemas. (3 p ref)

7047. Shannon, Lael. (Rutgers State U, New Brunswick) **Development of time perspective in three cultural groups: A cultural difference or an expectancy interpretation.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 114-115.—Administered T. J. Cottle and J. Peck's Lines Test to 120 10-12 and 14-17 yr old Anglo-American, Indian-American, and Mexican-American boys. Significant main effects for cultural group, age level, and Group  $\times$  Age interactions support an expectancy interpretation of time perspective.

7048. Shatz, Marilyn & Gelman, Rochel. (U Pennsylvania) **The development of communication skills: Modifications in the speech of young children as a function of listener.** *Monographs of the Society for Research in Child Development*, 1973, Vol 38(5, Serial No 152), 1-37.—Reports 3 studies of the 4-yr-old's ability to adjust to a listener. In Study 1 16 Ss were asked to tell first an adult and then a 2-yr-old about a toy. 8 Ss who had 2-yr-old siblings were run on the toy task once in an adult-sibling session, and once in an adult-nonsibling session. Tapes were made of spontaneous conversations between the Ss and their mothers. Ss adjusted their speech production to their listeners: speech to 2-yr-olds contained more short, simple utterances and more attentional utterances. All children adjusted their speech whether or not they had younger siblings. In Study 2, tapes of uncontrolled conversations of 5 4-yr-olds each talking to a 2-yr-old and an adult revealed speech adjustments like those of Study 1. In Study 3 tapes of 8 4-yr-olds talking to peers were compared with the conversations with their mothers taped in Study 1. Analyses of the peer-directed vs adult-directed speech showed that, with respect to utterance length, the use of various constructions, and attentional utterances, peers were treated like adults. These results, combined with those of Study 1, indicate that the 4-yr-old adjusts his speech to the capacities of different aged listeners. Results are discussed with regard to previous work on the preschooler's communication, and the implications of speech-listener interaction for the process of language acquisition are considered.—A. Barclay.

7049. Smothergill, Daniel W.; Hughes, Fergus P.; Timmons, Stephen A. & Hutko, Paul. (Syracuse U) **Spatial visualizing in children.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 4-13.—Conducted 4 experiments on visualization of space in 108 2nd and 11th graders and undergraduates, 102 4-5, 6-7, and 9-10 yr olds, and 30 kindergartners and 3rd and 6th graders. Exp 1 used a localization task, and evidence was found that both children and adults spontaneously visualize their unseen hand when it is touched. In the remaining 3 experiments, S was required to manipulate spatial information mentally. Results show that (a) preelementary school children did not carry out such manipulations and responded instead to the topological properties of the problem; (b) elementary school children were increasingly more skilled at mental manipulation with age; and (c) the ability to manipulate spatial images correlated with performance on a test of spatial visualization, particularly in older elementary school children. (22 ref)—*Journal abstract*.

7050. Stacey, John T. & Ross, Bruce M. (Catholic U of America, Boys Town Ctr for the Study of Youth Development) **Schema and schema in children's memory of their own drawings.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 37-41.—4 groups of 78 6-yr-old children made drawings of 6 themes. One month later new drawings of the same themes were made by the same Ss under 4 conditions: free drawing, memory of the 1st drawing, making a copy of the 1st drawing, making a drawing that appeared different from the 1st one. A week later the Ss were tested for recognition of their own drawings and identification as to when they had been drawn. Recognition of 2nd-session drawings was about equal among the 4 conditions, even though order identification varied significantly and adults found perceptual matches of drawings from the same S much easier with the copy than with the different condition. Results support Piaget's scheme-schema memory distinction in that a basic operative scheme lies behind alternative figural representations.—*Journal abstract*.

7051. Sticht, Thomas G. et al. (Human Resources Research Organization, Alexandria, VA) **Auditing and reading: A developmental model.** *US AFHRL Technical Report*, 1974(Jul), No 74-36, 116 p.—Presents a classification scheme for the development of reading and auditing skills which considers basic adaptive processes, "linguaging" precursors, and linguaging processes. 4 hypotheses consistent with the model are derived: (a) the ability to comprehend language by auditing will surpass ability to comprehend language by reading during early school years until reading skill is acquired—following which time the ability to comprehend by auditing and reading will become equal; (b) performance on measures of ability to comprehend language by auditing will be predictive of performance on measures of ability to comprehend language by reading after reading skill is acquired; (c) performance on measures of reading rate and auditing rate will be comparable after reading decoding skill has been developed; and (d) training in comprehending by auditing will transfer to reading after reading skill is acquired. An extensive literature review of empirical data bearing on the model supports the hypotheses. It is concluded that reading is based upon the same concepts and linguaging competencies as used in auditing and that reading skills can be improved through training in linguaging using "oracy" skills. (16 p ref)—*Journal abstract*.

7052. Tanaka, Toshiaki. (Fukuoka U of Education, Japan) **[Relevant dimension and subproblem analysis in discrimination shift learning.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 237-241.—Simultaneous discrimination learning tasks, consisting of forms and equally divided areas as relevant dimensions, and circles and rectangles divided into 4 or 6 equal areas as stimulus values, were given to 3 groups of Ss: 67 kindergartners, 55 2nd graders, and 37 adults. Results indicate that reversal and nonreversal shift learning depended on relevant dimensions in such a way that younger children tended to be inefficient when equally divided areas were used as relevant dimensions.—S. Choe.

7053. Tanner, J. M. **The regulation of human growth.** In F. Rebelsky & L. Dormon (Eds), *Child development*

and behavior. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Develops a model to explain the regulation of "catch-up" or compensatory growth that occurs after a child's normal growth pattern is temporarily interrupted. Examples are presented of how the model represents known events of catch-up growth, of chronic starvation, and of precocious puberty. (24 ref)

7054. Terman, Lewis M. & Merrill, Maude E. **Sample items from Stanford-Binet Scale.** In F. Rebelsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Presents and briefly discusses sample items from different age levels of the Stanford-Binet.

7055. Trehub, Sandra E. (U Toronto, Ontario, Canada) **The problem of state in infant speech discrimination studies.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 116.—Argues that, because of the complexity of the relation between stimulus and state, and present gaps in understanding the questionable similarities between infant and adult states, current state selection procedures in infant speech discrimination studies seem unwarranted, or at least premature. Researchers should be required to justify their use of state criteria in future studies.

7056. Wall, Carol. (U California, Davis) **Predication: A study of its development.** The Hague, Netherlands: Mouton, 1974. 258 p.—Based on the protocols of 7 male and 7 female 18–30 mo old children, the development and elaboration of predication in children's speech is examined. Methodological considerations, analysis and categorization of utterances, the complexity of predication, and the importance of situational factors in predication are discussed. (42 ref)

7057. Webb, Roger A. (Johns Hopkins U) **Concrete and formal operations in very bright 6- to 11-year-olds.** *Human Development*, 1974, Vol 17(4), 292–300.—18 male and 7 female 6–11 yr olds with IQs in excess of 160 were given 3 Piagetian tests of advanced concrete operations and 2 tests of formal operations. All children passed all concrete operations problems, but only 4 of the oldest boys passed the formal operations tasks. Findings support the reality of Piaget's stage structures but suggest that the speed with which tasks within a stage are mastered (*horizontal decalage*) is a function of intelligence in the psychometric sense. (21 ref)—*Journal abstract*.

7058. Wishner, Julius; Peastrel, August L. & Humphrey, Janet. (U Pennsylvania) **A developmental study of efficiency in differential galvanic skin response conditioning.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 14–20.—Hypothesized that in a differential galvanic-skin-response (GSR) conditioning situation, differential sets would be increasingly effective with increasing age in producing differential rates of conditioning. The GSRs of 193 children from kindergarten and Grades 1, 2, 4, and 6 were conditioned under inhibiting and facilitating sets. Support for the hypothesis was found in a significant Grade  $\times$  Set interaction. Ability to verbalize the positive-conditioned-stimulus-unconditioned-stimulus relation was also a function of the Grade  $\times$  Set interaction, as well as the interaction of Grade  $\times$  Successful vs Unsuccessful Conditioning. Data also indicate the importance of cognitive factors in

classical conditioning paradigms with human Ss. (20 ref)—*Journal abstract*.

7059. Wulbert, Margaret; Inglis, Susan; Kriegsmann, Elinor & Mills, Barbara. (U Washington, Child Development & Mental Retardation Ctr) **Language delay and associated mother-child interactions.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 61–70.—Assessed the home environments and mother-child interactions of a language-delayed group and a matched control group of normal preschool children using the Caldwell Inventory of Home Stimulation (CIHS). 20 language-delayed children were defined by a discrepancy between their Stanford-Binet, language-based, IQ score and their Leiter, non-language-based, IQ score, and by a language evaluation. Children in both groups were distributed across all socioeconomic strata. The language-delayed group had significantly lower scores in 5 of the 6 subcategories of the CIHS. Greatest differences were found in the involvement and responsiveness of the mother and in her avoidance of restriction and punishment. Low CIHS scores were found through the socioeconomic strata, indicating that language delay had a stronger influence on mother-child relationships than did socioeconomic factors. (39 ref)—*Journal abstract*.

### Emotional & Personality Development

7060. Blackburn, Joe M. & Summerlin, Curtis G. (Mississippi State U) **Need occurrence in disadvantaged and non-disadvantaged.** *Adolescence*, 1974(Sum), Vol 9(34), 233–236.—Administered the Depoyster Need Assessment Scale to 300 disadvantaged (D) and 300 nondisadvantaged (ND) students in Grades 6, 9, and 12. D students experienced higher occurrence of physiological needs than ND students in each grade level. ND students experienced higher occurrence of love and belonging needs at all grade levels, and higher esteem needs at Grade 12 level. In general, D students functioned at a lower level on the need hierarchy. Grade 12 students scored at a higher level than the other students, both D and ND, indicating that student perception of needs is a function of development as well as of their socioeconomic status.—A. Krichev.

7061. Dranoff, Steven M. **Masturbation and the male adolescent.** *Adolescence*, 1974(Sum), Vol 9(34), 169–176.—Reviews literature on adolescent male masturbation. The need for a healthier outlook on masturbation to promote normal growth and development is stressed. It is concluded that (a) masturbation is not harmful in moderation, (b) some control must be exerted by parents and others to avoid overindulgence, and (c) the adolescent must be assured that his experimentation is normal. (26 ref)—A. Krichev.

7062. Dubos, René **Of human diversity.** Worcester, MA: Clark University Press, 1974. 64 p. \$5.95.—Discusses the idea of individualism as it applies to nations and individual men and to the development of personality. Factors that shape human life—genetic codes of species, environmental variations, and the power of adaptation—are also examined. (43 ref)

7063. Jordan, Lawrence A. (Graduate School & University Ctr, City U New York) **Use of canonical analysis in Copley's "A five-year longitudinal study of the validity of creativity tests."** *Developmental Psychol-*



gy, 1975(Jan), Vol 11(1), 1-3.—A reanalysis of A. J. Cropley's (see PA, Vol 48:996) data contradicts his conclusion that creativity tests have long-range predictive validity. The canonical correlations between a criterion set of 4 indices of high school achievement in art, drama, literature, and music, and a predictor set of 6 scores on creativity tests taken 5 yrs earlier—.52 for boys and .46 for girls—are not significantly different from zero. A novel procedure used by Cropley to assess the "predictive validity" of the creativity tests, which involves dichotomizing scores on canonical variates, is shown to be questionable.—*Journal abstract*.

7064. Kagan, Jerome. **Attention and psychological change in the young child.** In F. Reber & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Proposes that better understanding of the forces that control selectivity and duration of attention should provide insights into the nature of psychological growth. Studies are reported in which infants were tested on familiar and discrepant stimuli. Fixation time is viewed as the most significant variable.

7065. Kagan, Spencer & Carlson, Helena. (U California, Riverside) **Development of adaptive assertiveness in Mexican and United States children.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 71-78.—Used a novel behavioral task, the assertiveness pull scale, and unobtrusive measures (e.g., number of questions asked of E) to assess the development of assertiveness of 154 boys and girls of 3 age groups (5-6, 7-9 and 10-12 yrs) in 4 populations. Urban middle-class Anglo-American children were significantly more assertive than semirural poor Anglo-American and Mexican-American children, who did not differ from each other but who were both significantly more assertive than rural poor Mexican children. Assertiveness increased with age for all groups, but at a slower rate among rural Mexican than among US children. No significant effects due to sex were observed. Results parallel population and age findings of previous studies of competitiveness. (26 ref)—*Journal abstract*.

7066. Kessen, William. **Research in the psychological development of infants: An overview.** In F. Reber & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Sets forth a series of propositions about babies and studies of babies and discusses them in terms of recent research and speculation. It is concluded that there has been a shift in viewpoint from considering the child as a simple passive receptacle to viewing him as a complex organism interacting with his environment. (32 ref)

7067. Lisi, Filippa. (U Messina, Inst di Psicologia, Italy) **[Sophistication of body scheme from 6 to 10 years: Reliability indices.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 209-214.—Longitudinal data on 120 Ss tested 8 times from the 1st to the 5th grade suggest that each child establishes his own body scheme at a relatively early age, a tendency that persists with time in spite of its interaction with environmental factors.

7068. McClelland, David. **Excerpts from Personality.** In F. Reber & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf,

1973. xxiii, 470 p.—Examines theoretical reasons why early childhood experiences should be relatively more important than later ones in personality development. The factors of primacy, underdeveloped symbolic processes, repetition of experience in early childhood, and the conditions for forgetting are discussed. It is concluded that data on learning and forgetting processes support the psychoanalytic position.

7069. McGeorge, Colin. (U Canterbury, Christchurch, New Zealand) **Susceptibility to faking of the Defining Issues Test of moral development.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 108.—Administered the Defining Issues Test (DIT) by J. Rest et al to 146 student teachers on 2 occasions with instructions to either fake bad, fake good, or record their own views (standard instructions). Results support the general theory of a sequence of cognitive stages of moral judgment in which Ss recognize stages they have passed through as immature and can respond appropriately when asked to fake low, while stages higher than the S's own are unattainable thus preventing faking upwards.

7070. Meddock, Terry D.; Parsons, Joseph A. & Hill, Kennedy T. **Effects of an adult's presence and praise of young children's performance.** In F. Reber & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Studied 32 4-yr-old children of each sex to examine the separate effects of praise from an adult and the presence of that adult on preschool children's performance rate change at a simple motor task. Ss were divided into 4 experimental groups. The major finding was that performance increased under both adult praise and adult presence, with the effects being additive. (29 ref)

7071. Murphy, Lois B. (George Washington U) **Some mutual contributions of psychoanalysis and child development.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 99-123.—Discusses the contributions of psychoanalysis and child development to the understanding of ego development. Topics surveyed include physiological factors related to ego functioning, separation and deprivation, plasticity and integration of ego functions, and the role of frustration and aggression in development. It is suggested that the application of concepts drawn from psychoanalysis and child development to the analysis of detailed records of child behavior could lead to a more comprehensive theory of motivation. It is concluded that collaboration between the disciplines of psychoanalysis and child development can not only validate and deepen the approaches of both, but also can lead to new concepts for understanding personality development. (4½ p ref)—*J. Kelly*.

7072. Nesselroade, John R. & Baltes, Paul B. (Pennsylvania State U) **Adolescent personality development and historical change: 1970-1972.** *Monographs of the Society for Research in Child Development*, 1974, Vol 39(1, Serial No 154), 1-79.—Reports a longitudinal study of ontogenetic and sociocultural change in adolescent personality and ability development. In addition the study attempted to make a contribution to design considerations in developmental research. 1,800 male and female Ss, from 32 public school systems having a total of approximately 20,000 students, were measured in 1970, 1971, and 1972. A random sample of retest control

Ss was measured in 1972 only. All Ss were measured with Cattell's High School Personality Questionnaire, Jackson's Personality Research Form, and Thurstones' Primary Mental Abilities Test. Findings indicate that developmental change was more influenced by the cultural moment than by age sequences: e.g., adolescents as a whole were shown to decrease in superego strength, social-emotional anxiety, and achievement during the 1970-1972 period independent of their age level, and to increase in independence during the same period. The outcome further shows that traditional, simple cross-sectional or longitudinal designs are not adequate for describing developmental change and that, in addition to the use of sequential strategies, it is mandatory to employ various control groups. Findings are interpreted as suggesting the need for a rapprochement between ontogenetic and evolutionary models of development on the one hand, and psychological and cultural-historical ones on the other.—A. Barclay.

7073. Polsby, Gail K. **Unmarried parenthood: Potential for growth.** *Adolescence*, 1974(Sum), Vol 9(34), 273-284.—Unmarried pregnancy and motherhood is a life crisis that offers a girl the option of growing, reworking old problems, and assuming greater maturity, particularly when given help in making her own decisions during the pregnancy and early motherhood. Her apathy must be met by insuring that her physical needs are cared for and that her feelings are listened to.

7074. Shotter, John. (U Nottingham, England) **The development of personal powers.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Presents a conceptual framework within which the praxis of child development can be examined (i.e., what is empirically involved in the child's growth as an individual personality) and discusses criteria involved in distinguishing persons from things and recognizing human action. (47 ref)

7075. Simon, A. & Ward, L. O. (University Coll Swansea, Wales) **Variables influencing the sources, frequency and intensity of worry in secondary school pupils.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 391-396.—Studied the main sources of worry among 672 12-14 yr old grammar and secondary school students, the extent to which the type of worry and its frequency vary with age, and the influence of the type of school attended—grammar or secondary modern—on the frequency and intensity of the type of worry. Data from 2 specially developed worry list questionnaires show that there was a general decrease with age in the frequency and intensity of worry. There were no significant worry differences between grammar and modern pupils, except for the 12-yr-old group, where the secondary modern pupils had more frequent and intense worries than the grammar Ss. The most frequent sources of worry were the family, social relationships, and school, and the least frequent were animals, economic concerns, and personal health concerns. Grammar school pupils reported significantly more frequent and intense economic and school worries, while secondary modern pupils reported significantly more imagination and health worries. The only significant difference between the sexes was the tendency for

grammar school girls to worry more frequently and intensely than grammar school boys.—*Journal abstract*.

7076. Sroufe, L. Alan & Wunsch, Jane P. **The development of laughter in the first year of life.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed) New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reports a series of observational studies based on more than 150 infants. Clear evidence of age changes in both amount of laughter and the nature of stimuli eliciting laughter was found. Results are discussed in terms of cognitive growth, the psychoanalytical notion of ambivalence, the role of stimulus context, and a possible adaptive function of laughter. (25 ref)

7077. Takahashi, Keiko. (Kunitachi Coll of Music, Tokyo, Japan) **[Development of dependency in female adolescents: Analysis of self-reported histories.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Mar), Vol 22(1), 1-10.—Asked 18 female college students, identified by questionnaire in a previous study as having a stable need for dependency, to write interpersonal histories with a semistructured frame of references. Analysis indicated that there are 2 types of dependency; family and nonfamily type; that the family type is passive and negative in social behavior, whereas the nonfamily type is active and positive; and that since dependency structures appear in early childhood, and are consistent during the developmental history, early prediction may be possible. (English summary)—S. Choe.

7078. Takahashi, Keiko. (National U of Music, Tachikawa, Japan) **[Dependent behavior in female adolescent twins.]** (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 242-247.—Compared the dependence (defined as affectional tie) of 77 twins of high school age with that of nontwins. Ss rated parents, siblings, and friends in terms of affectional tie and personal respect, and described the psychological significance of these people to them. Results indicate that the need for dependence of twins was not different from that of nontwins; however, twins depended less on friends of the same sex and more on the other half of the pair. This supports the position that adolescent twins tend to have difficulties in the normal process of socialization because they depend too much on each other.—S. Choe.

7079. Watson, John S. **Smiling, cooing, and "The Game."** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Discusses an hypothesis termed "The Game" to explain the onset of vigorous smiling and cooing in early infancy. The important role of the face stimulus in this process is analyzed. Some competing hypotheses also are discussed. (27 ref)

### Social Behavior & Family Relations

7080. Ainsworth, Mary D.; Bell, Silvia M. & Stayton, Donelda F. (Johns Hopkins U) **Infant-mother attachment and social development: Socialization as a product of reciprocal responsiveness to signals.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.



7081. Atkinson, Brian R. & Ogston, Donald G. (Providence Child Development Ctr, Calgary, Alberta, Canada) **The effect of father absence on male children in the home and school.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 213-221.—Compared the behavior of 70 male children, ages 8-16 yrs, from homes without fathers to 30 children from intact homes. The children's behavior in the home, school, and away from these institutions was assessed by means of questionnaires completed by their mothers, teachers, and the children themselves. Differences in moral values, as reflected in the reasons for and the severity of punishment, and responsibilities in and away from the home were reported by the children and their mothers. Teachers reported no difference in academic and extracurricular participation and performance. It is concluded that, in general, the behavior of children with and without fathers in not appreciably different except that parental disciplinary behavior may vary as a function of the father's absence.—*Journal abstract.*

7082. Bearison, David J. & Cassel, Thomas Z. (Graduate School & University Ctr, City U New York) **Cognitive decentration and social codes: Communicative effectiveness in young children from differing family contexts.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 29-36.—Studied the effectiveness of verbal communication among 37 6-yr-old middle-class children from families exemplifying a person or a position social code. Families' social code was the percentage of person-oriented regulatory appeal statements made by mothers in response to questions concerning how they would attempt to regulate their children's behavior. On each of 5 measures comparing the form and content of messages to sighted and blindfolded listeners, children from person-oriented families showed greater evidence of accommodating their communication to the listener's perspective than did children from position-oriented families. (15 ref)—*Journal abstract.*

7083. Bell, Silvia M. & Ainsworth, Mary D. **Infant crying and maternal responsiveness.** In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Conducted a naturalistic, longitudinal study of 26 infant-mother pairs. Results show that consistency and promptness of maternal response is associated with decline in frequency and duration of infant crying. Findings are discussed in an evolutionary context and with reference to the popular belief that responding to a baby's cries "spoils" him. (22 ref)

7084. Bernal, Judith. (U Cambridge, Unit for Research on the Medical Applications of Psychology, England) **Attachment: Some problems and possibilities.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Discusses (a) the problems inherent in defining and measuring the affectional bonds between the child and those to whom he becomes attached and (b) how the child's relationship with his mother or chief attachment figure differs from his relationship with others. (32 ref)

7085. Blurton Jones, N. G. (U London, Inst of Child Health, England) **Ethology and early socialisation.** In M. P. Richards (Ed), *The integration of a child into a social*

*world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Discusses various features of the ethological method and illustrates the possible roles of evolutionary theory in the study of the development of social behavior. (6 p ref)

7086. Clarke-Stewart, K. Alison. (Yale U) **Interactions between mothers and their young children: Characteristics and consequences.** *Monographs of the Society for Research in Child Development*, 1973, Vol 38(6-7, Serial No 153), 1-108.—Carried out observations for 9 mo of 36 mothers and their firstborn children (9-18 mo old) as they interacted at home, spontaneously and in structured situations. Ratings, frequencies, and measures of contingencies between sequential maternal and child behaviors were based on these observations. A highly significant linear relation was found between children's competence and mothers' care. Within this broad pattern, specific relations were found between children's language development and mothers' verbal stimulation, children's skill with objects and mothers' presentation of play materials, and mothers' and children's positive social behavior toward each other. Maternal restrictiveness was related to the child's involvement with objects, maternal effectiveness to the child's irritability, and maternal cuddling to the child's physical attachment to the mother. Nonlinear relations between the mother's behavior and the quality of the child's attachment were demonstrated. Children's development was related differentially to maternal stimulation, responsiveness, and appropriateness; children's activities to the mothers' preferred mode of interaction. The analysis of relations over time suggested that stimulating, responsive maternal behavior influenced the child's intellectual development, whereas in social relations the child's behavior influenced the mother.—*A. Barclay.*

7087. Cook, Harold & Stingle, Sandra. (Teachers Coll, Columbia U) **Cooperative behavior in children.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 918-933.—Reviews the theoretical and empirical literature relevant to cooperative behavior in children. An attempt is made to delineate theoretical viewpoints, to discuss definitions of behavior, and to summarize research in terms of age, sex, cultural and subcultural variables, and social interaction. In addition, some factors influencing the learning of cooperation are discussed. Methodological problems and inconsistent findings that limit generalizations concerning the processes thought to relate to cooperative behavior in children are described. (3 p ref)—*Journal abstract.*

7088. Coon, Robert C.; Lane, Irving M. & Lichtman, Robert J. (Louisiana State U) **Sufficiency of reward and allocation behavior: A developmental study.** *Human Development*, 1974, Vol 17(4), 301-313.—Investigated the effect of sufficiency of reward on the principles that elementary school children employ to allocate rewards to others. Ss were a total of 322 children in kindergarten and Grades 2, 4, and 6. Results indicate that children allocated a smaller proportion of reward to the winner of a game when they were distributing insufficient and oversufficient quantities of reward than when they were distributing a sufficient quantity of reward. Kindergarten children allocated significantly less reward to the winner than did older children. These results are interpreted as

indicating that no single norm can explain the reward allocation behavior of children. However, the results reaffirm past findings that the norm of equity is the most important determinant of children's reward allocation behavior.—*Journal abstract.*

7089. Coxon, A. P. (U Edinburgh, Scotland) **The mapping of family-composition preferences: A scaling analysis.** *Social Science Research*, 1974(Sep), Vol 3(3), 191-210.—When Ss express preference for one type of family composition over another, their judgments can be referred to the "objective" characteristics defining the stimuli. Pair comparison preference data from L. Delbeke's 1968 study were "internally" analyzed according to the J. D. Carroll and J. J. Chang 1970 "points of view" vector model and C. H. Coombs's 1964 unfolding (distance) model. The distance model was found to give a better fit. The models were also compared within the framework of Carroll's preference mapping hierarchy of models, referring the data to the "objective" structure underlying the stimuli. The simple distance model was found to give a much better fit. (27 ref)—*Journal abstract.*

7090. Deutsch, Francine. (Pennsylvania State U) **Effects of sex of subject and story character on preschoolers' perceptions of affective responses and intrapersonal behavior in story sequences.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 112-113.—Data from 32 white, lower-class 3- and 4-yr-old children indicate that the ability to accurately identify affective and intrapersonal responses did not significantly vary with Ss' age or sex, or with sex of story character, and that children performed better on same-sex rather than on cross-sex stories regardless of age and mental ability.

7091. Dien, Dora S. (California State U, Hayward) **Parental Machiavellianism and children's cheating in Japan.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 259-270.—Attempted to clarify the developmental aspect of Machiavellianism. Ss were 67 males and 60 females (mean age = 59 mo) in a Japanese nursery-kindergarten. Nachamie's Mach scale and a parental child-training questionnaire were administered to 218 mothers and 3 mo later to 109 of their husbands. 2 types of social learning were considered, one involving "competition," the other "transmission" via modeling and teaching. Cheating in a game was a measure of the preschooler's manipulative tendency. The 2 hypotheses tested were confirmed: (a) First and only children of low-Mach mothers from simple nuclear families cheated more than those of high-Mach mothers. (b) First and only children of parents who were both high Machs in simple nuclear families showed the least amount of cheating.—*Journal abstract.*

7092. Eckerman, Carol O.; Whatley, Judith L. & Kutz, Stuart L. (Duke U) **Growth of social play with peers during the second year of life.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 42-49.—To assess the social interactions between unfamiliar peers, 30 pairs of home-reared children—10 pairs in each of 3 age groups, 10-12, 16-18, and 22-24 mo of age—were observed in an unfamiliar play setting with their mothers. The children contacted their mothers little and interacted more with toys and one another, exchanging smiles, vocalizations, and toys and imitating each other's actions. Contact with

the same objects and involvement in the peer's activities with objects increased reliably with age. By 2 yrs of age, social play exceeded solitary play and the social partner was most often the peer. Results suggest that children generalize to peers' behaviors developed through child-adult interaction, but that peers provide stimulation differing from that of familiar adults.—*Journal abstract.*

7093. Edwards, J. B. **A developmental study of the acquisition of some moral concepts in children aged 7 to 15.** *Educational Research*, 1974(Feb), Vol 16(2), 83-93.—Studied 350 boys and 350 girls 7-15 yrs old to determine how they define certain moral concepts, how they decide whether an action was right or wrong, and what influenced their acquisition of moral concepts. Older girls were better in defining moral concepts. There were no significant social class differences. Mothers had had greater influence than peer groups in children's acquiring moral concepts, and teachers had also contributed significantly during early school years. (31 ref)—J. B. Francis.

7094. Etaugh, Claire & Brown, Barry. (Bradley U) **Perceiving the causes of success and failure of male and female performers.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 103.—Studied sex differences in attributions of ability, effort, task difficulty, or luck given by 320 Ss at 4 grade levels (5th, 8th, and 11th grades and college) to the outcomes of 4 masculine tasks performed by either male or female actors. Results suggest that differential perceptions of male and female performances appear to be well established in both boys and girls by the 5th grade.

7095. Frueh, Terry & McGhee, Paul E. (U Missouri) **Traditional sex role development and amount of time spent watching television.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 109.—Tested the hypothesis that the amount of time spent watching TV is significantly related to the strength of traditional sex-role development. Data from 80 kindergartners and 2nd, 4th, and 6th graders support the hypothesis and suggest that this relationship holds equally for both sexes and does not change with increasing age.

7096. Girgus, Joan S. & Wolf, Joan. (City Coll, City U New York) **Age changes in the ability to encode social cues.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 118.—Studied the accuracy with which 48 Ss (mean ages = 5.5, 7.4, 9.5, and 20.5 yrs) could encode cues commonly found in social interactions (e.g., facial expression, vocal intonation, and movements). Data suggest that younger Ss perceived many everyday social interactions as essentially identical and responded accordingly.

7097. Goldberg, Susan. **Infant care and growth in urban Zambia.** In F. Reblsky & L. Dormon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Observed 38 infants from the age of 4 mo through 12 mo in a high density suburb. Several assessment scales were employed to study the mother-infant relationship and its influence on structuring the infant's world. The effects on the infant's motor, cognitive, and social development due to the Zambian mother's practice of carrying her infant in close physical contact in a back-sling are discussed. (29 ref)



7098. Halverson, Charles F. & Waldrop, Mary F. **Maternal behavior toward own and other preschool children: The problem of "ownness."** In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p. —Explored interactions between mothers and their own and other children (23 male and 19 female 2½-yr-olds) to identify maternal behaviors consistent across children and those closely tied to individual children. Data were obtained on mother-child interactions through a structured interaction session. Results indicate that mothers used significantly more positive statements with other children and significantly more negative sanctions with their own.
7099. Harper, Lawrence V. & Sanders, Karen M. (U California, Davis) **Preschool children's use of space: Sex differences in outdoor play.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 119.—Observed 3-5 yr old children's free-play activities over a 2-yr period. Boys played outdoors consistently more than did girls, and girls spent more time indoors at craft tables and in the kitchen.
7100. Harper, Lawrence V. **The young as a source of stimuli controlling caretaker behavior.** In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p. —Reviews the literature on the effects of mammalian offspring on their caretakers. A general classification system is presented in which the offspring are seen as providing exogenous stimuli which facilitate (trigger, sensitize, orient) or inhibit (check, desensitize, disorient) caretaker behavior. Examples of general offspring stimulus effects are given from comparative studies. It is suggested that the same behavior analysis could be fruitfully applied to human parent-offspring relations. (5½ p ref)
7101. Harré, Rom. (U Oxford, England) **The conditions for a social psychology of childhood.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.
7102. Heinrich, Hanns Ch. [Scales for evaluating parental reinforcement of girls.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 226-249.—Presented to 372 girls in Grades 4-8 a 4-part questionnaire which inquired about encouraging and punishing behavior of the mother and the father. Reliability of the 4 parts ranged between .802 and .910. Socioeconomic background of an S distinguished parental behavior most decisively; fathers of the more affluent strata were judged to be less strict and more helpful. (English & French summaries) (15 ref)—W. J. Koppitz.
7103. Hoffman, Martin L. **Father absence and conscience development.** In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Studied 28 female and 25 male father-absent 7th grade white children and a control group of equal size. Ss were compared on 7 moral attributes and overt aggression. Father-absent boys obtained lower scores for all the moral indexes and were rated by teachers as significantly more aggressive than father-present boys. No differences between father absence and father presence were found for girls. (23 ref)
7104. Hubert, Jane. (London School of Economics, England) **Belief and reality: Social factors in pregnancy and childbirth.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.
7105. Ingleby, David. (MRC Unit on Environmental Factors in Mental and Physical Illness; London School of Economics, England) **The psychology of child psychology.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Attempts to develop the thesis that practically every act in relation to a child, from his birth and before, reflects constraints dictated by that child's place in the political system.
7106. Katz, Phyllis A. & Zalk, Sue R. (Graduate School & University Ctr, City U New York) **Doll preferences: An index of racial attitudes?** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 663-668.—Administered a doll choice task to 96 white and 96 black nursery and kindergarten children by same- and other-race Es. In contrast to earlier studies, male and female dolls were presented which differed in skin color, not hair or eye color. The strong preference for white dolls found by previous investigators was not obtained. Young children exhibited a slight preference for other-race dolls, although gender cues were more significant determinants of choice behavior than were skin color cues. Children's responses were, in part, a function of E's race. Stronger preferences for same-race dolls were exhibited in the presence of a same-race E.—*Journal abstract*.
7107. Kelley, Eleanor; Good, Evelyn & Walter, Sarah. (Louisiana State U, Baton Rouge) **Working-class adolescents' perceptions of the role of clothing in occupational life.** *Adolescence*, 1974(Sum), Vol 9(34), 185-198.—Administered to 10th and 12th graders (196 white males, 259 white females, and 136 black females) a questionnaire which measured their occupational aspirations, their awareness of requirements for entering the occupation, and their perception of the role clothing plays in occupations. Most Ss had white-collar and upward aspirations toward white-collar occupations, and perceived the academic requirements accurately. Black females had higher aspirations than white females, and more whites than blacks had aspirations lower than their parent's current status. Most Ss recognized that clothing is functional in the occupational world and can also be manipulated to create an impression and influence others. (19 ref)—A. Krichev.
7108. Kniveton, Bromley H. (Loughborough U, England) **The very young and television violence.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 233-237.—Children of middle-class and working-class homes were exposed on 2 occasions to different aggressive films. There was a highly significant positive correlation between a child's imitative response to the 2 films. Aggression increased consistently over and above the initial tendency to behave in that way. In working-class children the effect of an aggressive film was long lasting. Children with less ability to develop their own interests are considered more likely to be influenced by

filmed aggression. It is stressed that the relationship is not between filmed aggression and imitation of aggression, but between the degree of deprivation of life satisfactions and the child's increased tendency to imitate.—W. G. Shipman.

7109. **Leifer, A. D.; Leiderman, P. H.; Barnett, C. R. & Williams, J. A.** Effects of mother-infant separation on maternal attachment behavior. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Compared attachment behavior observed in 3 groups of mothers (22 separated from infants, 22 contact pairs, and 24 full-term mother-infant dyads) prior to, and 1 and 4 wks after, discharge of the infant from the hospital. Results suggest that maternal behavior results from many factors which are not all equally influential at any given time or over a period of time. The role of any 1 variable could not be isolated. (26 ref)

7110. **Liebert, Robert M. & Baron, Robert A.** Some immediate effects of televised violence on children's behavior. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Studied influences of televised violence using a  $2 \times 2 \times 2$  factorial design (sex, 5-6 or 8-9 yrs old, observation of aggressive or nonaggressive TV sequences). Following TV viewing, Ss were given an opportunity to aggress against a peer, then placed in a free play situation where frequency of aggressive responses was observed. Ss viewing aggressive TV scenes engaged in longer attacks against ostensible "victims" and engaged in a higher level of aggressive play. (27 ref)

7111. **Moyer, K. E.** (Carnegie-Mellon U) *You and your child: A primer for parents*. Chicago, IL: Nelson-Hall, 1974. ix, 213 p. \$9.95.—Presents a practical guide for teachers and parents on ways to deal with the problems of child raising, helping the child to adjust to school, methods of discipline, handling emotions, habits, and minor behavior problems, and use of psychological principles to help children grow and develop.

7112. **Mueller, Edward.** The maintenance of verbal exchanges between young children. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Examined spontaneous verbal interaction among 24 pairs of  $3\frac{1}{2}$ - $5\frac{1}{2}$  yr old preschool children. Maintenance of verbal interaction was found to be multidetermined; however, when many causative factors operated in 1 direction, the outcome was perfectly predictable. The 2 most powerful predictors of a message receiving a reply were its technical quality and the visual attention of the listener at its beginning.

7113. **Rebellsky, Freda & Hanks, Cheryl.** Fathers' verbal interaction with infants in the first three months of life. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Recorded fathers' verbal interactions with their infants (7 male and 3 female normal, full-term babies) by means of a microphone attached to the infant for a 24-hr period every 2 wks. The data show that fathers spend little time vocalizing to their infants and that the number of

interactions varies by time of day, age and sex of infant, and the kind of activity occurring.

7114. **Rebellsky, Freda G.** Infancy in two cultures. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reports a pilot study of environmental differences during early infancy of 10 Dutch and 10 American babies during the 1st 3 mo of life. Systematic observations were made for 3 hrs every 2 wks for 6 times. Tentative results indicate that Dutch and American babies have very different experiences in the 1st 3 mo. Differences in physical environment and caretaking are described.

7115. **Rebellsky, Freda.** First discussant's comments: Cross-cultural studies of mother-infant interaction. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Suggests that the differing needs of societies cause developmental processes to be different from culture to culture. A personal study comparing development of Dutch and US children during the 1st 2 yrs of life is cited to illustrate differing results which cannot be termed "better" or "worse." It is concluded that our present understanding of development does not explain cross-cultural phenomena.

7116. **Rebellsky, Freda; Conover, Cheryl & Chafetz, Patricia.** The development of political attitudes in young children. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Administered an open-ended questionnaire to 146 male and 146 female 2-13 yr olds to study their knowledge of and attitudes toward issues in the 1968 Presidential election. Accuracy scores, attitude items, and qualitative data were obtained. Findings indicate that information increased with age but that children under 6 responded very differently than older children.

7117. **Rheingold, Harriet L. & Eckerman, Carol O.** The infant separates himself from his mother. In F. Rebellsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Proposes that study of infant detachment behavior has received insufficient attention, perhaps due to a preoccupation with attachment behavior. The biological and psychological consequences of the infant's separation from his mother are viewed as important, and the behavior is considered a challenging field for investigation.

7118. **Richards, Martin P. (Ed.).** (U Cambridge. Unit for Research on the Medical Applications of Psychology, England) *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.

7119. **Richards, Martin P.** (U Cambridge. Unit for Research on the Medical Applications of Psychology, England) *First steps in becoming social*. In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Discusses various aspects of the child's relationships with adults and some of the ways these relationships are linked with the social context of development. (38 ref)



7120. Saffady, William. (Wayne State U) **The effects of childhood bereavement and parental remarriage in sixteenth-century England: The case of Thomas More.** *History of Childhood Quarterly: Journal of Psychohistory*, 1973(Fal), Vol 1(2), 310-336.—Discusses 3 effects of the death of a mother on 16th century children: (a) pathological reactions to early object loss that persisted in later life, (b) developmental consequences of early object loss, and (c) the effects of parental remarriage. (12 p ref)

7121. Santrock, John W. **Relation of type and onset of father absence to cognitive development.** In F. Rebellsky & L. Dormon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Compared 3rd and 6th grade IQ and achievement scores for 286 father-absent and 57 father-present white, predominantly lower-class children. Father absence was analyzed by age of onset, type, or presence of a stepfather. Father absence due to divorce, desertion, or separation had the most negative influence in the 1st 2 yrs of life; father absence due to death was most detrimental in the 6-9 yr old age bracket. Results of testing 7 hypotheses are reported. (15 ref)

7122. Schaefer, Charles E. (Children's Village, Dobbs Ferry, NY) **An exploratory study of basic attitudes and philosophies of child care staff.** *Devereaux Forum*, 1974(Win), Vol 9(1), 21-26.—Compared child-rearing attitudes and the general philosophy of human nature in the general population and in a sample of residential treatment parents. It was found that the attitudes of home parents tended to be less strict and more protective than those of people in general. Other findings and their interpretations are discussed.

7123. Stein, Edward V. (San Francisco Theological Seminary, San Anselmo, CA) **Fathering: Fact or fable?** *Journal of Pastoral Care*, 1974(Mar), Vol 28(1), 23-35.—Presents case histories of defective father relationships which caused psychological harm. The need for psychological fathering is supported by data concerning male homosexuals, by primate studies and studies of myth, and by observing situations where fatherlessness is systematically imposed. Psychological fathering is discussed in terms of affection, protection, and contact. Psychoanalytical concepts of the father-child relationship are considered.—B. Smith.

7124. Wauty-Dancot, M. C.; Rucquoy, G. & Descy, J. **[Context, methodology and results of a preliminary inquiry on the degree of sexual education in a Belgian population.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Nov), Vol 73(6), 747-761.—Describes the method and preliminary results of a pilot study done in preparation for a large-scale investigation of sexual knowledge among Belgian adolescents. A questionnaire developed and administered to 100 youths yielded data on the extent of misinformation in this area among the Ss. Plans for the larger study are presented. (English, Dutch, German, Italian & Spanish summaries)—E. Coché

7125. Wendt, Hans W. **Early circannual rhythms and adult human behavior: Components of a chronobehavioural theory, and critique of persistent artifacts.** *International Journal of Chronobiology*, 1974, Vol 2, 57-86.—Mother-infant interactions in from 21 to 51 families observed over 2 24-hr spans exhibited

circannual trends. Adolescents showed higher "risk verifying" scores when, from mothers' records, critical phases had coincided with high-variability spring months. Relationships decreased when group means were substituted for individually accessible age data, but the remaining lag correlation suggested procedures for testing the model where exact coincidence is inaccessible. Several such studies are summarized using least square cosine fits and other statistics ( $N = 8-375$  Ss). Relevant behavior was operationalized by type of linguistic frameworks, imagery content, and factored correlation matrices based on several kinds of social and political behavior. Factors related to preverbal circannual phenomena accounted for from 11 to 64% of the variance in certain adult behaviors. Persisting notions about supposedly perinatal influences on later behavior are examined. 6 types of artifacts are explored which could account for several of the effects reported in the literature. (3 p ref) —Journal abstract.

### Adult Development & Aging

7126. Birren, James E. (U Southern California, Andrus Gerontology Ctr) **Translations in gerontology: From lab to life: Psychophysiology and speed of response.** *American Psychologist*, 1974(Nov), Vol 29(11), 808-815.—Reviews the literature in the areas of perception, memory, learning, motor skills, intelligence, neural activity, and personality. General support is given to the proposition that advancing age is accompanied by a decrease in the speed with which the central nervous system processes information. This principle is considered manifest in the observation that individuals tend to show a slowness in response as they become older. It is argued that whereas speed of behavior in the young adult may be regarded as a performance-related dependent variable, in the case of the aging individual it should be regarded as an independent variable with which to interpret all phenomena considered important in behavior. Factors which qualify the principle are discussed, together with its implications for accident-prone behavior in the aged. (27 ref)—B. Lindsey.

7127. Jackson, D. W. (Ohio State U) **Relationship of residence, education, and socialization to cognitive tasks in normal people of advanced old age.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 423-426.—Tested 40 aged residents of a dependent care facility on a series of cognitive conservation tasks. A decrement toward lowered levels of cognitive functioning was noted but specific psychosocial factors were related to this decline. Length of residence in dependent context and involvement in socialization and leisure activities were significantly related to level of cognitive functioning and were independent of sex. However, attained educational level was positively related to cognitive conservation for females but not for males.—Journal abstract.

7128. Kogan, Nathan. (New School for Social Research) **Judgments of chronological age: Adult age and sex differences.** *Developmental Psychology*, 1975(Jan), Vol 11(1), 107.—62 male and 137 female undergraduates and 76 male and 93 female Ss (mean age = 71.3 and 71.6 yrs, respectively) judged the ages of males and females portrayed in sets of 27 photographs. Results demonstrate the operation of judgmental assimilation

and contrast principles in determinations of chronological age, with females exhibiting greater extremity of judgments than males.

7129. Labouvie-Vief, Gisela; Hoyer, William J.; Baltes, Margret M. & Baltes, Paul B. (U Wisconsin, Madison) **Operant analysis of intellectual behavior in old age.** *Human Development*, 1974, Vol 17(4), 259-272. —A review of recent research on adult intellectual development indicates that there is little justification for the notion of marked intellectual decrement in the aged. Rather, the aged person appears to exhibit a pronounced degree of plasticity in intellectual performance, suggesting that it is necessary to explore environmental variables related to cognitive proficiency. An operant framework is proposed for the analysis of environment-intelligence interactions in old age, and intellectual decrement is interpreted to reflect the lack of supportive environmental contingencies. It is argued that such a framework demands the implementation of research aimed at examining the range of modifiability of intellectual performance in the elderly. (50 ref)—*Journal abstract*.

7130. Managan, Dorothy et al. (DuPage County Health Dept, Nursing Div, Wheaton, IL) **Older adults: A community survey of health needs.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 426-432.—Determined selected health needs of noninstitutionalized persons 65 yrs and older. 5 health-related areas were assessed: health condition, physical functioning, accessibility of medical care, social isolation, and service needs. 1,466 Ss were interviewed in their homes. Functional impairment, lack of family doctor, and social isolation were major problems. Persons who lived with others had more health problems and were more socially isolated than those living alone. Findings indicate the need for intensive casefinding and well-adult conferences staffed by family nurse practitioners and friendly visitors.—*Journal abstract*.

7131. Meichenbaum, Donald. (U Waterloo, Ontario, Canada) **Self-instructional strategy training: A cognitive prothesis for the aged.** *Human Development*, 1974, Vol 17(4), 273-280.—A brief review of the literature on problem-solving with children and the elderly reveals a similar pattern of results, implicating the role of comprehension, production, and mediation deficiencies. It is proposed that a self-instructional strategy training procedure, which is designed to explicitly teach the use of heuristic processes and mediational devices, can be employed to compensate for age-associated deficits such as poor problem-solving. The format for such a self-instructional procedure, which was derived from the developmental research of the Soviet psychologists C. Vygotsky (1962) and A. R. Luria (1961), is presented. (36 ref)—*Journal abstract*.

7132. Poitrenaud, J. & Moreaux, C. (INSERM, Unité de Recherches Gérologiques, Paris, France) **[Psychometric norms for geriatric subjects.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(3), 149-158.—Reports results of administering a battery of 4 tests to 361 males and 127 females 60-85 yrs old, subdivided according to sex, age, and cultural levels. Information is provided on the suitability of the Binois and Pichot Test

of Vocabulary, the Benton Visual Retention Test, the Clement Code Test, and the Wechsler Memory Scale.

7133. Schaie, K. Warner. (U Southern California, Gerontology Ctr) **Translations in gerontology: From lab to life: Intellectual functioning.** *American Psychologist*, 1974(Nov), Vol 29(11), 802-807.—Examines research evidence of intellectual change as a function of age and concludes that the notion of a universal decline in adult intelligence is not supported. Qualitative differences in the approach of old adults to intellectual performance are attributed to motivational factors and inappropriately designed tasks. Social policy implications of these findings for the programing of adult education specified. It is suggested (a) that specific educational programs be designed to provide the sociocultural skills which today's aged have missed, (b) that variable retirement policies be adopted, and (c) that segregation based on age cohorts be reduced. (34 ref)—*B. Lindsey*.

7134. Schonfield, David. (U Calgary, Alberta, Canada) **Translations in gerontology: From lab to life: Utilizing information.** *American Psychologist*, 1974(Nov), Vol 29(11), 796-801.—Discusses methodological issues in the drawing of implications from laboratory research which are relevant to the real-life problems of the aged. 6 examples of one approach to extrapolating experimental findings to analogous practical situations are given. The findings are considered to illustrate a general principle to the effect that integrated psychological functioning from about the age of 50 yrs depends upon an increased control and selectivity of attention. (16 ref)—*B. Lindsey*.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

7135. Hegeman, Elizabeth & Kooperman, Leonard. (John Jay Coll of Criminal Justice, City U New York) **Anthropology and community action.** New York, NY: Doubleday, 1974. 240 p. \$1.95.—Presents a collection of 18 papers which attempt to view problems of cultural communication, community integration, mental health, and paternalism in an anthropological perspective. Cultural field studies and discussion papers are included to emphasize special issues involved in industrialization, cultural diversity, cultural assimilation, and bureaucratic centralization. (31 ref)

### Culture & Ethnology & Race Relations & Religion

7136. Binion, Rudolph. (Brandeis U) **Hitler's concept of Lebensraum: The psychological basis.** *History of Childhood Quarterly: Journal of Psychohistory*, 1973(Fal), Vol 1(2), 187-215.—Discusses 2 aspects of Hitler's Vol 1(2), 187-215.—Discusses 2 aspects of Hitler's politics, one (anti-Semitism) deriving from a trauma of Hitler's young manhood, the other ("Lebensraum") from a German national trauma—i.e., a shock suffered by the German people collectively. The former expressed the Germans' abreactive need, which the latter then supplied. Hitler's relationship to Germany went back to his infancy, but the trauma behind his politics terminated the infantile material that connected with it. (6 p ref)—*Journal summary*.

7137. Bloom, Leonard. **Some values and attitudes of young Zambians, studied through spontaneous**



**autobiographies.** *African Social Research*, 1972(Dec), No 14, 288-300.—Describes a study based on autobiographies written by 64 secondary and university students from the small elite African middle class and with above average education. The content of the autobiographies suggests that the attitudes and values of young Zambians are changing as their society changes and that persons of both urban and rural backgrounds are equally affected. The young people often experienced social psychological problems which apparently resulted from rapid socioeconomic changes. Graphic examples are excerpted from the students' autobiographies.—*D. Berliner.*

7138. Carss, Brian W. & Whitrod, R. M. (U Queensland, St Lucia, Australia) **A study of the relative seriousness of criminal offences as viewed by selected groups in Australia and Papua-New Guinea.** *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 96-100.—Conducted a study to determine whether any consensus exists among selected groups of people in Papua-New Guinea and Australia as to how they rank different forms of unlawful behavior. The Papua-New Guinea sample consisted of 356 Ss from the military and colleges, and the Australian sample consisted of 297 Ss from the police force, military training school, and universities. Results show that subgroups in the 2 countries differed as to the seriousness of certain offenses, and that on some crimes—e.g., compounded stealing, violence, and disorders—there were national differences also.—*Journal summary.*

7139. Chakrabarti, Tridib K. (U Calcutta, India) **Attitudes reflected in matrimonial advertisements.** *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 142-143.—Notes that the appearance of matrimonial advertisements in Indian newspapers is a departure from the traditional pattern of partner selection, which depends upon information gained personally. Content analysis was performed on a random sample of matrimonial advertisements (200 male, 200 female) appearing in a leading Bengali daily newspaper. The advertisers belonged to the urban middle classes, were generally highly educated, and enjoyed high social status. Caste was mentioned by 92% of both sexes, physical beauty by 91% of the females but only 10% of the males. Since content analysis indicated a typically conservative orientation on the part of the advertisers, it is concluded that they were not free of traditional beliefs.—*R. Brislin.*

7140. Deregowski, Jan B. & Munro, Don. (U Aberdeen, Scotland) **An analysis of "polyphasic pictorial perception."** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 329-343.—Assessed the tendency to interpret pictures as representing a sequence of events, and the extent to which such tendency is fostered by background cues and arrangement of figures. Ss were a total of 306 white Canadian 6th and 7th graders and 834 African primary school children and tradesmen. Ss were administered a test using 9 drawings randomly distributed, with instructions for each S to write an interpretation of what was happening in the picture he received. Results show that interpretations representing a sequence of events were more common in the African sample. Results also suggest that it is probably erroneous to describe the phenomenon as perceptual, since the

responses appeared to be affected by the extent to which S's interpretation was "stimulus-bound." Only the background cues were found to affect Ss' responses.—*Journal abstract.*

7141. Dodrill, Carl B. (U Washington, Medical School) **Personality characteristics of students not identifying with their parents' denominations at entrance into a Christian college.** *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 216-222.—Investigated (a) the degree to which students did not identify with their parents' denominations at entrance into a Christian college and (b) the differences between the personalities of students who did identify with their parents' denominations and those who did not. Ss were 344 students who had taken the Guilford-Zimmerman Temperament Survey at the time of entrance. Results show that (a) 5 out of 6 Ss identified with their parents' denominations and (b) those who did not identify had greater tendencies than those who did toward independent thinking, social ascendance, introspectiveness, and reflectiveness. Results suggest that personality factors may be important in certain aspects of religious behavior.—*Journal abstract.*

7142. Evans, Robert H. (U Virginia) **Parish priests, political power, and decision-making: An Italian case.** *American Behavioral Scientist*, 1974(Jul-Aug), Vol 17(6), 813-826.—A case study of an archpriest in a small Italian village, illustrating how his power rests on interpersonal relationships, patronage, and religious tradition.

7143. Goldschmidt, Walter. (U California, Los Angeles) **Guilt and pollution in Sebei mortuary rituals.** *Ethos*, 1973(Spring), Vol 1(1), 75-105.—Examines rituals surrounding death among the Sebei of Uganda as they relate to structural societal characteristics and intrapsychic tensions. It is postulated that rituals mediate between psychological tensions and needs and public demands. (2 p ref)

7144. Goodich, Michael. (U Haifa, Israel) **Childhood and adolescence among the thirteenth century saints.** *History of Childhood Quarterly: Journal of Psychohistory*, 1973(Fal), Vol 1(2), 285-309.—Links the childhood experience of 13th century saints with their adolescent rebellion. (5 p ref)

7145. Graves, Theodore D. (U California, Los Angeles) **The Navajo urban migrant and his psychological situation.** *Ethos*, 1973(Fal), Vol 1(3), 321-342.—Studied the relationships between psychosocial variables and the rate of return to reservations and drinking behavior among Navajo migrants to Denver. The attitudes of 259 male Navajo migrants and former migrants toward unemployment and low wages and their expectations of future economic status were assessed. Comparisons between Ss' reported perceptions and objective measures of economic status revealed that many migrants had a distorted image of their economic situation. It was found that migrants who had a sense of personal efficacy and who believed in the possibility of economic improvement exhibited relatively low rates of return to the reservation and of arrest for drunkenness. It is concluded that psychological distortion and interpretation of personal situations have considerable influence on the objective behavior of Indian urban migrants. (25 ref)—*J. Kelly.*

7146. Guthrie, Robert V. (U Pittsburgh) **White racism and its impact on black and white behavior.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Apr), Vol 1(3), 144-149.—Discusses some sources of racism in the US and some of the survival techniques that have been used by blacks. Strategies and techniques to effect change are offered and include studying racism from a sociopsychological perspective, improving social science scholarship, having blacks initiate the research done on blacks, and legislating and prosecuting acts of racism as a crime in the US.

7147. Harper, J. (La Trobe U, Bundoora, Vic, Australia) **Educated women in Niugini.** *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 90-95.—Attempted to determine how Niuginian women in Papua and New Guinea define themselves, in a survey of 94 women who attended Busu Girl's School. Questionnaires and informal interviews were used to establish behavior, perception, and attitudes. Results are reported regarding occupational sex roles, work-force participation, family roles, sexual stereotypes, and liberation. The defining role of the colonial government is discussed.—R. Brislin.

7148. Hart, Geraldine; Ames, Kenneth A. & Sawyer, Robert N. (Pope John XXIII School, Portland, OR) **Philosophical positions of nuns and former nuns: A discriminant analysis.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 675-678.—24 nuns and 28 former nuns were given the Ames Philosophical Belief Inventory, and a discriminant-function was calculated along with the Generalized Mahalanobis D<sup>2</sup>. The statistically significant discriminant function suggests the Ames inventory can be employed as a screening device when selecting members of a religious community and also as a point of departure in the discussion of the implications of the decision to stay or to leave a religious order.—*Journal abstract*.

7149. Hicks, R. E. & Larsen, R. J. (Dept of the Public Service Board, Psychological Services, Branch, Papua New Guinea) **A note on personality testing among Papua New Guinea teacher trainees.** *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 36-39.—Reports scores of 115 1st-yr teacher trainees in Papua New Guinea on the Junior Eysenck Personality Inventory (JEPI) and the Australian Self-Description Inventory (SDI). Mean scores on the SDI were much higher than those usually felt to indicate poor adjustment. Personal observations indicated that factors contributing to the artificially high scores include lack of reading comprehension and cultural differences. JEPI scores showed similar patterns to mean scores in the United Kingdom, although there were significant differences ( $p = .01$ ) on 3 scales. The JEPI is seen to be more desirable for use in Papua New Guinea than the SDI, and the need for caution in interpreting all foreign test instruments is noted.—C. Wright.

7150. Jarvis, Peter. **Religious socialization in the junior school.** *Educational Research*, 1974(Feb), Vol 16(2), 100-106.—Surveyed 238 junior school teachers regarding the content of their religious education lessons and the overall religious subcultures of classroom and schools to determine by what process religious socialization takes place. It is concluded that religious education

lessons do not respond to the child's cognitive level and are thus likely to confuse, whereas the religious life of classroom and school leads to an emotive affinity with Christianity. Ambivalence toward the Christian religion is thus produced in the child.—J. B. Francis.

7151. Joyce, J. T. (Dept of the Public Service Board, Psychological Services Branch, Papua New Guinea) **A preliminary study of cultural differences in values influencing western education in the Enga district: I. Personal and clan values.** *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 9-16.—Administered a multidimensional questionnaire developed by the author to 250 high school students (mean age = 13 yrs) from 2 different areas of Papua New Guinea. One group was culturally homogenous and more isolated; the other was culturally mixed and had more exposure to Western influence. The questionnaire investigated cultural, cognitive, moral development, and democratic factors. Significant differences ( $p = .001$ ) were found between the 2 groups on questions related to the nature of friendship, the value of a nonclansman's life, and fear of the father's spirit. Factors contributing to these differences are discussed as they relate to the adjustment of these groups to Western civilization and law. The questionnaire is appended.—C. Wright.

7152. Loomis, Charles P. (U Houston) **A backward glance at self-identification of blacks and Chicanos.** *Rural Sociology*, 1974(Spr), Vol 39(1), 96.—Compared results of 1963 and 1970 studies which used the Twenty Statements Test to ascertain respondent's perceived identity. For both Mexican-Americans and blacks emphasis on ethnicity in self-identification has greatly increased in the last decade.

7153. Marsella, Anthony J.; Murray, Michael D. & Godlen, Charles. (U Hawaii) **Ethnic variations in the phenomenology of emotions: I. Shame.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 312-328.—Investigated ethnic variations in the connotative meaning of emotions, using as Ss 324 American college students of Japanese, Chinese, and European ancestry. Ss were administered a 20-scale semantic differential for various emotions including shame. Results were factor analyzed and yielded the following dimensions: Evaluative, Dynamism, Synesthesia, Awareness, Arousal, and Intensity. Results show ethnic group differences in the endorsement pattern of the different scales and in the factorial structures. The concept of "shame" is discussed and related to the cultural traditions of the ethnic groups studied. Implications for ethnopsychiatry are noted. (37 ref)—*Journal abstract*.

7154. Milner, David. (U Bristol, England) **Racial identification and preference in "black" British children.** *European Journal of Social Psychology*, 1973, Vol 3(3), 281-295.—Attempted to discover whether the pattern of outgroup-oriented racial attitudes among black American children might also be found among the children of black immigrants to Britain. Measures of racial identification, preference, stereotyping, and social aspirations were administered to West Indian and Asian elementary school children and to a comparison group of native English children. While English Ss showed consistent ingroup attitudes, both Asian and West Indian children evidenced marked prowhite attitudes,



identifying with the white outgroup. The phenomenon of misidentification is discussed, and explanations are suggested in terms of differing cultural backgrounds, aspirations to integration, and relationship to the host community. (37 ref)—*M. K. Phifer*.

7155. **Munroe, Robert L.; Munroe, Ruth H. & Whiting, John W.** (Pitzer Coll) **The couvade: A psychological analysis.** *Ethos*, 1973(Spring), Vol 1(1), 30-74.—Formulated hypotheses related to the practice of couvade on the basis of a crosscultural survey of data from 22 societies. Hypotheses were then tested with 40 Black Carib men and 21 women as Ss. Men were divided into groups of those who did and did not practice couvade, and later into intensive and nonintensive couvade groups. These groups were compared on measures of language usage, behavioral evaluation by peers, histories provided by kinsmen, etc. Results support the hypothesis that the level of adult male salience experienced in childhood is a significant determinant of whether a man will practice couvade as an adult. Both psychological and sociocultural explanations are posited as necessary in any explanation of this practice. (4 p ref)—*C. Wright*.

7156. **Narramore, S. Bruce.** (Rosemead Graduate School of Psychology, CA) **Guilt: Christian motivation or neurotic masochism?** *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 182-189.—Theorizes that (a) according to the Bible, guilt motivation is never used by God to motivate the Christian, and (b) guilt feelings in the experience of Christians are always self-destructive. Some of the major defenses utilized in attempting to combat guilt are discussed, and it is suggested that guilt feelings are one of the primary factors in all psychogenic pathology.—*Journal abstract*.

7157. **Newson, John & Newson, Elizabeth.** (U Nottingham, Child Development Research Unit, England) **Cultural aspects of childrearing in the English-speaking world.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.

7158. **Pederson, John E.** (Rosemead Graduate School of Psychology, CA) **Some thoughts on a biblical view of anger.** *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 210-215.—Discusses anger as a part of God's image in man and, as such, a key in the understanding of human anger.

7159. **Piker, Steven.** (Swarthmore Coll) **Comments on the integration of Thai religion.** *Ethos*, 1973(Fal), Vol 1(3), 298-320.—Examines the role of the Thai religious system as a projective institution which organizes and expresses the diverse psychological traits of subgroups within Thai culture. Some correspondence was found between personality dispositions leading to specific religious practices and variations in childrearing practices. (22 ref)

7160. **Pratt, Henry J.** (Wayne State U) **Organizational stress and adaptation to changing political status: The case of the National Council of Churches of Christ in the United States.** *American Behavioral Scientist*, 1974(Jul-Aug), Vol 17(6), 865-883.—Presents a historical dissertation on how changes in the social and political strategy of the National Council of Churches have been related to a long-term alteration in Protestantism's general status in society. The adoption of these new

strategies has required an emphasis on techniques designed to minimize the danger of member body defections. (32 ref)

7161. **Sappington, A. A.** (U Alabama, Birmingham) **Behavior of biased and non-biased whites towards blacks in a simulated interaction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 487-493.—Examined differences between biased and nonbiased whites in their behavior towards blacks in a simulated interaction situation. 12 biased and 10 nonbiased white female undergraduates were selected on the basis of scores on a 7-point rating scale. Behaviors involving various levels of interaction (i.e., description, choice of a hypothetical interaction partner, and actual verbal exchanges) were examined. The biased and nonbiased whites differed, and these differences became more apparent as actual interaction was more closely approximated. Although no openly antiblack remarks occurred, biased whites talked less to blacks than to whites, expressed more negative affect as reflected in nonimmediacy of their remarks to blacks, and chose black partners less often. Biased whites described blacks as favorably as did nonbiased whites. Possible explanations are discussed.—*Journal abstract*.

7162. **Schuman, Howard.** (Michigan U) **Racial attitude change: Are whites really more liberal? Blacks aren't impressed.** *Psychology Today*, 1974(Sep), Vol 8(4), 82-86.—Contrasts the increasingly liberal racial attitudes of whites with the view of the white majority held by blacks. Since 1958 and even 1965, polls in Detroit indicate that white citizens have adopted attitudes more accepting of school, neighborhood, and even marital integration. Blacks, however, are increasingly impatient with the remaining prejudicial attitudes and with the fact that racial equality is not of high priority for most whites.—*E. J. Posavac*.

7163. **Spiro, Melford E.** (U California, San Diego) **Social change and functional analysis: A study in Burmese psychocultural history.** *Ethos*, 1973(Fal), Vol 1(3), 263-297.—Presents an historical examination of the effects of British colonialism on social aggression in Burma. It is suggested that changing patterns of social aggression resulted from psychological deprivation due to colonial suppression of traditional Burmese institutions through which hostility had been expressed in culturally approved and socially adaptive ways. (2 p ref)

7164. **Strunk, Orlo & Larsen, John A.** (Boston U, School of Theology, Albert V. Danielson Pastoral Counseling Ctr) **Variability within the theological concept of behavior of the Beliefs-About-Behavior Inventory.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 432-434.—Shaw's Beliefs-About-Behavior Inventory, designed to identify 3 concepts about behavior as the theological, illness, and psychological, was administered to 116 religious professionals, including Protestant seminarians, Roman Catholic priests and nuns, and pastoral counselors. Wide variability was discovered within these theological groups and between these groups and the original criterion groups. When groups were combined and then divided in terms of liberal-conservative categories the theological scale differentiated better, suggesting that the theological scale may be biased toward a particular type of theological way of thinking (conservative) rather than a general theological cognitive

style per se. Several possible explanations for the variability are suggested.—*Journal abstract.*

7165. Tallman, Irving & Wilson, Lance. (U Minnesota) **Simulating social structures: The use of a simulation game in cross-national research.** *Simulation & Games*, 1974(Jun), Vol 5(2), 147-167.—Describes the design of a study which explored the interplay between intrafamily behavior and social structure variables in influencing a child's capacity to adapt to social change. Blue- and white-collar families in Minnesota and central Mexico as well as rural Mexican peasants were compared on a modified version of the Life Career game called SIMCAR (Simulating Career Choice Patterns). SIMCAR was constructed on the basis of an economic consumption model. In considering the cross-cultural validity of the game 4 common types of validity were used: face validity (assessed via a simple questionnaire on the game's realism), rule consistency (audio tapes were made during actual playing sessions and reviewed after all data had been collected), predictive validity (interview data on such issues as occupational aspirations, attitudes toward marriage, etc.), and utility. Data suggest that the game does elicit the kind of behavior it was designed to elicit, and that the data produced by the game are sensitive to critical differences between and within societies.—D. E. Anderson.

7166. Todd, Judy L. & Shapira, Ariella. (U London, England) **US and British self-disclosure, anxiety, empathy, and attitudes to psychotherapy.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 364-369.—A total of 152 US and British 18-55 yr old adults were administered the Self-Disclosure Questionnaire, the Taylor Manifest Anxiety scale, Hogan's Empathy Scale, and Fischer and Turner's Attitudes to Psychotherapy scale. It was predicted that (a) US Ss would be more self-disclosing and more positive to psychotherapy than the British; and (b) high self-disclosure would relate to low anxiety and high empathy for US but not for British Ss, and to positive attitudes to psychotherapy. Results show that US Ss were more self-disclosing, empathic, and favorable to psychotherapy than the British. Predicted interactions between nationality and self-disclosure were not confirmed.—*Journal abstract.*

7167. Tulkin, Steven R. **An analysis of the concept of cultural deprivation.** In F. Reberly & L. Dormon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Suggests that there are serious limitations to the validity of the concept of "cultural deprivation" since it ignores cultural relativism and neglects political realities. Relevant literature is reviewed and the implications for research presented. (58 ref)

#### Social Issues & Social Processes

7168. ———. **The value system of Filipino college students.** *Philippine Journal of Child-Youth Development*, 1968(Jan), Vol 2(1), 1-52.—Studied the relationships between demographic characteristics of 4,000 Filipino college students and their moral and spiritual values. Results show that these values were stronger in females than males and that they were also correlated significantly with the factors of age, socio-economic status, education, and urban or rural background.

7169. Ashmore, Richard D. & McConahay, John B. (Rutgers State U, Livingston Coll) **Psychology and America's urban dilemmas.** New York, NY: McGraw-Hill, 1975. ix, 180 p. \$4.95.—Presents an overview of (a) the social and psychological aspects of urban life; (b) the problems in achieving equality in urban educational and judicial systems; (c) the scarcity of resources, and the concomitant problem of allocating them properly; (d) the relationship between race relations, poverty, and urban issues; and (e) the effects of crowding and pollution. (14 p ref)

7170. Bakare, Christopher G. (U Ibadan, Behavioural Sciences Research Unit, Nigeria) **An appraisal of psychology research in family planning.** *Professional Psychology*, 1974(Aug), Vol 5(3), 346-352.—Examines psychology's contribution to the multidisciplinary field of population growth. Topics appropriate for psychological study fall into 2 groups: (a) identifying variables that are predictive of behavior under study and (b) measuring these variables accurately. The need for relevance in research topics is cited, and relevant variables within topics can be identified by (a) practitioners in the field, (b) building sound theoretical models, and (c) using factor analytic techniques.—C. Wright.

7171. Barr, Norman I. & Zunin, Leonard. (Inst for Reality Therapy, Los Angeles, CA) **Campus prisons, community prisons, and judicial administration.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.—Discusses the ideas of community-based prisons, locating prisons on university campuses, and the control of the correctional system by the judiciary rather than by the executive branch of government, as potential successful solutions to the problem of administering justice in the US. Historical precedents for these suggestions are described, and the need for public support in any major change in corrections is stressed.

7172. Baxter, Sam. (St Bartholomew's Hosp Medical Coll, Hackney Hosp, London, England) **Labour and orgasm in primiparae.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 209-216.—Interviewed 54 women 12 wks postpartum about sociological, physical, and psychological data pertaining to the prepregnancy, pregnancy, and postpartum periods. Current psychiatric status was assessed with the Present State Examination. Women with a long 2nd stage of labor (violent pelvic activity) had a subsequent increase in percentage of intercourse leading to orgasm and fewer psychiatric symptoms. Those with a decreased percentage of orgasm had attempted breast feeding, had a later return of menstruation and more psychiatric symptoms. (15 ref) —W. G. Shipman.

7173. Becker, Howard S. (Northwestern U) **Consciousness, power and drug effects.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 67-76.—Discusses the social context of drug experiences by considering the amount and kind of knowledge available about the drug to the user. Information control in 3 drug-use settings is examined: illegal use, medically prescribed, and involuntary use through chemical warfare. The impact of dosage, main and side effects, and pharmaceutical research and communication structures are considered.



The physician's need for professional dominance over patients is discussed, along with a review of the physician's drug information system. The physician's often incomplete knowledge of pharmaceutical research is noted. (17 ref)—*R. Tomasko.*

7174. **Berger, Peter L.; Berger, Brigitte & Kellner, Hansfried.** (Rutgers State U) **The homeless mind: Modernization and consciousness.** Harmondsworth, England: Penguin, 1973. 232 p. 50 p.—Presents the views of 3 sociologists on the effects of modernization, industrialization, urbanization, and technology on man's attitudes, beliefs and behaviors. The relationships between elements of modern consciousness and various institutional processes, the effects of modernization of the "3rd world," and types of protests against modernization are discussed.

7175. **Bermant, Gordon; McGuire, Mary; McKinley, William & Salo, Chris.** (Battelle Seattle Research Ctr, WA) **The logic of simulation in jury research.** *Criminal Justice & Behavior*, 1974(Sep), Vol 1(3), 224-233.—Contents that for both substantive and methodological reasons, laboratory research into the functioning of mock jurors and juries may not be a useful foundation for the practical understanding of actual jury functioning. Data from undergraduates are provided to demonstrate that changes in the structural verisimilitude ("realism") of a simulated trial can produce systematic changes in juror response. However, the modal verdict in the most realistic simulation was not the verdict in the actual trial upon which the simulation was based. It is concluded that, in general, researchers should make all efforts to maximize the applicability of their findings by tailoring their methods and means of S selection more closely to the realities of courtroom practice.—*Journal abstract.*

7176. **Blum, Stuart H. & Blum, Lucille H.** (Brooklyn Coll, City U New York) **Do's and don'ts: An informal study of some prevailing superstitions.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 567-571.—To demonstrate the prevalence and relationship to specific background variables of prevailing superstitions, a questionnaire containing 24 superstitious beliefs or practices was independently completed by 132 adults. Each superstition was rated as to whether it had strong, partial, or no influence for the individual, and a total score was obtained. The mean total superstition score for women was significantly higher than for men ( $P = .05$ ). A moderately substantial negative correlation was found between superstitious belief and amount of formal education. It is suggested that, particularly in current times, the sense of control inherent in superstitious belief and practice has a therapeutic value in the reduction of anxiety. This value may account for the survival of common superstitions in spite of centuries of advance in scientific knowledge.—*Journal abstract.*

7177. **Bridges, William P. & Berk, Richard A.** (Northwestern U) **Determinants of white collar income: An evaluation of equal pay for equal work.** *Social Science Research*, 1974(Sep), Vol 3(3), 211-233.—Studied determinants of earnings among 1,308 urban white collar workers. Findings suggest that the type of work performed by an individual is of minor importance in determining earnings. Most of the explained variance

can be accounted for by other factors such as sex and marital status. (21 ref)

7178. **Bronfenbrenner, Urie.** (Cornell U) **The origins of alienation.** *Scientific American*, 1974(Aug), Vol 231(2), 53-61.—Suggests that alienation of young people—currently at a new high—is rooted in social institutions, most importantly the family. Factors responsible for increased alienation are changes in family structure, poverty, lack of infant and maternal care, isolation of the child and family from others, and the separation of children from adults in the world of work. It is recommended that social institutions become more responsive to human needs; e.g., by offering more day care, better education, and improved neighborhoods.—*P. Tolin.*

7179. **Bronfenbrenner, Urie.** **Who cares for America's children?** In F. Rebellsky & L. Dorman (Eds), *Child development and behavior.* (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Proposes that America's neglect of its children is a serious national problem. Steps are suggested to put adults and children in touch with each other.

7180. **Brown, George H.** **Drug usage rates as related to method of data acquisition.** *HumRRO Technical Report*, 1974(Aug), No 74-20, 46 p.—Reports 2 studies, conducted in 1972, concerned with the effect upon obtained drug-usage rates of various methods of data acquisition. Study 1 compared the anonymous questionnaire and the personal interview administered to 419 US Army enlisted personnel. Study 2, with 499 Ss, compared 5 different types of questionnaire administrators. In both studies, the obtained drug-usage rates, by a variety of criteria, did not differ for modes of data collection.—*Journal abstract.*

7181. **Busfield, Joan.** (U Essex, England) **Ideologies and reproduction.** In M. P. Richards (Ed), *The integration of a child into a social world.* London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Contrasts the beliefs surrounding fertility in present-day England with those of different times and places. Emphasis is placed on those beliefs that are generally accepted throughout the society rather than on those which differentiate individuals and social groups. (42 ref)

7182. **Camilleri, Carmel & Tapia, Claude.** (U Paris V, France) **[French youth and social groups after May 1968: Surveys of university and school populations of Paris and province.]** (Fren) *Monographies Française de Psychologie*, 1974, No 27, 181 p.—Surveys and analyzes the attitudes and problems of French students which led to 1968 student unrest, and the implications of the events. Values of young people, characteristics and conflicts of generations, power of various groups, and areas of confrontation and cooperation are examined in the context of industrial society.

7183. **Candee, Dan.** (Harvard U, Lab of Human Development) **Ego developmental aspects of New Left ideology.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 620-630.—Investigated the relationship of J. Loewinger's (1969) measure of ego development to the structure of political reasoning in a sample of student leftists ( $N = 76$ ). Results show that lower stage Ss tended to see politics in terms of the physical or emotional effects of politics on themselves,

while higher stage Ss evidenced both a perception of political complexity and the positive assertion of human development and mature justice as political values. (23 ref)—*Journal abstract*.

7184. Chobot, Donna S.; Goldberg, Philip A.; Abramson, Linda M. & Abramson, Paul R. (Connecticut Coll) **Prejudice against women: A replication and extension.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 478.—In a previous study, P. A. Goldberg (1968) found that college women were more critical and negative toward articles purportedly written by women than toward the same articles supposedly written by men. The present study with both male and female college students does not support this result.

7185. Christianson, Scott. (State U New York, School of Criminal Justice, Albany) **The war model in criminal justice: No substitute for victory.** *Criminal Justice & Behavior*, 1974(Sep), Vol 1(3), 247-277.—Contends that the criminal justice system operates on a war model. War mentality pervades the entire criminal justice process, determining to an important extent how criminal "enemies" are treated. The war model is characterized by identification of enemies and heroes, estimate of the enemy's strengths and weaknesses, development of strategy, development of military weapons and resources, utilization of dishonest language, and establishment of goals and objectives which are designed to produce "victory." It is argued that the system's distasteful emphasis on force, physical courage, weapons, and the twin concepts of "enemies" and "heroes" must be eliminated. (46 ref)—*Journal abstract*.

7186. Coelho, George V.; Hamburg, David A. & Adams, John E. (Eds.). (NIMH, Rockville, MD) **Coping and adaptation.** New York, NY: Basic Books, 1974. xxv, 454 p. \$17.50.—Presents a collection of 13 discussion papers on social interaction and motivation in adaptive behavior, coping tasks and strategies in the development of competence, coping with real-life crises, assessment of coping functions, and biological and social perspectives of coping and adaptation.

7187. Cunningham, Isabella C. & Green, Robert T. (U Texas, School of Communications, Austin) **Purchasing roles in the U.S. family, 1955 and 1973.** *Journal of Marketing*, 1974(Oct), Vol 38(4), 61-64.—Explored changes in the roles of husbands and wives in purchase decision making, comparing a 1955 study of 727 Detroit housewives with a 1973 study of 248 Houston housewives. Significant differences in 5 of 6 decision areas suggest that it would be a mistake to base marketing action on information about general role shifts; product-specific information is needed.

7188. de Sitter, L. U. (Technische Hogeschool, Eindhoven, Netherlands) **[Socio-technique.]** (Duth) *Mens en Onderneming*, 1974(Mar-Apr), Vol 28(2), 65-83.—Contrasts sociotechnique with sociology and social psychology, which are viewed as having several deficiencies (e.g., anachronistic generalizations, static viewpoints, and tautological conclusions). Sociotechnique is a study of the means by which technical instrumentation, division of labor, and specialization, operate in mutual dependence for productive purposes. The relationship of sociotechnique to business democracy is characterized

by changes in the division of labor, particularly the control functions.

7189. Delaporte, Yves & Roué, Michèle. (U René Descartes, Paris, France) **[Premarital relations, faithfulness, suicide: Sexual conduct in a group of nomadic Lapps.]** (Fren) *Anthropologica*, 1973, NS Vol 15(2), 155-166.—Describes the sexual mores of a group of Lapps in northern Norway engaged in reindeer culture and relatively untouched by outside influences. The pattern in this limited community included a period of sexual freedom among the young prior to marriage (15-25 yrs) and a stable ensuing marriage—good relationship, fidelity, and no divorce. Factors suggested as contributing to stability are the economic base of marriage (the merging of 2 reindeer herds) and the value attached to children, whether conceived through premarital relations or through a previous relationship of husband or wife. Young women exercise notable freedom in choosing premarital sexual partners and in selecting a husband, and have equal status with the husband after marriage. While killing for passion is unknown, suicide of a rejected male is not considered aberrant. (English summary)—E. E. Brown.

7190. Djakić, Mara. (Vojnomedicinska Akademija, Inst za mentalno zdravlje i zdravstveno prosvetivanje, Yugoslavia) **[Problems of the modern marriage and family.]** (Srer) *Vojnosanitetski Pregled*, 1974(Jul-Aug), Vol 31(4), 263-266.—Reviews literature on classification and types of marriages and factors responsible for different types of marital adjustment, and briefly discusses these within the framework of local conditions.

7191. Doctor, Ronald M. & Sklov, Monny. (San Fernando Valley State Coll) **A cross-cultural study of attitudes about marijuana smokers.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 111-115.—Administered an attitude questionnaire to 158 American and 149 British students to determine the nature of British and American attitudes about marihuana smokers. It was hypothesized that British citizens would tend to be more tolerant of the marihuana user, would be less socially rejecting, and more inclined to view their behavior as a medical problem with physical determinants than American citizens. Results indicate that attitudes about marihuana smokers are a function of whether the respondent was a user or nonuser rather than his country of origin. In general, users and nonusers agreed that marihuana use was a personal decision, the determinants of which were psychological and social. There were clearcut differences between the 2 subgroups. Nonusers perceived the smoker as having many interpersonally aversive characteristics and a definite psychological problem; users denied having any psychological problems, were more positive in their interpersonal perceptions of smokers, and considered the smoker as more autonomous in his personal and social functioning.—*Journal abstract*.

7192. Fawcett, James T. (East-West Ctr, East-West Population Inst, Honolulu, HI) **Psychological research on family size and family planning in the United States.** *Professional Psychology*, 1974(Aug), Vol 5(3), 334-344.—Reviews the development of the field of population psychology in the U.S. A preponderance of available research deals with the attitudes, values, personality



factors, and patterns of decision making involved in the areas of family planning and family size. Research on the consequences of family planning and of population density is just beginning. The involvement of psychologists in the field of population is increasing, and mutual benefits are predicted for the fields of psychology and demography. (2 p ref)—C. Wright.

7193. **Feinman, Saul.** (U Wyoming) **Approval of cross-sex-role behavior.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 643-648.—Previous research has indicated that sex-role preferences of boys were more clearly masculine than girls' preferences were feminine. To provide a partial explanation of this phenomenon, the responses of 40 male and 67 female college students to descriptions of cross-sex-role behavior of young boys and girls were investigated in the present study. Ss rated 10 one-sentence descriptions of cross-sex-role behavior on an approval-disapproval dimension. Both male and female Ss indicated greater disapproval of cross-sex-role behavior of boys than of girls. The relationship of these findings to previous research is discussed. (17 ref)—*Journal abstract*.

7194. **Fejer, Dianne & Smart, Reginald G.** (Addiction Research Foundation, Toronto, Ontario, Canada) **The supposed drug information and attitude gap between teachers and students.** *Journal of Drug Issues*, 1974(Spr), Vol 4(2), 107-116.—Studied the knowledge about and attitudes toward drugs of elementary teachers, secondary teachers, and high school students. The responses of 363 teachers to questionnaires covering social and demographic characteristics, knowledge of drug facts, and attitudes toward drug use and legalization of marihuana were compared with data collected from high school students in 2 previous studies. It was found that high school teachers were more knowledgeable about drugs and more favorable toward legalization of marihuana than were elementary teachers or high school students. It is suggested that the results contradict the opinion expressed in current drug education literature that there is a generation gap between students and teachers with regard to drug information and attitudes.—J. Kelly.

7195. **Fisher, Gary.** (Cedars-Sinai Medical Ctr, Los Angeles, CA) **Milieu of marihuana use.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 45-55.—Surveyed 530 marihuana users and 73 nonusers. Results relate 6 categories of frequency of use to (a) age, sex, and marital status; (b) education; (c) friendship acquisition and satisfaction depending upon other's use; (d) perceived community approval of use; (e) social setting of use; (f) proselytizing patterns; (g) duration and satisfaction of use; (h) source and ease of supply; and (i) political position. Among the many findings reported, increased frequency of use was said to be accompanied by (a) greater satisfaction and frequency of friendship with other users, (b) exclusion of nonusers from friendship, (c) greater perceived community approval, (d) increased variety of use settings, and (e) more frequent introduction of others to marihuana use.—W. R. Street.

7196. **Forer, Lois G.** **The rights of children.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Discusses the lack of laws protecting children's rights and explores the psychological and

sociological reasons for this situation. Suggestions are made for formulating a juvenile jurisprudence.

7197. **Frenkel, Sinai I.; Robinson, James A. & Flinan, Byron G.** (Walter Reed Army Medical Ctr, Washington, DC) **Drug use: Demography and attitudes in a junior and senior high school population.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 179-186.—Analyzed the responses of 2,004 students in Grades 7-12 to a multiple-choice drug attitude survey. The myriad of adjustment problems associated with drug use suggests that treatment and research should concentrate efforts on individual psychological problems rather than on drug use only, and that further studies are needed in the direction of causality of drug use and related psychological problems. (22 ref)—*Journal abstract*.

7198. **Friedman, Herbert L.** (American Inst for Research, Transnational Family Research Inst, Geneva, Switzerland) **Psychosocial research on family planning in Europe.** *Professional Psychology*, 1974(Aug), Vol 5(3), 326-334.—Reviews family planning research in Europe, noting a dearth of well-designed studies. Existing research includes 2 studies of physicians' attitudes toward abortion, 3 sterilization studies, and work in progress on women purchasing pregnancy tests in 2 different cultures. The majority of available studies deal with women who are seeking or have had abortions. A trend is hypothesized toward greater focus on decision-making processes in family planning, and an increasing interest in the field of population in Europe is reported.—C. Wright.

7199. **Friedman, Herbert L.** (American Inst for Research, Transnational Family Research Inst, Geneva, Switzerland) **Fertility choice behavior: Some recommendations for research design.** *Family Planning Perspectives*, 1974(Sum), Vol 6(3), 184-185.—Recommends 12 guidelines to facilitate research into fertility choice behavior.

7200. **Galli, Nicholas.** (Herbert H. Lehman Coll, City U New York) **Patterns of student drug use.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 237-248.—Explored the extent and nature of drug use among a total of 517 elementary, junior, and senior high school students. Findings indicate that while drug usage began to increase in the 7th grade, substantial increases occurred after this grade level. For all substances, drug use peaked in the 9th or 10th grade with dramatic decreases occurring in the 12th grade. The implications of these and other findings are discussed.—*Journal abstract*.

7201. **Green, Dorothy E. & Nemzer, Daniel E.** (National Clearinghouse for Smoking & Health, Ctr for Disease Control, Bethesda, MD) **Changes in cigarette smoking by women: An analysis, 1966 and 1970.** *Health Services Reports*, 1973(Aug), Vol 88(7), 631-636.—Examines the success of adult women nationwide in giving up cigarettes. About one of every five male cigarette smokers stopped smoking 1966-1970. Among females the trend was less pronounced. The smoking behavior of women varies according to marital status, occupation, and educational level. Smoking is highest among divorced or separated women, lowest among widows, and higher among single women than among the married. The smaller decrease in smoking by women is ascribed to a time lag in the smoking habits of women

during the brief history of smoking in America.—R. S. Albin.

7202. Harrison, J. D. (Summer Inst of Linguistics, Ukarumpa, Eastern Highlands District, New Guinea) **The Kluckhohn value-orientation research instrument used in Papua New Guinea.** *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 3-8.—Investigated the use of a value orientation research instrument developed by F. Kluckhohn. The scale measures the interaction of cognitive, affective, and directive elements, with an emphasis on intracultural regularity and intercultural variability. Adapted and translated versions were administered in Pidgin English or local dialect to 225 representatives of 3 groups with varying levels of sophistication, either via interview or in written form. A summary of the groups' value profiles is presented, and it is suggested that this instrument is acceptable for research on comparative values in preliterate societies. The Pidgin English version is appended.—C. Wright.

7203. Hart, Larry. (Boston City Hosp, MA) **The effect of noxious subliminal stimuli on the modification of attitudes toward alcoholism: A pilot study.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 87-90.—Exposed 6 female junior college students to a subliminal stimulus consisting of a 35-mm color slide of a whiskey bottle with a champagne glass partially filled with liquor and the word "poison" printed in capital black letters on the top of the bottle. An alcoholism questionnaire given to Ss and 16 controls on 2 separate occasions indicates that programed exposure of a noxious subliminal stimulus significantly modified attitudes toward alcoholism for the experimental Ss. Findings suggest that stimuli which are not consciously perceived or directly experienced can influence attitudes.—M. E. Pounsel.

7204. Heath, Dwight B. (Brown U) **[Sociocultural perspectives of alcohol in Latin America.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Apr), Vol 20(2), 99-111.—Reviews the literature dealing with alcohol in Latin America in sociocultural perspective; i.e., the ideological, economic, political, religious, and other social and cultural aspects that differentiate human populations. In some minority populations (e.g., certain religious groups), it has been found that not only do patterns of ingestion and use of alcohol vary, but also that the various forms, meanings, functions, and interpretations of alcohol are intimately related to other aspects of the culture—social organization, philosophy, psychology, folklore, and even witchcraft. (6 p ref) —English summary.

7205. Hemminki, Elina; Rissanen, Aila & Mattila, Antti. (U Helsinki) **Drug use among schoolchildren in Helsinki 1970.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 159-165.—Surveyed a total of 2,702 17-, 15-, and 14-yr-olds to determine differences between drug and nondrug users in Helsinki. Questionnaire results indicate that (a) 25% of all Ss had taken drugs, with hashish being used most frequently; (b) the social background of drug-takers and nontakers did not differ greatly; (c) and drug-takers had lower school achievement, were more extroverted and impulsive, had more friends, and were more rebellious and alienated. Ss also indicated that the most important reason leading to drug-taking was curiosity. It is suggested that different

problems and social pressures lead to drug-taking among youth in general. (21 ref)—*Journal abstract*.

7206. Hempel, Donald J. (U Connecticut) **Family buying decisions: A cross-cultural perspective.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 295-302.—Presents cross-cultural comparisons of husband-wife interactions in 5 specific house-buying decisions. Data were obtained from surveys of 206 families in the eastern US and 317 families in northwest England. Using interviews and questionnaires, 2 measures of husband-wife roles were assessed: the husband was asked to identify who was "mainly responsible" for decisions, while the wife indicated the "relative influence" of each partner in the 5 decisions (choice of neighborhood, style of house, when to buy, acceptable price, and mortgage source). Family role structure was classified into 1 of 4 categories (husband dominant, wife dominant, syncratic, or autonomic) depending on who made the decisions most often. Overall data show that perceived role varies more by sex of respondent and by stage in the decision process than by the cultural context of the purchase, and that the extent of husband-wife agreement is related to family size, stage in life cycle, attitudes toward previous residence, and life-style. (39 ref)—L. Gorsey.

7207. Herman, C. Peter. (Northwestern U) **External and internal cues as determinants of the smoking behavior of light and heavy smokers.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 664-672.—Studied 108 light and heavy smokers (male undergraduates) to assess the role of external and internal smoking cues as determinants of smoking behavior, as an analogy to S. Schachter's (1971) model of eating behavior. It was predicted that light smokers would be more affected by the manipulation of external cues and heavy smokers more affected by the manipulation of internal cues. For heavy smokers, internal cues were of major importance; for light smokers, both external and internal cues were influential. A number of models are proposed to account for the data.—*Journal abstract*.

7208. Holmes, Kay A. **Reflections by gaslight: Prostitution in another age.** *Issues in Criminology*, 1972(Win), Vol 7(1), 83-101.—Discusses the evolution of public awareness of prostitution and indignation regarding it between 1897 and 1920, resulting in the codification of laws that are still in effect. 2 attitudes were dominant: that of the humanitarians, who advocated compassion for women forced into prostitution by environmental and class realities; and that of the control group, who saw the prostitute as a decadent, feeble-minded nonperson who should be treated as a demented criminal and severely punished. It is contended that the latter attitude remains legally in force today.—J. E. Bassett.

7209. Hood, Ralph W. (U Tennessee, Chattanooga) **Cognitive and affective rejection of mentally ill persons as a function of dogmatism.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 543-549.—Studied cognitive and affective attitudes toward the mentally ill in 83 introductory social psychology students categorized on the basis of their Rokeach Dogmatism Scale scores. On a purely cognitive level, high-dogmatic Ss held more stereotypical attitudes toward the mentally ill than low-



dogmatic Ss. After a series of regularly scheduled lectures on the social psychology of deviance in a normal classroom situation, high-dogmatic Ss significantly decreased their stereotypical attitudes toward the mentally ill. However, on semantic-differential scales to measure affective attitudes toward the mentally ill high-dogmatic Ss increased their affective rejection of the mentally ill after this series of regularly scheduled lectures. There was no difference between high- and low-dogmatic Ss on an objective test measuring learning with respect to the lectures on deviance. The implications of these data for dogmatism theory are discussed, especially in terms of the relationship between dogmatism, anxiety, and the cognitive and affective rejection of others. (31 ref) —*Journal abstract.*

7210. Insel, Paul M. & Moos, Rudolf H. (Eds.). (Stanford U) **Health and the social environment.** Lexington, MA: D. C. Heath, 1974. xv, 460 p. \$16. —Presents a collection of 30 research and discussion articles which cover basic theories, research strategies, issues, and conclusions about the impact of the psychosocial environment on health and illness. Topics include psychosomatic disorders and environmental stimuli, social correlates of heart disease, social dimensions in obesity, and drugs and their social consequences.

7211. Irvine, Lynn M. & Brelje, Terry B. (Eds.). (Illinois Security Hosp, Chester) **Law, psychiatry and the mentally disordered offender: II.** Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.

7212. Janisse, M. P.; Perlman, D. & Perry, R. P. **Water-resource management: A psychological perspective.** In *The allocative conflicts in water-resource management.* Winnipeg, Canada: University of Manitoba, Agassiz Center for Water Studies, 1974. —Reviews psychological literature related to water, focusing on fluoridation, attitudes about water pollution, changing attitudes, and combating pollution via operant techniques. (84 ref)

7213. Johnson, Clara J. (U Georgia, School of Social Work, Regional Inst of Social Welfare Research) **Attitudes toward premarital sex and family planning for single-never-pregnant teenage girls.** *Adolescence*, 1974(Sum), Vol 9(34), 255-262. —A questionnaire covering attitudes toward premarital sex and family planning was administered to 50 black mothers (18 single, 16 married, and 16 separated or widowed). Results indicate a direct relationship between age and conservative attitudes toward premarital sex, but not when marriage status was controlled. All Ss disapproved of premarital sex without contraceptive measures and all but 4 approved of family planning for unmarried, never-pregnant teenagers. (17 ref) —*A. Krichev.*

7214. Juhasz, Anne M. (Loyola U, Chicago) **The unmarried adolescent parent.** *Adolescence*, 1974(Sum), Vol 9(34), 263-272. —Discusses the extent of illegitimacy, factors influencing it, and demographic findings about unwed mothers and fathers. Problems arising from such pregnancies are numerous, particularly if the child is carried to birth. More comprehensive sex education, wider knowledge and acceptance of contraception, and better understanding of the unwed-family constellation should make it possible to decrease the number of unwanted children. (22 ref) —*A. Krichev.*

7215. Kaiser, Fred M. & Lilly, J. Robert. (U Pittsburgh) **Partisanship, realignment, and intensity among voter registrants at a small college.** *New Scholar*, 1974(Spr), Vol 4(2), 223-243. —Conducted a questionnaire survey of 362 students to determine factors contributing to voting patterns. Attitudinal differences among those registering for different parties, reinforcing relationships, transfers from partisan heritages, and the influence of transfers between parties were examined. It is suggested that the finding of little congruence among attitudes may explain the lack of strong partisan loyalties, increased split-ticket voting, vote switching between elections, and low turnout rates. (31 ref) —*Journal summary.*

7216. Kilpatrick, William. (Boston Coll, School of Education) **Identity: Continuity, fidelity and future shock.** *Adolescence*, 1974(Sum), Vol 9(34), 285-288. —Draws attention to the wide discrepancy between the requirements of identity formation and the demands of rapid social and technological changes.

7217. Lerner, Steven E.; Linder, Ronald L. & Drolet, Judy C. (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Drugs in the high school.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 187-195. —Observation of 616 high school students indicates that (a) an upward trend of psychoactive drug use was apparent within the lower grade levels; (b) while patterns of drug use existed between parochial and public high school sophomores, by their junior year the 2 groups were similar; and (c) over half of the public school students claimed they took drugs either "for kicks" or "for curiosity." —*Journal abstract.*

7218. Lerner, Steven E.; Linder, Ronald L. & Burke, Elaine M. (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Drugs in the junior high school: II.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 51-56. —Administered a questionnaire on drug use patterns to 310 previously studied 7th graders now in 8th grade at a suburban San Francisco junior high school (see PA, Vol 53:Issue 4). Ss' use patterns and their perceptions of their parents' use of selected drugs were recorded. This 1-yr longitudinal study indicated greater experimental and regular use of hard liquor, tobacco, marijuana, heroin, LSD, and codeine. Marijuana use increased by 16.35%, hard liquor use by 9.95%, and tranquilizers by 4.82%. Ss perceived their fathers as using less amphetamines than did students and their mothers and using more tobacco, beer-wine, and hard liquor than did their mothers. They saw their mothers as greater users of amphetamines, barbiturates, and tranquilizers. Drug use is indicated to increase by grade level and students are provided role models for drug use by their parents. —*R. Tomasko.*

7219. Lifton, Robert J. & Olson, Eric. (Yale U) **Living and dying.** New York, NY: Praeger, 1974. 156 p. \$6.50. —Examines the psychological and cultural significance of death and suggests that death is the kind of problem for our culture that sex was for the Victorians. The concept of the "pornography of death" is introduced, and ideas on death and the life cycle, death in history, and symbolic immortality are discussed. (2 p ref)

7220. Linder, Ronald L.; Lerner, Steven E. & Burke, Elaine M. (California State U, San Francisco) **Drugs in the junior high school: I.** *Journal of Psychedelic Drugs*.

1974(Jan), Vol 6(1), 43-49.—Administered a questionnaire on use of psychoactive drugs by sex and grade, reasons for drug use, and drug cost to 776 7th and 8th grade students at a suburban San Francisco junior high school. Results indicate a greater usage of alcohol, tobacco, marihuana, amphetamines, barbiturates, and LSD as the students advanced in grades. Males concentrated on depressants; females used a wider variety of drugs. At the 7th grade level, females most likely used tobacco and inhalants; males used alcohol. In 8th grade, females used amphetamines, tranquilizers, and LSD to a greater extent; males continued to dominate in alcohol use. Ss attributed their use of drugs to peer pressure, curiosity, and for "kicks."—R. Tomasko.

7221. Lipowski, Z. J. (Dartmouth Coll, Medical School) **Sensory overloads, information overloads and behavior.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7222. Lobenthal, Joseph S. (New School for Social Research) **A lawyer views mental health personnel.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.—Discusses the differing roles of the mental health professional and the lawyer in terms of their goals and procedures and the needs of the system, client, and professional. Suggestions about the proper role of the psychiatrist in the courtroom and how to make his opinions more meaningful are presented.

7223. Lykken, David T. (U Minnesota, Mayo Hosp) **Psychology and the lie detector industry.** *American Psychologist*, 1974(Oct), Vol 29(10), 725-739.—Indicates that although the lie detector industry is already a major area of applied psychology, few professional polygraphers have psychological training and few psychologists know enough about the industry to monitor its practices. The theory and methods of polygraphic interrogation are analyzed. It is argued that although it is unlikely that the polygraphic lie detector could have the claimed near-perfect validity, there should be greater and more skillful use of the polygraph in criminal investigation. Some of the limitations of the instrument in employee screening are discussed. (17 ref)—*Author abstract*.

7224. Madron, Thomas Wm.; Nelsen, Hart M. & Yokley, Raytha L. (Western Kentucky U) **Religion as a determinant of militancy and political participation among black Americans.** *American Behavioral Scientist*, 1974(Jul-Aug), Vol 17(6), 783-797.—Analyzed data from a stratified systematic sample of 405 black and white adults. Dependent variables were militancy and political participation. Religious independent variables were orthodoxy and devotionism. Nonreligious independent variables were education, powerlessness, sense of citizen duty, self-esteem, and political socialization. Black orthodoxy was inversely related to participation (in the first canonical structure only) and positively related to militancy (in both structures). White orthodoxy was an important inverse predictor of militancy (or receptivity to civil rights). Findings support the argument that some of the problems in analyzing black political

behavior stem from applying "white" concepts to black respondents. (42 ref)—J. J. Parnicky.

7225. Malpass, Roy S. & Symonds, John D. (State University Coll New York, Plattsburgh) **Value preferences associated with social class, sex, and race.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 282-300.—Measured, in 10 groups of Ss in 2 separate and geographically distinct settings in the US, preferences for 92 values. Groups consisted of a total of 118 black and 288 white high school students, undergraduates, and unemployed adults of lower- and middle-class status. Factor analysis showed 5 shared value composites: (1) the good life, (2) pleasant working companions, (3) balance and adjustment, (4) artistic creativity, and (5) religiousness. Class differentiated groups more than race or sex on composites 1-4. Middle-class groups showed lower preference for the 1st 2 and higher for the 3rd value composite, as compared with lower-class groups. Black groups showed higher preference than whites for the 5th. Results show that the greatest differentiation of groups occurred when they were combined on the basis of social class. (34 ref)—*Journal abstract*.

7226. Marinoff, Stanley C. & Fiedler, Dolores E. (Group Health Assn, Washington, DC) **Some factors affecting staff attitudes toward offering intrauterine devices for adolescent patients.** *Public Health Reports*, 1974(Jul-Aug), Vol 89(4), 372-376.—Studied the contraceptive methods prescribed at 2 clinics for girls under 17. At one clinic, 70% (98) of the girls were prescribed an intrauterine device (IUD) and 16% (23) the pill. At the 2nd clinic, 4% (10) were prescribed an IUD while 79% (215) were prescribed the pill. It was found that the attitude of the clinic staff toward inserting an IUD in nulliparous patients was a major factor in the choice of contraceptive method.—S. Blackman.

7227. Marshman, Joan A. (Ed.). **Street drug analysis and its social and clinical implications.** Toronto, Canada: Alcoholism & Drug Addiction Research Foundation, 1974. v, 120 p.—Presents a collection of 8 symposium papers on methods, procedures, and implications of street drug analysis. Topics include the evolution of counterculture drug analysis programs, gas chromatographic mass spectrometric analysis of street drugs in the body fluids of overdose victims, and street drug information for health care personnel.

7228. McCleary, Roland D. **Child alcoholism as seen by the school in Illinois.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 182-186.—Explores various attitudes surrounding the use of drugs in general, and alcohol in particular, in the US. Possible factors in the use of alcohol are discussed.

7229. Merklin, Lewis. **They chose honor: The problem of conscience in custody.** New York, NY: Harper & Row, 1974. xxvi, 325 p. \$8.95.—Presents descriptions of the experiences of 6 war and draft resisters who chose to go to prison instead of escaping to Canada. Various aspects of life in a federal penitentiary, attitudes of the prison officials and guards toward the men, and issues involved in granting amnesty to men who never considered themselves criminals are discussed.

7230. Mersereau, Guy. (Erie County Dept of Mental Health, Forensic Psychiatry Service, Buffalo, NY) **The**



**talking criminal: A biological and political phenomenon.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.—Discusses the need for communication between the criminal justice and mental health systems. The interactions between criminal and "counter-criminal" systems, and implications for staff training, therapeutic procedures, and the relationships between large social systems are discussed.

7231. Midlarsky, Manus I. (U Colorado) **Power, uncertainty, and the onset of international violence.** *Journal of Conflict Resolution*, 1974(Sep), Vol 18(3), 395-431.—Attempts to explain the onset of international warfare by defining power as a capability to effect a reduction of environmental uncertainty, while the exercise of power for the benefit of an actor is the actual reduction of that uncertainty. 8 types of power configuration are specified, including, among others, control, subservience, constraint, and inversion. Based on an analysis of historical data, the conditions of power loss in alliance systems and power constraint in the form of geographical frontiers were related to the frequency of war for central power nations. An alternative approach stemming from theories of international stability yields the same functional relationship as does the initial power framework. Additionally, a logarithmic relationship between the number of international poles existing in the period 1815-1945 and the frequency of war was obtained. (36 ref)—*Journal abstract*.

7232. Monsour, Karem & Stone, Beth. (Claremont Coll) **The Hawaiian trip: A study of a segment of American youth.** *Psychiatric Annals*, 1974(Jun), Vol 4(6), 6-53.—Interviewed and administered the Omnibus Personality Inventory (OPI) to 15 male and 15 female American adolescents from the US mainland who were living in Maui, Hawaii. Ss were Caucasian and middle class, with a disproportionate number of Catholics. The OPI indicated active emotional lives and an emphasis on experiential learning. Attitudes expressed in interviews confirmed this impression, revealing a "here and now" orientation. Drug use, which had been prevalent in Ss' histories, was reduced to the use of marihuana. It is noted that only 1 S came from a truly disorganized family background; most were from mutually accepting, intact homes. This group is seen to be typical of American youth who have well-formed identities that conflict with societal norms and expectations.—C. Wright.

7233. Munsinger, Harry. (U California, San Diego) **Human quality control: The breeding and feeding of genius.** Pacific Palisades, CA: Goodyear, 1972. x, 128 p.

7234. Muramatsu, Minoru. (Inst of Public Health, Section of Public Health Demography, Tokyo, Japan) **Psychological research in family planning: A view from Asia.** *Professional Psychology*, 1974(Aug), Vol 5(3), 344-346.—Provides a brief overview of research on family planning in Asia, pointing out the lack of studies on socioeconomic, cultural, and psychological factors. A questionnaire study in Japan investigating the desire for more children among couples with 2 or 3 children is reported. Results indicate that a majority of these individuals did not want more children and that the

influence of sexual preference on childbearing attitudes in Japan is decreasing.—C. Wright.

7235. Mylonas, Anastassios D. **Perception of police power: A study in four cities.** *Criminal Law Education & Research Center, Monograph Series*, 1973, Vol 8, 131 p.—Attempted to determine whether working concepts of criminal procedure can be transplanted from one country to another, where they might form the basis for modifying the criminal justice system for greater effectiveness and popularity. This phase of the study was concerned with the identification and attribution of police power in the police phase of the criminal procedure, as they reveal themselves in the conceptions of divergent population groups.—R. Gunter.

7236. National Clearinghouse for Drug Abuse Information. (Rockville, MD) **National Clearinghouse for Drug Abuse Information briefing report.** *National Clearinghouse for Drug Information, Report Series*, 1972(Jul), Ser 9(2), 11 p.—Describes the purposes and services of the National Clearinghouse for Drug Abuse Information: distribution of general information on drug abuse—publications, films, records, plays, and posters; response to public inquiries; a computerized information-retrieval system; and a communications network system.

7237. Nelson, Daniel J. & Reed, Margaret L. (Auburn U) **The use of simulation in interracial and interinstitutional programs in international relations.** *Simulation & Games*, 1974(Jun), Vol 5(2), 212-218.—Night school students from 2 racially homogeneous Southern universities (37 white and 20 black students) participated in a simulation exercise—Inter-Nation Simulation—for 4 wks. All 10 prototype nations in the game were of mixed racial composition. The only significant differences between blacks and whites were on questions evaluating simulation as a learning device (with white students rating the exercise much higher). No differences between blacks and whites were found on other variables, including approval or disapproval of the interracial nature of the simulation and the value of the simulation as a device for improving racial understanding.—D. E. Anderson.

7238. Newmeyer, John A. (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Five years after: Drug use and exposure to heroin among the Haight-Ashbury Free Medical Clinic clientele.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 61-65.—Administered a 25-item questionnaire on drug use to 81 clients of Haight-Ashbury Free Medical Clinic. Responses were compared to a similar 1967 survey taken at the same facility. Comparison indicates a sharp drop in the use of psychedelics, a moderate drop in the use of marihuana and amphetamines, a sharp rise in heroin use, and a possible rise in barbiturate use. Special attention was given to heroin use, which was noted to be more extensive for males and persons of lower socioeconomic class. It directly correlated to other drug use and appeared mediated more by friends than pushers. It is suggested that barriers to the growth of the heroin epidemic can be enhanced by the presence of a certain number of addicts in the community serving as negative role models.—R. Tomasko.

7239. Nicholi, A. M. (Harvard U, Medical School, Boston) **Emotional determinants of LSD ingestion.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 223-225.—Explored some of the psychological reasons for ingestion of LSD by interviewing 37 Harvard and Radcliffe undergraduates. Many of those interviewed were seen as patients in the university health services. Reasons for initial use were given as follows: (a) poor relationships with other people and a desire to improve them; (b) extreme dissatisfaction with self, characterized by high expectations and poor performance; (c) alienation from and hostility to the adult world; (d) feelings of inadequacy; and (e) a strong sense of moral worthlessness and a desire to feel some religious experience. The majority of the Ss discontinued use of the drug after relatively few experiences with it, mainly because of the failure of LSD to meet their expectations and its inconsistency in providing the desired mood alteration. Frequently students later turned to other types of drugs, primarily marihuana and "downers."—A. de la Haba.

7240. Nolan, Seneca H. (Metropolitan Police Dept, St Louis, MO) **The law enforcement officer and the mentally disordered offender.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.

7241. Oswalt, Robert M. (Skidmore Coll) **Sexual and contraceptive behavior of college females.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 392-394.—Surveyed 10% ( $N = 180$ ) of the females at 1 college, with 90% of this sample responding, to obtain current scientific information on sexual and contraceptive behavior. Comparisons are made with earlier studies. Results indicate that the percentage of females engaging in sexual intercourse increased substantially in the last few years, but there was not a concomitant increase in promiscuity. A certain disregard for the possibility of pregnancy was evidenced with data showing only 40% of the sexually active students protected all the time. 5% of the entire student body had been pregnant, which was a surprising finding considering the socioeconomic and education level.—A. de la Haba.

7242. Pandey, Rajendra. (U Gorakhpur, India) **An overview of sociology of students unrest.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 29-34.—Discusses, in broad terms, student unrest, protest, disruption, and violence. Their historic origins, present nature, suspected causes, suggested remedies, and specific obstacles to corrective action are examined. Some emphasis is placed on peculiarities of the situation in India. Behavior patterns are stressed, along with similarities of student conduct in different countries. Positive as well as negative aspects of student rebellion are considered. (18 ref)—D. Berliner.

7243. Penn, J. Roger. (Oregon State U, Ctr for Research on Student Life & Development) **College student life-style and frequency of alcohol usage.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 220-222.—Gathered questionnaire data from 1,294 university students concerning their alcohol usage and its relation to their selected life styles.

95% of the Ss admitted alcohol consumption; of these 68% drank hard liquor and 76% drank wine or beer. Greater numbers of the drinking group lived in fraternities and in off-campus situations rather than in dormitories and co-operatives where the social pressure to drink was less evident. Frequency of consumption was higher than anticipated. Nearly half the sample had used marihuana and 38% believed that it was less harmful than alcohol.—A. de la Haba.

7244. Phillips, Warren R. & Lorimer, Theron. (Ohio State U) **The impact of crisis upon the behavior of nations in the 1960's.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 423-445.—Investigated conflicting aspects of interacting dyads, involving international crises which occurred between June 1962 and July 1968, to discern the conflictual dimensions of national behavior in crises. In addition, conflict behavior was examined for those periods immediately prior to and immediately following crisis situations. This resulted in dimensions of conflict behavior for pre-, during-, and postcrisis periods. The periods were contrasted with one another to gain a better conception of the behavior exhibited. Results show that the dimensions of behavior changed in predictable ways in the shift from one period to another. The behavior of individual dyads shifted in ways which were not predictable by simple linear technique.—*Journal abstract.*

7245. Puska, Pekka. (U Turku, Suomi, Finland) **University students' health behavior.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 200-201.—Studied the health behavior of 250 students at the University of Turku, Finland, and of a control group of the nonstudent population with the same sex and age distribution. Results show that 83% of the students came from elsewhere while most of the control group had lived in the city for a longer time. The control group had more married people than the students. Students smoked less, and over a shorter time span, than controls. No differences were noted in frequency of using spirits. Students ate more irregularly and slept longer. The control group had more physical activity, aside from sports, than the students. In general there was little significant difference between the 2 groups.—A. de la Haba.

7246. Rossi, Peter H. et al. (Johns Hopkins U) **Measuring household social standing.** *Social Science Research*, 1974(Sep), Vol 3(3), 169-190.—Describes the use of the prestige concept to measure household social standing and to show that people recognize that households have social standings in the same way that occupations have social standings. A model of how a limited number of characteristics of adult household members (e.g., occupation and educational attainment) contribute to their household's overall standing is presented. Short descriptions of households (vignettes) were developed which were then presented to a probability sample of white adults over 18 in Baltimore who were asked to rate the social standing of the household. Findings support the conclusions that (a) it is possible to provide an operational definition to the concept of social standing as applied to households; (b) on the level of both collective and individual assessments, the same principles are applied in combining husbands' and wives'



occupational and educational achievements in deriving judgments of social standing of households; and (c) there is considerable consensus over the social standing and the principle of combining household members' characteristics.—*L. Gorsey.*

7247. Rouse, Beatrice A. & Ewing, John A. (U North Carolina, Medical School, Chapel Hill) **Student drug use, risk-taking, and alienation.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 226-230.—Conducted a study to determine whether drug use had increased in a college population studied 2 yrs previously, what kinds and levels of risks Ss associated with various drugs, and the extent of alienation of the marihuana groups. Frequency of use, and the reasons for it, drugs other than marihuana used, risks perceived, percentage of males who drove following use of marihuana or alcohol, and indicators of alienation are presented in tables. Findings show increased use, with the perception of arrest and punishment as the primary risk. Few significant associations were found between possible indicators of alienation and marihuana use. (18 ref)—*A. de la Haba.*

7248. Schmidt, Michael M. & Buys, Christian J. (New Mexico Inst of Mining & Technology) **Environmental attitudes of technological students.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 407-410.—Surveyed environmental attitudes of 47 students at a technical college. Attitudes assessed were (a) perceived severity, causes, and solutions of environmental problems; and (b) personal commitment to solutions. Ss who perceived environmental problems as severe were older, from larger families, and were more committed personally to the solutions. Similarly, Ss who perceived causes of problems as institutional were less religious, perceived the problem as severe, and were committed personally to solutions.—*Journal abstract.*

7249. Schulman, Robert E. (Menninger Clinic, Div of Law & Psychiatry, Topeka, KA) **Determination of competency: Burial at the crossroad.** In L. M. Irvine & T. B. Brelje (Eds.), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.—Discusses the clinical and legal issues in the determination of competency to stand trial. It is argued that competency to stand trial interferes with the goal of criminal law and that a potentially dangerous collaboration exists between the legal and medical establishments which may serve to violate the rights of the patient.

7250. Shaw, R. Paul. (U British Columbia, Resource Science Ctr, Vancouver, Canada) **A conceptual model of rural-urban transition and reproductive behavior.** *Rural Sociology*, 1974(Spr), Vol 39(1), 70-91.—Seeks to identify and interrelate determinants of reproductive performance in the context of rural-urban transition and accompanying socioeconomic development. Focus is on the integration of sociological, economic, demographic, and biological considerations as a means of understanding that reproductive behavior is largely an adjustment to the socioeconomic environment. Accordingly, exogenous intervention to modify reproductive behavior without modifying the socioeconomic context as well will probably be futile. Empirical results of a number of

regression studies are summarized in support of the proposed model.—*Journal abstract.*

7251. Sheth, Jagdish N. & Wright, Peter L. (Eds.). (U Illinois) **Marketing analysis for societal problems.** Urbana-Champaign, IL: University of Illinois, 1974. 270 p. \$5.75.—Presents a collection of 11 symposium papers on conceptual foundations of social marketing analysis and how various social problems can be viewed within a marketing framework. Topics include vertical market structure theory and the health care delivery system, persuasion theory in social marketing, education problems and marketing, and the effects of race and retail structure on consumer behavior.

7252. Shikier, Richard. (Colorado State U) **The perception of politicians and political issues: A multidimensional scaling approach.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 461-477.—Undertook the multidimensional scaling (MDS) of attitude statements and political candidates in the same multidimensional space, proposing that (a) the position of the attitude statements would explicate the nature of the factorial structure of politicians; (b) the underlying dimensions would demonstrate whether candidates are perceived in terms of relevant political dimensions, and (c) the scaling would reveal the extent of individual differences, especially those based on political affiliation. 115 adults were recruited from various sources, including local campus political clubs. L. R. Tucker's (see PA, Vol 48:8104) 3-mode model of MDS was used to analyze the similarity judgments of these Ss. Results indicate that politicians were perceived in terms of the relevant issues and that Republicans and Democrats differed markedly in their perception of the political arena. (33 ref)—*Journal abstract.*

7253. Siassi, Iradj & Wesner, David O. (Rutgers State U, Medical School, Piscataway) **Women's liberation and the two adolescent movements.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 99-108.—Presents the thesis that women view women's liberation in the same way that adults view adolescence. The liberated state appears to have many of the idyllic qualities of adolescence and is currently enjoyed principally by men.—*W. R. Street.*

7254. Simon, William E. (Southampton Coll) **Psychological needs, academic achievement and marijuana consumption.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 496-498.—44 undergraduate marihuana users were asked to complete the Edwards Personal Preference Schedule and to report their high school and college grade-point averages. Ss were compared to a control group of 44 undergraduates who never had used marihuana. Users scored significantly higher on the Change, and Aggression, while nonusers scored significantly higher on the needs for Achievement and Order. Nonusers also had significantly higher high school and college grade-point averages. (19 ref)—*Journal summary.*

7255. Sims, John H. & Baumann, Duane D. (Eds.). (George Williams Coll) **Human behavior and the environment: Interactions between man and his physical world.** Chicago, IL: Maaroufa Press, 1974. ix, 354 p.—Presents a collection of 18 papers on man and his environment and how they act as manipulators of each other. Topics include the historical and cultural roots of

the current ecological crisis, environmental coping styles, the role of values in social action, the experience of living in cities, a social-psychological model of crowding, and the social effects of the physical environment.

7256. **Sinnett, E. Robert; Arata, Christine L. & Bates, Rodney A.** (Kansas State U) **Methods of administration of street drugs: Stereotypes, actuality, and perceived dangers.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 535-542.—Interviewed 47 16-26 yr old multiple drug users and abusers to ascertain their methods of self-administration of street drugs. Results indicate that stereotypes associating a particular drug with a particular method of self-administration are of dubious value. They do not reflect the diversity of methods commonly employed by users. Both drug substance and method of administration had a marked influence on users' judgments of the danger of various drug experiences. (15 ref) —*Journal abstract.*

7257. **Smart, Reginald G. & Fejer, Dianne.** (Addiction Research Foundation, Toronto, Ontario, Canada) **Marihuana use among adults in Toronto.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 117-128.—Investigated (a) the extent of marihuana use among 1,200 Canadian adults, (b) the relationship between marihuana use and various social and demographic characteristics, (c) the relationship of personality traits, neuroticism, and extroversion to marihuana use, (d) the extent of various psychological problems among users and nonusers and the methods which they use for coping with them, and (e) multi-drug use among marihuana users. Results show that 12.2% of males and 5.5% of females aged 18 and over had used marihuana in the past yr; the frequencies rose to 41.5% and 20% respectively, in the under-25 group. Marihuana use was most common among males, single or divorced persons, and the better educated. However, social variables did not explain the variation in marihuana use frequency. Multi-drug use, including higher use of alcohol, characterized marihuana users. They were similar in extroversion and neuroticism to normals but higher in both than nonusers. (22 ref) —*Journal abstract.*

7258. **Stein, Robert M.** **The incest wound.** *Spring*, 1973, 133-141.—Suggests that the split between love and sex is a direct consequence of the incest wound. When the tension between the incest desire and prohibition is obliterated, fragmentation results, and the essential union of the masculine and feminine opposites is not possible. It is felt that the severity of the incest wound can be measured by the degree of fear about losing rational control, whether or not it is related to sexuality. It is suggested that when the repression of instincts becomes necessary in a culture, this is a sign something has gone wrong with societal institutions for regulating incest.—*A. Farrell.*

7259. **Stillwell, Rachel & Spencer, Christopher.** (U Sains Malaysia, School of Comparative Sciences, Minden, Penang) **Children's early preferences for other nations and their subsequent acquisition of knowledge about those nations.** *European Journal of Social Psychology*, 1973, Vol 3(3), 345-349.—Studied 22 male and female junior high school Ss in England to examine the hypothesis that Ss may have more information about liked and disliked nations than about those toward which

they are neutral. Ss were pretested on knowledge and preference toward 5 major nations and retested after acquiring information about these countries. Results show greater knowledge of liked and neutral countries than about disliked nations. There was also a significant increase in knowledge of all nations after a week of information, with the greatest increase in knowledge of disliked nations. Ss preferred nations which were near their own in cognitive space. It is concluded that preference for a nation depended on the amount of knowledge about the country and on the perceived similarity of that country to one's own.—*M. K. Phifer.*

7260. **Tietze, Christopher.** **The "problem" of repeat abortions.** *Family Planning Perspectives*, 1974(Sum), Vol 6(3), 148-150.—Presents estimates of expected repeat abortions. The statistics indicate that a significant incidence of repeat abortions can be expected within a year or 2 following 1st abortion or liberalization of abortion laws. Skillful counseling is recommended to increase postabortal use of contraception.

7261. **van Deusen, Edmund L.** **Contract cohabitation: An alternative to marriage.** New York, NY: Grove Press, 1974. vii, 149 p. \$6.95.—Describes the concept of contract cohabitation—a personal relationship similar to that between an employer and an employee, including all regular aspects of a job (e.g., vacations, salaries, regular hours, and set responsibilities). Procedures for setting up this type of contractual relationship and the author's own experiences with this alternative life-style are described.

7262. **Vanck, Joann.** (Queens Coll, City U New York) **Time spent in housework.** *Scientific American*, 1974(Nov), Vol 231(5), 116-120.—Contrary to expectation, women who are not in the labor force devote as much time to housework as women did 50 yrs ago, although the nature of the work has changed. Urban and rural women have spent about the same amount of time in housework throughout the last 50 yrs. Women in the labor force devote about half as much time to household tasks as nonemployed women. Factors giving rise to high expenditures of time in housework are discussed.—*P. Tolin.*

7263. **Vessey, Martin P.; Johnson, Bridget & Donnelly, James.** (Radcliffe Infirmary, Oxford, England) **Reliability of reporting by women taking part in a prospective contraceptive study.** *British Journal of Preventive & Social Medicine*, 1974(May), Vol 28(2), 104-107. Reports on a prospective study in progress at 17 family planning clinics to provide a balanced view of the beneficial and harmful effects of different methods of contraception. Data about pregnancies and their outcome, hospital visits, and changes in contraceptive practices have been collected from participants since 1968. In the present investigation, the reliability of this data was checked by comparing information obtained by the routine survey methods from 1,915 Ss attending 2 Scottish clinics with information obtained from maternity and hospital inpatient records. It was found that no births, miscarriages, terminations of pregnancy, or admissions for sterilization had been missed in the prospective study, while 90% of all other hospital admissions were reported. No evidence was obtained of any important variation in the reliability of reporting



between users of different methods of contraception or between different methods of collecting follow-up information.—*Journal abstract.*

7264. Weeks, Joseph L.; Mullins, Cecil J. & Vitola, Bart M. Prediction of drug abuse by the Life Values Questionnaire. *US AFHRL Technical Report*, 1974(Aug). No 74-60, 16 p.—Administered the Life Values Questionnaire (LVQ). Psychological Distance Questionnaire, and Assumed Similarity of Opposites Test to 1,682 male US Air Force basic trainees. The investigation was conducted to determine if the measures contributed significantly to the prediction of 7 drug abuse criteria when combined with available demographic and aptitude variables. Results indicate that only the LVQ added significantly to prediction. Although the validities yielded by the LVQ for the criteria were not high, it appears that its predictive variance is unique.—*Journal abstract.*

7265. Weijel, J. A. (U Amsterdam, Inst of Social Medicine, Netherlands) The influence of social security in an affluent society on illness behaviour. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7266. Weisberg, Robert. (Skidmore Coll) Stylizing civilization: A brief history of Watergate. *Review of Existential Psychology & Psychiatry*, 1973, Vol 12(2), 129-140.—Discusses the role of American susceptibility to the media and advertising in the development of Watergate from an event of limited political importance to an aesthetically and psychologically significant national myth.

7267. Wellisch, David & Hays, J. Ray. (U Houston) A cross-cultural study of the prevalence and correlates of student drug use in the United States and Mexico. *Bulletin on Narcotics*, 1974(Jan-Mar), Vol 26(1), 31-42.—Compared information obtained from students in Monterrey, Mexico, and Houston, Texas. Alcohol and tobacco were the substances most frequently used, tobacco use being reported more often in Mexico. Use of marihuana and alcohol was equally prevalent in both samples, and appeared to be age-related. Male users outnumbered females for all substances except cough syrup. Opiates and cocaine were considered by drug users to be the most dangerous.—A. S. Kulkarni.

7268. Whittaker, James K. (U Washington) A further comment on Barnes and Kelman. *Child Care Quarterly*, 1974(Sum), Vol 3(2), 130-132.—Criticizes a new model for child care work by F. Barnes and S. Kelman on the following grounds: (a) lack of evidence indicating need for a new type of child care professional, (b) failure to develop the model sufficiently, and (c) no comparison of effectiveness with previous models. A rejoinder by Barnes follows.—J. H. Feldstein.

7269. Wildman, Robert W. II & Wildman, Robert W. (Georgia State U) Liberalism of college students and general public on the Thumin Conservatism-Liberalism Scale. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 441-442.—Administered Thumin's Conservatism-Liberalism Scale to 30 college students and to 30 nonstudents. As in Thumin's original sample, the students obtained a mean score very close to the scale's absolute center.

However, the nonstudent group made significantly more conservative scores. These findings suggest that students are liberal on a relative basis and that identifying the center of the Thumin scale with the middle of the political spectrum may be unjustified.—*Journal abstract.*

7270. Winburn, G. Michael & Hays, J. Ray. Dropouts: A study of drug use. *Journal of Drug Education*, 1974(Sum), Vol 4(2), 249-254.—Surveyed a group of 144 high school dropouts to study the prevalence and correlates of their drug use as compared to that of 2,277 high school students. Tobacco (74%) and alcohol (71%) were reported to be the most used of 9 categories of substances included in the survey. Next highest categories of use were of marihuana (38%) and stimulants (31%). The category of drugs with the lowest overall reported use was opiates or cocaine, with 11.9% of the dropouts reporting use. Results are reported according to grade level, sex, and ethnicity.—*Journal abstract.*

7271. Wortzel, Lawrence H. & Frisbie, John M. (Boston U) Women's role portrayal preferences in advertisements: An empirical study. *Journal of Marketing*, 1974(Oct), Vol 38(4), 41-46.—Studied the reactions of 100 21-35 yr old women to advertising illustrations portraying women as housewives or as career women. Respondents selected illustrations for ads and were then given a scale measuring attitudes toward the Women's Liberation Movement. It is concluded that ads showing women may portray them in household roles if the roles are appropriate to the products. If the product is for personal use, nontraditional roles are preferred. Even among women with positive attitudes toward Women's Liberation, the product is more important than the movement in determining which role portrayal will most enhance product desirability.—D. Twedt.

7272. Young, John L. (U Notre Dame) Coping with student drug use. *Journal of Pastoral Care*, 1974(Mar), Vol 28(1), 40-50.—Provides basic information on specific drugs of abuse and general facts on drugs as biological chemicals. An account of a group discussion approach is given, and some of the likely underlying causes of student drug use are discussed. (20 ref)—*Journal abstract.*

7273. Zifferblatt, Steven M. & Hendricks, Carroll G. (Stanford U, Heart Disease Prevention Program) Applied behavioral analysis of societal problems: Population change, a case in point. *American Psychologist*, 1974(Oct), Vol 29(10), 750-761.—Suggests that current approaches to societal problems, such as population change, have resulted in inadequate solutions and that various methodological and conceptual biases exist which limit problem solution alternatives. Applied behavior analysis approaches employ strategies which have been successful in effecting behavior change in educational, clinical, and institutional contexts and should be carefully considered in approaching population change problems. Interdisciplinary contributions are suggested that facilitate identification of relevant behaviors and selection of appropriate behavioral intervention strategies. Training programs for family planning trainers and workers are currently feasible and are felt to provide a potentially effective response to the individual family's needs. (54 ref)—*Author abstract.*

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

7274. Ammon, Gunter et al. (Deutsche Akademie für Psychoanalyse, Berlin, W Germany) **The structuring of congresses: An alternative: Preliminary results of congress dynamics research.** *Small Group Behavior*, 1974(May), Vol 5(2), 157-174.—Describes efforts to organize congresses or conventions with more scientific and personal value than those held at present. (32 ref)

7275. Billig, Michael. (U Bristol, England) **Normative communication in a minimal intergroup situation.** *European Journal of Social Psychology*, 1973, Vol 3(3), 339-343.—Investigated the effects of social categorization on intergroup relations. 80 high school students in England were divided into 2 groups on the basis of a trivial task. Ss in 1 group then awarded money to Ss in the other group according to prearranged payment matrices. Ss showed significant ingroup favoritism and used fairness as a significant strategy. The maximum joint effort was the 3rd strategy employed. S-S communication seemed to weaken the norms of the situation since there was no record of the 3 main strategies being communicated directly.—M. K. Phifer.

7276. Edney, Julian J. (Arizona State U) **Human territoriality.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 959-975.—Discusses a few seminal works on animal territoriality. A comparison of definitions of human territoriality demonstrates the variety in interpretations of the human expression. Theoretical work on human territoriality includes a small number of classificatory systems and conceptualizations, but no comprehensive theory. An evaluative review of research shows a collection of studies involving a variety of operational definitions, methods, and populations. Current developments show that work on this topic is expanding, and that it has relevance to environmental issues. However, research is still in a preparadigmatic stage and many issues are unresolved. (61 ref)—*Journal abstract*.

7277. Greer, Ann L. & Greer, Scott. (U Wisconsin, Milwaukee) **Understanding sociology.** Dubuque, IA: Wm. C. Brown, 1974. x, 63 p.—Presents a text which clarifies for students the meaning of the field of sociology. Among the topics included are designing research, participant observation and experimental design, research strategies, and the relationship between social science and social life.

7278. Harrison, Patrick R. (Hope Coll) **A technique for analyzing the distance between organisms in observational studies.** *Journal of General Psychology*, 1974(Oct), Vol 91(2), 269-271.—Discusses a technique for analyzing the distance maintenance relationships between organisms in studies such as those done by ethologists in natural environments. The technique requires superimposing a cartesian grid system over a photograph or scale drawing of the geographic area in question, coding grid positions over time for each organism, and then converting the grid positions for each pair of organisms into undirected distance. From this a parametric technique is used for further analysis. A correlation matrix is constructed and the data is then factor analyzed.—*Journal abstract*.

7279. Smith, M. Brewster. (U California, Santa Cruz) **Humanizing social psychology.** San Francisco, CA: Jossey-Bass, 1974. xii, 289 p. \$12.50.—Discusses the need for and proposes a version of social psychology that includes both humanistic and scientific elements by incorporating human freedom and dignity in addition to planning, problem-solving, and scientific perspectives. This humanistic perspective is applied to various topics within social psychology, including opinion theory, political attitudes and activism, alienation, and ethical issues in population control. (21 ref)

7280. Vitola, Bart M.; Mullins, Cecil J. & Weeks, Joseph L. **Characteristics of Women in the Air Force: 1970 through 1973.** *US AFHRL Technical Report*, 1974(Jul), No 74-59, 15 p.—The total input of US Women in the Air Force (WAF) enlistees for 1970 through 1973 ( $N = 20,988$ ) was compared with that of male enlistees for the same period ( $N = 324,935$ ). WAF Airman Qualifying Examination-A (AQE-A) and AQE-G scores in 1973 dropped less than those for males relative to 1970. WAF AQE-M and AQE-E scores in 1973 were higher than they were in 1970, whereas similar scores for males declined slightly. Educational level for males declined in the years 1970-1973, whereas for WAF it climbed somewhat. Racial mix for females was about the same as for males, but the contribution by the various recruiting areas to the total number of black women in the Air Force varied considerably from area to area. As with males, the younger females tended to have lower aptitude scores.—*Journal abstract*.

## Group Dynamics &amp; Interpersonal Communication

7281. Archer, Dane. (U California, Board of Sociology Coll V, Santa Cruz) **Ethical problems in small group observation.** *Small Group Behavior*, 1974(May), Vol 5(2), 222-243.—Discusses the ethical problems generated by the asymmetric role of the observer of small groups. This violation of the norm of reciprocity may produce emotional reactions in both group participants and observers. Ethical guidelines generally applied in social science research are of limited value in the group context. Since members cannot know what they will actually do or say in the group, informed consent is viewed as a *carte blanche* allowing observers to see whatever transpires. Suggestions are made for solving (a) problems of observer qualification and motivation, (b) problems of observer-member contact, and (c) other noncontact problems involving the process of observation itself.—G. R. Breed.

7282. Beier, Ernst G. (U Utah) **Nonverbal communication: How we send emotional messages.** *Psychology Today*, 1974(Oct), Vol 8(5), 52-56.—Interviewed and videotaped 50 newlywed couples in order to study body language cues indicating conflict and harmony. The conflicts that many of these couples described could be detected in their nonverbal behavior. Most Ss could successfully simulate only 2 of the 6 moods (anger, fear, seductivity, indifference, happiness, and sadness) they were asked to act out for the videotape. People send ambiguous messages, 1 intended verbal message and 1 unintentional nonverbal message, without being aware of it. The simplest explanation of such behavior is that people want to send discordant messages. However, the



motivation of the nonverbal message may well be unconscious.—E. J. Posavac.

7283. Brehmer, Berndt & Garpebring, Staffan. (Umea, Sweden) **Social pressure and policy change in the "lens model" interpersonal conflict paradigm.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 191-196.—Investigated the effects of conflict and policy inaccuracy on change in 32 undergraduates. The amount of policy change for Ss who were paired with a stooge who did not change his policy even though it was incorrect was compared to the amount of policy change for Ss whose opponents changed their policies to reduce the inaccuracy of these policies. Results show that the amount of policy change was the same in both of these conditions, indicating that task adaptation was a more important goal to the Ss than conflict reduction.—*Journal abstract*.

7284. Cameron, J. L. et al. (Chestnut Lodge Research Inst, Rockville, MD) **Group process in an individualized learning situation.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 265-272.—Describes an 18-month study of the interplay of group process in an environment in which 7-14 yr old children were working on tasks designed to suit their particular abilities, regardless of the activities of other children. Results show that the identification processes were such that the children tended to identify with various aspects of the group leader's activity at all times. When the activity remained within the highly specified areas of the technician's task, these identifications had a positive effect upon the children's performance and led to a rapid increment in learning behavior. When a specific technical posture was not assumed and another activity was encouraged, the group process took over in a way which was quite disruptive of the goals of the program.—M. E. Pounsel.

7285. Cantor, Gordon N. **Effects of familiarization on children's ratings of pictures of whites and blacks.** In F. Reblsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—40 male and 40 female 9-11 yr old white children were exposed to 10-sec presentations of 3 pictures of white boys and 3 pictures of black boys. Ss rated these and another group of pictures viewed only once on a 5-point scale of degree of wanting to bring the boy home with them. Black boys were rated more highly than white boys. Familiarization enhanced ratings of blacks by both male and female Ss but not ratings of whites. Results are compared to findings in previous studies. (15 ref)

7286. Carment, D. W. (McMaster U, Hamilton, Ontario, Canada) **Effects of sex role in a maximizing difference game.** *Journal of Conflict Resolution*, 1974(Sep), Vol 18(3), 461-472.—Same- and mixed-sex dyads of 39 female and 53 male undergraduates played 100 trials of a maximizing difference game in a replication of an experiment in which S. P. McNeel et al (see PA, Vol 49:9065) used Flemish Ss. In contrast to the Belgian investigation, and in line with earlier experiments in the US which had used the Prisoner's Dilemma game, it was found that the like-sex female dyads were most competitive, followed by the like-sex male dyads. The males and females in the mixed-sex dyads were least competitive and not different from one another. Simply

being paired with a female had an immediate effect on the males, but the females appeared to be more affected by the response strategy of the males. It is argued that the most likely factor accounting for the results was the greater use of "tit-for-tat" responding by the males. (15 ref)—*Journal abstract*.

7287. Davis, John D. & Sloan, Margaret L. (U Sheffield, England) **The basis of interviewee matching of interviewer self-disclosure.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 359-367.—Interviewed 16 male and 16 female undergraduates, inviting them to disclose information about themselves on a series of 10 high-intimacy topics presented in an individually randomized order. Ss were assigned to 1 of 4 treatments defined by the possible combinations, over 2 5-topic blocks, of disclosure or nondisclosure on the part of the interviewer. (Interviewer disclosure on a topic immediately preceded the corresponding disclosure by S.) 2 judges (one of whom was the interviewer) independently rated tape recordings of interviewees' presentations for disclosure and modeling of content. Interviewee disclosure was strongly facilitated by disclosure on the part of the interviewer, but was sustained at a high level only if the interviewer continued to disclose. Ss showed no clear preference for a disclosing interviewer. For given levels of interviewer disclosure their interview reactions were less favorable the more they had disclosed, suggesting that the "dispensation" of self-disclosure was costly.—*Journal abstract*.

7288. Eckhoff, Torstein. (U Oslo, Norway) **Justice: Its determinants in social interaction.** Rotterdam, Netherlands: Rotterdam University Press, 1974. xiv, 414 p.—Presents an analysis of justice in terms of the forms of human interaction where there is a "give and take" of positive or negative values (e.g., exchange, restitution, competition, revenge, and punishment) or where benefits or burdens are allocated among a number of recipients. Also discussed are the strategies and norms which regulate these types of interactions used to explain the development and use of the principles of justice. (7½ p ref)

7289. Fuller, Raymond G. & Sheehy-Skeffington, Alan. (Trinity Coll, Dublin, Ireland) **Effects of group laughter on responses to humorous material: A replication and extension.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 531-534.—Tested the validity of one interpretation of the concept of "social laughter," that the sound of others laughing increases the probability with which an individual will exhibit overt expressions of amusement. 15 undergraduates' responses were observed under conditions in which group laughter was dubbed onto or omitted from verbal material varying in humorous content. For items of both high and low humor the addition of dubbed laughter increased the frequency of Ss' overt expressions of amusement. However, under this condition Ss rated the items as more humorous. It was hypothesized that, although "social laughter" may represent some form of social facilitation, the laughter of others may act as a contextual cue directing the listener to search for a humorous interpretation of the stimulus material presented to him. Implications for the practice of using dubbed laughter in

commercial broadcasting are briefly discussed.—*Journal abstract.*

7290. Gormly, John. (Rutgers State U, New Brunswick) **A comparison of predictions from consistency and affect theories for arousal during interpersonal disagreement.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 658-663.—Compared 2 psychological theories for their utility in predicting arousal during a situation in which there was interpersonal disagreement. 60 male Ss met an accomplice who presented himself in 1 of 3 ways: likable, neutral, or unlikable. Following this initial encounter, the S heard the accomplice state 12 social attitudes which either highly disagreed with or highly agreed with the S's opinions. The S's level of skin conductance was continuously recorded during the time he listened to the accomplice's attitudes. Skin conductance data support the affect theory ( $p < .025$ ) that level of arousal is influenced by the proportion of disagreements. Both the initial liking-disliking factor ( $p < .001$ ) and the proportion of disagreements factor ( $p < .001$ ) had a significant effect on the S's attraction toward the other person. (18 ref)—*Journal abstract.*

7291. Gruder, Charles L. (U Illinois, Chicago Circle) **Cost and dependency as determinants of helping and exploitation.** *Journal of Conflict Resolution*, 1974(Sep), Vol 18(3), 473-485.—Investigated the effects of the cost of helping and the dependency and need of a recipient on whether she was helped or exploited. There were 2 levels each (high and low) of cost, dependency, and need. 48 male Ss, 24 at each level of cost, interacted with each of 4 female experimental confederates who represented different combinations of levels of dependency and need. Ss role-played a job applicant, and each dyad bargained over an hourly wage agreement. The extent to which the S helped or exploited the confederate was defined as correlated with the wage at which he agreed to be hired: the higher his wage, the less the help or the greater the exploitation. A Cost  $\times$  Dependency interaction was the major result, which was primarily due to greater exploitation of the highly dependent other under high cost. (20 ref)—*Journal abstract.*

7292. Hunsaker, Phillip L. & Hunsaker, David M. (U Wisconsin, Milwaukee) **Luna I moon colony: An adapted format for analysis of group decision-making in a competitive setting.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 411-414.—An experimental simulation is described as a method for measuring and training decision-making by groups under complex conditions and intergroup competition. The method employs a simulation game including selection of goals, relevance of strategy, risk-taking, consistency, competition, and other potential components. Similarities to a previously described simulation as well as the additional dimensions of the adapted simulation-game are discussed.—*Journal abstract.*

7293. Jaspars, Joseph M. et al. (U Nijmegen, Netherlands) **Cognitive balance, self involvement and anticipation of interaction.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 535-551.—Specifies the limits of F. Heider's balance theory (1948) in the operation of a triad, P, O, and X. Ss were 96 soldiers in a camp. Each S read a description of

a social situation which described a liking-disliking relationship between 2 persons and their agreement-disagreement on an unspecified topic. Half of the Ss worked on an imaginary condition and half on a real condition. Half were asked to observe a situation involving 2 other Ss, while half were asked to consider themselves directly involved. 6-point scales measured affection, willingness to participate in a discussion, and the expectation that change in agreement would follow discussion. Results indicate a significant relationship ( $p < .01$ ) between the mutual liking of P and O and the reality of the situation. A significant correlation ( $p < .10$ ) was found between the reality and tension of a real situation. A greater willingness to participate in a discussion occurred ( $p < .001$ ) when the relationship between P and O was positive. The challenge of disagreement between P and O was acceptable when the situation was imaginary. The positivity effect found for pleasantness was stronger for Ss who found liking stronger than agreement.—A. J. Ter Keurst.

7294. Jaspars, Joseph M.; van den Oever, Ton & van Gils, Jacques A. (U Nijmegen, Netherlands) **Cognitive balance and visual interaction.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 557-568.—Tested the hypothesis that the different reactions in unbalanced situations between male and female Ss can be attributed to differences in sex composition of the dyads. Ss were 80 male and female college students. Each member of a pair tried to hit a mark on a rotating disc with a falling pellet. Ss then discussed their performances, while their eye-movements, unknown to them, were photographed to determine their visual interaction. Ss also rated themselves and indicated the expected ratings by their partners on P. Fielder's Least Preferred Coworker (LPG) Scale. The expected ratings by the partners were very comparable to the self-ratings. Significant ( $p < .01$ ) relationships were found between performance on the LPC scale and emotional and task-related traits. The leniency effect operated to give higher ratings to partners than they had expected to receive. There was a slight but nonsignificant tendency for same-sex dyads to react with less eye contact than unlike-sex dyads. The hypothesis was not confirmed.—A. J. Ter Keurst.

7295. Jones, Dorothy S. & Medvene, Arnold M. (U Maryland) **Self-actualization effects of a marathon growth group.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 39-43.—Examined the effects of a marathon group experience on 34 female and 26 male undergraduates' level of self-actualization 2 days and 6 wks after the experience, and assessed the relationship between ego strength and extent of change in self-actualization during a marathon growth group. The Personal Orientation Inventory and the Barron Ego-Strength scale were given to all Ss. It was found that gains in self-actualization as a result of marathon group participation depended upon an individual's level of ego strength upon entering the group. (27 ref)—*Journal abstract.*

7296. Kleiven, Jo; Fraser, Colin & Gouge, Celia. (U Bergen, Psykologisk Inst, Norway) **Are individual and group decisions dependent on available information?** *Scandinavian Journal of Psychology*, 1974, Vol 15(3).



178-184.—Conducted a choice-shift experiment to explore the role of available information in individual and group decisions to 1 risky and 1 cautious problem. Individual prediscussion decisions to both problems by 152 undergraduates were related to the relative number of arguments favoring risky and cautious decisions known by each S. This information index was related to group decisions on the cautious problem only. Normative group influence, as well, seems to be involved in group decisions, and it is suggested that the relative importance of informational and normative processes for group decision may depend on the nature of the problem discussed. (21 ref)—*Journal abstract*.

7297. Lee, John A. (U Toronto, Ontario, Canada) **The styles of loving.** *Psychology Today*, 1974(Oct), Vol 8(5), 43-50.—Conceptualizes 3 primary styles of loving: *eros*, the search for the perfect lover; *ludus*, viewing love as a pleasant pastime; and *storge*, love that develops slowly and naturally. These basic styles can be paired to produce 3 equally important forms of love. The *manic* lover (a combination of *eros* and *ludus*) cannot get his lover out of his mind. The *pragma* approach to love (a combination of *ludus* and *storge*) involves an active systematic search for the best partner. Finally *agape* love (combining *eros* and *storge*) is altruistic and universalistic. The typology was initially tested in interviews with 112 English and Canadian Ss under 35 yrs old. American Ss subsequently tested include heterosexuals up to 65 yrs old and homosexual males.—E. J. Posavac.

7298. Lewis, Philip; Lissitz, Robert W. & Jones, Catherine L. (U Georgia) **Assessment of change in interpersonal perception in a T group using individual differences multidimensional scaling.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 44-48.—Studied the nature and development of interpersonal perceptions in a college student T group, where group members rated one another for similarity following each of 13 group sessions. The similarity ratings were subjected to a multidimensional scaling analysis; the 3 dimensions of interpersonal judgment which emerged were described by correlating them with the group leader's interpersonal ratings. Results indicate that group members' perceptions were relatively complex and changed markedly over sessions in ways consistent with current theories of group development. The analysis permits a look at some of the interpersonal processes which occur in a T group free from biases which are usually forced upon Ss by having them use specific labeled rating scales.—*Journal abstract*.

7299. Pfeiffer, J. William & Jones, John E. (Eds.). **Structured experiences of human relations training: A reference guide.** Iowa City, IA: University Associates: 1974. 48 p.—Lists and categorizes by type (e.g., awareness expansion, communication, or problem-solving experiences) all structured experience guidelines published by University Associates in Volumes I, II, III, and IV of the *Handbooks of Structured Experiences for Human Relations Training* and in the 1972, 1973, and 1974 *Annual Handbooks for Group Facilitators*.

7300. Segal, Mady W. (U Maryland) **Alphabet and attraction: An unobtrusive measure of the effect of propinquity in a field setting.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 654-657.

—Studied the relationship between propinquity and interpersonal attraction in 44 state police trainees. Place in alphabetical order was used as an unobtrusive (and conservative) measure of propinquity. The effect of proximity on friendship choice among Ss was found to be stronger than the effects of a wide variety of other characteristics that have been identified in the literature as determinants of interpersonal attraction.—*Journal abstract*.

7301. Sievers, Walter & Langthaler, Werner U. [Analysis of polylogue conversation sequences.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 299-325.—Investigated the dynamics of communication within a group of people by recording the frequencies of transitions from 1 speaker to another in transition matrices. 6 such matrices gained from 3 different groups of 9 participants each were compared for dissimilarities and factor analyzed. The communication patterns gained from the factor analysis were compared with K. D. Mackenzie's model for decomposition of communication networks. (English & French summaries)—W. J. Koppitz.

7302. Svebak, Sven. (U Bergen, Psykologisk Inst, Norway) **Three attitude dimensions of sense of humor as predictors of laughter.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 185-190.—Constructed an exploratory attitude test to investigate a theory of sense of humor which distinguishes between 3 dimensions of a comical situation and their personality equivalent—sensitivity to humorous messages (M), personal likings of comical situations (L), and need for emotional control (E). From a group of 96 undergraduates administered the questionnaire, 30 were selected for observation of the occurrence of laughter in an entertainment situation. The attitude dimensions were tested as predictors by a combined factorization and regression approach. No prediction was obtained for the total group. Laughter in males was, however, predicted by the L variable and in females by the E variable, as expected on the basis of an avowed sex difference in style of social behavior.—*Journal abstract*.

### Social Perception & Motivation & Attitudes

7303. Anderson, Norman H. & Butzin, Clifford A. (U California, San Diego) **Performance = Motivation × Ability: An integration-theoretical analysis.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 598-604.—20 student Ss judged stimulus persons on 3 dimensions: performance, motivation, and ability. Each pair of dimensions was combined in a 4 × 4 design as cue information for judgments of the 3rd dimension. In accord with prediction, judgments of performance showed the bilinear form that characterizes the multiplying model: Performance = Motivation × Ability. Judgments of motivation and ability also exhibited a simple algebraic form, but this form was not mathematically consistent with the form of the performance equation. These data exhibit the parallelism property that characterizes an adding-type model and add further support to the concept of a general cognitive algebra of judgment, although this cognitive algebra is not a simple mirror of mathematical algebra. (21 ref)—*Journal abstract*.

7304. Bierhoff, H. W. (U Bonn, Psychologisches Inst, W Germany) [Attraction, helping behavior, verbal conditioning, and cooperation: An integration through exchange theory.] (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(2), 84-107.—Presents a discussion within a framework of a formalized exchange theory, with special attention to situational and motivational factors. Previous field and laboratory research is re-examined in the light of exchange theory, and seemingly contradictory results in helping behavior research are reconciled. The role of exchange theory as a general, integrative theory in social psychology is discussed, and proposals for testing it are given. (80 ref)—*English abstract*.

7305. Black, Harvey K. (State University Coll New York, New Paltz) **Physical attractiveness and similarity of attitude in interpersonal attraction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 403-406.—In a  $2 \times 2$  design which manipulated physical attractiveness and similarity of attitude, 48 male undergraduates rated their desire to be a friend of and to date a female. They also rated her on intelligence and popularity. As hypothesized, both physical attractiveness and similarity of attitude had significant effects on desired friendship and desired dating. It was further hypothesized that based on the differential closeness of the relationships, an effect of similarity would be observed within the attractiveness conditions on desired dating, while no such effect would be observed on desired friendship. This prediction was confirmed only for the attractive condition. Physical attractiveness and similarity affected popularity as predicted. A significant interaction between similarity and attractiveness was observed on ratings of intelligence.—*Journal abstract*.

7306. Byrne, Donn; Rasche, Lois & Kelley, Kathryn. (Purdue U) **When "I like you" indicates disagreement: An experimental differentiation of information and affect.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 207-217.—Hypothesized that the independent manipulation of the informational content and the affective meaning of personal evaluations would indicate that both informational judgments and attraction responses are a joint function of the 2 stimulus components. In a  $2 \times 2$  factorial design, each of 80 undergraduates was exposed to a videotape message from a stranger which was either affectively positive or negative and informationally positive or negative. Analysis of variance indicated that perceived similarity was influenced only by the informational variable ( $p < .0001$ ) while attraction was influenced by both information ( $p < .0001$ ) and affect ( $p < .002$ ). It is suggested that the most inclusive theories of person perception and attraction will necessarily encompass elements of both cognitive and reinforcement formulations. (34 ref)—*Journal abstract*.

7307. Cialdini, Robert B.; Braver, Sanford L. & Lewis, Stephen K. (Arizona State U) **Attributional bias and the easily persuaded other.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 631-637.—Tested the hypothesis that a person positively biases his assessment of the intelligence of a person whom he is able to persuade easily. 38 male and 38 female undergraduate volunteers served as Ss. In 1 condition, persuaders and observers saw an S confederate easily convinced by the

persuaders' arguments. In 2 other conditions, the confederate either was not convinced by the persuaders' arguments or did not indicate how he was affected by the arguments. According to prediction, it was found that relative to observers of the influence attempts, persuaders attributed higher levels of intelligence to yielders than to nonyielders. This effect resulted from a tendency of persuaders to enhance, and observers to derogate, the intelligence of yielders. Findings are interpreted in terms of a desire to promote a sense of internal control. (19 ref)—*Journal abstract*.

7308. Clore, Gerald L. & Gormly, John B. (U Illinois) **Knowing, feeling, and liking: A psychophysiological study of attraction.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 218-230.—Recorded the skin conductance and heart rate of 48 undergraduates during verbal exchanges in which Ss were either agreed or disagreed with on a variety of issues. The manipulation of attitude similarity had significant effects on interpersonal attraction, perceived competence, and skin conductance but not on heart rate. Disagreement produced higher skin conductance than agreement, and speaking was more arousing than listening. The correlations between arousal and attraction showed that heightened arousal was associated with both attraction toward agreeers and dislike toward disagreeers. As predicted, the linear relationship between attitude similarity and attraction increased in slope (.00, 3.75, 8.75) with increasing levels of conductance (low, medium, high). The failure of Ss to prefer agreeers to disagreeers under conditions of low arousal suggests that information without affect does not influence attraction. (37 ref)—*Journal abstract*.

7309. Codol, Jean-Paul. (U Provence, Lab de Psychologie Sociale, Aix-en-Provence, France) **[Concept of superior conformity of one's own group to accepted norms—Does such a phenomenon exist?]** (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 25-30.—Sought to determine whether the phenomenon of perception of one's self as in greater conformity than others to group norms, considered established for individuals, applies also to the group to which an individual belongs. Ss were 25 13-14 yr old girls in 2 4th-grade secondary school classes. Specific norms for 4th-grade classes were derived from responses to a questionnaire in which the Ss indicated which of 14 adjectives best characterized all of the 6 4th-grade classes in the school. General norms were derived from ratings given each adjective on a 4-point value scale. Data specific to the problem under study were obtained by having the Ss state whether their own 4th-grade class possessed more or less of each characteristic than the other 4th-grade classes. Individuals tended to consider their own group more in conformity with the general norms than the other groups. For the general norms, intergroup comparison yielded an index of conformity very close to that for interindividual comparison. For the specific norms, the conformity index was perceptibly higher for the intergroup comparison.—*E. E. Brown*.

7310. Dengerink, H. A. & Bertilson, H. S. (Washington State U) **The reduction of attack instigated aggression.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 254-262.—30 male undergraduates competed



with an opponent in a reaction-time task to avoid receiving shock. The opponent initially set only the highest possible intensity shock for the Ss. The opponent then adopted 1 of 3 strategies to reduce the intensity of shocks set by the Ss. In 1 condition the opponent set shock intensities which matched those set by the S. In a 2nd condition the opponent set shocks which were not contingent upon those set by the S but which were identical to those set by the opponent who matched the S's settings. The opponent in the 3rd condition suddenly reduced the intensity of his settings and chose only the least intense possible shock for the S. All 3 conditions resulted in reduced aggression. This decrement was greatest and most rapid among those Ss who were exposed to a precipitous decrease in the intensity of attack.—*Journal abstract.*

7311. Deschamps, J.-Cl. (Genève U, Ecole de Psychologie et des Sciences de l'Education, Switzerland) [Attribution, social categorization and intergroup representations.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 710-721.—Reviews the research on attribution, social categorization, and stereotyping, hoping to synthesize the findings and develop a theory of social attribution, i.e., an explanatory model emphasizing the social character of the attribution phenomenon. Attribution is defined as the "process of inferring causes (interactions, characteristics) from their effects (actions, behaviors,...)." The analysis focuses on (a) relations between groups, (b) the basis of the inferential behavior, (i.e., "objective" knowledge or understanding of the environment vs "social reality"), and (c) the role of social categories in the attribution process. It is concluded, on the basis of the review of research, that there is a tendency (a) to attribute characteristics to individuals based upon perception of the group of which they are members, and (b) to overvalue intergroup and minimize intragroup differences. Attribution of characteristics to other groups is made in a fashion that will preserve the social identity of one's own group and enhance its value. Such attributions are influenced by the type of relations between groups and their differences in social status. (45 ref)—Z. M. Cantwell.

7312. Eisenberger, Robert; Kaplan, Robert M. & Singer, Robert D. (State U New York, Albany) **Decremental and nondecremental effects of noncontingent social approval.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 716-722.—Tested the J. Gewirtz and D. Baer (1958) assumption of a deprivation-satiation function for social approval against R. Cairns's (1967) view that noncontingent approval worsens subsequent approval-contingent performance by decreasing the discriminability of approval contingencies. A total of 136 2nd- and 3rd-grade girls served as Ss. In accord with Cairns's interpretation, noncontingent approval was found to worsen subsequent approval-contingent performance only among Ss not informed that approval would depend upon the adequacy of their performance. A 2nd experiment provided evidence against the interpretation that the contingency instruction operated simply by contributing to achievement motivation. The conceptual basis for the informational interpretation of the decremental effects of noncontingent approval is discussed. (25 ref)—*Journal abstract.*

7313. Endler, Norman S.; Minden, Harold A. & North, Corileen. (York U, Downsview, Ontario, Canada) **The effects of reinforcement and social approval on conforming behaviour.** *European Journal of Social Psychology*, 1973, Vol 3(3), 297-310.—Divided 72 male and 72 female college Ss into equal groups with high and low need for social approval. Each group was assigned to 1 of 3 experimental conformity conditions: (a) true-agree, (b) neutral, (c) true-disagree. The groups were tested with a social-conformity apparatus. Results show that (a) reinforcement for agreeing with a contrived group consensus (true-agree group) elicited more conformity than social pressure without reinforcement (neutral group), which in turn elicited more conformity than reinforcement for disagreeing with the consensus (true-disagree group); (b) females conformed more than males; and (c) Ss needing high social approval conformed more than those needing low social approval. Conformity is explained in terms of social learning, and it is suggested that the situational factor of reinforcement was a more important determinant of conformity than the motivational factor of social approval. (30 ref)—*Journal abstract.*

7314. Glouberman, Dina. (Kingston Polytechnic, Kingston-upon-Thames, England) **Person perception and scientific objectivity.** *European Journal of Social Psychology*, 1973, Vol 3(3), 241-253.—Argues that the perception of other people requires a different set of scientific assumptions than are used in traditional psychology. Mind-body dualism, subject-object dichotomy, and traditional notions of scientific causality are considered inapplicable to the perception of people, except when people are seen as objects. The "predict and control" model of psychology, and the "medical model" of psychiatry both involve the perception of people as objects. The "participant-observer" model is seen as the optimal one for the study of human beings. (17 ref)—*Journal abstract.*

7315. Jerdee, Thomas H. & Rosen, Benson. (U North Carolina, Chapel Hill) **Effects of opportunity to communicate and visibility of individual decisions on behavior in the common interest.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 712-716.—Conducted 2 experiments on the effects of opportunity to communicate and visibility of individual decisions on socially responsible behavior in group situations involving the "commons" problem. 280 undergraduates in a business administration course were assigned roles as firm representatives and assembled in groups of 5 to bid on contracts under various conditions. Opportunity to communicate resulted in more socially responsible bidding, but visibility of individual decisions had no effect. Opportunity to communicate also helped to sustain socially responsible bidding in the face of a persistently defecting group member.—*Journal abstract.*

7316. Johnson, David L. & Ridener, Larry R. (Baylor U) **Self-disclosure, participation, and perceived cohesiveness in small group interaction.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 361-362.—Found that in small, same-sex discussion groups containing a total of 23 undergraduates, self-disclosure (as measured by the Self-Disclosure Questionnaire) was associated significantly with perceived group cohesiveness, but not

participation. Only males' self-disclosure was associated with perceived cooperation, and only females' self-disclosure was associated significantly with perceived norms and influence. Contrary to expectation, participation was associated significantly only with males' perceived group cohesiveness including perceived cooperation, ideas, norms, liking, and influence.—*Journal abstract.*

7317. Kanfer, Frederick H.; Cox, Larry E.; Greiner, Jerry M. & Karoly, Paul. (U Illinois) **Contracts, demand characteristics, and self-control.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 605-619.—Describes 3 experiments testing predictions from a conceptualization of self-control that separates commitment (contract) from execution. The cold pressor test provided the experimental procedure for all Ss. In Exp I, with 64 female undergraduates, ice water tolerance was greater with an explicit written contract than with oral instructions conveying the same content. After interpolated experience with the E, Ss who believed they had failed to meet contract conditions tolerated ice water longer than those who believed the E failed to meet conditions. In Exp II, 48 Ss anticipating reinforcement for contract fulfillment tolerated the ice water longer than Ss who were not reinforced or who received reinforcement contingent only on contract making. In Exp III with 96 Ss, examination of the magnitude of intention to tolerate ice water revealed that presence of the aversive cues associated with the task and high probability of demands to fulfill the contract significantly lowered commitments. Delay of onset of the task only weakly ( $p < .10$ ) affected commitment; short-delay eliciting reduced estimates of tolerance. Results are discussed in relation to demand characteristics and reconceptualization of self-control that stresses the importance of situational variables and Ss' commitments to future action. (35 ref)—*Journal abstract.*

7318. Kaplan, Kalman J.; Firestone, Ira J.; Degnore, Roberta & Moore, Michael. (Wayne State U) **Gradients of attraction as a function of disclosure probe intimacy and setting formality: On distinguishing attitude oscillation from attitude change—study one.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 638-646.—Investigated the mediating effect of setting on the relationship between intimacy depth of disclosure probe and attraction toward the prober, using a repeated-measures design in 3 interview settings: business, psychotherapeutic, and sexual. 44 male undergraduates were assigned to each of the interview-setting conditions. In all settings interviewer attractiveness decreased with intimacy of questions, this effect being especially pronounced under the high-formality business setting. Analyses on component measures of attitude showed that this was primarily attributable to increased disliking rather than decreased liking. Examination of alternate blocks of intimate vs nonintimate questions shows the recoverability of earlier attraction values indicative of attitude oscillation rather than change. (26 ref)—*Journal abstract.*

7319. Kiesler, Charles A.; Roth, Thomas S. & Pallak, Michael S. (U Kansas) **Avoidance and reinterpretation of commitment and its implications.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 705-715.

—It is suggested that people worry about potentially negative implications of attitudinally explicit behavior, especially when their commitment or perceived responsibility for the behavior is high. In 2 experiments with 76 and 121 undergraduates, respectively, Ss agreed to tape-record a public (high-commitment) or anonymous (low-commitment) speech advocating a position consistent with their own. Ss in Exp I chose 2 tasks to work on while waiting for the recording studio to become available. High-commitment Ss avoided the task which would have forced them to think about the implications of their commitment (how others would react to the content of the speech). In Exp II this effect was replicated; but in a different set of conditions, highly committed Ss (more than those less committed) chose a task which allowed them to reinterpret their prior behavioral commitment innocuously (as related to speech accents and not attitude). The implications for attribution theory and the process of inferring belief from behavior are discussed. (21 ref)—*Journal abstract.*

7320. Kuiken, Don; Rasmussen, R. V. & Cullen, Dallas. (U Alberta, Edmonton, Canada) **Some predictors of volunteer participation in human relations training groups.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 499-504.—27 college students who volunteered for participation in T groups and 141 who did not volunteer were compared on authoritarianism, reported history of self-disclosure, and a series of questions on social relations. Volunteers, especially males, were lower in authoritarianism, whereas no differences were obtained for histories of self-disclosure. Also, female volunteers reported that they were less satisfied with their abilities to relate to others and that they spent less time with others. It is suggested that males may make a choice to volunteer by considering the compatibility of their social and political attitudes and those implied by T groups. In contrast, females may make their choice by considering their personal social relationships. (15 ref)—*Journal abstract.*

7321. Kumpf, Martin & Götz-Marchand, Bettina. (U Mannheim, W Germany) **Reduction of cognitive dissonance as a function of magnitude of dissonance, differentiation, and self-esteem.** *European Journal of Social Psychology*, 1973, Vol 3(3), 255-270.—Tested several hypotheses concerning the interrelationship of dissonance reduction mechanisms in situations where response possibilities were relatively unconstrained. Engaged female Ss were invited to take part in a bogus "Marriage Expectancy Test" to predict marriage success. One wk later they received fictitious results differing negatively from their initial expectations of marriage success. The reactions measured were "conformity with the result," "derogation of source," "devaluation of the issue," and "underrecall." As predicted, avoidance responses increased steeply with discrepancy, while little increase was found for confrontation mechanisms. (22 ref)—*Journal abstract.*

7322. Lawson, E. D. & Giles, Howard. (State University Coll New York, Fredonia) **British semantic differential responses on world powers.** *European Journal of Social Psychology*, 1973, Vol 3(3), 233-240.—Investigated stereotypes associated with world powers, using 28 male and 28 female Ss at a British university who rated 24



world powers according to a semantic differential. Significance tests showed the relationship of the powers to concepts assumed to measure the Evaluative, Potency, and Activity factors. 3-dimensional models showed the relative positioning by men and women; in general, the sexes agreed. Results indicate that superpowers were close to Bad and Strong, and countries associated with war and strife were closer to Bad, Weak, and Passive. Findings are compared with those from an American sample.—*Journal abstract.*

7323. Lefebvre, Luc M. & Cunningham, John D. (U Leuven, Psychologisch Inst, Belgium) **Performers' anticipations of a supervisor's attribution for their changes in performances.** *Psychologica Belgica*, 1974, Vol 14(1), 19-29.—Studied performer's anticipations of a supervisor's attribution for their potential changes in performance as a function of (a) the supervisor's attribution for their present performance and (b) their future performance. 56 college students in 2 experiments completed a questionnaire in which they predicted the supervisor's attribution for future successful or failing performance. Attributions were limited to internal causes: effort and ability. The prediction that effort would be regarded as a more important cause of changes in performance than ability was supported. Unexpectedly, the ability anticipation for future success was higher after an ability than after an effort attribution for present performance. Some implications of attribution research in an interdependency context are discussed.—*Journal abstract.*

7324. Lerner, Richard M. & Frank, Phyllis. (Eastern Michigan U) **Laboratory analogue of field helping behavior.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 557-558.—Within the context of a balanced factorial design, 40 male and 40 female white college students individually viewed a videotape of a black or white, male or female, financially needy "cohort" performing an alphanumeric substitution task. Ss were instructed to award money for performance, which was identical in all conditions. Female Ss awarded more money than male Ss, but males were given as much money as females, and blacks were given as much as whites. Results were compared to field studies of the relation of race and sex to helping behavior.—*Journal abstract.*

7325. Maitland, Karen A. & Goldman, Jacquelin R. (U Florida) **Moral judgment as a function of peer group interaction.** *Journal of Personality & Social Psychology*, 1974(Nov), Vol 30(5), 699-704.—Used an instrument for assessing moral judgment to study the effects of 3 different levels of peer group interaction on the moral judgments of 36 male and female 11th- and 12th grade Ss. Discussion to consensus of issues of moral judgment produced greater increases on scores than did open-ended discussion or individual development of personal rationales. Both the consensus scores for the groups and the individual posttest scores of group members were found to exceed the individual pretest moral judgment levels. No differences were found between the group consensus and individual scores on posttest. Results are discussed in terms of social conflict resolution as a mechanism for inducing higher levels of moral judgment.—*Journal abstract.*

7326. Mikula, Gerold & Schwinger, Thomas. (U Graz, Inst for Psychology, Austria) **[Sympathy and the need**

**for social approval as determinants for the allocation of common rewards.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 396-407.—Conducted experiments with 36 dyads to examine the extent to which the partner who distributes the common award earned by the dyad is influenced by the emotional relation between the 2 partners and by his desire for approval of his distribution procedure. It was expected that in dyads with a positive relationship the allocating partner would claim a smaller share but would strive for social acceptance and approval, while in dyads with a negative relationship he would claim a larger share and disregard social approval. Results confirmed the hypothesis. (20 ref) (English & French summaries)—*T. Fisher.*

7327. Mischel, Walter; Jeffery, Katharine M. & Patterson, Charlotte J. (Stanford U) **The layman's use of trait and behavioral information to predict behavior.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 231-242.—Investigated the conditions that determine Ss' preferences for information about another person's traits vs his specific past behavior in order to predict his future behavior. The similarity-dissimilarity between the situation for which past behavior was available and the one to which predictions had to be made strongly influenced the choice of specific behavioral information vs more general trait information. As expected, behavioral information was preferred most by the 90 undergraduate Ss when the situation to which behavior had to be predicted was highly similar to the one for which the past behavioral data were available. On the other hand, more general trait information was preferred in predicting to situations that were not directly similar to those for which past behavioral information was available. The effect of the temporal span covered by available information was also explored. (15 ref)—*Journal abstract.*

7328. Peeters, Guido. (Catholic U, Lab for Experimental Social Psychology, Louvain, Belgium) **Patterns of information implied in interpersonal relations: A case in point on the convergence of social-cognitive schemata, formal causal inferences, and linguistic universals.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 505-534.—Discusses the convergence of social-cognitive schemata with formal causal inferences and linguistic universals in the perception of interpersonal relationships. Social-cognitive schemata refer to general perceptual patterns, as indicated by F. Heider (1958). This is considered with reference to a set of empirically established schemata concerning the inference of traits from relationships involving personal likes and dislikes. 2 schemata are discussed: the causal-inference model (CIM) and the pronominal-categories model (PCM). According to the CIM, evaluative negativity (bad) would be closer to the negation of evaluative positivity (not good) than evaluative positivity (good) would be to the negation of evaluative negativity (not bad). Therefore (bad), (not good), and (not bad) are closely related. The PCM is an extension of the CIM by the use of linguistic universals, such as "I," "you," and "he." The convergence of the general perceptual concepts and the 2 models is interpreted in terms of a general cognitive consistency theory. (15 ref)—*A. J. Ter Keurst.*

7329. Powell, Graham E.; Tutton, S. Jane & Stewart, Robert A. (U London, Inst of Psychiatry, England) **The differential stereotyping of similar physiques.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 421-423.—25 male and 25 female undergraduates ranked photographs of 6 female physiques on 15 concepts presented in random order (e.g., like least, like best, wife, young, successful, prudish, homosexual, and prostitute). The physiques were selected to form 3 pairs using W. H. Sheldon's somatotype numbers. Data from a mixed-model analysis of variance show that the Physique main effect was significant, indicating that Ss had differentiated clearly between the 2 body types in each pair. The Physiques  $\times$  Concepts interaction was significant for endomorphic and ectomorphic pairs, indicating they were seen as more or less different depending on the concept. Although main effects of Sex were not significant, the Physique  $\times$  Sex interaction was significant for the ectomorphic pair, suggesting that sex differences in stereotyping are confined to particular physiques as well as specific concepts. Findings support a social-expectational model of the relationship between overt behavior and physique rather than Sheldon's genetic model.—L. Gorsev.

7330. Roeder, Burkhard. [Reply to criticisms by Schmeltz and Schmidt of Roeder's procedure for measuring social status.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 270-274.—Using the method of measuring social status, the author rejects the hypotheses formulated by C. Schmeltz and W. Schmidt (see PA, Vol 53:Issue 4). (English & French summaries)

7331. Schmeltz, Claus & Schmidt, Wolfgang. [Critical remarks on Roeder's procedure of measuring social status.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 263-269.—Doubts the validity of B. Roeder's procedure for measuring social status (see PA, Vol 51:2926) which cannot be generalized to different samples of Ss. The method does not answer hypotheses derived from comparable social studies. (English & French summaries)

7332. Schümer, Rudolf. (U Mannheim, W Germany) **Context effects in impression formation as a function of the ambiguity of test traits.** *European Journal of Social Psychology*, 1973, Vol 3(3), 333-338.—Tested the following hypotheses of impression formation: (a) If context effects are attributable to changes in meaning, they should be greater for highly ambiguous test traits than for less ambiguous ones. (b) Increase in set size leads to an increase in context effects. (c) Context effects do not interact with the evaluative level of test traits. 32 Ss classified 190 trait adjectives on an ambiguity scale in order to select low and high ambiguity traits for testing purposes. Ss then rated 64 stimulus sets on a 9-point scale anchored by like and dislike, and on a 21-point scale of likability. Results show significant context traits and test traits as well as context by set size interaction, and set size by test interaction. Results do not support the theoretical formulations and confirm previous negative results regarding the meaning-change hypothesis. (15 ref)—M. K. Hifer.

7333. Shaw, Jerry I. & Skolnick, Paul. (California State U, Northridge) **An investigation of relative**

**preference for consistency motivation.** *European Journal of Social Psychology*, 1973, Vol 3(3), 271-280.—92 Ss rated their attraction to, identification with, and idealization of a hypothetical stimulus person who was represented as having fulfilled particular social motives such as approval, power, achievement, and consistency. Results confirm that Ss preferred persons who satisfied traditional needs more than those whose consistency desires were fulfilled. Implications for the role of consistency motivation in social behavior are considered.—Journal abstract.

7334. Singh, Ramadhar. (Indian Inst of Technology, Kanpur) **Reinforcement and attraction: Specifying the effects of affective states.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 294-305.—Examined a multiplicative effect of magnitude and proportion of positive reinforcements on attraction and self-rated feelings. In Exp I 270 undergraduates rated their attraction toward persons associated with 1 of 3 reinforcement magnitudes (personality similarity, attitude similarity, and personal evaluations) and 1 of 6 proportions of positive reinforcements (.00, .20, .40, .60, .80, and 1.00). Results indicate that the slope of the linear attraction function increased and the Y-intercept decreased with increasing magnitude of reinforcement ( $p < .05$ ). A similar interaction effect was found on the feelings of 90 Ss in Exp II. Results are interpreted as added support for D. Byrne's (1971) reinforcement-affect model of interpersonal attraction. (26 ref)—Journal abstract.

7335. Spencer, Christopher; Williams, Marylin & Oldfield-Box, Hilary. (U Sheffield, England) **Age, group decisions on risk-related topics and the prediction of choice shifts.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 375-381.—Tested assertions in the literature that the elderly are less willing to make decisions involving risk than are the young by comparing the decision-making of 36 undergraduates and 26 Ss aged 55-65. Neither on their initial decisions nor in their group discussions of Choice Dilemma Questionnaire items did the older differ from the younger sample. The predictive validity of J. A. Stoner's Value Ranking Instrument was tested with both samples and in neither was the instrument successful in indicating which items subsequently produced cautious shifts and which shifts to greater risk following group discussion. One reason for the inadequacy of Stoner's method of examining particular cultures' value for risk may lie in the abstractness of the instrument.—Journal abstract.

7336. Tanaka, Masako. (Tokyo U of Education, Japan) **The anisotropic structure of personal space.** *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 223-232.—Asked 56 male college students to signal as soon as they felt discomfort when they approached or were approached by another male student from 8 horizontal directions under light and dark illumination. 32 measures of the distance at which each S felt discomfort were obtained and analyzed. Results indicate that this distance decreased as the angle between the line of approach and the median plane of the body increased from front to rear; that darkness increased the distance when the approach was from the



rear; and that introverts required a greater distance for comfort than extraverts. (English summary)—*S. Choe.*

7337. van Krevel, D. & Menckeberg, H. W. (U Leyden, Netherlands) **Status congruency as a cognitive schema in dyad-learning.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 583-599.—Studied the relationships of congruence/incongruence with dominance and abilities of dyad members. In Exp I, it was hypothesized that it is easier to learn that a person dominates and is more able than a female than that a person dominates and is more able than a male. Ss were 17 male and 17 female students. Each S learned 8 dyads of imaginary persons with combinations of sex, dominance, and ability by means of the paired-associates technique. The congruence effect had a strong significance ( $p < .001$ ). The correlation between homogeneity and sex of the dominating person was significant ( $p < .01$ ). The hypothesis that it is easier to learn that a female is dominated than a male was statistically supported. It is more difficult to learn the ability relationships in a mixed-sex male-dominated dyad than in an all-male dyad. In Exp II, the Ss were 16 male and 16 female students. The testing format was similar to that of Exp I, except that the S identified himself-herself with one member of a dyad. The congruency hypothesis was supported. Dominance relationships were more easily learned than ability relationships. (24 ref)—*A. J. Ter Keurst.*

7338. van Krevel, D. & Zuidgeest-van den Hoogen, T. (U Leyden, Netherlands) **The influence of self attitude on balance.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Oct), Vol 29(7), 553-555.—Investigated 2 of F. Heider's applications of his balance theory, in which he postulated (a) reciprocal positive or negative sentiment in a dyad, and (b) homogeneity in the evaluation of a person, such as being uniformly positive or negative, or the halo phenomenon. As a result of peer and self-ratings by members of 50 discussion groups of 5 or 6 students each, meeting weekly, the 1st hypothesis was supported for most criterion combinations but the 2nd was confirmed only when positive sentiments between the members of a dyad were evident.—*A. J. Ter Keurst.*

7339. Westbrook, Mary. (Macquarie U, Sydney, NSW, Australia) **Judgement of emotion: Attention versus accuracy.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 383-389.—Attempted to account for reported failures to find sex and related personality correlates of the ability to judge emotions accurately in terms of attention to emotional cues. It was hypothesized that attention to emotional cues is (a) independent of accuracy, (b) consistent across different types of cues, and (c) characterizes women and people who are (d) socially oriented and (e) field dependent. It was predicted that accuracy is related to (f) field independence and (g) intelligence. Data from 100 18-50 yr old Ss who completed the WAIS Vocabulary subtest, tests of attention to both visual and auditory cues of emotion, the Carlson Adjective Check List, and the Embedded Figures Test support hypotheses a, b, c, f and g. A canonical analysis revealed a cognitive style-intellectual factor relating accuracy to field independence and intelligence. (27 ref)—*Journal abstract.*

7340. White, James H. (U Guelph, Ontario, Canada) **Justice and generosity in social exchange: An experimental study of reactions to winning or losing a game.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 369-373.—Predicted from exchange theory that distributive justice would be fulfilled in a game when a player with high investments defeated an opponent with low investments. Were the reverse to occur, the "low" winner should feel embarrassment and the "high" loser anger. 12-13 yr old unacquainted boys whose leadership status was high or low raced model cars, winning or losing being predetermined. After racing, the boys were separately asked to divide a sum of money between them, which provided a measure of their anger or embarrassment over the outcome. The boys behaved in accordance with predictions in that high-status boys who had lost to low-status boys were less generous than low-status boys who had lost to high-status boys. Parallel results were obtained among the winners.—*Journal abstract.*

7341. Zaleska, M. & Askevis-Leherpeux, F. (U Paris VII, Social Psychology Lab, France) **[The influence of unanimous group error on the response of the individual.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 526-535.—Investigated the influence of group pressure on individual judgment (after S. E. Asch) particularly to determine (a) whether knowledge of the unanimous response of a group influenced individuals to question their initial responses to a stimulus and eventually to adopt the response, and (b) whether a link existed between the adoption of the majority response and the degree to which the "majority" was perceived as representing the total population from which the group was drawn. Ss were 84 female students in the last year of high school; 10 groups of 5 Ss each were experimental and 6 groups of 5 Ss and 1 of 4 Ss were control groups. The experimental task was in 3 steps. (a) All groups completed problems. (b) Ss reconsidered their solutions, with the experimental Ss given information about majority solution. (c) All groups discussed solutions, with correct responses given. Results of chi-square analysis indicate that significantly more experimental than control Ss changed their responses. Identification of "majority" with the parent population was significantly more frequent among Ss who changed to the majority response than among controls.—*Z. M. Cantwell.*

## COMMUNICATION AND LANGUAGE

7342. Bagozzi, Richard P. (Northwestern U, Graduate School of Management) **Marketing as an organized behavioral system of exchange.** *Journal of Marketing*, 1974(Oct), Vol 38(4), 77-81.—Defines core concepts in the paradigm of marketing as an exchange and introduces the exchange system as a conceptual framework for generating marketing theory. Marketing is considered as "the process of creating and resolving exchange relationships."

7343. Bakan, David. (York U, Downsview, Ontario, Canada) **Mind, matter and the separate reality of information.** *Philosophy of the Social Sciences*, 1974, No 4, 1-15.—Advances an argument that information is

substantially different from matter and energy, based on L. Szilard's work (1929) on the relationship between intelligence and thermodynamic systems. E. Schrödinger's hypothesis that living organisms maintain stability by consuming negative entropy or information is brought to bear. This organismic trait is named "negentrophagia." Implications about the nature of psychological and evolutionary processes are drawn.—*Author abstract.*

7344. Berlyne, D. E. (Ed.). (U Toronto, Ontario, Canada) *Studies in the new experimental aesthetics: Steps toward an objective psychology of aesthetic appreciation.* Washington, DC: Hemisphere, 1974. viii, 340 p. \$14.95.—Includes 14 papers which review and present new findings on reactions to art and the psychological processes which operate in aesthetic appreciation. Topics include verbal and exploratory responses to visual and auditory patterns varying in uncertainty level; the measurement of novelty, complexity, and interestingness; hedonic tone and reward value of exposure to paintings; and correlates of humor.

7345. Brown, Robert G. *Sales response to promotions and advertising.* *Journal of Advertising Research*, 1974(Aug), Vol 14(4), 33-39.—Classified 2,500 instant coffee users as "price" or "brand" buyers, and compared the behavior of these 2 types in buying instant coffee. Results indicate that (a) price promotion yields faster responses in sales than does advertising, (b) price promotions do not yield new long-term buyers (except for new products, where trial is important), (c) brand buyers are not likely to respond to price promotions, and (d) advertising appears to be capable of increasing the "prime franchise" of a brand. (15 ref)—*J. C. Franklin.*

7346. Callahan, Francis X. (California State U, Chico) *Advertising's influence on consumers.* *Journal of Advertising Research*, 1974(Jun), Vol 14(3), 45-48.—Conducted a survey of a sample of 1,200 consumers. Men and women were found to use advertising equally. Advertising is an important source of information when consumers buy hard goods, but other sources are much more important in actual decision-making. Length of search for information showed a positive correlation with price, and as price and brand preference increased, allegiance to store declined. The use of advertising information and prior thought increased with income.—*J. C. Franklin.*

7347. Carloni, G. & Nobili, D. (U Bologna, Inst de Psicologia, Italy) [Filicide: II. Filicide in myth and art.] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1337-1380.—The stories of numerous parents in mythology and fairy tale are brought into interpretive focus. A genealogy of classic Greek figures highlights Oedipus' parents, Medea and Iphigenia. Australian myths point out the universality of subconscious parental aggression, while popular fairy tales demonstrate variations on the mother figure. Freudian interpretations and the archetype concept are combined, and it is suggested that mythology and legend have much to offer in the study of both normal and pathological behavior. (19 ref)—*L. Klinkon.*

7348. Chase, Lawrence J. & Kneupper, Charles W. A literary analog to conflict theories: The potential for theory construction. *Speech Monographs*, 1974(Mar), Vol

41(1), 57-63.—Recommends the use of literature as case-study material for the verification and generation of conflict theories. Dostoevsky's novel *Crime and Punishment* is used as a case study to illustrate the frustration-aggression model, the decision-making or game-theoretic approach, and the instinctual aggression paradigm.—*C. A. Sherrard.*

7349. Choudhury, Pravat K. & Schmid, Lawrence S. (Howard U) *Black models in advertising to blacks.* *Journal of Advertising Research*, 1974(Jun), Vol 14(3), 19-22.—A recall experiment using control and experimental groups of whites and blacks supported the hypothesis that blacks are more likely to recall advertisements with black models than those with white models.

7350. Ciborowski, Tom & Choy, Stephen. (U Hawaii) *Nonstandard English and free recall.* *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 271-281.—Presented orally to 2 groups of 12 5th graders 2 stories containing 8 embedded items that were later tested for recall. Ss were tested individually. One group was judged to possess competent verbal skills in standard English and extremely marginal (if any) verbal skills in Hawaiian Islands dialect; a 2nd group was judged to possess competent verbal skills in Hawaiian Islands dialect but with only marginal verbal skills in standard English. An unusual feature of the study was that the dialect speakers were not economically disadvantaged. The pattern of performance shows that the dialect speakers, despite schoolroom ratings, were in fact bidialectal, demonstrating verbal skills both in standard English and in Hawaiian Islands dialect. (17 ref)—*Journal abstract.*

7351. Corbin, Henry. *Mysticism and humour.* *Spring*, 1973, 24-34.—Attempts to clarify the link between humor and mysticism, asserting that humor itself cannot be accurately defined. It is suggested that humor demands an ability to create a certain distance between oneself and the world. From this vantage point, humor is seen as the safeguard of the mystic, protecting him from both subjective and objective dangers. Several stories from Islamic philosophy are presented to illustrate this view. These tales highlight the importance of symbolic language. An anecdote from contemporary French literature summarizes the interaction of humor, mysticism, and symbolic elements.—*A. Farrell.*

7352. Etzel, Michael J. & Walker, Bruce J. (U Kentucky) *Advertising strategy for foreign products.* *Journal of Advertising Research*, 1974(Jun), Vol 14(3), 41-44.—Compared general attitudes toward all products of a given country (US, Japan, and Germany) with attitudes toward individual products (e.g., autos, cameras, and toys). Results indicate that consumers see individual products from a given country differently. Generalizations about any nation's products are therefore inaccurate and misleading.—*J. C. Franklin.*

7353. Feyerherm, Pierre. [Theories concerning certain expressive movements: Self-contacting behaviors.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(1), 89-113.—Nonverbal behaviors labelled as "autistic gestures," "body-focused movements" or "automanipulation" have been differently interpreted by psychoanalytic, clinical, semiological, and ethological theories. These behaviors seem to be unrelated to their context and they occur in conflictual or tense



situations. The ethological hypothesis that they are actually "displacement activities" is considered to be the most appropriate. It derives from a specific methodology and from an original position in biological and psychological disciplines. (French & English summaries) (52 ref) —*Journal summary.*

7354. Fillenbaum, Samuel. (U North Carolina, Chapel Hill) **Or: Some uses.** *Journal of Experimental Psychology*, 1974(Nov), Vol 103(5), 913-921.—Attempted to show that individuals are sensitive to differences in the use of the operator *or*. Results show that on a variety of tasks, Ss were sensitive to differences between *or* sentences malformed because there was no topical relation between the disjuncts and well-formed *or* sentences which satisfied the constraint of common topic. In the case of well-formed *or* sentences, Ss were sensitive to differences between the ordered or asymmetric use of *or*, as in threats, and its unordered or symmetric use, and in the latter case between its use as an exclusive and exhaustive term, as an exclusive term, and as a (possibly) inclusive term. Results suggest that any attempt to discover the unique conceptual representation of an operator such as *or* is misguided, and that the generalizability of any findings obtained by study or some particular use of *or* should be questioned.—*Journal abstract.*

7355. Fromkin, Victoria A. (Ed.). (U California, Los Angeles) **Speech errors as linguistic evidence.** The Hague, Netherlands: Mouton, 1973. 269 p.—Presents a collection of 15 papers representing different linguistic and psychological theories of speech based on empirical speech error data. Topics include Freud's analysis of slips of the tongue, errors of speech and their implications for understanding the strategy of language users, the detection and correction of slips of the tongue, and a theory of speech errors.

7356. Goldstein, Jan E. **The Woolfs' response to Freud: Water-spiders, singing canaries, and the second apple.** *Psychoanalytic Quarterly*, 1974, Vol 43(3), 438-476.—Discusses the relationship of the writer Virginia Woolf and her husband Leonard to Freudianism. Virginia Woolf never came to appreciate Freud as a healer nor did she utilize analysis for her mental ailments, but toward the end of her life she did paint an optimistic picture of the effects of Freudianism on future literature.

7357. Gragg, Robert L.; Nash, Jeffrey E. & Touhey, John C. (Phillips Petroleum, Bartlesville, OK) **Individual differences in ratings of words combined in sentences.** *Journal of Psycholinguistic Research*, 1974(Oct), Vol 3(4), 311-318.—Replicated D. Heise's study (see PA, Vol 43:8323) to examine the efficiency of regression-compounded group means as predictors of individual ratings of words combined in sentences; pre- and postcombination ratings were also obtained from the 124 undergraduate Ss. Heise's model efficiently predicted group ratings for words combined in sentences, but neither group-weighted nor individually weighted regression equations efficiently predicted the ratings of individual Ss. Results are consistent with several findings that question the applicability of widely studied models of attitude change to individual differences, and alternative approaches to this problem are discussed.—*Journal abstract.*

7358. Hamilton, James W. **Jensen's *Gradiva*: A further interpretation.** *American Imago*, 1973(Win), Vol 30(4), 380-411.—Interprets the novel *Gradiva* within the framework of ego psychology, noting the important influence on the 2 main characters of object loss in childhood. It is noted that the author of the book also experienced object loss (i.e., lost both parents) in adolescence. The hypothesis is proposed that *Gradiva* may have been the author's attempt at externalization resulting from incomplete mourning of his parents. This interpretation is seen to extend and supplement Freud's libidinally based analysis of the work.—C. Wright.

7359. Haroche, Claudine. (U Paris VII, Lab de Psychologie Sociale, France) **[Experimental study of the role of social influences on the perception of an ambiguous tense in French: The present.]** (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol 21(4), 161-165.—Studied the ambiguity of the present tense in French, which can be used to denote either temporary or permanent states. 160 secondary school students judged 4 sentences consisting of a subject and a predicate. Ss readily identified each sentence as signifying either transience or permanence, but rarely as implying both. The influence of social context on the interpretation of the present tense in French is noted.—R. L. Cook.

7360. Harris, Richard J. (Kansas State U) **Effects of nonlinguistic knowledge on language production.** *Journal of Psycholinguistic Research*, 1974(Oct), Vol 3(4), 303-310.—Hypothesized that undergraduates' descriptions of cartoons would contain fewer words overall, more definite articles, and more pronouns and would mention fewer concrete objects if either a picture illustrating the same objects was seen previously or S assumed his reader was also looking at the picture. Results, which confirm the hypothesis, argue against linguistic-object theories and in favor of an interactive theory of higher mental processes. (19 ref)

7361. Hendon, Donald W. (Columbus Coll) **Mechano-content analysis as an aid to predicting effects of advertising microcommunications.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 773-775.—Performed a regression analysis of 204 posters to predict the percentage of respondents who remembered seeing an outdoor advertising message. The independent variables were 21 mechanical and 6 content elements; the dependent variables were recognition scores. The predictive validity of 20 equations was too low to be of value to advertising communicators. The correlations between predicted and actual scores were low (.30-.41,  $p < .05$ ) because the independent variables varied only slightly as a result of the outdoor medium's simplicity.—*Journal abstract.*

7362. Hoosain, Rumjahn. (U Illinois, Ctr for Comparative Psycholinguistics) **The processing and remembering of congruent and incongruent sentences.** *Journal of Psycholinguistic Research*, 1974(Oct), Vol 3(4), 319-332.—80 female undergraduate Ss conjoined, using either "and" or "but," complex sentences containing "while," "before," "after," "because," "in order to," and other presented clauses. Results indicate that congruent cases, in which Ss were expected to respond with "and," had shorter response latencies than incongruent cases, with expected "but" responses. It is suggested that this

indicated a semantic incongruence effect, but the latter were remembered better, indicating a motivational salience effect due to contradiction of expectation. Whether the main clause preceded or followed the subordinate clause was not significant, in terms of either response latencies or sentence memory. Sentences with "after" had faster response times than those with "before," although Ss used identical constituent clauses.—*Journal abstract.*

7363. Hough, Graham. (Darwin Coll, Cambridge, England) **Poetry and the anima.** *Spring*, 1973, 85-96.—Discusses ways in which the anima archetype manifests itself in English poetry. It is felt that the elaboration of a work of literary art encourages the appearance of unconscious elements. Thus, the literature of the most advanced civilizations offers much for psychological investigation. The Muse, the goddess, the anima figure is invoked by the poet as a guide to the realm of unconscious form. It is concluded that superior literature can serve psychology by providing evidence of real psychic development.—A. Farrell.

7364. Larsen, Steen F. & Hermann, Jesper. (U Aarhus, Inst of Psychology, Risskov, Denmark) **Social status and language comprehension.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 161-168.—Investigated the comprehension of connected discourse by 116 adult Danes from 2 different socioeconomic status groups, high status (HS) and low status (LS). On a task at the lexical level of comprehension (choosing between alternatives to 2 words in each of 4 texts) there appeared to be no differences between HS and LS Ss. At the structural level a difference ( $p < .05$ ) was found in drawing conclusions from the texts, but the groups nevertheless agreed completely ( $p < .01$ ) in underlining important segments of the texts. Thus the symmetry between production and comprehension hypothesized by B. Bernstein did not appear. Results agree with a general model of language processing. It is suggested that in the future more attention should be paid to variables other than the purely sociological variable of social status or social class. (25 ref)—*Journal abstract.*

7365. Mabry, Edward A. (U Wisconsin, Milwaukee) **Dimensions of profanity.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 387-391.—Investigated the dimensions of profane language use by 283 college students. Responses to a questionnaire on personal use of "sexual vernacular" were submitted to factor analysis. Results of the factor analysis yielded 5 dimensions of profane language based upon predispositions to use such words. The 5 dimensions were labeled: Abrasive, Technical, Abrasive-Expletive, Latent, and Euphemistic. Results are discussed in terms of past and future research needs.—*Journal abstract.*

7366. Mackay, Donald G. (U California, Los Angeles) **Aspects of the syntax of behavior: Syllable structure and rate.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 642-657.—Conducted 2 experiments with a total of 20 university students to test the theory that maximal rate of speech varies as a function of syllable structure. Spectrographic analyses indicated that the difference in syllable duration was not confined to any 1 portion of the syllables—the vowel, the consonants, and the interval between syllable repetitions

was longer for vowel-consonant-consonant (VCC) syllables than for CVC and CCV syllables. These and other findings cannot be explained in terms of word frequency, transition frequency of adjacent phonemes, or coarticulation between segments. Number of phonemes was a poor predictor of maximal rate for a wide variety of syllable structures, since VCC structures were produced slower than phonemically longer CCCV structures, and V structures were produced no faster than phonemically longer CV structures. These findings cannot be explained by traditional models of speech production or articulatory difficulty but support a complexity metric derived from a recently proposed theory of the serial production of syllables. This theory is also consistent with the special status of CV syllables suggested by R. Jakobson (1966) as well as certain aspects of speech errors, tongue-twisters, and word games. (21 ref)—*Journal abstract.*

7367. March, Robert M. & Swinbourne, Donald W. (ASI Market Research, Tokyo, Japan) **What is "interest" in TV commercials?** *Journal of Advertising Research*, 1974(Aug), Vol 14(4), 17-22.—Examined the concept of "interest" in TV commercials, using 6 semantic dimensions and 2 types of interest: interest in product messages and interest in other things. Housewives' responses were measured for 5 commercials. Approximately 5 variables accounted for consumer interest in product message, predominantly the "relevance" dimension. As to consumer interest in other aspects of the commercials, no one variable was a good predictor.—J. C. Franklin.

7368. Mazzaro, Jerome. (State U New York, Buffalo) **John Berryman and the Yeatsian mask.** *Review of Existential Psychology & Psychiatry*, 1973, Vol 12(2), 141-162.—Discusses characterization in the poetry of John Berryman in terms of the Yeatsian concept of masks which both protect and reveal personality. Berryman's use of Freudian concepts of language is examined.

7369. Meyer, Bernard C. (Mt Sinai School of Medicine, City U New York) **Some reflections on the contribution of psychoanalysis to biography.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 373-391.—Discusses some problems and benefits resulting from the application of psychoanalytic principles to biography. The precision and usefulness of psychoanalytically oriented biographies is seen as dependent on the aptitude, knowledge, and intelligence of the writer. The biographer should avoid dogmatism and must be aware of the influence of his emotional makeup on his attitude toward his subject. Psychoanalysis can contribute to an understanding of the creative process by applying the critical attention of the therapist to the materials available to the biographer for interpretation, and by providing explanations for vicissitudes in the quality and quantity of an artist's productions. The value of psychoanalytic principles to an understanding of the artistic personality is illustrated by a discussion of the influence of grief on the works of Samuel Johnson, Washington Irving, Alban Berg, and others. (37 ref)—J. Kelly.

7370. Meyer, Bernard C. **The Little Prince: Speculations on the disappearance of Antoine de Saint-Exupéry.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 142-159.—Presents evidence



in support of the hypothesis that the mysterious disappearance of this celebrated airman-poet was the ultimate expression of a leitmotif that is recurrently discernible throughout his life and writings. Certain themes in his life led to his being identified with Christ, both in his own eyes and in those of some of his biographers. (26 ref)

7371. Miller, David. (Syracuse U) **Achelous and the butterfly: Toward an archetypal psychology of humor.** *Spring*, 1973, 1-23.—Discusses various facets of the nature and meaning of humor, delving broadly into literary sources. F. Nietzsche's view that laughter is holy is linked with Henry Miller's pronouncement that the smile is everything. Psychological themes underlying humor are examined in search of a collective fantasy regarding a sense of humor.—A. Farrell.

7372. Moss, A. E. (U Surrey, Guildford, England) **Shakespeare and role-construct therapy.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 235-252.—Discusses several Shakespearean works as illustrations of his personal construct system, which is seen as a tightly knit group of ideas revolving around 2 incompatible emotions. It is suggested that the creative phase of Shakespeare's career reveals a pattern similar to that in "fixed role therapy." (26 ref)

7373. Moss, A. E. (U Surrey, Guildford, England) **Hamlet and role-construct theory.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 253-264.—Uses *Hamlet* to illustrate G. Kelley's concepts of role theory and personal construct psychology. (15 ref)

7374. Nelson, Katherine & Benedict, Helen. (Yale U) **The comprehension of relative, absolute, and contrastive adjectives by young children.** *Journal of Psycholinguistic Research*, 1974(Oct), Vol 3(4), 333-342.—Presented relative, contrastive, and absolute adjectives in standard and comparative contrasts to 19 3 yrs 10 mo to 6 yrs 7 mo old preschoolers in a picture-choice paradigm. Proportion of errors in picture choices shows the predicted effect of greater difficulty for comparative than for standard terms. Latency data shows that the responses to comparative forms of absolute and contrastive adjectives were significantly slower than responses to their standard forms, and were also slower than responses to the comparative forms of the relative terms which did not differ from their standard forms. These data support the interpretation that the classes of relative, contrastive, and absolute adjectives are processed differently by young children. Factors of cognitive complexity that influence the order of difficulty are discussed.—*Journal abstract*.

7375. Perry, Michael & Perry, Arnon. (Haifa U, School of Management, Israel) **Brand recall in two Israeli media.** *Journal of Advertising Research*, 1974(Jun), Vol 14(3), 33-39.—Found that a combination of newspaper and radio advertising produced greater brand recall than was obtained using each medium separately.

7376. Rosenthal, Robert et al. (Harvard U) **Body talk and tone of voice: The language without words.** *Psychology Today*, 1974(Sep), Vol 8(4), 64-68.—Reports on the development of a 45-min film to measure sensitivity to nonverbal messages. A series of scenes made up of facial expression or physical postures, a few spoken phrases (altered to remove verbal content), or a

combination of visual and audio stimuli are presented, with 2 descriptions of what might be occurring in each scene. The viewer chooses one alternative as correct. After showing the film to more than 130 groups of Ss, it is concluded that women do better than men, high scorers function better than lower scorers, and IQ makes little difference.—E. J. Posavac.

7377. Sexton, Donald E. & Haberman, Phyllis. (Columbia U, Graduate School of Business) **Women in magazine advertisements.** *Journal of Advertising Research*, 1974(Aug), Vol 14(4), 41-46.—Analyzed 1,827 advertisements depicting women in 3 time periods: 1950-1951, 1960-1961, and 1970-1971. Results of a systematic rating procedure appeared to corroborate feminist charges that the roles for women shown in advertisements are limited: in 2 decades the trends did not appear to have moved very far from a narrow picture of women as social people in predictable environments.—J. C. Franklin.

7378. Seymour, Dorothy Z. **Black children, black speech.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Discusses views of Black English as "sloppy talk" and as another dialect. The sounds and language structure of ghetto speech are analyzed, and the psychological effects of stigmatizing it are noted. A possible 2-language solution is suggested.

7379. Siddiqi, Jawaid A. & von Knoblauch zu Hatzbach, Ludwig. (Inst Psychologisches, Mainz, W Germany) [Cliff's law: Fact or artifact? A critique of methodology and theoretical analysis.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 275-298.—Tested the hypothesis that N. Cliff's law of adverbs as multipliers derives from the experimental procedure used and lacks general validity. The material consisted of 6 adjectives and 7 adverbs to be judged on 6 polarities. 7 experimental groups of 25 students each judged only a single adverb paired with the 6 adjectives, while the control group of 50 students followed Cliff's procedure exactly and judged all 7 adverbs paired with all adjectives. Results indicate that Cliff's mathematical model fitted all experimental situations well; however, this fact contradicts Cliff's interpretation of the function of adverbs; for example, the intensity of "rather" turns out to be greater than the intensity of "very." Results support a theory of precision function for adverbs, for which a mathematical model is given. (English & French summaries) (25 ref)—W. J. Koppitz.

7380. Smart, Reginald G. & Fejer, Dianne. (Addiction Research Foundation, Toronto, Ontario, Canada) **The effects of high and low fear messages about drugs.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 225-235.—In 2 studies, investigated the effects of high and low fear messages about drugs in a total of 2,412 high school, university, and community college students. In Study 1, 3 levels of threat appeal about marihuana were used, and the interaction between the value of these messages and anxiety level was examined. Study 2 investigated attitudes toward a nonexistent drug—monoamyltripitate (MOT)—on the expectation that attitudes toward MOT would have few extraneous influences (outside the message itself). It was found that differences among the

persuasive messages were very small and insignificant. However, the effects of fear level for MOT were very large and indicate that high fear appeals are superior. Where a new drug is involved it would be expected that a high threat will discourage use more than a low threat. (15 ref)—*Journal abstract*.

7381. Stein, Murray. **Hephaistos: A pattern of introversion.** *Spring*, 1973, 35-51.—Discusses myths concerning the Greek god Hephaistos, tracing many of his relationships and activities. As the worker is viewed by Marxists to be the workhorse of industrial society, so is Hephaistos portrayed as the only Olympian god who works. Associations between this god and women and their mysteries is also explored. This archetypal background is related to an introverted psychological type of man closely attached to the world of women and mothers, his creativity dependent on his intimacy with the feminine world, yet posing a threat to natural feminine creativity. It is suggested that Marxists may respond to intimations of this image of original man.—A. Farrell.

7382. Takefuta, Yukio (Ed.). (Ohio State U) **Analysis of intonational signals by computer simulation of pitch-perception behavior in human listeners.** Columbus, OH: Ohio State University Research Foundation, TR 15, 1974. 23 p.—Describes computer methods for extracting physical parameters, comparing the relative efficiency of the parameters as an intonational signal, processing extracted data, and extracting and identifying pitch patterns. Pattern features and cardinal pitch patterns are defined.

7383. Vernon, McCay & Miller, William G. (Western Maryland Coll) **Language and nonverbal communication in cognitive and affective processes.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 124-135.—Reviews research on the role of language and nonverbal communication in cognitive and affective process, with emphasis on studies involving deaf Ss. It has been found that deaf and nondeaf Ss have comparable problem solving abilities, which indicates that the mediating process of thought is not a system of verbal symbols. It is suggested that most deaf children develop into psychologically healthy adults because body language, not verbal language, plays the primary role in affective development. It is concluded that verbal language is not a relevant variable in cognition, and that paralinguistic phenomena such as body language and voice quality are more important than verbal language in the communication of feelings. (2 p ref)—J. Kelly.

7384. Wedin, Lage. **Evaluation of a three-dimensional model of emotional expression in music.** *Reports from the Psychological Laboratories, University of Stockholm*, 1972(May), No 349, 20 p.—Data from a previous experiment suggesting a 3-dimensional model of emotional expression in music were submitted to some complementary analyses. The cross-stimulus and cross-S generality was investigated—chiefly by rotating the different factor structures into a common space—with 44 psychology and 30 music students. In 4 additional experiments the validity of the preliminary results was investigated with a total of 47 music and 47 psychology students. An attempt was made to reproduce the structure by graphic ratings on each separate dimension

and by ratings on factor-typical scales. The original 3-dimensional model was essentially corroborated except that the 3rd dimension, Solemnity-Triviality, was bipolar like the 2 1st dimensions, Tension-Energy and Gaiety-Gloom. (16 ref)—*Journal abstract*.

7385. Wise, Gordon L.; King, Alan L. & Merenski, J. Paul. (Wright State U, Dayton) **Reactions to sexy ads vary with age.** *Journal of Advertising Research*, 1974(Aug), Vol 14(4), 11-16.—Reacting to the statement, "Advertisers make too much use of sex appeals in their advertisements," 1,200 respondents indicated very mild agreement. Far stronger agreement came from older groups, and females agreed more strongly than males. Race, income level, and educational level did not produce significant differences.

7386. Wittwer, J. (U Bordeaux II, France) **[Identifying deep structures by the method of syntactic cues.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 590-600.—Describes a scheme of grammatical analysis based primarily on a study of syntactic cues. Examples of the application of the scheme are included. The relation of the scheme to the concepts of N. Chomsky and other psycholinguistic theories are discussed. (16 ref)

## PERSONALITY

7387. Ancona, L. & Scopetta, C. (Catholic U of the Sacred Heart, Faculty of Medicine, Inst of Psychology, Rome, Italy) **[Perception, projection, anxiety.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 513-525.—Studied the effects of anxiety on perception and projection. Ss were 50 male 1st, 2nd, and 3rd yr medical students. They completed 2 tasks related to medical perception change, and measures of hidden, visual perceptual change, and measures of hidden, manifest, and total anxiety, introversion/extraversion, and reactive imagination. Results indicate that when the object of perception was physical reality, anxiety led to a heightened perceptual constancy (or denial of change) in the object; when the object of perception included physical structures and persons, anxiety led to a denial of physical change in persons and a deformation of physical structures; when the object included other persons and structures; when the object included other persons and self, anxiety led to a perceptual constancy in regard to self and a deformation of other persons. (26 ref)—Z. M. Cantwell.

7388. Bane, Mary J. & Jencks, Christopher. **Five myths about your IQ.** In F. Reber & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Examines 5 propositions about IQ asserting that (a) IQ tests are the best measure of human intelligence; (b) poorness is related to low IQ, and the converse; (c) IQ is overwhelmingly determined by genetic endowment; (d) black children and poor white children have low IQ scores primarily because they have "bad" genes; and (e) improving the quality of schools will tend to wipe out differences in IQ and school achievement and hence in life chances.

7389. Bard, James A. (Cleveland State U) **Rational proselytizing.** *Rational Living*, 1973(Fal), Vol 8(2), 24-26.—Studied the effects of proselytizing rational living. The experimental group consisted of 10 college students, each



assigned to teach the principles of rational living to one or more friends. The group was matched to a group of volunteers on factors of sex, academic performance, rationality scale score, and a self-rating of personal happiness. Rationality scales administered to both groups before and after "teaching" show an increase in rationality scores for the experimental group after the teaching.—G. J. Frankel.

7390. **Bratfisch, Oswald.** [Experimental intellectual activity and perceived difficulty in intelligence tests.] (Span) *Revista de Psicología General y Aplicada*, 1974(May-Jun), Vol 29(128), 477-497.—22 Ss completed a battery of 10 intelligence tests, and compared 5 of the tests as to their perceived similarity of content and difficulty. A correlation of .48 was found between the 2 factors. Perceptual speed tests were considered the easiest and spatial ability tests were considered the most difficult. (English summary) (27 ref)—W. B. Haslam.

7391. **Bromberg, Walter & Hutchison, Sarah H.** Self image of the American Indian: A preliminary study. *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 39-44.—Administered the Draw-A-Person Test to 28 Indians and 25 whites, interpreting it as a measure of self-image. Indian drawings had larger bodies, larger heads, larger and more open eyes, and more hair than drawings by whites. A general discussion, incorporating these results, points out that the Indian's image of self and concept of the relations between self and environment have no representation in white psychology. An explanation of the Indian world-view is given, combining Gestalt concepts, nonverbal communication, animism, and phenomenism. (15 ref)—W. R. Street.

7392. **Burnengo Parodi, A.** (U Genoa, Inst of Psychology, Italy) [The Ka-Ro Test: A contribution to its application as a parallel form of the Rorschach Test.] (Ital) *Neuropsichiatria*, 1972(Jan), Vol 28(1-2), 37-46.—Compared the responses of 38 normal adults to the standard Rorschach test and a parallel series (Ka-Ro) introduced by Y. Kataguchi. Inkblots characterizing this series have more indented edges and more shades of color than the original. Ss were 19 males and 19 females 20-50 yrs old, with varied economic and educational backgrounds. Half were administered the Rorschach first; the Ka-Ro 4 mo later. Half received the Ka-Ro first, the Rorschach 4 mo later. Results show that  $R$ ,  $R$  + %,  $D$ %, and  $Dd$ % were greater for the Ka-Ro test. More movement and color responses were also noted. Results compared favorably with the original data reported by Kataguchi and with results of 3 similar studies in the literature. (English, French, & German summaries)—A. Felice.

7393. **Buss, Allan R.** (U Alberta, Ctr for Advanced Study in Theoretical Psychology, Edmonton, Canada) Regression, heritability, and race differences in IQ. *Developmental Psychology*, 1975(Jan), Vol 11(1), 105.—Suggests that there are 2 distinct sources (mean differences and regression coefficient differences) to be considered when interpreting between-race real regression differences in IQ. Although race differences in mean IQ producing differential regression effects alone are not evidence of clear genetic or environmental factors, between-race differences in real absolute regression

associated with differential regression coefficients are potentially suggestive of such interpretations.

7394. **Campo, Vera.** [The Rorschach as a minimal battery.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 275-287.—Discusses use of the Rorschach test as the principal method of obtaining clinical information.

7395. **Carlitz, Lucien.** (U de l'Etat de Mons, Belgium) [The TAT and psychoanalytic theories: Bibliographic insights.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 467-489.—Reviews the evolution of the theoretical foundations of the Thematic Apperception Test and emphasizes a close dependence on the American psychoanalytic school. 3 steps can be distinguished: (a) emphasis on the revelation of unconscious tendencies in story content; (b) owing to the influence of ego psychology, the story is now considered a pure cognitive product; (c) current efforts by Shentoub in France to synthesize the 2 approaches. Shentoub urges a return to orthodox Freudian concepts; the story is regarded as a compromise between the unconscious drives and ego control capacity. (Flemish & English summaries) (87 ref)—S. S. Marzolf.

7396. **Carter, John D.** (Rosemead Graduate School of Psychology, CA) Personality and Christian maturity: A process congruity model. *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 190-201.—Maintains that C. Rogers's, E. Gendlin's, and Jung's theories of personality include the processes of actualization and congruence. The processes are seen as the basis of a model of personality and Christian maturity in which both spheres have the same processes but have different contents. The similarities and differences are discussed, and it is argued that genuine integration is only possible when some processes or principles are common to Christianity and psychology. (18 ref)—*Journal abstract*.

7397. **Chamorro Gundin, Fernando.** [Comparative experiences with the Rorschach psychodiagnostic test and the Szondi test.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 311-323.—Compares results obtained with both tests showing their many points of agreement.

7398. **Clouse, Bonnidell.** (Indiana State U) Ego and superego variables as related to moral behavior. *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 223-235.—Discusses morality from a behavioral point of view, using ego and superego variables as the bases for defining the term. (22 ref)

7399. **Codol, Jean-Paul.** (U Provence, Lab de Psychologie Sociale, Aix-en-Provence, France) [The phenomenon of superior conformity of one's self to group norms in a situation requiring perceptual estimation of physical stimuli.] (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 11-23.—Sought to verify the existence of the phenomenon of the self-image of superior conformity to group standards in a situation not previously studied. 18 groups of 4 secondary school pupils each, all in their final year, gave oral estimates of the lengths of 12 rods 33-182 cm long. In each group 1 S was naive, 1 pre-instructed S gave the correct estimate, and 2 Ss responded so as to produce a predetermined relationship between estimates. After 12 trials of 3 estimates each, the naive Ss rated their own performance and that of other

group members. They tended to greatly overestimate their own accuracy and to systematically devalue the performance of the S who gave the correct answers. Results are considered to support the hypothesis that the phenomenon exists where accuracy is taken as the norm.

—E. E. Brown.

7400. Conde Lopez, Valentin & de Estaban Chamorro, Tomas. (U Complutense, Facultad de Filosofia y Letras, Madrid, Spain) [A study of Zung's Self-rating Depression Scale (SDS) on a stratified sample from a normal population.] (Span) *Revista de Psicologia General y Aplicada*, 1974(May-Jun), Vol 29(128), 515-553.—250 Ss in Madrid 15-70 yrs old completed the SDS. Results were analyzed according to sex (females scored significantly higher than males), age, and marital status. (English summary)

7401. Defrenne, J.; Mertens, C. & Segers, M.-J. (U Louvain, Belgium) [Evaluation of anxiety in a professional setting using the Cattell test.] (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol 21(4), 121-129.—Describes a study of Belgian postal workers who were administered the Anxiety Scale of the Institute for Personality and Ability Testing. All Ss (1,807 males and 846 females) had volunteered for a heart examination. Test results were interpretable only if sex, age, and profession were taken into account. While the test does appear to be a valid measure of anxiety it provides little etiological evidence about the trait. Such developmental information is important for understanding the functional significance of anxiety. (English & Spanish summaries)—R. L. Cook.

7402. Ekehammar, Bo. (U Stockholm, Sweden) **Interactionism in personality from a historical perspective.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1026-1048.—Starting from a distinction between 3 different conceptions of human behavior (personologism, situationism, and interactionism) and between 2 different conceptions of the environment (physical vs psychological environment), the present article focuses on the interactionist position, which has been preferred in some recent conceptions of personality. By reviewing different classical theories of psychology, it is argued that the modern interactionist conceptualization is not new in personality psychology. It can be traced back to the works of J. R. Kantor and K. Lewin and is also advocated in many of the succeeding classical works. By reviewing the previous interactionists' conceptions of the environment, it is argued that their emphasis on the psychological environment in explaining person-situation interactions presents the same main thought as that found in the recent cognitively colored interactionism. By reviewing empirical strategies and results within the interactionist framework, it is argued that the inaptness of previous methods has impeded the development of interactionism and explains why it has not had an impact until now. (4 p ref)—*Journal abstract*.

7403. Ellison, Barbara A. (Albany State Coll) **Creativity in black artists: A comparison of selected creativity measures using judged creativity as a criterion.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Apr), Vol 1(3), 150-157.—Based an investigation of creative expression among 38 black college students on the hypothesis that a positive relationship exists between (a) scores on 2 measures of creativity—the Remote

Associates Test (RAT) and the Barron-Welsh Art Scale of the Welsh Figure Preference Test (WFPT)—and (b) scores on creativity checks and judged creativity. Ss completed a pastel drawing that illustrated the concept "Freedom." These drawings were rated by art instructors on the basis of 6 qualities: aesthetic wholeness, color, composition, symbol, vitality, and perspective depth. Results indicate that a low and negative relationship exists between scores on the 2 creativity measures and judged creativity; these findings contradict results of similar studies.—M. E. Pounsel.

7404. Erlenmeier, N.; Mönikes, W. & Wirtz, R. (U Bonn, Psychologisches Inst, W Germany) [Rorschach organization and form level indices of intelligence.] (Germ) *Diagnostica*, 1974, Vol 20(3), 106-116.—Examines the relationship between 2 Rorschach indices of intelligence, Beck's (1967) organization activity Z, and Klopfer's (1954) form level FLR, and the total, verbal, and performance scores of the Hamburg-Wechsler-Intelligenztest (HAWIE). 2 raters scored the Rorschach protocols of 180 Ss 61-75 yrs old. Intrarater reliabilities between .80 and .97, interrater reliabilities between .64 and .69, and correlations of .38 and .31 between HAWIE total score and FLR and Z respectively are reported. The last *r* was .22 when the number of responses was partialled out.—M. Morf.

7405. Estes, W. K. (Rockefeller U, New York, NY) **Learning theory and intelligence.** *American Psychologist*, 1974(Oct), Vol 29(10), 740-749.—Proposes that the primary objective of intelligence testing be redirected from predicting to improving intellectual performance. In a number of instances, specific behaviors involved in responding to items on intelligence tests have been subjected to experimental analysis in laboratory studies. Results support the concept that different levels of test performance result from different combinations of processes and mechanisms of coding, hierarchical association, memory search, and cybernetic control of intellectual functioning. (20 ref)—*Author abstract*.

7406. Fernandez Ballesteros, Rocio. [Auxiliary plates on the Rorschach for precise determinants.] (Span) *Revista de Psicologia General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 325-327.—Discusses materials that assist Rorschach Ss to define more clearly what determined their answers.

7407. Floyd, Joan & Viney, Linda L. **Ego identity and ego ideal in the unwed mother.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 273-281.—Compared 32 primipara unwed mothers, 30 single nonpregnant women, and 15 primipara married mothers to test the hypotheses that unwed mothers would show (a) greater ambivalence about their ego identities, (b) less identification as an adequate feminine person, (c) a greater mother figure component in their ego ideals, and (d) greater expression of dependency needs. Findings support hypotheses (a) and (b). However, there were no significant differences found between groups for the "mother" component of ego ideals. Unwed mothers were also found to exhibit significantly greater dependency needs than their nonpregnant counterparts, but they did not differ from the married mothers whose dependency needs were equally great. The latter finding suggests the



vulnerability of the ego state generated by any pregnancy, in or out of marriage. (25 ref)—*Journal summary*.

7408. Forbes, Alan R.; Dexter, Wayne R. & Comrey, Andrew L. (U Otago, Dunedin, New Zealand) **A cross-cultural comparison of certain personality factors.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 383-393.—Administered the 1970 version of the Comrey Personality Scales to 179 New Zealand university and teachers' college students. Factor analysis of the data confirmed that the basic structure of the scales was almost identical with that found in 641 representative cases from an American normative sample. It is suggested that further research is needed to explicate the relationship between the traits of orderliness and conformity. (26 ref)—*Journal abstract*.

7409. Galli, Giuseppe. (U Macerata, Lab of Experimental Psychology, Italy) **[Methodological principles for the study of the phenomenal self.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(4), 550-574.—Describes an experimental method for the exploration of the phenomenal self which is based on the Gestalt and contemporary interaction theories. Self-qualities are classified according to these parameters: isolation-participation in relation to the phenomenal environment; self-allo-centered view of qualities (direct self-image, reflected self-image); time perspective of experiencing self-qualities (actual-potential self); and subjective experience of self-qualities and positive vs negative tendencies (fear images, wish images). The method consists of a series of bipolar pictures—the profiles of the Ss and of relevant partners, presented to Ss in a correct and in distorted versions. The comments and reactions of Ss are recorded and analyzed. (English & French summaries) (2 p ref)—*T. Fisher*.

7410. Ginoux, Jean-Claude. (U Provence, UER de Psychologie, Aix-en-Provence, France) **[Problems of training in analysis and interpretation of the Rorschach test.]** (Fren) *Cahiers de Psychologie*, 1973, Vol 16(1), 57-71.—Discusses the difficulties of obtaining an adequate training in the analysis and interpretation of the Rorschach, emphasizing the difference between the 2 processes. Analysis is the work of examining "with a fine-tooth comb" all possible meanings of all the elements of the total protocol that the psychologist is in a position to isolate. Interpretation is the work of deciding which of all the possible meanings of all the evaluative criteria will contribute, when considered in juxtaposition, to the progressive understanding of the whole. Interpretation is presumably crystalized from a series of reflections and hypotheses; it is a continuing process, not a conclusion postponed until all other steps of the test have been completed. Training can thus be given in analysis, but not in interpretation. The trouble with most of the available learning aids—academic training, literature, manuals, interpretative schemata, and supervised and group practice—is that they present the learner with presolved problems. To reach a satisfactory level of competence, the trainee must become autonomous, accepting not only the hard task of acquiring the necessary background and knowledge but the always present risk of interpretation. (English summary) (16 ref)—*E. E. Brown*.

7411. Gonzalez, Arthur E. & Davis, Wallace M. (Princeton U) **Sex differences and cognitive consistency: A Greek and North American contrast.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 301-311.—Conducted an experiment across 2 cultures, Greek and American, to test the disposition of Ss toward cognitive consistency. Ss were 16 American and 16 Greek male and female high school students. It was hypothesized that the balance effect would depend on sex, culture, and task variables. In a  $2 \times 2 \times 2$  factorial design, responses to 3 items on a 10-point bipolar adjectival scale were assessed before and after the introduction of discrepant information. Results show significant differences between Greek and US (Californian) Ss and between males and females in both cultures, differential across tasks. Some implications of the findings for consistency theory in general are discussed.—*Journal abstract*.

7412. Gough, Harrison G. (U California, Berkeley) **Estimation of locus-of-control scores from the California Psychological Inventory.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 343-348.—Correlated Rotter's Internal-External Control Scale with 18 standard and 4 new scales of the California Psychological Inventory (CPI) in samples of 141 male and 220 female college students. The directions of relationship were the same for 21 of the 22 scales. For all 361 Ss, CPI Tolerance, Good Impression, and Achievement via Conformance scores each correlated-.35 with locus of control; Anxiety had a coefficient of .24. A 5-scale regression equation was developed, including Dominance, Responsibility, Tolerance, and Good Impression weighted negatively, and Self-control weighted positively. In a new sample of 50 couples, locus-of-control scores estimated by means of this equation correlated .43 with actual locus of control for husbands and .44 with actual locus of control for wives. Descriptive implications of actual and estimated locus-of-control scores were more similar for wives than for husbands. (16 ref)—*Journal abstract*.

7413. Gray, David F. & Gaier, Eugene L. (State U New York, Buffalo) **The congruency of adolescent self-perceptions with those of parents and best friends.** *Adolescence*, 1974(Sum), Vol 9(34), 299-303.—7 female 12th graders rated 100 positive and negative traits as describing or not describing themselves. Each S's 2 best friends and parents were asked to rate each trait as they felt the S would see herself. Both parents and friends gave ratings which correlated significantly with those of the Ss. Friends were slightly more accurate but less consistent. The Ss came from social and religious backgrounds and were in a school which tended to minimize differences in values between the adolescents and their parents, and among the adolescents themselves.—*A. Krichew*.

7414. Greenhaus, Jeffrey H. & Badin, Irwin J. (Stevens Inst of Technology, Hoboken, NJ) **Self-esteem, performance, and satisfaction: Some tests of a theory.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 722-726.—Conducted 2 studies to investigate (a) the relationship between the 3 sources of self-esteem outlined in a 1970 study by A. K. Korman (see PA, Vol 44:5758)—chronic, task specific, and socially influenced—

and performance on an anagram task, and (b) the moderating effects of task-specific self-esteem on the relationship between performance and satisfaction. Ss were a total of 205 undergraduates, who completed the Self-Description Inventory, a 5-item measure of task-specific self-esteem, and the California F Scale. Task-specific self-esteem predicted performance for the total sample and socially influenced self-esteem predicted performance for high-authoritarian Ss. As predicted, performance tended to predict satisfaction only for high-self-esteem Ss.—*Journal abstract.*

7415. **Hamburg, David A.** (Stanford U, Medical School) **Coping behavior in life-threatening circumstances.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7416. **Hokanson, Jack E.** (Florida State U) **An escape-avoidance view of catharsis.** *Criminal Justice & Behavior*, 1974(Sep), Vol 1(3), 195-223.—Presents a conceptualization pertaining to the "arousal" reducing concomitants of aggression, along with supporting evidence. It is suggested that hostility catharsis, when observed, may only be a special case of a more general set of behavioral-emotional learning processes involving the escape-avoidance paradigm. The possible relationships among aggressive behavior, autonomic conditioning, and cognitive processes are discussed. Implications for the treatment and control of problems of aggression are suggested and compared with those emanating from the hydraulic model. (35 ref)—*Journal abstract.*

7417. **Holt, Robert R.** (New York U) **Freud's mechanistic and humanistic images of man.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 3-24.—Contrasts the mechanistic view of man most commonly associated with Freud's theories with a conflicting humanistic image of man which can be inferred from his later speculative works, his letters, and his own life. The influence of these two images of man on psychoanalytic theories is discussed. It is suggested that mechanistic theories of man, which see him as devoid of freedom and responsibility, can have dangerous social and political consequences and can dehumanize psychotherapeutic treatment. The humanistic image of man, which has an inherent therapeutic orientation, is viewed as personally and socially constructive. The relations of humanistic and mechanistic psychoanalysis to scientific methodology are discussed. It is concluded that a comprehensive psychological theory—which could encompass the physiological, biochemical, social, cultural, and philosophical aspects of man—is needed. (2½ p ref)—*J. Kelly.*

7418. **Kiener, Franz.** (Technischen U Berlin, Inst für Psychologie, W Germany) **[Investigations of body image: II.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974, Vol 22(1), 45-66.—Reviews the literature covering primary investigations in the field of body image. Body image is dependent upon the ego and its relationship to the environment. It represents subjective and objective awareness, conscious and subconscious, structural and with unclear boundaries. It changes, but reflects the present ego picture, at times accepting reality and at times rejecting it. (80 ref)—*S. D. Babcock.*

7419. **King, Mark.** (Duquesne U) **Sex differences in self-actualization.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 602.—Contrary to previous findings, no significant sex differences were found when the Personal Orientation Inventory was given to married couples. Results suggest that self-actualizing people choose other self-actualizers as mates, lessening previously reported sex differences.

7420. **Klein, George S.** **The vital pleasures.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 181-205.—Discusses sensual and nonsensual pleasures as ego experiences which contribute to identity development and to the structuring of motives and behavior patterns. Pleasure is seen as a positive ego experience, rather than as a mechanistic release of libido pressing for discharge. The prototypical conditions of pleasure are derived from infantile experiences but undergo cognitive and affective changes as the self develops. 6 prototypes of the pleasure experience, including reduction of unpleasant tension, sensual pleasure, pleasure in perceptual and cognitive functions, pleasure from experiencing the self as an effective agent, and aesthetic pleasure, are described. It is suggested that the capacity to experience different types of pleasure at appropriate points of development contributes to ego strength. (2 p ref)—*J. Kelly.*

7421. **Kubie, Lawrence S.** **The drive to become both sexes.** *Psychoanalytic Quarterly*, 1974, Vol 43(3), 349-426.—Argues that the assumption, whether tacit or overt, that any human being wants to be only one sex to the exclusion of the other is psychoanalytically naive and runs counter to all psychoanalytic experience. The concept an unconscious drive to become both sexes is further elaborated.

7422. **La Branche, Anthony.** (Loyola U, Chicago) **Neglected and unused things: A narrative encounter.** *Review of Existential Psychology & Psychiatry*, 1973, Vol 12(2), 163-168.—Discusses the use of ego-invented narratives to bring forgotten and unused objects into harmony with the autobiographical narrative of the self. It is suggested that invented histories of nonuse which concede a separate existence for neglected things indicate an imaginative continuity which orders thought and perception.

7423. **Laplanche, J.** **[Castration: Theoretical evolution and current status: A course in the curriculum of the U.E.R. Clinical Studies.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 685-709.—Continues the discussion of the castration complex in a 2nd article (see PA, Vol 53:Issue 4) which examines the logic of the phallic phase, differences of the castration complex in boys and girls and in men and women, theoretical constructs of the castration complex, the effect of the castration complex in the oedipal situation, and the "taboo of virginity."—*Z. M. Cantwell.*

7424. **Laplanche, J.** **[Castration: Theoretical evolution and current status: A course in the curriculum of the U. E. R. Clinical Studies.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 632-646.—Discusses the following theoretical aspects of a Freudian construct, the castration complex: the theory of the complex; the specificity of the complex in psychoanalysis; Freud and the castration complex; "Little Hans" and the theory of



infantile sexuality; and the role of the castration complex in the evolution of infantile sexuality.—Z. M. Cantwell.

7425. Marshall, Bernice (Ed.). *Experiences in being*. Belmont, CA: Brooks/Cole, 1971. 317 p.—Presents a collection of 29 articles and dialogues on current personal and social issues and how the perception of these can contribute of self-awareness. Topics include the interpretations of emerging, inner, reflected, and searching aspects of man's self-image and the experiences precipitated by these (e.g., freedom, conflict, or loneliness); how man's self-image reflects in his interpersonal relationships; and the application of methods of increasing self-knowledge to the educational process. (3 p ref)

7426. Muro, James J. & Drummond, Robert J. (U Maine, Orono) *A note on college level norms for the HIM-B. Small Group Behavior*, 1974(May), Vol 5(2), 145-156.—Norms for the Hill Interaction Matrix (HIM-B) are provided from responses by 337 female and 178 male freshmen from the University of Maine in Orono.

7427. Nakonečný, M. (U Karlova, Katedra psychologie a pedagogiky, Prague, Czechoslovakia) [Psychological function and structure of the "Jáství." (Czech) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 45-50.—Analyzes different meanings of the Czech term "jáství" which in English is akin to "ego," "self," or even "personality." Models of these concepts by P. A. Bertocci, G. W. Allport, H. B. English, E. R. Hilgard, and others are discussed. The term has empiric connotations and explains unity of mental life and consistency of external behavior. It refers to both structure and dynamic functioning, and is an important concept in psychiatry and clinical psychology. This does not mean that understanding behavior in terms of classical and instrumental conditioning is excluded, but that use of the concepts "self" or "ego" is psychologically more meaningful and appropriate. (21 ref)—V. Fischmann.

7428. Oakland, James A. (Fuller Theological Seminary, Graduate School of Psychology, Pasadena, CA) *Self-actualization and sanctification*. *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 202-209.—Discusses the theological concept of sanctification from the reformed and Wesleyan perspective and equates that perspective with the psychological concept of self-actualization. Both concepts attempt to describe a long-term growth process in the individual whereby certain characteristics become increasingly prominent. Christ is set forth as the outstanding example of a self-actualizing person.—*Journal abstract*.

7429. Ogilvie, Bruce C. (California State U, Inst for the Study of Athletic Motivation, San Jose) *Stimulus addiction: The sweet psychic jolt of danger*. *Psychology Today*, 1974(Oct), Vol 8(5), 88-94.—Studied athletes of national or world caliber using the MMPI, the Edwards Personal Preference Schedule, the 16 PF, and interviews. These athletes have strong desires to achieve, are autonomous, self-assertive, and forthright. They showed low anxiety and a strong sense of reality. They differ from nonathletes in that they satisfy their human need for stimulation by exposing themselves to danger.—E. J. Posavac.

7430. Olivieri de Perdikidi, H. [Infantile mourning in projective techniques.] (Span) *Revista de Psicología*

*General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 345-353.—Presents case study data showing responses to projective tests in children following the death of a parent.

7431. Orpen, Christopher. (U Cape Town, S Africa) *The susceptibility of the Quick Test to instructional sets*. *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 508-509.—Administered the Ammons Quick Test to 135 2nd-yr and 126 senior-year male high school students under intelligence, achievement, and standard instructional sets. Analysis revealed a significant main effect for Instructional Set, indicating the susceptibility of the Quick Test to instructional sets.

7432. Peatling, John H. *The architecture for self as its own builder*. *Character Potential*, 1974(Oct), Vol 7(1), 28-36.—The papers by A. L. Miller-Tiedeman (see PA, Vol 53:Issue 3) and L. W. Barber (see PA, Vol 53:Issue 3) are related by architectural principles which serve to introduce the theoretical tools found in the personality model developed by J. H. Peatling and A. L. Miller-Tiedeman for the architecture for self as its own builder. This mathematical model allows for differentiation and integration. It is hierarchical and cumulative. It is also built on interactions of basic personality elements which, though complex, can model a way for an adult at a Piagetian level of formal operations to restructure self with awareness. This is the last of 4 papers in a symposium on career, choice, and the self (see PA, Vol 53:Issue 3).—L. W. Barber.

7433. Penner, Wes J.; Zingle, Harvey W.; Dyke, Ron & Truch, Steve. (Edmonton Public School System, Alberta, Canada) *Does an in-depth transcendental meditation course effect change in the personalities of the participants?* *Western Psychologist*, 1973, Vol 4(4), 104-111.—Studied how a course in transcendental meditation (TM) affected the responses of 50 male and 50 female Ss to the Omnibus Personality Inventory (OPI) and how these responses compared with those of the normative sample (NS). The OPI was administered before and after the 22-day course. The TM students considered themselves less tense and anxious than the NS before the course, and even more relaxed afterward. Before the course the TM participants were more prone to "acting out" their feelings, more interested in social activities, and more liberal in religious orientation, than the NS; after the course they responded more like the NS, especially on the religious orientation subscale. TM Ss differed markedly from the NS, and did not change during the course, in being more imaginative, free-thinking, intellectually oriented, self-determining, considerate of others, and feminine. On the thinking introversion, personal integration, and response bias subscales, TM Ss were like the NS before the course, but afterward had higher scores than the NS. The limitations of the study are discussed.—D. R. Evans.

7434. Ray, J. J. & Martin, J. (U New South Wales, Sydney, Australia) *How desirable is dogmatism?* *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 143-144.—Studied the relationship among scores on the Rokeach Dogmatism Scale, the Martin Social Desirability Scale, and the amount of university education. The 2 scales were administered to a total of 177 psychology students at Macquarie University who had 1,

2, and 3 or more yrs of contact with the university. Dogmatism decreased with the amount of university education but was unrelated to social desirability. The desirable and undesirable aspects of dogmatism are discussed.—*R. Brislin.*

7435. Ray, John J. (U New South Wales, Kensington, Australia) **Dogmatism in relation to sub-types of conservatism: Some Australian data.** *European Journal of Social Psychology*, 1973, Vol 3(3), 221-232.—Examined the relationship between authoritarianism and conservatism, using newly developed forms of the Dogmatism and Fascism scales to correlate with political, social, moral, and economic conservatism. Ss were 118 members of upper-, middle-, and working-class neighborhoods in Sydney, Australia. It is concluded that both new scales were equally good measures of general authoritarianism among supporters of Australian political parties. The new Dogmatism scale was significantly and positively correlated with the political, social, and moral conservatism scales, but negatively related with economic conservatism. (17 ref)—*Journal abstract.*

7436. Reitz, H. Joseph & Groff, Gene K. (Indiana U) **Economic development and belief in locus of control among factory workers in four countries.** *Journal of Cross-Cultural Psychology*, 1974(Sep), Vol 5(3), 344-355.—Investigated belief in locus of control among 1,140 factory workers from a developed Western country (the US), 716 from a developed oriental country (Japan), 469 from a developing Western country (Mexico), and 258 from a developing oriental country (Thailand). Ss were tested on Rotter's Internal-External Control Scale. Items were grouped for analysis into 4 categories proposed as meaningful in cross-cultural research: leadership and success; respect; politics; luck and fate. Comparisons were made of the percentage of external responses by category. Results show workers from the 2 developed countries were more internal on leadership and success than workers from the 2 developing countries, and workers from the 2 oriental countries were more external on respect than workers from the 2 Western countries. Other significant intercountry differences were found on the remaining categories.—*Journal abstract.*

7437. Romano, P. (Ospedale Neuropsichiatrico Provinciale di Treviso, Italy) [Some considerations on Jungian psychology as a topical question in the current cultural situation.] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1381-1389.—Discusses the respective roles of the personal and the collective unconscious in individual development. It is argued that analysis which focuses only on the personal unconscious leaves the individual in a state of infantile dependency on others, while analysis which takes into consideration the collective unconscious fosters a mature dependency. Thus, it is asserted that in a society that rewards infantile dependency and imposes limited motivational constructs Jungian psychology is of critical importance. (English summary) (17 ref)—*L. Klinkon.*

7438. Russon, Gordon W. **Interpersonal adequacy: A behavioural determinant.** *Canadian Journal of Criminology & Corrections*, 1974(Oct), Vol 16(4), 393-402.—Elaborates a concept of interpersonal adequacy, defined as the individual's assessment of self in

comparison with others, and notes that this assessment influences choice of interactional patterns. A continuum rather than a dominance/submission dichotomy is proposed, and 4 patterns of behavior with increasing adequacy are identified: submissive, decompensating, overcompensating, and cooperative. Personality types that fit these terms are described, and a checklist of 60 items proposed to relate to the categories is presented for evaluation purposes. It is suggested that the categorization may be of use in assessing and treating offenders. (French abstract)—*C. Wright.*

7439. Salay, Ference. **An application of verbal stimulus-response indicants to objective measurement of cathexis.** *Göteborg Psychological Reports*, 1974, Vol 4(10), 20 p.—In a preliminary step of establishing methods for measurement of cathexis, factor analysis was used to make specific a certain way of thinking about some verbal stimulus-response indicants of cathexis. Results are in fair overall agreement with expectations—valid application of such verbal stimulus-response media to problems of the measurement of cathexis. Some recent theoretical and empirical work by C. W. Ramey which inspired the present study is reviewed. (15 ref)—*Journal abstract.*

7440. Scarr-Salapatek, Sandra. **Unknowns in the IQ equation: A review of three monographs.** In F. Reber & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reviews and evaluates the theses of A. R. Jensen, H. J. Eysenck, and R. J. Herrnstein and other commentaries on the IQ controversy.

7441. Sheppard, Charles; Bates, Cindy; Fracchia, John & Mertis, Sidney. (Central Islip State Hosp, Demographic & Special Studies Unit, NY) **Psychological need structures of law enforcement officers.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 583-586.—Hypothesizing that a relationship exists between personality and occupational choice, the Edwards Personal Preference Schedule (EPPS) was employed to assess need differences for a sample of 33 metropolitan police officers. Responses were compared with those of the EPPS adult male and male college normative groups. Comparison with the adult male population showed that Ss scored higher on needs for Achievement, Exhibitionism, and Heterosexuality and lower on needs for Abasement, Affiliation, Deference, Endurance, Nurturance, and Order. Comparison with the male college normative population showed that Ss differed in having a lower Affiliation need. The common findings of the present and 2 previous studies suggest that compared to the male general population, police officers have higher needs for Exhibitionism and Heterosexuality and a lower need for Affiliation. Further studies are necessary for clarification.—*Journal abstract.*

7442. Simon Hernandez, M. E. [The clash of the green in the ZTT and the Rorschach.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 289-309.—Discusses the symbolism of green and reactions to it found with the ZTT (Zulliger Test) and the Rorschach.

7443. Sorrentino, Richard M. & Short, Judith-Ann. (U Western Ontario, London, Canada) **Effects of fear of success on women's performance at masculine versus**



**feminine tasks.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 277-290.—Tested hypotheses derived from M. Horner's (1968) theory concerning the effect of the sex-role orientation of the performance situation on the arousal of the motive to avoid success in women. The study compared the performance of 164 female undergraduates high and low in the motive to avoid success in a male-oriented and a female-oriented situation. It was found that the Ss performed significantly better ( $p < .01$ ) in the male-oriented than in the female-oriented situation, with this difference between conditions being greater for those Ss scoring high rather than low in the motive to avoid success ( $p < .05$ ). Results are inconsistent with an inhibitory anxiety explanation of motive to avoid success. The possibility that the measure of this motive may in part be a measure of ability is discussed. (18 ref)—*Journal abstract*.

7444. **Stewin, L. & Anderson, C. C.** (U Alberta, Edmonton, Canada) **Cognitive complexity as a determinant of information processing.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 233-243.—Conducted a study of 107 11th-grade students to examine the relationships between cognitive complexity as defined by B. Tuckman's (1966) Interpersonal Topical Inventory (ITI) and O. Harvey's (1967) Conceptual Systems Test (CST). Generally, characteristics of impulsivity, flexibility, and conformity were associated with ITI functioning, whereas a number of religious orientations were found to be associated only with CST functioning. It is concluded that (a) the ITI and CST assessed conceptual systems functioning differently and (b) no necessary relationship existed between their domains of functioning. The latter conclusion suggests that a disparity rather than a difference exists between at least these 2 psychometric approaches to systems functioning. (40 ref)—*Journal abstract*.

7445. **Templer, Donald I.; Lester, David & Ruff, Carol F.** (Pleasant Grove Hosp, Anchorage, AK) **Fear of death and femininity.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 530.—Results of 2 studies with undergraduates demonstrate a positive but weak association between femininity and fear of death. This association may be partly a function, at least for females, of the positive association of these 2 variables with general activity.

7446. **Vanggaard, Thorkil. Phallós: A symbol and its history in the male world.** New York, NY: International Universities Press, 1974. 208 p. \$2.95.—Analyzes the history and significance of the phallus in different cultures, emphasizing the concept of the homosexual radical—the drive toward a temporary hierarchical relationship between a young man and an older teacher or advisor, both of whom are otherwise heterosexual. The manifestations of this impulse in ancient Greek and Roman, early Christian, and contemporary cultures are discussed.

7447. **Vondráček, V.** (U Karlova, Výzkumná psychiatrická laboratoř, Prague, Czechoslovakia) [Natural and pathological significance of anxiousness and fear.] (Czec) *Ceskoslovenská Psychiatrie*, 1973(Feb), Vol 69(1), 35-38.—Discusses the difference between anxiety and fear. Empirical findings are presented concerning the anatomico-pathological substrate of fear, its biochemistry, motivation, types, incidence in different syndromes,

and importance in everyday life. Phobias are described, analyzed, and classified and their relationships to obsessions, compulsions, and delusions are mentioned. (Russian & English summaries)

7448. **Wakefield, James A. et al.** (U Houston) **Eysenck's personality dimensions: A model for the MMPI.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 413-420.—9 of the 10 clinical scales of the MMPI were considered as measures of the neuroticism, psychoticism, and extraversion personality dimensions of H. J. Eysenck. The correspondence between the conceptual placement of the subtests in Eysenck's 3-dimensional space and their empirical placement in factor space was tested for 205 married males and 205 married females. The correspondence was significant for both sexes but considerably stronger for the females than for the males. (27 ref)—*Journal abstract*.

7449. **Wardell, D.** (U Alberta, Edmonton, Canada) **Stimulus intensity and introversion-extraversion.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 425-426.—Investigated the relationship between reactions to 4 levels of acid stimulation (5 drops of lemon juice at 4 pH levels—3.5–0.5) and extraversion-introversion as measured by the Eysenck Personality Inventory (EPI). Ss were 16 extraverts, 16 introverts, and 16 "ambiverts" selected from 315 undergraduates by EPI scores. Introverts salivated more than extraverts on only 1 stimulus level. Extraverts and ambiverts rated levels of the physical stimulus as increasingly stronger. Findings only partially support the hypothesis of "transmarginal inhibition" (i.e., a response decrease when the intensity of a stimulus is raised to a very high level).—*L. Gorsey*.

7450. **Warr, Peter & Rogers, Colin.** (MRC Social & Applied Psychology Unit, U Sheffield, England) **Some personality effects on extreme responding and on the relative weighting of items in combination.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 347-357.—Examined variations in judgment associated with differences in ethnocentrism-authoritarianism. 106 undergraduates completed 2 scales measuring these personality traits (by P. B. Warr et al, and by R. E. Lee and P. B. Warr), in addition to recording their impressions of 12 different groups of people on 15 11-point bipolar scales. Ss then engaged in a series of irrelevant tasks before rating 10 compound stimuli composed of a nonrelevant cue from the 1st rating scale and a pro- or antiethnocentrism item. Results are consistent with the idea that the content of an ethnocentric belief system can generate significant relationships between ethnocentrism scores and frequency of extreme responding. It is cautioned, however, that although there are significant judgmental correlates of ethnocentrism scores, these arise primarily from the content of the beliefs held by different scale scorers. (15 ref)—*L. Gorsey*.

7451. **Zoch, Hans-Dieter.** (U Salzburg, Psychologisch-es Inst, Austria) **A study of the validity criteria of tests of social intelligence.** (Germ) *Diagnostica*, 1974, Vol 20(3), 95-106.—Administered to 104 high school students 1 measure of each of Guilford's 6 factors of behavioral cognition (social intelligence), a sociogram questionnaire, and the 9 subtests of R. Amthauer's Intelligence-Struktur-Test (IST) (1955). Correlations

between the behavioral cognition measures and 12 sociogram scores were, with a few exceptions, nonsignificant; and a factor analysis of the behavioral cognition measures, the number of positive and of negative choices of the sociogram, and the IST subtests did not yield a social intelligence factor. The behavioral cognition measures are stable and homogeneous, but statistics on items which could be deleted from them are presented.—*M. Morf.*

## PROFESSIONAL PERSONNEL

7452. ———. [The Fourth Japanese Neuropsychiatric Symposium, October, 1972: A comparative study of cultural, psychological and medical problems in Western Japan.] (Japn) *Kyushu Neuro-psychiatry*, 1972(Dec), Vol 18(3-4), 141-175.

7453. Aaron, Ruth. The analyst's emotional life during work. *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 160-169.—Discusses 4 reports presented at the 1973 annual meeting of the American Psychoanalytic Association. The papers dealt with how the analyst experiences his inner life during his work; with empathy, countertransference, and the analyst's personal and professional development; with the effect on him of intercurrent events; and with his love, hate, and indifference toward the patient.

7454. Albuquerque, Manuel A. [Antipsychotherapy.] (Span) *Revista de Psiquiatria y Psicologia Medica*, 1973(Oct), Vol 11(4), 219-224.—Discusses the lack of confidence in therapists that is evident in some people. Since the therapist studies the behavior of the individual on the biological, psychological, and social level, and since it is difficult to understand behavior on all these levels, it is not surprising that the therapist sometimes exhibits professional insecurity. Psychiatrists are required to enact many difficult roles. These problems suggest that psychiatry has been the target of more accusations and suspicions than it deserves. (17 ref)—*W. B. Haslam.*

7455. Authier, Jerry & Gustafson, Kay. (U Nebraska, Medical Ctr, Psychiatric Inst, Omaha) Application of supervised and nonsupervised microcounseling paradigms in the training of paraprofessionals. *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 74-78.—Studied the effect of supervision on the learning of basic clinical interviewing skills within the microcounseling format. Ss were 12 19-33 yr old paraprofessional counselors (4 women and 8 men) employed in the drug research center of a midwestern psychiatric institute. Each S was assigned randomly to either a supervised or a nonsupervised microcounseling training condition. Trained coders categorized 32 trainee utterances from each S's pre- and posttraining videotaped interviews as 1 or more of the microcounseling skills, 1 or more of the opposite skills, or a miscellaneous skill. Analysis revealed only 1 significant effect indicating more frequent use of microcounseling than opposite skills. No significant differences were found between training conditions or across time.—*Journal abstract.*

7456. Barraclough, Brian & Wace, Godfrey. Learning clinical psychiatry in a provincial mental hospital.

*British Journal of Psychiatry*, 1974(Sep), Vol 125, 303-309.—Used an "educational technology" approach to assess the clinical teaching of psychiatry to registrars in a provincial mental hospital. Teaching methods based on learning theory and which relate the academic aspects of training more closely to clinical work are considered likely to be more efficient than present methods.—*Journal summary.*

7457. Bellak, Leopold. (New York U, Albert Einstein Medical Inst) Careers in psychotherapy. *Dynamische Psychiatrie*, 1974, Vol 7(4), 242-247.—Describes the intellectual, emotional, financial, physical, and other aspects of careers in psychotherapy. Suggestions for keeping "a sound mind in a sound body" are included.

7458. Bok, Sissela. The ethics of giving placebos. *Scientific American*, 1974(Nov), Vol 231(5), 17-23.—Discusses the issues raised when a treatment is prescribed that, unknown to the patient, cannot have any specific effect on his condition. It is concluded that this widespread practice is often deceptive, and should be restricted.

7459. Boneau, C. Alan & Cuca, Janet M. (American Psychological Assn, Washington, DC) An overview of psychology's human resources: Characteristics and salaries from the 1972 APA survey. *American Psychologist*, 1974(Nov), Vol 29(11), 821-839.—Mailed an extensive questionnaire to the total American Psychological Association (APA) membership and to a sample of nonmembers to obtain information, in areas such as the availability of minority group members and the age distribution of current academicians, relevant to a subsequent restructuring of recruiting and training objectives. The responses of 27,371 members and of 7,990 nonmembers who were eligible for membership in the APA were analyzed in terms of level of highest academic degree, sex, subfield, employment setting, departmental setting in education, type of employer, work activity, years of experience, age, and racial-ethnic identity. A further breakdown of the APA membership data by degree level and by sex is presented, and information on employment status and salaries is evaluated. It is concluded that the APA is more representative of doctorate psychologists than of master's-level psychologists.—*B. Lindsey.*

7460. Crown, Sidney. (London Hosp, England) The "clinical" psychologist: Stigma, paradox and hope. *British Journal of Medical Psychology*, 1972(Sep), Vol 45(3), 199-202.—Discusses maladaptive behavior patterns among clinical psychologists due to the imperfections of their techniques and uncertainties about their roles. Syndromes of maladaptive behavior are characterized: e.g., the "perseverative psychometrician" or the "compulsive WAIS tester." Relatively recent adaptive behavior patterns are reviewed and their implications for future training are examined.—*R. Hall.*

7461. Dachs, Anne A.; Holland, George J. & Klotz, Addie L. (San Fernando Valley Health Consortium, Granada Hills, CA) A regional health manpower survey conducted by a community consortium. *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 71-76.—Distributed a regional health manpower questionnaire to 350 health care providers in California. Data were available from 220 respondents. Interviews were also conducted with 67



administrators. The overall employee vacancy rate was 1.6%. It is concluded that for 2 or 3 yrs existing training programs should not be expanded and new training programs should not be started.

7462. **Dauber, Bonnie.** *Profile of an abortion counselor.* *Family Planning Perspectives*, 1974(Sum), Vol 6(3), 185-187.—Mailed 350 questionnaires to 60 randomly selected institutions in the San Francisco area. Data are presented from the 1st 100 completed questionnaires. Counselors are described in terms of personal characteristics (including their use of contraceptives), training, experience, and activities they perform while on the job.

7463. **Dorsey, Richard.** (Merrill-National Lab, Cincinnati, OH) *Utilization review, cost control, and patient care in psychiatry.* *Psychiatric Annals*, 1974(Jun), Vol 4(6), 69-79.—Argues that the implementation of utilization review in medicine and psychiatry will result in (a) administrative constraints on clinical decisions, (b) compromises in confidentiality, and (c) more precise standards of diagnosis and treatment through statistical analysis. Such review may be useful to psychiatrists in patient care decisions. (36 ref)

7464. **Dörken, Herbert & Whiting, J. Frank.** (Langley Porter Neuropsychiatric Inst, San Francisco, CA) *Psychologists as health-service providers.* *Professional Psychology*, 1974(Aug), Vol 5(3), 309-319.—Analyzes data from the 1972 American Psychological Association manpower survey and reports results of a pilot fee practice survey that was sent to a stratified sample of these psychologists ( $N = 1,312$ ). Responses indicate that 75% were engaged in no fee-for-service activities, and that 21% and 4%, respectively, were engaged in part- and full-time fee-for-service activities. Data are analyzed for these 3 groups on variables of age of patients seen, hourly fees, annual income, insurance experience, etc. Hypotheses are proposed on the basis of these data relating to the most effective delivery of psychological and other health services. (18 ref)—C. Wright.

7465. **Epstein, Louis E. & Miller, Ted L.** (Indiana U) *The need for educational input in graduate training programs for school psychologists.* *School Psychologist*, 1974(Apr), Vol 28(4), 21-22.—Argues that knowledge of psychology must be augmented by a knowledge of educational practice in general if school psychologists are to give effective service. Hence graduate programs in school psychology should include in their curriculum exposure to educational practices.

7466. **Flomenhaft, Kalman & Carter, Ross E.** (Philadelphia Child Guidance Clinic, Inst for Teachers of Family Therapy, PA) *Family therapy training: A statewide program for mental health centers.* *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 789-791.—Reports on staff training programs in family therapy techniques conducted 1 day/wk for 5 mo at mental health centers throughout Pennsylvania. Since 1972 approximately 150 mental health professionals at 35 centers have participated. 67 staff members who had worked at least 1 yr since completing the program were asked to fill out a questionnaire. The 53 respondents (mean age = 35.7 yrs), who had worked as professionals an average of 7½ yrs, spent a greater portion of their direct-service time treating whole families. While the

overall gain was only 21%, comparison of individual changes in time spent treating families indicated a significant increase ( $p < .01$ ). Ss said they felt the program gave them new ways of looking at problems and new ideas about treatment.—*Journal abstract.*

7467. **Forman, James & Gold, Naomi.** (Temple U) *Student perspectives: A short history of Division 16, APA.* *School Psychologist*, 1974(Apr), Vol 28(4), 18-20.—Outlines the evolution of the School Psychology Division of the American Psychological Association since 1946. Changes in membership criteria and committee activities are discussed. It is concluded that the division has continually pursued its goals of excellence and professionalism.

7468. **Gadbois, C.** (Ecole Pratique des Hautes Etudes, Lab de Psychologie du Travail, Paris, France) *[Career orientation: Family and professional plans among young girls during their training.]* (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 622-628.—Conducted a questionnaire study of family and career plans of 196 student nurses at the beginning and end of training. Results indicate that the major determinant of professional plans at the end of training was the nature and duration of the professional activity of Ss' mothers. However, the caution is expressed that economic factors could be masking attitudes and motives of mothers who work. A more discriminating study is needed to verify this observation.—Z. M. Cantwell.

7469. **Goldman, Roy D. & Singer, Robert D.** (U California, Riverside) *How do mental health paraprofessionals form judgments about patients? The development of a patient evaluation scale.* *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 319-331.—Explored the semantics of paraprofessionals' judgments about patients. Psychiatric technicians in a public mental hospital were asked to make evaluative judgments about 256 patients in their wards. They were also asked to rate the patients on a 22-item scale concerned with specific behaviors or first-order inferences about behavior. The pattern of correlations as well as regression weights between evaluations and behavioral ratings were used to infer the "meanings" of the paraprofessionals' evaluations of patients. Results indicate that most paraprofessionals tended to look for similar behaviors in making evaluations of patients.—*Journal abstract.*

7470. **Hale, B. John; Buchan, L. Gerald & Dickerson, Morgan.** (U Oregon, Medical School) *Use of transactional analysis and other tools in understanding drug activities.* *Journal of Drug Education*, 1974(Sum), Vol 4(2), 197-204.—This paper suggests ways for the drug treatment specialist to explore his attitudes toward drugs and drug use and serves as an aid in the treatment of drug users and their families.

7471. **Heikkinen, Charles A.** (Yale U) *Another look at teaching experience and closed-mindedness.* *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 79-83.—Replicated a study by J. Wittmer and G. B. Webster (see PA, Vol 44:4216) in which significant relationships consistently appeared between teaching experience and closed-mindedness in counseling students as measured by the Rokeach Dogmatism Scale. The present sample consisted of 52 master's level students in counseling, 23 of whom had teaching experience. The analysis revealed

significant results in agreement with the findings of the earlier study when the present sample was combined with that of Wittmer and Webster. Age was also significantly related to closed-mindedness in both the present and combined samples. Recommendations are made for reducing levels of closed-mindedness among counselors in training and for a careful examination in terms of possible closed-mindedness of program applicants who are older and/or have teaching experience. The requirement of teaching experience for counseling practice is challenged. (15 ref)—*Journal abstract*.

7472. Hertz, Dan G. (Hebrew U, Hadassah Medical School, Jerusalem) **Problems and challenges of consultation psychiatry in gynecology and obstetrics.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7473. Johnson, Dorothy E. (U California, Los Angeles) **Development of theory: A requisite for nursing as a primary health profession.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 372-377.—Discusses problems facing nurse scientists and educators in influencing the direction and progress of nursing as a profession and a scientific discipline. The lack of a scientific foundation of knowledge in nursing, especially an absence of systematic theoretical and conceptual schemes, can be partially attributed to the profession's status as an occupation or service which has not been considered as a particularly socially valuable one, and also partially to the problems involved in converting the theory systems of natural science to the practices of applied science. Alternative routes to theory development for nursing are identified and related to the various purposes of nursing as perceived by professionals. Criteria for evaluation of the body of nursing knowledge are also examined, including the social congruence, significance, and utility of conceptual models used to explain nursing practices. (26 ref)—*L. Gorsey*.

7474. Kawash, George & Fuchs, Alfred H. (U Guelph, Ontario, Canada) **A factor analysis of ratings of five schools of psychology on prescriptive dimensions.** *Journal of the History of the Behavioral Sciences*, 1974(Oct), Vol 10(4), 426-437.—A. H. Fuchs and G. Kawash (see PA, Vol 53:Issue 4) reported judges' ratings for 5 schools of psychology on Watson's prescriptive dimensions. These data were subjected to factor analysis and the 5 schools described are compared in terms of 7 factors pertaining to the relationships among the prescriptions as they function in the views of the 5 schools.—*C. M. Franks*.

7475. Keen, Sam. **Voices and visions.** New York, NY: Harper & Row, 1974. v, 218 p. \$6.95.—Presents a collection of interviews with 8 contemporary psychologists, anthropologists, biologists, and social theorists, including N. O. Brown, H. Marcuse, C. Castaneda, and R. Assagioli.

7476. Krakowski, Adam J. (Champlain Valley-Physicians Hosp, Plattsburgh, NY) **Consultation psychiatry, present global status: A survey.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973:*

*Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7477. Lansdown, Richard. (Hosp for Sick Children, London, England) **The educational psychologist as a clinician.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spr), Vol 3(6), 17-23.—Examines the future of the educational psychologist as a clinician in England. Rather than dichotomizing work with children in schools or with adults in hospitals, a new 6-yr training program could produce a "general practitioner," allowing the psychologist to work in many spheres.

7478. Loevinger, Jane. (Washington U) **Ego development: Syllabus for a course.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 77-98.—Presents a syllabus for a graduate level course on ego development. Emphasis is placed on the historical development of ego theory, and on similarities between the structures of psychological theories of personality development and T. Kuhn's concept of the nature of scientific paradigms. (3 p ref)

7479. Lowenstein, L. F. **Psychologists/social services: What are your tasks?** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 25-28.—Considers how psychologists and social workers, both paid and voluntary, can work more closely together on certain urgent problems. Among the tasks to be undertaken cooperatively are preventative, educational, and therapeutic work, research and surveys, and government action.

7480. Majumdar, S. K. (NCERT, National Science Talent Search, New Delhi, India) **Scientific creativity: A research project under the National Science Talent Search Scheme.** New Delhi, India: National Council of Educational Research & Training, 1973. 53 p.

7481. Neely, Charles R. **Rehabilitation counselor attitudes: A study to compare the attitudes of general and special counselors.** *Journal of Applied Rehabilitation Counseling*, 1974(Fal), Vol 5(3), 153-158.—Conducted a study of 97 counselors carrying general caseloads and 64 counselors carrying special caseloads to determine the opinions of these Ss toward their employment. Results indicate little overall difference between the attitudes of counselors regardless of the type of caseload carried.—*Journal abstract*.

7482. Núñez, Flavio O. (U Buenos Aires, Facultad de Medicina, Argentina) **[Some elements of epistemology for physicians, psychiatrists, and psychologists.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 168-172.—Outlines the implications of epistemology, in the general sense of a theory of the sciences, with special emphasis on the training of students.

7483. Okonogi, Keigo. (Keio U, Medical School, Tokyo, Japan) **The psychiatrist's role-diffusion as psychotherapist in Japan.** *Dynamische Psychiatrie*, 1974, Vol 7(4), 248-257.—Notes that there are only a few psychoanalytically trained psychiatrists in Japan, and they are facing two crises: one is specifically Japanese (conditions of psychiatric service and sociocultural conditions in Japan) and the other is similar to Western problems in the field; i.e., the current shift from German descriptive psychiatry to American dynamic psychiatry.

7484. Perkins, David V. & Thompson, John R. (Indiana U) **An assessment of physicians' attitudes**



toward community mental health. *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 282-291.—A study of 21 physicians indicates that Ss had a range of activity in and attitudes toward community mental health; this variation was not found to be a function of medical specialty or geographic location. (29 ref)

7485. Pérez Morales, F. et al. (U Buenos Aires, Inst de Investigaciones Médicas, Argentina) [Ten years of teaching medical psychology.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 201-206.—Reports the experience since 1964 of a teaching group in the Psychiatric and Psychosomatic Section of the Medical Research Institute of Buenos Aires University, Argentina, in training students of medical psychology.

7486. Pyke, S. W. This column is about women: Sex and the Ontario psychologist. *Ontario Psychologist*, 1974(Oct), Vol 6(4), 42-44.—Reports that women are underrepresented in all components of *The Ontario Psychologist*, given their current numbers in 2 major professional organizations in Ontario.

7487. Remer, Rory & Sease, William. (U Kentucky) The development of a criterion instrument for counselor selection. *Measurement & Evaluation in Guidance*, 1974(Oct), Vol 7(3), 181-187.—Describes the development of an instrument that can be used as a predictive measure of counseling competence based on performance criteria. An analysis of variance of the total test scores of 82 Ss indicates that the instrument possessed significant discriminating qualities, although the various modes of presentation did not differ in the quality of discrimination.

7488. Riedel, Robert G. (Southwest Minnesota State Coll) The current status of the history and systems of psychology courses in American colleges and universities. *Journal of the History of the Behavioral Sciences*, 1974(Oct), Vol 10(4), 410-412.—Surveys 393 American institutions of higher learning and concludes that history systems courses in psychology are flourishing.

7489. Rubin, Theodore I. Shrink. New York, NY: Popular Library, 1974. 237 p. \$1.50.—Presents an autobiographical account of the author's search for self-knowledge and self-fulfillment as a psychiatrist.

7490. Spielberger, Charles D. (U South Florida, Clinical Training Program) Case seminar of group mental health consultation. *Professional Psychology*, 1974(Aug), Vol 5(3), 303-308.—Reports a 2-day per month group mental health consultation effort involving individuals from a variety of "caretaking" professions. Consultees present cases of general interest, in seminars that progress through 4 identifiable phases: introductory, warm-up, problem-focused, and ending. The psychologist consultant serves simultaneously as teacher, group leader, clinician, and facilitator. Benefits for consultees include reduced feelings of isolation and inadequacy. Although those in the field agree on the effectiveness of group consultation, the need for objective evaluation is suggested.—C. Wright.

7491. Stahl, Robert J. & Casteel, J. Doyle. (P. K. Yonge Lab School, Gainesville, FL) The status of pre-college psychology in the State of Florida during 1970-71 and 1972-73: A comparative report. Gaines-

ville, FL: P. K. Yonge Laboratory School, Research Mono No 8, 1973. iii, 46 p.

7492. Stahl, Robert J. (Ed.). (P. K. Yonge Lab School, Gainesville, FL) High school psychology in the United States and Canada: An anthology of recent status reports. Gainesville, FL: University of Florida, Coll of Education, 1974. 41 p.

7493. Thompson, Vaida D. & Newman, Sidney H. Educating psychologists to work in the population field. *Professional Psychology*, 1974(Aug), Vol 5(3), 320-324.—Presents suggestions for the education of psychologists in the field of population, emphasizing an interdisciplinary approach at all levels of training. Possibilities for programs at the undergraduate, graduate, and postdoctoral levels are described, and it is suggested that postdoctoral training, either short- or long-term, may be the most expeditious method. The necessity for administrative interest and support for population education and the desirability of resources for work within the community are pointed out.—C. Wright.

7494. Tophoff, M. [From plastic toward realities: Fantasies by an anonymous personality.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 399-405.—Describes learning experiences in preparing for the profession of a therapist. The report by T. de Wever (see PA, Vol 53:Issue 4) is used to indicate how an S attains normality by learning that situations demand reactions that are not absolute but consist of elements from both ends of a continuum of qualities, ranging from bad to good.—A. J. Ter Keurst.

7495. True, John E.; Young, Carl E. & Packard, Mary E. (Johns Hopkins U, Medical School) An exploratory study of associate degree programs for mental health workers. *Public Health Reports*, 1974(Jul-Aug), Vol 89(4), 345-352.—Conducted a survey of mental health worker associate degree programs at seven colleges offering such programs. 27 graduates were also interviewed. Although the programs were "relatively healthy and viable," a number of problem areas were uncovered. There was a need to find more jobs for the graduates and the work settings needed to be more prepared for the workers' entry, needed to provide adequate supervision, measure the workers' progress, and provide career ladders.—S. Blackman.

7496. Van Strien, P. J. (U Groningen, Netherlands) [Professional practice and professional ethics of business psychologists.] (Duth) *Mens en Onderneming*, 1974(Mar-Apr), Vol 28(2), 115-129.—Summarizes responses to a questionnaire regarding professional ethics and practices, received from 62% of the business psychologists in the Netherlands. Results are discussed in terms of a multirelational model of a psychological consultant. The number of business psychologists has increased from 30 in 1952 to 300 in 1972, and the scope of their activities has widened. They are no longer concerned chiefly with personnel matters, but deal with the entire area of organizational psychology. Membership in the Netherlands Institute of Psychology has decreased, however; 90% of these psychologists belonged to the Institute in 1952, but only 65% in 1972. The reasons for this are discussed. It is felt that there is a clear need for business psychologists to become independent of management. Based on the questionnaire

returns, a new code of ethics for the profession is being formulated.—A. J. Ter Keurst.

7497. Welches, Lois J.; Dixon, F. A. & Stanford, Elinor D. (US Dept of Health, Education and Welfare, US Public Health Service, San Francisco, CA) **Typological prediction of staff nurse performance rating.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 402-409. —Based on a cluster analysis of 650 staff nurses' California Psychological Inventory scores, 6 clusters of variables that influenced performances were identified: (C1) Age and Experience; (C2) Intelligence, Independent Achievement, Sensitivity, and Flexibility; (C3) Job Satisfaction and Opportunity for Professional Growth; (C4) Perception of Self-Performance; (C5) Social Image; (C6) Leadership Potential and Capacity for Status. All but 33 of the 650 staff nurses fell into 1 of 12 O-types—each individual in a group had similar profiles on the 6 dimensions. Variables most related to the head nurse's rating of the staff nurse were in clusters C2 and C4 and the shift she was working. Among younger nurses, those who were more conforming and less ambitious received higher ratings than those who were very ambitious and somewhat rebellious. The oldest nurses in the sample received low head-nurse ratings. (16 ref)—*Journal abstract*.

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

7498. Ashwell, Margaret & Etchell, Lindsey. (Clinical Research Ctr, Harrow, England) **Attitude of the individual to his own body weight.** *British Journal of Preventive & Social Medicine*, 1974(May), Vol 28(2), 127-132.—A random height and weight survey of 1,059 people in a London borough showed that overweight people were most accurate in the assessment of their weight and underweight people were the least accurate. Overweight women were more aware of their size than overweight men. Overweight women had made more attempts to lose weight than overweight men. There were no significant differences between overweight women of different age or class groups. Men in higher social classes were more likely than men in other groups to have tried to lose weight. These results show that the high prevalence of overweight associated with older and lower social class women cannot be explained by the fact that they are unaware of their size and only partly explained by the fact that they have not made attempts to lose weight. Results of a 2nd survey conducted among 2,173 Consumers' Association members show that the weights considered as ideal by these people corresponded very well with the ideal weights given by life insurance tables.—*Journal abstract*.

7499. Gambi, D.; Pinto, F. & Vacchini, F. (U Cattolica del Sacro Cuore, Medical School, Clinica delle Malattie Nervose e Mentali, Italy) **[Enuresis in infancy: Study of the family constellation in 10 children.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 215-238.—Conducted individual and group interviews with 10 families with enuretic children and found it possible to relate specific family dynamics to the onset and maintenance of the enuresis.

7500. Goldstein, Kenneth M. & Blackman, Sheldon. (North Richmond Community Mental Health Ctr, Research & Evaluation Div, Staten Island, NY) **Generalizations regarding deviant groups.** Staten Island, NY: North Richmond Community Mental Health Center, 1973. 20 p.—Investigated generalizations about 10 different population groups made by 81 undergraduates using the Katz and Braly adjective favorableness ranking procedure. Data indicate a positive cluster of Ideal Person, Yourself, and Physically Disabled, a neutral cluster of Americans, Mentally Retarded, Negroes, and Mentally Ill, and a negative cluster of Drug Addicts, Criminals, and Alcoholics. Generalizations emerging for each group are examined. (30 ref)

7501. Haft, Jay S.; Benjamin, H. B. & Zeit, Walter. (Medical Coll Wisconsin) **Foreign bodies in the female genitourinary tract: Some psychosexual aspects.** *Medical Aspects of Human Sexuality*, 1974(Oct), Vol 8(10), 54-78.—Discusses eroticism, masochism, sadism, enforced chastity, the vagina as a hiding place, attempted self-therapy, and birth control and abortion as possible motivations for the existence of foreign objects in the female urogenital tract. Different types of objects that are found, their use as either masturbatory devices or as a means of achieving complete sexual satisfaction, and the indications of psychological disturbances are discussed. The need for treating such patients with concern and tact and recognizing their possible strong embarrassment is stressed; many patients will deny knowledge of how the object was introduced or may fabricate an impossible story to explain their condition. Pathological consequences of object insertion are described. (55 ref)—L. Gorsey.

7502. Roe, A. Michael. **Maladjusted: The assumption of normality.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spr), Vol 3(6), 23-28.—Recommends the avoidance of a disease model, and the assumption of normality in understanding the behavior of maladjusted children. To assume normality is to insist that all behavior, whether one approves of it or not, must be interpreted whenever possible according to a single set of psychological principles. Ultimately all that we need to know about maladjusted children must be based on our knowledge of normal development. (15 ref)—I. L. Zimmerman.

7503. Sander, Klaus & Lück, Helmut E. (U Köln, Psychologische Beratungsstelle für Studierende, W Germany) **[Development of a scale for measuring students' problems.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 250-262.—Constructed a 44-item questionnaire inquiring into physical and psychological problems. 504 male and female students seeking advice at the students' counseling center at the University of Cologne answered the questionnaire. A factor analysis of the results revealed 3 factors which indicate student problems in general: restricted capacity for studying, autonomic disturbances with depressive overtones, and social rejection. Short scales were developed for identifying potential problem students in group sessions. (English & French summaries)—W. J. Koppitz.

7504. Segers, Marie-Jeanne; Mertens, Charles & Jucquois, Luc. **[Professional activity, anxiety,**



**depression and cardiovascular risk.]** (Fren) *Bulletin du CERP*, 1972(Oct-Dec), Vol 21(4), 131-143.—Examined the relationship between mental and physical health in 1,669 male Belgian postal workers. Results suggest that specific psychological and clinical risks can be associated with certain occupational levels; this association varies with age, but risks were more linked to occupation than to sedentary habits. Better mental health in higher occupational levels appeared to compensate for the sedentary nature of the position. (Spanish summary) (25 ref)—*English summary*.

7505. **Semi, A. A.** (Servizi Psichiatrici di Venezia, Centro Storico, Italy) [**Considerations on the advantages of illness in a military milieu.**] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1481-1488.—Discusses the psychological significance of illness in the military. The institution manifests a schizo-paranoid refusal to acknowledge illness or unreason, preferring to see the mentally ill person as "sly," or to grant him rest periods and other special privileges. These attitudes facilitate the sick person's regression to a narcissistic childlike state and rationalization of his illness. It is felt that this could have relevance in other cultural arenas. (English summary)—*L. Klinkon*.

7506. **Uchimura, Hideyuki; Saito, Masashi; Mukai, Akira & Hazama, Hidebumi.** (Hizen National Mental Hosp, Saga, Japan) [**Lipid and fatty acid compositions in the brains of psychiatric patients: A case of senile dementia.**] (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 26-33.—Reports the results of brain examinations of 5 Ss: 64-yr-old male, senile dementia (SD); 49-yr-old male, epileptic with chronic diphenylhydantoin intoxication (EP); 36-yr-old female, encephalopathy due to 1314 TH intoxication (En); 46-yr-old male, chronic schizophrenic (CS); and 63-yr-old male, control (Co). The SD's brain showed no change in the amount of total cholesterol or in the ganglioside pattern, but a slight increase in the relative lipid compositions in the gray matter, cerebroside and sphingomyelin, a decrease in the phosphatidyl-ethanolamine, and no change in the fatty acid composition of each lipid. Both the EP and the En showed similar changes in lipid and fatty acid compositions and the ganglioside pattern, suggesting that drug intoxication may cause common changes in the brain and that the drugs may affect the sphingolipid metabolism of the gray matter. The CS showed a slight decrease in the long-chain fatty acids of the sphingolipids in the gray matter, but no changes in lipid composition or ganglioside pattern. (English summary) (18 ref)—*S. Ashida*.

7507. **Wadsworth, Michael.** (MRC Unit on Environmental Factors in Mental & Physical Illness, London School of Economics, England) **Health and sickness: The choice of treatment.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 271-276.—Discusses the more complex theories of causation of illness, theories which have been developed in the light of the changing pattern of illness and of new ideas which take into account the patient's life style and his concept of the illness. Correct diagnosis is difficult because of the influence of the patient's attitude, but social scientists are

investigating how and why these patterns develop and how the physician can deal with them.—*W. G. Shipman*.

### Mental Disorders

7508. **Adam, A. & Bauduin, A.** (U Liège, Pediatric Service, Belgium) [**Failure of the neurotic defense mechanisms in a preadolescent girl.**] (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 568-580.—Presents the case of a neurotic 13-yr-old girl with various phobias who developed anorexia and a psychosis 1 yr after the death of a younger nephew. Psychoanalytic and ego-psychological implications of the case are discussed at length. (English, Dutch, German, Italian & Spanish summaries)

7509. **Arizumi, Noboru.** [**Regional psychiatric clinics: Statistics on outpatients.**] (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 63-66.—Reports statistical analysis of 1,293 new patients admitted to the clinic during 1970 and of 1,081 patients readmitted during December, 1970. Patients are classified by age, sex, diagnosis, age and diagnosis, location of home, and resources for paying hospital bills.

7510. **Bachor, Dan G.** (Foothills School Div, High River, Alberta, Canada) **The effects of stress, task structure and intellect on situational anxiety.** *Western Psychologist*, 1973, Vol 4(4), 98-103.—Studied the effects of stress, cognitive style, and trait anxiety on the state anxiety produced by a computer simulation game. 80 Ss were selected from 146 8th- and 9th-grade students on the basis of their scores on a divergent(D)-convergent(C) thinking test battery. They were assigned to 4 groups (C- D-, C+ D-, C- D+, and C+ D+), and within groups to a stress-no-stress treatment. Measures of state anxiety were taken at the beginning and end of the simulation game. The stress-no-stress effect was significant, but the convergent-divergent effect was not. The effect of trait anxiety was significant but the effect of nonverbal intelligence was not. Results are interpreted as consistent with the trait-state anxiety theory.—*D. R. Evans*.

7511. **Bash, K. W. & Bash-Liechti, J.** (Psychiatrische Universitätsklinik, Bern, Switzerland) **Studies on the epidemiology of neuropsychiatric disorders among the population of the City of Shiraz, Iran.** *Social Psychiatry*, 1974(Oct), Vol 9(4), 163-171.—Reports data from psychological evaluations of residents in low and middle socioeconomic status areas. Findings from 928 Ss show that 16.6% had significant psychiatric disorders and that the total prevalence rate was not significantly different from that in rural areas of Iran, although the rate was higher among the poor than among middle-class Ss.

7512. **Beck, Aaron T.** (U Pennsylvania, Medical School) **The development of depression: A cognitive model.** In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7513. **Beck, Samuel J.** (U Chicago) **Bimodality in schizophrenia: An adaptation to ambiguous communication.** *British Journal of Medical Psychology*, 1972(Sep), Vol 45(3), 221-232.—Examines the phenomenon of mutually contradictory attitudes and behaviors in the context of families of schizophrenic patients. The influence of family environment on development of

schizophrenia is discussed. Family research data are reviewed. Attempted adaptation to the contradictory messages of society by the family is concluded to be the mechanism that breeds schizophrenia. (21 ref)—*R. Hall.*

7514. **Beech, H. R. & Liddell, Andrée.** (Withington Hosp, Manchester, England) **Decision-making, mood states and ritualistic behavior among obsessional patients.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974. viii, 352 p. 45.

7515. **Beech, H. R. & Perigault, J.** (Withington Hosp, Manchester, England) **Toward a theory of obsessional disorder.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974. viii, 352 p. 45.

7516. **Beech, H. R. (Ed).** (Withington Hosp, Manchester, England) **Obsessional states.** London, England: Methuen & Co, 1974. viii, 352 p. £5.

7517. **Beech, H. R.** (Withington Hosp, Manchester, England) **Approaches to understanding obsessional states.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974. viii, 352 p. 45.

7518. **Beeckmans-Balle, M.** (Saint-Pierre Hosp, Children's Medical Service, Brussels, Belgium) **[Early infantile autism: Tentative considerations on factors of early diagnosis.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 537-555.—Reports a longitudinal study of 27 children with early infantile autism. The severity of the affliction appears to depend on 2 major factors: (a) the intellectual potentialities of these children, which have often been overestimated; and (b) the disturbance of perceptive integration. (English, Dutch, German, Italian & Spanish summaries) (18 ref)—*E. Coché*

7519. **Bennet, Glin.** (U Bristol, England) **Psychological breakdown at sea: Hazards of singlehanded ocean sailing.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 189-210.—Reconstructed the story of a singlehanded ocean voyage to illustrate the processes by which an individual can be overwhelmed by events and some ways of reacting to threats. The case sample was based on a sailor's logbooks, tape recordings, and film.

7520. **Bergeret, J.** (U Lyon II, France) **[Character and structure: Reflection from psychoanalytic psychopathology.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 656-661.—Examines the relationships between structure, character, and symptomatology. All structural organization can be perceived in the form of elements of character or, in the case of sickness or maladaptation, in the form of syndromes or symptoms. Topics covered include theories of character, problems dealing with structure basic to the psychic personality, the concept of structure, psychotic and neurotic structure, astructurations, character traits, and pathologies of character.—*Z. M. Cantwell.*

7521. **Black, Alan.** (Long Grove Hosp, Epsom, England) **The natural history of obsessional neurosis.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974. viii, 352 p. 45.

7522. **Bleuler, Manfred.** **The long-term course of the schizophrenic psychoses.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 244-254.—Discusses results of the author's studies of a large number of long-standing schizophrenic illnesses. On an average, schizophrenia showed no further change for the worse after a duration of 5 yrs, but rather a tendency to improve. The success

and limitations of modern therapy were statistically determined. Many recovered schizophrenics continued to do well even without medication and social care. As a rule, schizophrenics had no endocrine pathology and endocrine patients were not schizophrenic. Neither a broken home in childhood nor an upbringing by a schizophrenic parent resulted in any important association with schizophrenia. However, a disturbed relationship with relatives and loved persons was more frequent in the anamnesis of schizophrenic women than of schizophrenic men. Most schizophrenics who had been schizoid before their psychosis had lived in miserable familial conditions.—*Journal abstract.*

7523. **Bodlakova, V.; Hemsley, D. R. & Mumford, S. J.** (Brunel U, London, England) **Psychological variables and flattening of affect.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 227-234.—Studied 34 Ss in schizophrenic and other diagnostic categories to investigate the relationship between ratings of flatness of affect and various psychological variables. These variables included the use of psychological constructs in discriminating between photographs and in discriminating between people known to the S; vocabulary level; social withdrawal; and various indices of chronicity. Results confirm a significant relationship between clinical ratings of affective flattening and the use of psychological constructs. This was true both for the description of photographs and for describing differences between known people. There was also a significant relationship between affective flattening and both hospitalization and social withdrawal. (19 ref)—*Journal summary.*

7524. **Breakey, William R.; Goodell, Helen; Lorenz, Patrick C. & McHugh, Paul R.** (Christian Medical Coll, Ludhiana, India) **Hallucinogenic drugs as precipitants of schizophrenia.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 255-261.—Examined the drug-taking histories of 46 schizophrenics and 46 matched controls. It was found that the schizophrenics on the average used a wider variety of drugs, in greater amounts. Schizophrenics who had used drugs experienced the onset of symptoms 4 yrs earlier than nonusers and were also admitted to hospital 4 yrs earlier on the average. Those schizophrenics who had used drugs had had better premorbid personalities than the non-drug-users. These results are indicative of some precipitating role of drug abuse in the onset of schizophrenia.—*Journal abstract.*

7525. **Brockman, Lois M.** (U Manitoba, Winnipeg, Canada) **The reading factor in measuring security in children.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 244-250.—Investigated the influence of reading comprehension on security as measured by the Institute of Child Study Security Test (The Jimmy Story). 25 4th-8th grade boys diagnosed as emotionally disturbed (assumed to be insecure) were individually matched on age, grade placement, nonlanguage IQ and socioeconomic status with boys rated secure by their teachers. The ICS Security Test and Dominion Achievement Test in Silent Reading were administered to both groups. Analysis of security scores with reading scores as a covariate indicate that reading comprehension did not invalidate the security measure.—*Journal abstract.*



7526. **Burton-Bradley, B. G.** (Dept of Mental Health, Boroko, Papua New Guinea) **Social change and psychosomatic response in Papua New Guinea.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7527. **Büchele-Karrer, Brigitte.** [A comparative study of the Three Trees Test and other projective tests.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Jul), Vol 23(5), 166-181.—Administered the Three Trees Test by R. J. Corboz to 50 children 5-15 yrs old in a child psychiatric assessment clinic. Results for various child psychiatric groups are given and explained. The test is considered to have special value as a method of assessing the child in relation to its environment, especially when the test is combined with other diagnostic procedures. (18 ref)—H. A. Euler.

7528. **Cancro, Robert.** (U Connecticut, Health Ctr) **An overview of the schizophrenic syndrome.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment.* New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7529. **Cancro, Robert.** **The rehabilitation of chronic schizophrenics: Genetic and environmental considerations.** *International Journal of Social Psychiatry*, 1974(Spring-Summer), Vol 20(1-2), 68-71.—Notes that the occurrence of schizophrenia is determined by genetic and environmental factors, while rehabilitation depends solely upon environmental manipulation. The unreliability of such treatments is taken to indicate that genetic factors determine each patient's reaction to various therapies. It is suggested that an effort should be made to expose patients to several treatment methods to determine the most promising one. Ethical considerations in rehabilitating schizophrenics are discussed.—W. R. Street.

7530. **Canegalli, R.; Dispari, V. & Sforzini, D.** (Neuropsychiatric Hosp, Voghera, Italy) **[The presence and meaning of the "bar reaction" in schizophrenia.]** (Ital) *Neuropsychiatria*, 1972(Jan), Vol 28(1-2), 47-52.—Observed the incidence of a positive neurological sign, called the "bar reaction" by G. G. Giordano, in 50 female and 40 male schizophrenics 19-62 yrs old. The sign, first identified in cases of neo-plastic lesions in the prefrontal cortex, consists of the movement in the same direction of the opposite limb when one of the lower limbs is gradually moved 10-20 cm toward the exterior by the examiner, as the patient is lying relaxed in supine position. The sign was present in 21% of the Ss. Results are interpreted as a further suggestion of the existence of a neurological symptomatology in schizophrenia. (French & English summaries)—A. Felice.

7531. **Chapman, Loren J.; Chapman, Jean P. & Daut, Randall L.** (U Wisconsin, Madison) **Schizophrenic response to affectivity in word definition.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 616-622.—120 drug-free schizophrenics and 167 nonpsychotic Ss were given affect-laden and affectively neutral free-response vocabulary items. The 2 subtests were matched on psychometric characteristics that affect the power of the subtest to discriminate among ability levels of nonpsychotic Ss. These characteristics (coefficient alpha,

mean and standard deviation of test score, standard deviation of item difficulty, and shape of the distribution of item difficulty) were matched using nonpsychotic Ss with the same sum of the subtest scores as the schizophrenics. Both chronic and newly admitted schizophrenics were no less accurate on the affective subtest than on the neutral subtest. It is concluded that most published findings on schizophrenic response to affective stimuli appear to be artifacts of unmatched tests. (33 ref)—*Journal abstract.*

7532. **Chartier, George M. & Ainley, Caryl.** (Arizona State U) **Effects of model warmth on imitation learning in adult chronic psychotics.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 680-682.—Tested predictions derived from social learning research with children, employing experimental dyads. In a factorial design, 18 male and 18 female adult chronic psychotic inpatients either (a) interacted with an adult model who was noncontingently warm and rewarding, (b) interacted with a neutral and nonrewarding model, or (c) were not exposed to a model. In a 2nd phase, the model displayed task responses and novel behaviors incidental to the task, and the S's subsequent imitation of the model was recorded. Findings support the hypotheses that adult chronic psychotics can acquire new behaviors through observation of a model without contingent reward to either party, and that a previously positive relationship with a model facilitates such learning.—*Journal abstract.*

7533. **Chodoff, Paul.** (George Washington U, Medical School) **The depressive personality: A critical review.** In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research.* New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7534. **Cogorno, A. & Maioli, B.** (Genoa Province Mental Hygiene Service, Italy) **[Effects of environmental factors on the course of mental illness.]** (Ital) *Neuropsychiatria*, 1972(Jan), Vol 28(1-2), 135-148.—Evaluated the effects of family conditions, economic status, and societal attitudes on the course of mental illness through a follow-up study of 362 patients who received aftercare for at least 5 yrs after discharge. Family harmony, integration of the patient within the family, and continued aftercare were found to be important, interrelated factors. Findings suggest that the nuclear family is more supportive of mental patients than society in general. (English, French, & German summaries)—A. Felice.

7535. **Cormane, R. H.** (U Amsterdam, Netherlands) **A molecular explanation of stress dermatitis.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7536. **Crisp, A. H.; Harding, Britta & McGuinness, B.** (St George's Hosp Medical School, London, England) **Anorexia nervosa: Psychoneurotic characteristics of parents: Relationship to prognosis: A quantitative study.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 167-173.—Administered the Middlesex Hospital Questionnaire to 68 parents of 44 female patients with anorexia nervosa, and compared the results with those from a matched normal population. Parents were also examined in relation to the treatment and 6-mo outcome

of the illness in their daughters. Most of the parents became more psychoneurotically disturbed after the treatment (the mothers anxious; the fathers depressed). The 6-mo outcome for the patient's illness was significantly related to the initial levels of psychoneurotic morbidity in the parents.—*W. G. Shipman.*

7537. Davidson, Glenn S. & Neale, John M. (State U New York, Stony Brook) **The effects of signal-noise similarity on visual information processing of schizophrenics.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 683-686.—Performed 2 studies with a total of 34 schizophrenic and 34 nonschizophrenic male inpatients to examine the effect of target-noise similarity on the span of apprehension performance of schizophrenics. Ss were required to search a briefly presented display of letters for a target letter which was presented along with noise letters of varying degrees of physical similarity to the target. In both studies the schizophrenics' performance was significantly poorer than that of controls, and the target-noise similarity manipulation affected both groups equally. Results indicate that the information-processing operations of both groups were similar but that schizophrenics performed them at a slower rate.—*Journal abstract.*

7538. de M'Uzan, M. **Psychodynamic mechanisms in psychosomatic symptom formation.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7539. de Wever, T. (Inst for Medical Psychotherapy, Amsterdam, Netherlands) **[Nameless.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 323-334.—Presents a transcript of an imaginary interview that reveals the conflicts and other emotionalized reactions of a female "nameless" S. These conflicts, which brought on general depression and lack of identity, were shown by a persistent mourning for a deceased father, adverse reactions to what is presented as an overactive and officious mother, and a strained relationship with her husband. These conditions motivated her to become a compulsive eater with an unkempt appearance. The chronological age of the S was about 25. Comments on the interview are made by the following psychologists: A. de Blécourt (see PA, Vol 53:Issue 4); R. W. F. Diekstra (see PA, Vol 53:Issue 4); P. J. Jongerius (see PA, Vol 53:Issue 4); B. W. Lehmann (see PA, Vol 53:Issue 4); and M. Tophoff (see PA, Vol 53:Issue 4). Behavior therapy for the patient is described by A. W. Burger (see PA, Vol 53:Issue 4).—*A. J. Ter Keurst.*

7540. Diekstra, R. W. (Catholic U Nijmegen, Netherlands) **[I am what I think: Variation on a Cartesian theme.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 365-376.—Describes the reactions of the S reported by T. de Wever (see PA, Vol 53:Issue 4) as being self-centered, demanding, and suspicious of the reactions and motives of others concerning her welfare. Therapy should try to change the patient's "self-talk" to a greater interest in the welfare of others, to transform an introverted condition to a more extraverted one, and to develop a feeling of

generosity toward others, in keeping with the principle of Descartes, "I think, therefore I am."—*A. J. Ter Keurst.*

7541. Dongier, M. (McGill U, Montreal, Quebec, Canada) **Psychosomatic aspects in myocardial infarction in comparison with angina pectoris.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7542. Donovan, B. T. **Neuroendocrinology and mental illness.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 237-239.—Discusses progress in neuroendocrinology, and cites reasons for early disappointments concerning the expectation that neuroendocrinology studies would lead to better understanding and treatment of mental illness.

7543. Dopchie, N. **[Considerations on the theory on infantile psychoses.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 527-536.—Offers a reassessment of the theory of infantile psychosis, and concludes that the old concept of childhood schizophrenia should be abandoned. It is suggested that these states should be defined on the basis of the clinical picture and the patients' personality structure rather than on etiological considerations. (English, Dutch, German, Italian & Spanish summaries)—*E. Coché*

7544. Dorfman, Willfred. **Depression and psychosomatic illness.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation.* New York, NY: S. Karger, 1974. vii, 303 p.

7545. Dormaar, M.; Giel, R. & van Luijk, J. N. **Psychiatric illness in two contrasting Ethiopian outpatient populations.** *Social Psychiatry*, 1974(Oct), Vol 9(4), 155-161.—Reports that 2 Ethiopian general outpatient populations with very different socioeconomic backgrounds showed a significant difference in the proportions of patients with psychiatric illness. The 2 clinics varied considerably in their accessibility to patients. The differences in the prevalence of psychiatric illness are explained in terms of the varying illness behavior of the 2 populations rather than as a result of variations in the incidence of illness.—*Journal abstract.*

7546. Dorworth, Thomas R. (U Pittsburgh, Counseling & Testing Ctr, Johnstown) **Learned helplessness and RET.** *Rational Living*, 1973(Fal), Vol 8(2), 27-30.—Examines similarities reported in the literature between research findings on helplessness in dogs and basic nonverbal components of rational-emotive philosophy's explanation and management of abnormal human behavior. It is contended (a) that cognitive events provide a sufficient condition for maladaptive behavior; (b) that a strong functional relationship exists between maladaptive behavior and the phenomenological interpretation that a stimulus event is terrible; (c) that the goal of therapy should be to question the client's invalid or illogical interpretation of self and environment; and (d) that this goal should include immunizing the individual against future aversive stimulation. Since ethical considerations prohibit experimentation on humans, it is recommended that ideas about human



behavior continue to be tested on animal populations.  
—G. J. Frankel.

7547. Dotti, Andrea & Loredi, Camillo. (U Roma, Istituto di Psichiatria, Italy) [A contribution towards the study of chronic amphetamine psychoses.] (Ital) *Rivista di Psichiatria*, 1974(Jan-Feb), Vol 9(1), 63-77.—Describes 3 cases followed for several years, and argues that the possibility of a personality disorder of organic origin is more credible than the possibility of a schizophrenic-like psychosis. Hypothetically, the patient seeks a megalomaniac delusional state induced by amphetamines as a defense against depression. (16 ref)

7548. Duddle, May. (Cheadle Royal Hosp, Cheshire, England) Drug taking amongst emotionally disturbed university students. *British Journal of Addiction*, 1973(Jun), Vol 68(2), 166-169.—Measured 109 undergraduate psychiatric referrals to determine the extent of drug use among emotionally disturbed university students. Results show that 26 (23.9%) of the Ss had tried cannabis, 21 of whom used it regularly; 15 (13.8%) had tried LSD; and 3 had used other drugs, including heroin and amphetamines. Students who used drugs tended to have friends who were also users and estimated that a high proportion (48.9%) of all university students took drugs, whereas nonusers had few friends who took drugs and estimated that only 14.4% of the whole university were drug users. There was no evidence that taking cannabis increased the incidence or severity of psychiatric illness among students.—*Journal abstract*.

7549. Eggers, Christian. (U Heidelberg, Children's Clinic, W Germany) [The course of infantile and prepubertal schizophrenia.] (Germ) *Monographien aus dem Gesamtgebiete der Psychiatrie*, 1973, Vol 9, 250 p.—Observed 57 cases of infantile schizophrenia for an average of 15 yrs. Using data from personal interviews the cases were classified into acute-episodic and chronic groups and into 11 subgroups, based on E. Bleuler's definition of schizophrenia. The age of onset of the disease, the presence of premorbid personality, and above-normal intelligence were found to have prognostic significance, but the frequency of psychotic episodes, occurrence of prodromes, history of familial schizophrenia, family atmosphere, and individual symptomatology were prognostically insignificant. (778 ref)—H. T. Smith.

7550. Ekman, Paul & Friesen, Wallace V. (U California, San Francisco) Nonverbal behavior and psychopathology. In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7551. Eynon, Thomas G. (Southern Illinois U, Ctr for the Study of Crime, Delinquency, & Corrections) The mentally disordered offender. In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.

7552. Ferster, Charles B. (American U) Behavioral approaches to depression. In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7553. Finch, A. J. & Nelson, W. M. (Virginia Treatment Ctr for Children, Richmond) Locus of control

and anxiety in emotionally disturbed children. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 469-470.—Administered 2 measures of locus of control and 2 measures of anxiety to emotionally disturbed children. Results show that whether locus of control was significantly related to anxiety was dependent on the measure of anxiety employed. All measures of anxiety intercorrelated significantly.

7554. Fontan, M.; Bouanna, G. & Piquet, J.-M. [A linguistic approach to schizophrenic discourse.] (Fren) *Annales Médico-Psychologiques*, 1974(Feb), Vol 1(2), 169-182.—Applies the linguistic approach of F. de Saussure to verbal productions by 8 schizophrenic Ss. These analyses are based on structural principles of speech, such as the heterogeneity of linguistic sign, and the notion of value, as these determine the "surge" of signification in thought passing into the communicative word. It is this focus on matching what is interior to the person with elements in the world exterior to him that promises an increased understanding of the schizophrenic psychopathological process. The frequently observed recourse of schizophrenic individuals to the use of pseudo-language indicates their inability to employ ordinary linguistic mechanisms (e.g., metaphor or metonymy) for basic and necessary interpersonal communication. (33 ref)—H. E. King.

7555. Fransella, Fay. (Royal Free Hosp, School of Medicine, London, England) Thinking and the obsessional. In H. R. Beech (Ed), *Obsessional states*. London, England: Methuen & Co, 1974. viii, 352 p. ae.—Presents a review of the literature on patterns of intelligence, rigidity and age, tolerance of ambiguity, creativity, extremity ratings, and inductive vs deductive reasoning in obsessional neurosis or obsessional personality. A theory of obsessional thinking based on G. H. Kelly's theory of personality constructs is presented, and suggestions for therapy are noted.

7556. Friedman, Raymond J. & Katz, Martin M. (Eds.). (NIMH, Bethesda, MD) *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7557. Gaddini, Renata. (U Rome, Italy) Early psychosomatic symptom and the tendency towards integration. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7558. Garfinkel, Paul E. (Clarke Inst of Psychiatry, Toronto Mental Health Foundation, Ontario, Canada) Perception of hunger and satiety in anorexia nervosa. *Psychological Medicine*, 1974(Aug), Vol 4(3), 309-315.—11 16-23 yr old female patients with anorexia and 11 matched controls were given questionnaires on hunger and satiety before and after a standard meal in order to evaluate the way in which patients with anorexia nervosa consciously recognize and describe their sensations of hunger and satiety. Findings show that the patients perceived hunger in a manner similar to controls, but were more preoccupied with thoughts of food, had a stronger urge to eat, and were more anxious when hungry. The patients, unlike the controls, frequently did not describe satiety in terms of gastric fullness. The disordered perception of satiety, however, was not

related to clinical outcome. Findings are discussed in terms of their implications for treating anorexia nervosa. (28 ref)—*Journal abstract*.

7559. Gibbons, J. L. **Endocrinology and psychiatry.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 240-243. —Summarizes recent research findings on endocrine concomitants of psychiatric disorders, and describes the development of measurement techniques (e.g., hormone assay methods) which have led to major advances in human neuroendocrinology.

7560. Grasso, A. M. & Nicoletti, F. (U Catania, Clinica delle Malattie Nervosa e Mentali, Italy) **[Psychoneurophysiological observations in schizophrenics: Analysis of gastrocnemius motor and H and T responses after "click."]** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 299-306. —Observed 15 male schizophrenics 18-42 yrs old in the acute phase of their illness and at their first dissociate episode. Ss showed no neurological signs and none of them was catatonic. An electromyograph with a supplemental panel was used to provide an acoustic stimulus with gradually increasing intensity, but applied in a randomized fashion. These acoustic stimuli were operated so that the S could not interpret them. Electric stimuli were also used with electrodes on various parts. Regardless of the intensity of the acoustic stimuli the H and T gastrocnemius monosynaptic reflexes did not show any variation, either in strength or in duration. Speculations are offered regarding the anatomic-functional relationship between attention and tonus regulation.—*M. Stanford*.

7561. Griffiths, R. D.; Hodgson, R. & Hallam, R. (Welsh National School of Medicine, Cardiff) **Structured interview for the assessment of work-related attitudes in psychiatric patients: Preliminary findings.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 326-333. —Developed a structured interview to assess the drive, realism, self-confidence, and self-rated disablement of psychiatric patients in relation to work. Using 18-55 yr old psychotic patients who had been unemployed for at least 12 mo, the clinical and research value of the interview was demonstrated by (a) studies of rater consistency, temporal stability, and parallel form reliability; and (b) an investigation of its predictive validity. (19 ref)—*Journal abstract*.

7562. Gruzeller, J. H. & Venables, P. H. (University Coll Hosp Medical School, London, England) **Two-flash threshold, sensitivity and  $\beta$  in normal subjects and schizophrenics.** *Quarterly Journal of Experimental Psychology*, 1974(Nov), Vol 26(4), 594-604. —2-flash threshold, response criterion, and sensitivity (defined by the slope of the psychophysical ogive) were examined in 30 schizophrenics and in 12 normals under 3 conditions—a baseline condition and during and after continuous white noise. Schizophrenics were subdivided into 4 groups on the basis of whether or not they exhibited paranoid symptomatology and electrodermal orientating responses. In general schizophrenics had more lenient 2-flash response criteria than normal Ss. In the baseline condition schizophrenics with orienting responses had lower 2-flash thresholds than those without orienting responses. Paranoid schizophrenics had more lenient criteria than nonparanoid schizophrenics and lower sensitivity than the nonparanoid group with orienting

responses. Differential group effects were obtained during and after noise, especially with regard to sensitivity. (38 ref)—*Journal abstract*.

7563. Hafner, R. Julian. (Inst of Psychiatry, U London, England) **Physiological changes with stress in depression and obsessional neurosis.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 175-179. —Selected 12 depressed patients and 12 obsessionals to complete the Beck Depression scale and Hostility and Direction of Hostility Questionnaire and compared the results with those from a normal population. Salivary flow was measured before and after a stressfully loud tone. There was a significant difference between the depressed and obsessional group on T (Neuroticism) and Beck scores. All 3 groups reacted to stress with a significant fall in salivary flow but the mean flow for the depressed group was significantly lower.—*W. G. Shipman*.

7564. Hagnell, Olle; Kreitman, Norman & Duffy, J. (U Lund, Inst of Psychiatry, Sweden) **Mental illness in married pairs in a total population.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 293-302. —Conducted 2 surveys in 1947 and 1957 to investigate the prevalence of conjoint mental illness in husband-wife pairs; 269 couples participated. Results indicate that (a) in 1947, Ss had no tendency to conjoint illness, but by 1957 they showed a highly significant excess over the expected number; (b) there was a general tendency for the wives of sick husbands to show a progressive increase in morbidity with increasing duration of marriage; (c) chronicity of illness in the husbands could be shown to influence the morbidity of wives, but the dating of the onset of illness was often very uncertain; and (d) remission of illness in the husband was clearly related to lower illness rates in the wives, except in the lowest social class. It is suggested that the risk of a healthy wife becoming ill if her husband is ill is significantly greater than that for the healthy husband of a sick wife. (19 ref)—*Journal summary*.

7565. Hall, John N. (U Leeds, England) **Inter-rater reliability of ward rating scales.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 248-255. —An examination of 25 papers in selected volumes of a professional journal suggests the following: (a) Rating scales are useful devices for assessing patients, but their reliability is partly dependent on the situation in which they are used. (b) When choosing a method of calculating reliability, it may be necessary to assume that scores are distributed normally, agreement is meaningful, chance agreement is negligible, total scores are meaningful, and mean scores of both raters are similar. (c) If these assumptions are not valid, the statistic weighted kappa may be applied. Possible methods for improving the reliability of ward rating scales are presented.—*Journal summary*.

7566. Hammer, Leon I. (Adelphi U) **Psychotherapy and growth.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 389-405. —Focuses on the need for psychotherapists to regard the growth process occurring in nature as a separate and distinct phenomenon from psychopathology. Basic to this growth process is new experience in a structured, realistic, nonrigid atmosphere with a broader and less academic view of man than psychiatry has taken to date.



7567. Hansen, Otto & Dimitrakoudi, Maria. (MRC Unit for Metabolic Studies in Psychiatry, U Sheffield, England) **The relation of blood adenosine triphosphate to changes of mood in affective disorders.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 268-274.—Investigated the relationship between blood adenosine triphosphate (ATP) levels and mood in 2 females suffering from manic-depressive predictable short-term cycle psychotic states. ATP was found to be low in the depressive phases, and it correlated significantly with mood. One male and 1 female "endogenous depressive" patient was followed with blood ATP determinations and mood rating during a course of electroconvulsive treatment. Correlating significantly with mood scores, ATP rose to normal clinical recovery. (21 ref)—*Journal summary*.

7568. Harding, T. (U Edinburgh, Royal Edinburgh Hosp, Scotland) **Serum creatine kinase in acute psychosis.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 280-285.—Determined creatine kinase (CK) levels in 34 acutely psychotic, 26 newly-admitted nonpsychotic, and 20 chronic schizophrenic patients. In each group, a positively skewed distribution of CK levels was found, with no overall significant difference. 5 acutely psychotic patients had raised levels. It is argued that these raised levels are related to nonspecific factors and do not reflect the psychotic illness directly. Findings do not support the view that serum CK estimation is of diagnostic value in psychiatric patients. (16 ref)—*Journal summary*.

7569. Hare, E. H. (Bethlem Royal Hosp, Beckenham, England) **The changing content of psychiatric illness.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 283-289.—The content of psychiatric illness may change in response to changes in the physical environment or because of cultural or social changes. Decreased severity of mania and an improved prognosis of schizophrenia is noted. It is suggested that environmental changes may be causing changes in content of these illnesses.

7570. Harris, Sandra L. **The relationship between family income and number of parent perceived problems.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 109-112.—Surveyed 56 children brought for mental health treatment. The number of problems reported by the parent was unrelated to the child's sex or age, but was higher for children of low-income families, especially if the child was young. Mothers reported more problems than fathers.

7571. Hauri, Peter. (Dartmouth Coll, Medical School, Sleep & Dream Lab) **Sleep in depression.** *Psychiatric Annals*, 1974(Jul), Vol 4(7), 45-62.—Reviews literature on sleep disturbances that occur in the general categories of bipolar and unipolar depression, noting wide variations in individual sleep patterns within the same diagnostic category. Seemingly contradictory research findings are discussed. It is suggested that investigation of the underlying reasons for the similarities and differences in sleep patterns are viable avenues for further research. Possible explanations for REM-suppressing effects of monoamine oxidase inhibitors and tricyclic antidepressants are discussed. It is noted that therapies involving total REM sleep deprivation have

had some positive but often short-lived benefit in the treatment of depression. (2 p ref)—*C. Wright*.

7572. Hay, A. J. & Forrest, A. D. **The diagnosis of schizophrenia and paranoid psychosis: An attempt at clarification.** *British Journal of Medical Psychology*, 1972(Sep), Vol 45(3), 233-241.—Studied case records of 198 female and 177 male patients diagnosed as having schizophrenia or paranoid psychosis and discharged from the Royal Edinburgh Hospital between 1966 and 1968 to test the justification for these labels. The validity of intragroup discriminations in schizophrenia and the use of operational definitions in the differentiation of schizophrenia, paranoid psychosis, and schizophreniform psychosis were examined as part of a long-term computer-assisted follow-up scheme for schizophrenic Ss. Data suggest that the value of any intragroup classification is negated by overlap of symptoms. A reclassification scheme with new operational definitions is presented. (21 ref)—*R. Hall*.

7573. Ikeda, Terutika. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[Vertex potential changes in a signal-reaction paradigm.]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 41-46.—Investigated electrical activity of the human cortical surface in response to warning and signal stimulus. Ss were normal medical students and interns, and patients in a psychiatric ward. The S's task was to press a balloon as the signal stimulus (a light) following a warning tone was presented. The obtained data were analyzed in terms of (a) evoked potential changes in response to the warning signal and the signal stimulus, (b) slow negative potential shift following the warning signal, and (c) evoked potential shifts in response to the termination of the warning signal and positive potential shifts caused by motor reactions. Distinct evoked potential changes were obtained with both the initiation and the termination of the warning signal and the initiation of the signal stimulus, and these potential changes were clearly related not only to the laboratory conditions but also to the S's degree of attention. Findings suggest that the evoked potential pattern changes are related to the negative potential shifts which precede the initiation of the signal stimulus. (English summary) (15 ref)—*S. Ashida*.

7574. Ikemi, Yujiro, et al. (Kyushu U, Medical School, Japan) **Psychosomatic mechanism under social changes in Japan.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7575. Ikuta, Takumi. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[Coding form for clinicophysiological studies in psychiatry.]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 34-40.—Proposes a newly designed coding form which facilitates investigations of the relationships between somatosensory-evoked responses and psychiatric symptoms. The form allows simpler coding systems and direct computer data processing. It can also be used for other clinical purposes; e.g., establishing the relationships between physiological and psychological conditions. (English summary)

7576. Imura, Tsuneo & Makihara, Hiroshi. (Nihon U, School of Medicine, Tokyo, Japan) **Interpersonal rela-**

tionships in families of schizophrenics: Some considerations based on three case studies. *Foreign Psychiatry*, 1974(Sum), Vol 3(2), 103-126.—Presents 3 case studies to support the theory that the family of the schizophrenic suffers from mental disease, and the patient's illness is merely a symptom of this larger disorder. Correlations are drawn between impressions of the behavior and responses of each individual; the dyadic reciprocal relationships among father, mother, patients, and siblings; and results of tests of each individual's ability to empathize.—M. E. Pounsel.

7577. Jha, B. K. (Hosp for Mental Diseases, Ranchi, India) **Epidemiological studies on specialised groups.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 39-50.—Discusses the prevalence of different types of mental disorders, based on hospital statistics, data from private psychiatric and general practitioners, random sampling of entire populations, household surveys, and random sampling of defined districts. Results generally agree on the greater frequency of schizophrenia and relative rarity of manic-depressive cases in the lower socioeconomic class. The impact of industrial surroundings and of population migration are discussed. The frequency of psychological disorders in various branches of the military, both during peace and war, are reviewed, and military pilots are compared with airline pilots. (55 ref)—D. Berliner.

7578. Johnston, Mary H. (U Chicago) **Word associations of schizophrenic children.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 663-674.—Studied the word associations in normal and disturbed 10- and 11-yr-old children by integrating 2 prior methods of word-association research: the study of pathological features of adult schizophrenic language and the study of psycholinguistic features of developmental changes in children's associations. The associations of 8 schizophrenic and 8 nonschizophrenic children in residential treatment were compared with those of 84 normal children. The associative differences were most consistent and definitive among the schizophrenic Ss—they gave fewer common responses and more idiosyncratic, unrelated responses. All Ss made responses termed "playing with the word," which is a sign of association disturbance in adults but appears to be normal in children. The associative differences observed between normal and disturbed Ss are interpreted as not so much reflecting a "developmental lag" in associative structure as a difficulty in selection of an association from what is believed to be a normal associative repertoire. The variability in occurrence of common responses plus the appearance of the expected "paradigmatic shift" in all the children support this interpretation. (16 ref)—*Journal abstract*.

7579. Kanzaki, Yasunori; Yoshida, Shuzo; Fujimoto, Seijiro & Matsushita, Kensuke. (Kagoshima U, Faculty of Medicine, Japan) **[Statistics on new patients at the Psychiatric Department of Kagoshima University Hospital: 1971.]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 59-62.—Presents classifications of 557 male and 473 female patients admitted to the hospital during 1971 by diagnosis, age and sex distribution, occupations by sex, resources for paying hospital bills, location of patient's home, and monthly admission rates.

7580. Katchadourian, Herant. (Stanford U, Medical School) **A comparative study of mental illness among the Christians and Moslems of Lebanon.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 57-67.—Reports biographic and psychiatric characteristics of 6,095 patients seen by Lebanese psychiatrists during 6 mo in 1964. Lebanese Moslems and Christians conform to customs that may acquire quasi-legal status. The effects of religious affiliation were sought in an examination of the psychiatric data. Overall care rates are lower for Moslems than Christians, and are especially low for Moslem women. More specifically, this pattern is found in care given for brain disorders, mental retardation, and psychotic, personality, and psychophysiologic disorders. For personality disorders, the sex difference is much more striking than the religious difference. The sex difference is reversed for rates of care for neurotic disorders. The varying availability of service is considered to be responsible for some differences, but causes for sex and diagnostic interactions with religion are seen as rooted in the Lebanese religious tradition.—W. R. Street.

7581. Klerman, Gerald L. (Harvard U, Medical School, Boston) **Depression and adaptation.** In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7582. Knobel, Mauricio. (U Buenos Aires, Medical School, Argentina) **Abnormality in normal development: A concept of symptom formation in childhood.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7583. Lansky, Melvin R. (U California, Medical School, Los Angeles) **Delusions in a patient with Capgras' syndrome.** *Bulletin of the Menninger Clinic*, 1974(Jul), Vol 38(4), 360-364.—Discusses the syndrome whose striking feature is the patient's insistence that a person or persons, usually those closest to him, have been replaced by doubles who impersonate them. A case report is included.

7584. Lens, Willy. (Psychologisch Inst, Leuven, Belgium) **A comparative study of motivational contents in projective and in direct, first person thought samples.** *Psychologica Belgica*, 1974, Vol 14(1), 31-54.—Investigated whether the Thematic Apperception Test (TAT) and the nonprojective Motivational Induction Method (MIM) have a different functional or motivational meaning for normals and neurotics. 3 groups of 30 military Ss each were used: psychoneurotics, medical patients admitted for physical illness, and a barrack group. Results did not support the prediction that psychoneurotics would express important needs and motives more in TAT fantasy and normal Ss more in MIM. Correlations between the 2 tests were affected by hospitalization and were different for different motives. Correlations for the achievement motive were always different in sign from those for the affiliative motive. (43 ref)—S. Slak.

7585. Lenz, Hermann. **[Loss, the central symptom of the depressive syndrome.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974, Vol 22(1).



39-44.—Proposes that depressed persons are overwhelmed by loss—loss of everything. This is evident in their complaints. They complain of loss of sleep, appetite, libido, interest, emotion, faith, and hope. Personality inventories lean heavily on the concept of loss. The aim of treatment is the suspension of loss. The opposite of loss is mania, because the manic believes that he possesses, knows, and understands all things. (English summary)—S. D. Babcock.

7586. Lesse, Stanley. (American Journal of Psychotherapy. New York, NY) **Psychiatric symptoms in relationship to the intensity of anxiety.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7587. Lewinsohn, Peter M. (U Oregon) **A behavioral approach to depression.** In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7588. Lipsitt, Don R. (Mt Auburn Hosp, Cambridge, MA) **Psychodynamic considerations of hypochondriasis.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7589. Love, Leonore R. & Kaswan, Jacques W. (U California, Los Angeles) **Troubled children: Their families, schools and treatments.** New York, NY: John Wiley & Sons, 1974. xi, 314 p. \$17.95.—Studied differences in the family and school environments of 120 elementary school children from various socioeconomic backgrounds who were seen as "disturbed" as compared to those considered normal by teachers, principals, and counselors. A psychological intervention—Information Feedback—for children's difficulties that focuses on mobilizing the self-help capabilities of significant adults in the child's daily life at home and at school is described and compared to child psychotherapy and parent counseling interventions. (9½ p ref)

7590. MacPhillamy, Douglas J. & Lewinsohn, Peter M. (Shasta Abbey, Mt Shasta, CA) **Depression as a function of levels of desired and obtained pleasure.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 651-657.—120 paid volunteer adults, equally divided into a depressed group and nondepressed and psychiatric control groups (from scores on the MMPI), were administered the Pleasant Events Schedule. Mean scores of the 3 groups were computed on scales purporting to measure obtained pleasure, activity level, and potential for being reinforced by a wide variety of events. As predicted, the depressed group scored significantly lower on these scales than the control groups, which did not differ significantly from each other. A minor hypothesis, derived from the neoanalytic theory of W. Bonime (1966), that depressed Ss would have higher scores on a scale purporting to measure the level of desired gratification was disconfirmed. (27 ref)—*Journal abstract*.

7591. Matsumoto, Kei. (Kagoshima U, Faculty of Medicine, Japan) **[Biological research in mental illness.]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 1-6.—Briefly surveys current biological investigations of

mental patients, and the author's recent studies of the biochemical responses and functions of the autonomic nervous system of 54 chronic schizophrenic, 4 manic, and 29 depressive psychotic patients. In the chronic schizophrenic Ss, slightly slow reactions of the parasympathetic system and abnormality of the adrenal medulla occurred, and in the depressive psychotic Ss, abnormal functions of the autonomic system were observed. Prolonged (24-wk) examinations of 9 male chronic schizophrenic Ss who received only dietary treatment (no drugs) indicated no distinct excretion of either 17-hydroxycorticosteroids or 17-ketosteroids except during the occurrence of acute psychotic symptoms. Significant increases in the excretion of catecholamines, steroid hormones, tryptamine, 3-indoleacetic acid and 5-hydroxyindoleacetic acid occurred just prior to the display of acute psychotic symptoms. (25 ref)—S. Ashida.

7592. Mawson, A. R. (Loyola U, City Coll, New Orleans) **Anorexia nervosa and the regulation of intake: A review.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 289-308.—Reviews recent work on the central mechanisms of food intake in relation to anorexia nervosa. On the basis of the review a number of conclusions are drawn as possible avenues for future research. A proposal is outlined for the investigation of levodopa as a potential treatment for anorexia nervosa.—*Journal abstract*.

7593. Melver, David & Presly, Allan S. (Royal Edinburgh Hosp, Scotland) **Towards the investigation of personality deviance.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 397-404.—Used the Character Disorder scale of the Symptom Sign Inventory and the 16 Personality Factor Questionnaire (16 PF) to identify traits characteristic of psychopathic personalities. 86 18-55 yr old female psychiatric patients in 3 diagnostic groups—character disorder, personal disturbance, and borderline—served as Ss. Data from the Kolmogorov-Smirnov 1-sample test applied to the 16 PF scores identified 2 patterns associated with personality deviance which accounted for half the Ss. None of the other 6 logically possible personality patterns were clearly associated with personality deviance. Factors G, L, and Q, were found to be abnormally distributed in Ss with character disorders. Further support for the findings was obtained using A. S. Presly and H. J. Walton's rating scale as a different criterion of personality deviance. Problems in the use of personality categories are discussed. (17 ref)—*Journal abstract*.

7594. Mellett, Peter G. (Netherne & Horton Hosp, Surrey, England) **The clinical problem.** In H. R. Beech (Ed), *Obsessional states*. London, England: Methuen & Co, 1974. viii, 352 p. ae.—Discusses observations of 20 obsessional patients referred to a psychiatric hospital. Findings suggest that the "fixed" behavior and thought patterns of these patients are imprinted and evoked by depression or suppressed anger. Case studies of 5 female patients are presented in detail, and neurophysiological factors in obsessional disorders are examined.

7595. Mendelson, Myer. (U Pennsylvania) **Psychoanalytic concepts of depression.** (2nd ed). Flushing, NY: Spectrum, 1974. xiv, 352 p. \$15.—Presents a critical, historical review of psychoanalytic concepts of depression. The development of diagnostic conceptualizations

of depression, treatment of mourning and depression in children, the theoretical aspects of depressive illness, and the impact of recent genetic, psychophysiological, and pharmacological findings on psychoanalytic concepts of depression are also examined.

7596. Meré, A. Gallego. (Inst Psicoanalítico, Madrid, Spain) [Psychoanalytic study of schizophrenic delusions.] (Span) *Revista de Psiquiatría y Psicología Médica*, 1974(Jan-Mar), Vol 11(5), 295-300.—Discusses such delusions as "universal hostility" and "reversible death" and their theoretical bases.

7597. Musaph, H. (Ed.). *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in symptom formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7598. Nagaoka, Kouki. (Nagasaki U, Faculty of Medicine, Psychiatric Div, Japan) [Henri Ey's "Consciousness of patient's condition."] (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 50-53.—Introduces H. Ey's psychiatric approach which classifies acute and chronic mental illness in terms of the "negative structure" (dysfunction) and the "positive structure" (resolution of the dysfunction) of consciousness. Examples are as follows: (a) Manic psychosis: negative structure may be identified by a dysfunction of "spiritual unity" and positive structure by the playful behavior of the patient. (b) Melancholic psychosis: negative structure may be identified by the general clinical symptoms of the patient and positive structure by his "tragic" behavior. (c) Acute delirium, hallucinatory psychosis: negative structure may be identified by severe dysfunction of consciousness and positive structure by dramatization, abstraction, and the artificialization of experience. (d) Confusion and delirium: negative structure appears as fuzzy thinking, fixation on a concept or extreme confusion among concepts, etc, and positive structure as inability to distinguish between the actual and the imagined. According to Ey, effective treatment can be initiated only when the psychiatrist understands the characteristics of these 2 types of structure.—S. Ashida.

7599. Nagayama, Haruo; Aikawa, Katsuyo & Matsunaga, Fumiya. (Nagasaki U, Medical School, Japan) [Mental disorders among university students studied through doctors' interviews.] (Japn) *Kyushu Neuro-psychiatry*, 1972(Dec), Vol 18(3-4), 201-205.—Reports results of 2-step interviews at Nagasaki University, conducted by psychiatrists with more than 4 yrs of clinical experience. The 1st interview, approximately 5 min long, was based on answers to a 160-item questionnaire previously given to each student. The 2nd interview, approximately 1 hr long, was given to those students who were suspected during the 1st interview of being potential mental patients. In 1971, 940 freshmen received the 1st interview and 41 students were recommended for the 2nd. 36 of these 41 took the 2nd interview and for 11 of them the suspicion of having some mental disorder was confirmed. In 1972, 1,041 freshmen took the 1st interview, and 50 of them were recommended for the 2nd interview. Of these 37 did so, and for 9 of these the suspicion of mental disorder was confirmed. Results indicate a need for public education in mental health and for reorganization and expansion of

student mental health programs. (English summary)—S. Ashida.

7600. Nakagawa, Helen; Osborne, Oliver H. & Hartmann, Kathleen. (U Washington, School of Nursing) *Fallacies in schizophrenia*. *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 410-415.—Based on records of 1,769 patients—798 schizophrenic and 971 nonschizophrenic—hospitalized in 2 mental institutions between 1945 and 1969, 17 biological, personal, and sociocultural presenting problems that pertain especially to mental illness were identified. By clustering even as few as 3 presenting problems, no pattern was evident in more than 16% of the schizophrenic patients. This same cluster could be found manifest in 10% of those not labeled schizophrenic. It is concluded that the use of the schizophrenia label offers nothing in the way of a construct by which systematic decisions about treatment, prognosis, or disposition could be made. (25 ref)—*Journal abstract*.

7601. Naylor, G. J.; Stansfield, D. A.; Whyte, S. F. & Hutchinson, F. (U Dundee, Scotland) *Urinary excretion of adenosine 3':5'-cyclic monophosphate in depressive illness*. *British Journal of Psychiatry*, 1974(Sep), Vol 125, 275-279.—The urinary excretion of adenosine cyclic monophosphate (cyclic AMP) was estimated in 12 patients suffering from a depressive psychosis and estimated again when they had recovered. During each period of assessment the patients were maintained under metabolic ward conditions. The urinary excretion of cyclic AMP increased significantly with recovery. The urine volume showed no significant change with recovery and did not correlate significantly with the cyclic AMP excretion. (15 ref)—*Journal summary*.

7602. O'Connell, Walter E.; Baker, Rodney R.; Hanson, Philip G. & Ermalinski, Richard. (VA Hosp, Houston, TX) *Types of "negative nonsense"*. *International Journal of Social Psychiatry*, 1974(Spring-Summer), Vol 20(1-2), 122-127.—The Personal Belief Inventory (PBI), a measure of irrational thinking, was administered to 172 male psychiatric patients. Factor analysis identified 4 factors: (a) self-esteem, (b) hyperdependency, (c) humanism, and (d) external conformity. A 2nd group of 27 male patients was given the PBI 3 times during a 4-wk course of group therapy. Ss were classed as either high or low in verbal participation. High participants had higher self-esteem factor scores and lower hyperdependency factor scores than low participants. Results are congruent with Adler's concept of humanistic identification.—W. R. Street.

7603. Paunero, Enrique. (Hosp Nacional de Psiquiatría, Buenos Aires, Argentina) [Alienation and mental illnesses.] (Span) *Revista de Psiquiatría y Psicología Médica*, 1974(Jan-Mar), Vol 11(5), 277-285.—Presents an existential view of alienation, discussing the types of alienation and the process of its development.

7604. Pershad, Dwarka & Shukla, T. R. (Post-Graduate Inst of Medical Education & Research, Chandigarh, India) *Distribution of socio-economic factors among hospitalised mental patients*. *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 17-20.—Studied diagnostic groups in a mental hospital to determine the impact of social and economic factors. 172 patients admitted during 1 3-wk period were interviewed, using a



structured "Interview Schedule" and 2 standard socioeconomic scales. Most patients were suffering from schizophrenia, with almost all the others being in the affective and organic groups, with only 2 neurotics. Results indicate few significant differences among the groups on socioeconomic status, mode of family, and area of domicile. Significant differences were noted in education, in marital status, and in the history of venereal disease and head injuries.—*D. Berliner.*

7605. Pfeiffer, Wolfgang M. (U Münster, Inst für medizinische Psychologie, W Germany) [Psychoses in a culture with strong traditions.] (Germ) *Confinia Psychiatrica*, 1974, Vol 17(1), 15-41.—Carried out a field study of 57 psychiatrically ill persons, identified by local informants, on a Sumatran island. The sociocultural characteristics, data-collection methods, discussions of psychological disturbances and their causes, and patient characteristics are reported in detail. The sex, age, education, occupation, diagnosis, length of illness and its course, and symptoms are reported for 40 of the patients, and case summaries of several schizophrenics, "a typical periodic psychosis," and manic-depressive disorders are given. The patients were 10-85 yrs old, most were diagnosed as schizophrenic, most had little or no formal schooling, and a number included conditions of athetosis, epilepsy, Parkinsonism, hemiparesis, and severe mental retardation. The principal points emphasized are the field-study characteristics and the relative universality of psychological disorders.—*I. N. Mensh.*

7606. Pinkerton, Philip. (U Liverpool, Inst of Child Health, England) Symptom formation reconsidered in psychosomatic terms. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7607. Planells, Montserrat. [The corporal schemata in relation to affective abnormalities.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 335-343.—Discusses body image and drawings of the self and others as they relate to affective disturbances.

7608. Post, Robert M. & Goodwin, Frederick K. (NIMH, Bethesda, MD) Estimation of brain amine metabolism in affective illness: Cerebrospinal fluid studies utilizing probenecid. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7609. Rees, Jancis R.; Allsopp, M. N. & Hullin, R. P. (U Leeds, England) Plasma concentrations of tryptophan and other amino acids in manic-depressive patients. *Psychological Medicine*, 1974(Aug), Vol 4(3), 334-337.—Determined plasma tryptophan concentrations in serial blood samples from a short-cycle (2-3 day) manic-depressive patient and 4 manic-depressive patients with longer (60-day) affective cycles. Tryptophan levels varied significantly with affective state in the short-cycle patient and 1 of the longer-cycle patients. Correlation in the short-cycle patient was better with blood samples taken at 3 PM than at 9 AM.—*Journal abstract.*

7610. Rees, W. Linford. (London U, St Bartholomew's Hosp, England) Personality and psychodynamic mechanisms in migraine. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7611. Rendon, Mario. (Bellevue Psychiatric Hosp, New York, NY) Transcultural aspects of Puerto Rican mental illness in New York. *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 18-24.—Presents data on demographic and psychiatric characteristics of New York residents of Puerto Rican origin. Compared to non-Puerto Ricans, these show higher overall incidence of mental illness, with especially high rates among late adolescents and more frequent diagnoses of schizophrenia. Several factors are cited which bear more heavily upon Puerto Ricans than non-Puerto Ricans in similar socioeconomic circumstances; e.g., unrealistic aspirations and linguistic inabilities. Conflicts between cultural patterns also induce stress as the young Puerto Rican is forced to accept the seeming indecencies of American competition, sexual freedom, and nuclear family structure. Symptoms of hysteria and schizophrenia specific to Puerto Ricans in America are described.—*W. R. Street.*

7612. Rodnick, Elliot H. & Goldstein, Michael J. (U California, Los Angeles) Premorbid adjustment and the recovery of mothering function in acute schizophrenic women. *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 623-628.—42 female acute, 1st-admission schizophrenics treated briefly in a community mental health center were followed from day of admission to 1 yr postdischarge. Mothers in the sample, divided on the basis of premorbid adjustment ( $n = 19$  good premorbid;  $n = 8$  poor premorbid) were studied regarding the changing patterns of child care shown over the 1-yr period. Results indicate that poor premorbid mothers were younger than good premorbid at the time of their 1st psychotic episode and had at least 1 infant child. The children of good premorbid were largely in middle childhood. Data are discussed in terms of the implications of early release programs for schizophrenia on the ultimate mental health of the offspring and on the whole area of "high-risk" studies. (16 ref)—*Journal abstract.*

7613. Rome, Howard P. (Mayo Clinic, Rochester, MI) Depressive illness: Its sociopsychiatric implications. *Psychiatric Annals*, 1974(Jun), Vol 4(6), 54-68.—Discusses suicidal behavior and its relationship to sociocultural and economic factors. Cerebral bioamine metabolic disturbances are necessary but not sufficient causes of depression. Contributing social factors include transience of residence and of behavioral codes, increased polarization and compartmentalization, and a negative view of life and the universe. The correlation between radicalization and increased suicide rates in several cultures is noted. Environmental factors are selective in the development of depression since they stress development of different coping patterns. The necessity of considering both universal and variable cultural factors in depression is stressed. (51 ref)—*C. Wright.*

7614. Rubinstein, Benjamin B. (Private practice, New York, NY) On metaphor and related phenomena.

*Psychoanalysis & Contemporary Science*, 1972, Vol 1, 70-108.—Discusses the nature of metaphor formation, the varieties and functions of metaphors, and the relations of metaphors to normal and pathological thought processes. Metaphors are not semigrammatical or incomplete sentences, as suggested by N. Chomsky and J. J. Katz, but are expressions of a logical process by which classes possessing similar conspicuous attributes are subsumed under a more general class. Metaphors serve as devices for the evolution of language, compensate for the deficiencies of ordinary language, and help express vague, complex, or highly individual thoughts and emotions. Some parallels can be found between the process of metaphor formation and certain pathological, paralogical aspects of schizophrenic language and thought. It is suggested that the study of metaphor formation as a process of classification can shed light on mental functions in general. (2½ p ref)—*J. Kelly*.

7615. **Sahánek, O. & Vítková, D.** (Psychiatrická léčebna, Brno, Czechoslovakia) [The question of conception and classification of endogenous psychosis.] (Czech) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 17-22.—Reviews literature about "atypical" or "mixed" psychoses and analyzes 41 cases so diagnosed between 1966 and 1970. Following Kraepelin's dichotomy of functional psychoses, it is suggested that atypical psychoses are not to be classified as independent, nosological entities. They belong to the manic-depressive category, regardless of whether the atypical clinical component is more or less evident, if remissions between psychotic episodes are complete. If remissions are not complete, the diagnosis of schizoaffective psychosis or periodic (circular) schizophrenia should be made. (Russian & English summaries) (15 ref)—*V. Fischmann*.

7616. **Schmale, Arthur H.** (U Rochester, School of Medicine & Dentistry) **Depression as affect, character style, and symptom formation.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 327-351.—Differentiates the characteristics of depression as affect, character style, and disease syndrome, and discusses the somatic adaptive mechanism (withdrawal) which underlies depressive reactions. Depression is seen as a conservation-withdrawal reaction to unpleasant situations or prolonged deprivation. The predominant affects of depression, helplessness, and hopelessness function as signals that current activities may lead to a re-experiencing of failure or deprivation and can result in constructive behavior adjustments or in further maladaptive symptom formation. The clinical syndromes of depression fall into 2 categories—exogenous depression, in which symptoms prevent a reawakening of pain associated with the infantile separation experience, and endogenous depression, in which symptoms result from a turning in of aggression onto the self. It is suggested that it is important for therapists to distinguish the stages and types of depression so that appropriate approaches to treatment can be provided. (2½ p ref)—*J. Kelly*.

7617. **Seiler, Lauren H. & Summers, Gene F.** (Queens Coll, City U New York) **Toward an interpretation of items used in field studies of mental illness.** *Social Science & Medicine*, 1974(Aug), Vol 8(8), 459-467.—Conducted a study of 1,003 rural heads of households to (a) describe the level of 2 symptom types among

subgroups in a rural population and (b) consider the importance of status variables and physiological malaise as factors in producing psychological stress. Data suggest that the quantity of psychological stress found in the rural community adult population was only minimally related to the ages of Ss. (40 ref)—*Journal abstract*.

7618. **Seligman, Martin E.** (U Pennsylvania) **Depression and learned helplessness.** In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

7619. **Serban, George & Woloshin, Gerald W.** (New York U. Medical Ctr) **Relationship between pre- and postmorbidity psychological stress in schizophrenics.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 507-517.—To determine the relationship between pre-schizophrenic (childhood and adolescence) problems and the pattern of difficulties facing patients in their adult years, 516 chronic and 125 acute schizophrenics and 95 normal individuals were given the Social Stress and Functionability Inventory for Psychotic Disorders. Results demonstrate that schizophrenics encountered more problems in their youth, adolescence, and adult years compared to normals. Also, both chronic and acute schizophrenics showed a high degree of continuity between earlier and later types of difficulties. (21 ref)—*Journal abstract*.

7620. **Shackleton, V. J.** (Ashridge Management Coll, Berkhamsted, England) **Factors affecting the declaration and communication of symptoms by psychiatric patients.** *British Journal of Social & Clinical Psychology*, 1974(Dec), Vol 13(4), 405-412.—Reports 2 experiments on the effect of different situations on the responses of psychiatric patients to self-report personality and symptom measures. Exp I with 64 newly referred 16-65 yr old patients, compared the responses of patients seen in a psychiatric outpatient clinic with a comparable group seen at home. Exp II, which used 64 similar Ss, studied the effect of a 1st psychiatric interview on patients' responses. All Ss completed the short form of the Maudsley Personality Inventory, the Eysenck Personality Inventory, the Cornell Medical Index, and 5 symptom scales by J. G. Ingham. Female patients consistently reported more symptoms, and a greater intensity of symptoms, than males. The different situations had no significant effect on Neuroticism, Extraversion, and Symptom scores. It is concluded that the situational variables investigated can be regarded as insignificant influences on the responses of similar psychiatric patients. (23 ref)—*Journal abstract*.

7621. **Shaffer, John W.; Perlin, Seymour; Schmidt, Chester W. & Stephens, Joseph H.** (Johns Hopkins U. Medical School) **The prediction of suicide in schizophrenia.** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 349-355.—Collected case history data on 361 schizophrenics from the time of their admission. These cases were subsequently followed for up to 5 yrs, and the incidence of suicide (12 out of 361) was determined. After elimination of all follow-up information, the case folders of the 12 suicides were interspersed among a random sample of 75 cases drawn from the remaining 349. These 87 cases were then blindly reviewed by 2 psychiatrists who rated each for degree of suicide



potential on an 11-point scale. Raters' accuracy and the predictive value of clinical and sociodemographic signs were also evaluated. Results indicate that although none of the signs and ratings, either singly or in combination, yielded individual accuracy of prediction superior to classification by base rate, the clinical judgments of the psychiatrists were significantly correlated with outcome ( $p < .01$ ). As expected, the number of previous suicide attempts was the most important single variable associated with outcome as well as the one which most influenced raters' judgments. Previously published "risk" scales were largely ineffective. (28 ref)—*Journal abstract*.

7622. Silverman, Lloyd H. (New York U) **Drive stimulation and psychopathology: On the conditions under which drive-related external events evoke pathological reactions.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 306-326.—Discusses environmental conditions which precipitate psychopathological reactions by stimulating a threatening drive, and reviews laboratory and clinical investigations of the evocation of pathological defenses by subliminal and supraliminal presentations of drive-related stimuli. It was found that expression of conflict-producing drives which are activated by external stimuli will be blocked when the drive relevance of the stimulus is hidden, when the situation prohibits drive expression, or when unconscious meanings make drive expression taboo. It is postulated that 4 conditions are necessary for external stimuli to evoke pathological defenses: (a) the drive aroused must be unacceptable to the individual, (b) ego-strength must be insufficient for the individual to handle the drives adaptively, (c) a minimal level of drive derivatives must be available to consciousness, and (d) the situation in which the stimuli appear must discourage direct drive expression. (2 p ref)—*J. Kelly*.

7623. Skinner, Harvey A.; Jackson, Douglas N. & Hoffmann, Helmut. (U Western Ontario, London, Canada) **Alcoholic personality types: Identification and correlates.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 658-666.—Conducted a study (a) to identify the existence of distinct personality types among 282 white male alcoholic psychiatric patients and (b) to relate this empirically derived taxonomy to types from previous research with alcoholic patients and to general psychiatric types. Employing a sequential factor-analytic strategy, 8 bipolar typal dimensions that defined 1 cluster of persons at each pole of each dimension were identified. The 5 clearest bipolar typal dimensions were classified as follows: (a) acute anxiety vs denial and blunted affect, (b) antisocial attitudes vs hypochondriacal preoccupation, (c) hostile-hallucinatory syndrome vs neurotic depression, (d) neurotic disorganization vs hostile paranoid, and (e) emotional instability vs interpersonal conflict and depression. MMPI profiles from prior research with a variety of psychiatric groups showed marked correspondence with MMPI profiles estimated for the 8 common types. (23 ref)—*Journal abstract*.

7624. Slade, P. D. (Royal Free Hosp, School of Medicine, London, England) **Psychometric studies of obsessional illness and obsessional personality.** In H. R. Beech (Ed), *Obsessional states*, London, England: Methuen & Co, 1974, viii, 352 p. 45.

7625. Smith, Landgrave T. (U Oklahoma, Health Sciences Ctr) **Schizophrenia: The case for an organic brain syndrome.** *Biological Psychology Bulletin*, 1974(Mar), Vol 3(3), 84-98.—Considers accounts of schizophrenia involving autoimmunological mechanisms, errors in biogenic amine metabolism, and enzymatic factors. The evidence appears to support the position that in a definable segment of the schizophrenic population there is a metabolic anomaly which is correlated with symptom manifestation. (33 ref)—*Journal abstract*.

7626. Soni, Som D. & Rockley, G. Joseph. (Prestwich Hosp, Manchester, England) **Socio-clinical substrates of folie à deux.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 230-235.—Presents 8 cases of folie à deux seen at a European hospital. A relevant review of the literature in conjunction with these cases suggests that while the principal in folie à deux is always a psychotic who initiates the delusions on the basis of his morbid psychotic illness, the associates have an assortment of abnormalities including schizophrenia, subnormality, susceptible personality, and dementia which predispose them to acquire the delusions of their partners. The social milieu is considered as a determinant of the actual content of the delusional systems, and precipitant in some cases. A socio-clinical approach in treating folie à deux is suggested. (23 ref)—*Journal summary*.

7627. Steingart, Irving & Freedman, Norbert. (State U New York, Downstate Medical Ctr, Brooklyn) **A language construction approach for the examination of self/object representation in varying clinical states.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 132-178.—Discusses the relation between some forms of syntactic construction in patient speech and the presence of clinical signs of psychopathology. Tapes of 8 therapy sessions involving 4 different patients were analyzed for type of language code (fragmented, narrative, or complex language), language status (representation of self or significant objects), and language focus (representation of self and objects as isolated or interacting). It was found that the depressed, paranoid, and remitted states of 1 patient were characterized by distinctive types of language construction, that schizophrenic symptoms correlated with a high degree of fragmented language, and that paranoid delusions were associated with a high proportion of conditional language constructions. It is concluded that patient differences in the use of some syntactic constructions reflect differences in the relative distribution of narcissistic libido and object libido. (4/4 p ref)—*J. Kelly*.

7628. Stevenson, Ian. (U Virginia) **Xenoglossy: A review and report of a case.** *Proceedings of the American Society for Psychical Research*, 1974(Feb), Vol 31, 264 p.—Presents a case of responsive xenoglossy (evidence of a learned language skill) inexplicable on the basis of the S's background. S was a 37-yr-old Jewish-American housewife who had never been to Scandinavia or knew intimately anyone who could speak any Scandinavian language. She had not previously shown any evidence of mediumistic abilities. "Jensen," the personality capable of speaking Swedish, developed unexpectedly during hypnotic age regressions employed by the S's physician husband. Extensive interviews of S with 3 Swedish-

speaking persons, supported by examinations of copies of original tapes by 3 additional Swedish-speaking persons, concurred that the case involved responsive xenoglossy. Cryptomnesia is considered extremely improbable on the basis of testimony by S's mother and 2 siblings as well as from S's low aptitude for foreign language. The personal characteristics of the S, results of extensive interviews with S and members of her family, as well as findings of psychological tests and a polygraph test for lie detection, yield no indication of fraud. Extrasensory perception is ruled out and the conclusion drawn that the case offers strong evidence of the survival of physical death by some aspect of human personality. —R. Scott.

7629. Stutte, Hermann. (Kinder-Jugendpsychiatrische, Universitätsklinik, Marburg/Lahn, W Germany) **Neurotic delinquency caused by a Thersites complex.** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Jul), Vol 23(5), 161-166.—Analyzed 32 juvenile patients with reference to the somatic, psychological, and criminological aspects of their delinquent tendencies, and points out that a crisis of individuation may arise from a conflict of self-estimation connected with real, but overestimated, or simply imaginary somatic imperfections (Thersites complex). This complex has its own concrete therapeutic and preventive possibilities, which are briefly mentioned. (46 ref)—*Journal summary*.

7630. Timsit-Berthier, M. (Medical Psychology Service, Liège, Belgium) **[Recent EEG developments in early infantile autism.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 556-567.—Unlike spontaneous EEGs, which may lead to gross diagnostic errors, the averaging of evoked potentials has led to results which have a descriptive but not a causative value. The primary components of the auditory evoked potential are exactly the same in autistic and normal children, indicating that the sensory input to the cortex is unaffected. On the other hand, autistic children show an increase of the secondary component N<sub>2</sub>, especially obvious during REM sleep, pointing to a disruption of the integrative functions of the cortex linked to an imbalance between excitatory and inhibitory systems regulating sensory inputs. As for the late components, studied through paired stimulations, autistic children show a pathological high-amplitude negative wave, leading to the hypothesis that the cortical processes responsible for conditioning are also disturbed in these children. (English, Dutch, German, Italian & Spanish summaries)—*Journal summary*.

7631. Ucha Udabe, Ronaldo. **Biochemistry and psychiatry with special reference to psychopharmacology.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7632. Upadhyay, R. K. (Ranchi U, Hosp for Mental Diseases, India) **A study of the opinion of the educated towards mental illnesses.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 10-15.—Studied attitudes toward mental illness, with an eye toward improved utilization of increasing government financial support for mental health services. 60 students, teachers,

and school administrators whose education ranged from intermediate through MA degree completed a rating schedule on the nature and treatment of mental illness. Findings show that even among educated persons, faith healing and cruel physical treatment remain common; few are well informed about methods of scientific treatment; most cannot recognize mental illnesses until they are in advanced stages; and many are still unaware of the psychiatric implications of alcoholism, homosexuality, and crime.—D. Berliner.

7633. van den Berg, J. H. (U Leiden, Inst for Conflict Psychology, Netherlands) **Divided existence and complex society: An historical approach.** Pittsburgh, PA: Duquesne University Press, 1974. xii, 306 p.—Discusses the relationship of "divided existence" (i.e., multiple personality) to culture. Based on the idea that it was with the onset of complex, industrial society that multiple personality appeared, the incidences of these occurrences and their relationship of mesmerism, hypnotism, the unconscious, and other psychological phenomena are analyzed.

7634. van Keep, Pieter A. & Kellerhals, Jean M. **The impact of socio-cultural factors on symptom formation: Some results of a study on aging women in Switzerland.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7635. Veeraraghavan, Vimala. (Delhi U, School of Social Work, India) **Marital relations: A comparative study amongst neurotics and normals.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 1-9.—Investigated the marital relationships of 25 hysteria and anxiety state neurotics undergoing treatment in hospitals under qualified psychiatrists. Ss were matched with 25 normal persons with similar backgrounds. A structured questionnaire was used. Results indicate that about twice as many neurotic Ss as normal Ss experienced incompatibility in temperament, nonmaterial expectations from the spouse, the impression that demands remain unfulfilled, and maladjustment in sexual relations. Almost all factors support the hypothesis that married neurotic women have more strained marital relations than do normal women.—D. Berliner.

7636. Vogel, Gerald W. (Georgia Mental Health Inst. Sleep Lab) **Dreaming and schizophrenia.** *Psychiatric Annals*, 1974(Jul), Vol 4(7), 63-77.—Examines the hypothesis that similar brain mechanisms may operate in dreaming and in psychoses. The theory that REM deprivation is a causal agent in mental illness is seen to have been disproved, and hypotheses based on REM rebound differences between normal individuals and schizophrenics have been disproved in all but 1 case. The possible causal influence of irregularities in serotonin metabolism leading to ponto-geniculate-occipital spikes has just begun to be thoroughly tested in humans, but there are problems with the theory, and findings thus far are inconclusive. While 15 yrs of laboratory work have produced no firm evidence relating REM abnormalities to schizophrenia, it is noted that there may be relationships between schizophrenia and dreaming in other areas (e.g., sleep onset dreaming). (2 p ref)—C. Wright.



7637. **Watson, Stanley J.** (Stanford U, Medical School) **Effect of delayed auditory feedback on process and reactive schizophrenic subjects.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 609-615.—A group of 20 male process schizophrenic, 20 male reactive schizophrenic, and 20 normal Ss read a passage aloud under delayed auditory feedback. S grouping, length of hospitalization, age, education, reading speed, and audiometric variables were controlled. It was theorized that normal Ss would be most affected by delayed auditory feedback, followed by reactive and then process Ss. Results do not support this hypothesis; after covarying for control reading time, the effect of diagnostic group disappeared. However, post hoc analysis revealed a subgroup of process patients more influenced by delayed auditory feedback than all other Ss. They were older, had shorter hospitalization, more education, lower control reading times, and higher process-reactive scores than the remaining process Ss. These patients are thought to constitute an "intermediate" schizophrenic group in their social organization and psychotic symptomatology. Thus, it is speculated that delayed auditory feedback could tap interactions between sensory and social variables in certain subsets of the schizophrenic population.—*Journal abstract*.

7638. **Weissman, Albert.** (Pfizer Pharmaceuticals, Groton, CT) **Current research in drugs and behavior as it relates to the mentally disordered offender.** In L. M. Irvine & T. B. Brejle (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.

7639. **Wittkower, E. D. & Warnes, H.** (McGill U, Montreal, Quebec, Canada) **Transcultural psychosomatics.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine, Amsterdam, 1973: Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7640. **Woerner, Margaret G. & Klein, Donald F.** (Long Island Jewish—Hillside Medical Ctr, Glen Oaks, NY) **14 and 6 per second positive spiking.** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 356-361.—Compared 27 hospitalized psychiatric patients whose (otherwise normal) EEGs showed the 14 and 6/sec positive spike pattern (PSP) with matched normal EEG patients. A group of siblings of psychiatric patients with PSP was similarly compared with matched normal EEG siblings. Comparisons on a variety of measures including pregnancy and birth histories, developmental variables obtained from mothers' reports and school records, psychiatric ratings, and psychological tests revealed few significant differences between PSP and normal EEG patients or siblings. Findings offer little to indicate a distinctive clinical significance for the PSP pattern, but further study is suggested. (23 ref)—*Journal abstract*.

7641. **Wolkind, S. N.** (London Hosp Medical Coll, England) **Psychological factors and the minor symptoms of pregnancy.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 161-165.—Investigated the relationship of minor symptoms of pregnancy to the Malaise Inventory (MI) and the the Pregnancy Questionnaire. Of 118 women who completed the interviews, 37 were classified as neurotic from their scores on the MI. A number of symptoms were found to be more common in

the neurotic group and it appears that a woman with previous neurotic or psychological difficulties is likely to see herself as having a marked number of uncomfortable symptoms during pregnancy.—*W. G. Shipman*.

### Behavior Disorders

7642. **Adilman, Philip H.** **Mary Ann and mother: An adolescent's turmoil to individuate.** *Adolescence*, 1974(Sum), Vol 9(34), 199-220.—Describes the history and treatment of a 14-yr-old female admitted to hospital because of truancy, promiscuity, and defiant behavior. The case illustrates the need to assess certain adolescent behavior in terms of an unresolved symbiosis with the mother. (16 ref)

7643. **Bleckner, Janet E.** (California State U, San Francisco) **Psychological characteristics of the Haight "junkie."** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 21-28.—Administered a Rorschach Ink Blot Test and interviewed 37 male and 17 female heroin addicts to assess characteristics of "middle class junkies." Test scores indicate the blots tended to be viewed in a global rather than detailed manner; Ss expressed few anxiety signs, an excess of diffuse over form-dominated color, and more animal than human content. The sociological history data from the interviews were correlated with the Rorschach scores and the addicts characterized as impulsive, immature, lacking awareness of realities of daily existence, lacking responsibility, operating from a model of the noncoping male parent, coming from a home stressing conformity and superficial interpersonal relations, and lacking self-esteem.—*R. Tomasko*.

7644. **Calicchia, John P.** (New York Inst of Technology) **Narcotic addiction and perceived locus of control.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 499-504.—Tested predictions derived from the narcotic-induced internality explanation of the relationship between narcotics and locus of control. Rotter's Internal-External Control Scale was administered to 120 male addicts who either were receiving the heroin substitute narcotic methadone or were undergoing a narcotic abstinence form of rehabilitation. Results support the hypotheses that (a) addicts would be more internally oriented than their control counterparts, (b) methadone addicts would hold significantly more internal locus of control beliefs than the abstinence addicts, and (c) the length of addiction and perceived internality would be positively correlated. Data are discussed in terms of the narcotic-induced internality explanation and its meaning for the treatment of addicts. (15 ref)—*Journal summary*.

7645. **Carlsson, Carl; Claeson, Lars-Erik & Pettersson, Lena.** (Lillhagen Mental Hosp, Göteborg, Sweden) **Psychometric signs of cerebral dysfunction in alcoholics.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 83-86.—Psychometrically tested 67 chronic alcoholics admitted to a Swedish hospital ward for alcoholics for signs of cerebral dysfunction. Results indicate that 83.6% of Ss had signs of cerebral dysfunction on at least 3 of the tests; only 1 patient showed no such signs. (20 ref)

7646. **Castro, Gonzalo A.** [Mental health and alcoholism.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Apr), Vol 20(2), 142-146.—Suggests that alcoholism interferes with the mental health of the alcoholic himself, by impairing his capacity to accept

himself and perceive the world, thus preventing his adjustment to life. It also damages the mental health of all of the other members of his family by hindering the development of a good family environment.

7647. Chambers, Carl D.; Bridge, T. Peter; Petersen, David M. & Ellinwood, Everett M. (U Miami, Medical School, Div of Addiction Sciences) **Methaqualone: Another "safe" sedative?** *Journal of Drug Issues*, 1974(Spring), Vol 4(2), 126-129.—Presents statistics on acute nonfatal and fatal reactions to methaqualone seen during 1972 at Jackson Memorial Hospital (Dade County, Florida). It was found that cases involving methaqualone represented 8.9% of all acute drug reactions and 30.1% of all acute reactions involving sedatives. In a substantial number of cases reaction to methaqualone was associated with use of other drugs or alcohol. All fatalities resulting from accidental overdoses of methaqualone involved individuals 21 yrs old or younger. It is suggested that methaqualone can no longer be considered a safe, nonabused sedative.—J. Kelly.

7648. Cocconcelli, C. (Istituto Psichiatrico "S. Lazzaro", Reggio Emilia, Italy) **[The phenomenon of nonalcoholic addiction in the Italian sociocultural environment: Reality and prejudice.]** (Fren) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1390-1399.—Examined cases treated from 1901 to 1970 in an interprovincial neuropsychiatric hospital with outpatient facilities. The period 1961-1970 showed notably different characteristics than other years, especially the use of intoxicants not actually definable as drugs, a lower average user age, and socially-based rather than physically-based reasons for use. In the same period, conditions normally accompanying addiction (as defined by the World Health Organization) were absent. Considering the significance of these findings, and the rootedness of Italian sociocultural values, it is suggested that present repressive attitudes seem greatly out of proportion. (Italian summary)—L. Klinkon.

7649. Coe, John I. (Hennepin County General Hosp, Minneapolis, MN) **Sexual asphyxias.** *Life-Threatening Behavior*, 1974(Fal), Vol 4(3), 171-175.—Some asphyxial deaths in young white males, usually by hanging, are accidents occurring during aberrant sexual activity. The physical aspects and limited psychological knowledge of these cases that distinguish them from suicidal deaths are discussed.—*Journal abstract*.

7650. Colon, P. G. (US Public Health Service, Federal Corrections Inst, San Pedro, CA) **The effects of heroin addiction on teeth.** *Journal of Psychodetic Drugs*, 1974(Jan), Vol 6(1), 57-60.—Describes the impact of heroin addiction on oral health. Heroin withdrawal is related to the occurrence of necrotizing ulcerative gingivitis (trench mouth). The high incidence of dental disease noted in a review of the medical records of 322 addicts is attributed to local environmental factors coupled with systemic effects of heroin, rather than to the drug itself. (16 ref)

7651. De Forest, John W.; Roberts, Thomm K. & Hays, J. Ray. (Texas Research Inst of Mental Sciences, Houston) **Drug abuse: A family affair?** *Journal of Drug Issues*, 1974(Spring), Vol 4(2), 130-134.—Compared the personal and interpersonal behavior patterns of 31

mothers of adolescent patients at a drug abuse clinic with those of a matched group of mothers from non-drug-abuse families. The MMPI and the Interpersonal Check List were used to measure levels of interpersonal behavior assessed by T. Leary's interpersonal system. It was found that the drug abuse mothers were significantly less identified with their mothers than were the control mothers. Significant numbers of drug abuse mothers described their husbands as hostile, critical, and arrogant, and their children as hostile and resentful. It is concluded that members of drug abuse families may be help-rejecting and that mothers can serve as mediators between hostile fathers and children. It is suggested that therapeutic intervention with drug-abusing adolescents must focus on the family as a whole.—J. Kelly.

7652. Deikel, Stuart M. (U California, Los Angeles) **The life and death of Lenny Bruce: A psychological autopsy.** *Life-Threatening Behavior*, 1974(Fal), Vol 4(3), 176-192.—Discusses the life and show-business career of Lenny Bruce to determine whether he deliberately caused his own death by morphine overdose, if there are any significant indices that clarify why death occurred when it did, and the appropriate assignment for the mode of death. Factors involved in Bruce's success as a comedian, his eventual decline, arrests for obscenity, his use of drugs, and various personality characteristics are described. Findings suggest that Bruce's death was a subintentional death of moderate lethality (i.e., one in which the decedent has played an indirect, unconscious role in hastening his death). (27 ref)—L. Gorsey.

7653. Demoulin, Ch.; Donnay-Richelle, J.; Renerte, J. C. & Timsit, M. (U Liège, Belgium) **[Perverse structure and sexual deviations: I. Clinical approach.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Nov), Vol 73(6), 725-746.—Discusses various instances of sexual perversion from a psychoanalytic vantage point. Shifts from neurosis to perversion and from perversion to psychosis have frequently been observed. (English, Dutch, German, Italian & Spanish summaries) (29 ref)—E. Coché

7654. Deusinger, Ingrid M. (Johann Wolfgang Goethe U Frankfurt, Inst of Psychology, W Germany) **[The personality structure of delinquents.]** (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 408-418.—In Test 1, 20 female Ss jailed for criminal offenses were compared with 20 controls jailed for merely asocial offenses (e.g., vagrancy or prostitution). Results of the Rosenzweig Picture Frustration Test showed significant differences between the 2 groups; the 20 Ss tended to avoid questions of guilt, to view the situation as inevitable, and to feel less hope that time and circumstances would solve their problems. In Test 2, 67 male juvenile Ss all jailed for crimes against property were compared with a group of juvenile offenders jailed for miscellaneous crimes. Ss answered the 18 lie-items of the Eysenck-Maudsley Personality Questionnaire. The property crimes group scored significantly higher for tendencies to lie. In Test 3, neuroticism, extraversion, rigidity, dogmatism, and tendency to lie were measured in 127 male and 51 female juvenile jailed offenders and in 218 controls. Jailed offenders were more neurotic and more prone to lie than those not in jail. Neuroticism decreased after prolonged detention. Only female detainees had a significantly



higher rigidity score than nondetainees. (English & French summaries) (17 ref)—*T. Fisher.*

7655. Devaux, C.; Petit, G.; Perol, Y. & Porot, M. (Hôpital Général, Clinique Neurologique et Psychiatrique de la Faculté de Médecine de Clermont-Ferrand, France) [Inquiry into parricide in France.] (Fren) *Annales Médico-Psychologiques*, 1974(Feb), Vol 1(2), 161-168.—Reports the chief statistical and psychopathological features which characterized 62 cases of parricide occurring in France 1958-1967. Parricide most often occurred in the North, in an agricultural population, and among those with a poor scholastic record; it was most often committed by males. Of the parent-slayings, 65% were of father by son, 20% mother by son, and 6% father by daughter. At least half of the families in which parricide took place were of a classically negative type; i.e., a parent missing, or parents tyrannical and physically abusive, utterly indifferent to the child's needs, etc. Roughly 60% of the cases presented a major psychotic syndrome, 20% an epilepsy, and 20% alcoholism. Of the psychotic syndromes, 64% were schizophrenic, 16% delusions of persecution, 8% chronic hallucinated states, 8% were manic-depressive, and 4% delusions of influence. Those not clearly belonging to any of the established categories of mental disease presented the psychotic traits of psychological rigidity, nervous "crises," or affective instability.—*H. E. King.*

7656. Devroye, A. (U Liège, Clinique Psychiatrique, Belgium) [Incest: Bibliographical review.] (Fren) *Acta Psychiatrica Belgica*, 1973(Nov), Vol 73(6), 661-712.—Reviews the literature on incest extensively. Ethnological data documenting the near-universality of the incest taboo are discussed in reference to various unconvincing explanatory hypotheses. Statistical data stemming from many authors concerning the frequency of incest are presented. Incestual relations are viewed from a family systems aspect, as a 3-generational event. The effect of incest on its protagonists, and the therapeutic questions involved are examined in detail. (English, Dutch, German, Italian & Spanish summaries) (2 p ref)—*E. Coché*

7657. Feldstein, Stanley; Chesler, Phyllis & Fink, Max. (U Baltimore) **Psychological differentiation and the response of opiate addicts to pharmacological treatment.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 151-157.—Re-evaluated the internal consistency of the Heroin Addict Questionnaire (HAQ) and examined its relationship to personality dimensions. In a study of 21 male opiate addicts in a city hospital treatment service, it was hypothesized that an inverse relationship would exist between the extent to which addicts claim to use heroin as a "normalizer" and their levels of psychological differentiation. Ss were administered the HAQ, the Embedded Figures Test (EFT), the Breskin Rigidity Test (BRT), and the California F Scale. Results show that the levels of Ss' psychological differentiation as measured by the EFT were unrelated to their scores on the HAQ. However, further investigations of the HAQ are suggested because of its high internal consistency.—*M. E. Pounsel.*

7658. Forbes, C. D.; Prentice, C. R. & Sclaire, A. B. (U Glasgow, Royal Infirmary, Scotland) **Surreptitious ingestion of warfarin.** *British Journal of Psychiatry*,

1974(Sep), Vol 125, 245-247.—Presents the case study of a 27-yr-old male who was treated for complications from the periodic ingestion of 5 mg of warfarin. It is suggested that surreptitious ingestion of anticoagulant drugs represents a form of deliberate disability in which the patient consciously deals with emotionally stressful circumstances by inducing a simulated illness.

7659. Fracchia, John; Sheppard, Charles; Ricca, Elizabeth & Merlis, Sidney. (Central Islip State Hosp, NY) **Interrelations among psychological needs of suburban heroin addicts.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 559-562.—Among the 15 variables assessed by the Edwards Personal Preference Scale (EPPS) for 50 male and 9 female applicants to a suburban methadone maintenance program, the pattern, direction, and magnitudes of correlations between need states were significantly different from those of the EPPS normative sample. The tendency of addicts to associate positively a number of incompatible needs is discussed in terms of its implications for counseling, generating interpersonal conflict, and understanding the addict as an individual.—*Journal abstract.*

7660. Friedman, Richard C.; Friedman, Judith G. & Ramirez, Terry. (El Paso Ctr for Mental Health & Mental Retardation Services, TX) **The heroin overdose as a method of attempted suicide.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 137-143.—Explored the relationship between overdose, depression, and suicide in 103 patients in a methadone maintenance clinic. A survey of Ss revealed that 33 had taken heroin overdoses during their lives, and historical reconstruction of the events showed that most overdoses were covert suicide attempts. Only 12% were accidents due to variability of street samples; 38% of the covert suicide attempts were related to incarceration. It is suggested that jail plays a role in contributing to the etiology of suicidal behavior in addicts. 5 cases are presented illustrating the causes of overdose in this group.—*Journal abstract.*

7661. Grotjahn, Martin. (U Southern California) **The changing view of sexual pathology.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 407-413.—Notes that nowadays individuals are less driven by anxiety and fear in the sexual area, so that sexuality reflects a more or less healthy acceptance of sex in all forms. As a result, new types of sexual pathology are observed, and psychotherapy of sexual disorders is facilitated.

7662. Harper, Mary J. **Courts, doctors, and delinquents: An inquiry into the uses of psychiatry in youth corrections.** *Smith College Studies in Social Work*, 1974(Jun), Vol 44(3), 158-178.—Conducted a follow-up study of the usefulness of psychiatric evaluations and of how psychiatric diagnoses and recommendations, based upon categories of ego functioning, had predicted recidivism among 88 "assaultive boys" in the year after the evaluations. Major findings were that psychiatric evaluations did not appear to be useful in identifying dangerous juveniles or in predicting recidivism. Nonclinical variables were also examined and appeared to be better predictors of assaultive behaviors. Findings point to the need for a psychosocial approach in prediction and treatment.—*M. W. Linn.*

7663. Hollis, W. Slater. (Memphis State U) **On the etiology of criminal homicides: The alcohol factor.**

*Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 50-53.—Attempts to document the extent of alcohol involvement in criminal homicides. For all homicides ( $N = 372$ ) in Memphis, Tennessee, over an 8-yr period the drinking status of the victim and of the offender when possible ( $N = 50$ ) were obtained from police records. 74.7% of the victims had been drinking when they died. Of 50 offenders for whom data were available, 86% had been drinking. The number of homicide victims increased with the victims' level of alcohol consumption. In 7 cases where the blood alcohol levels of both victim and offender could be determined, they were found to have the same level.—R.J. Albers.

7664. Jarvis, George K. & Messinger, Harley B. (U Western Ontario, London, Canada) **Social and economic correlates of juvenile delinquency rates: A Canadian case.** *Canadian Journal of Criminology & Corrections*, 1974(Oct), Vol 16(4), 361-372.—Reanalyzed data from an earlier study of delinquency rates and 38 other variables in London, Ontario. Factor analysis with varimax rotation reaffirmed the relationship between socioeconomic factors and delinquency rates, identifying 4 constellations of variables that accounted for 70% of the variance. (French abstract)

7665. Juliano, Daniel B. (State U New York, Buffalo) **Conceptual tempo, activity, and concept learning in hyperactive and normal children.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 629-634.—Conducted an experiment with 40 hyperactive and 80 normal 8-11 yr old males which examined the relations among activity, conceptual tempo, and diagnostic category on a concept learning and transfer task. Results reveal a small but significant performance decrement by the hyperactive group on the learning task. However, this decrement did not carry over to the transfer task, in which a group difference was not found. Activity and conceptual tempo were related to diagnosis, with the hyperactive group being more active and having a greater percentage classified as impulsive. Nonetheless, activity and conceptual tempo were not related to the performance tasks. Rather than accept a label of "brain damage" as an explanation for the learning problems of hyperactive children, it is suggested that future research might focus on cognitive styles and performance characteristics of hyperactive children. (15 ref)—*Journal abstract*.

7666. Kalish, Richard A.; Reynolds, David K. & Farberow, Norman L. (Graduate Theological Union, Berkeley, CA) **Community attitudes toward suicide.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 301-308.—Studied the effects of age, sex, and education on the views and experiences of 434 adults regarding suicide. Results indicate that (a) over 1/2 of all men and women cited mental illness as the primary reason for suicide, (b) approximately 1 out of 8 Ss displayed little or no sympathy with individuals who threatened suicide but lacked real intent, and (c) half of the younger Ss (20-39 yrs old) and approximately 40% of the other groups (49-59 yrs and 60 yrs and older) recognized that unconsummated threats were either a call for help or were deserving of professional intervention.—M. E. Pounsel.

7667. Kilmann, Peter R. (U South Carolina) **Personality characteristics of female narcotic addicts.** *Psycholog-*

*ical Reports*, 1974(Aug), Vol 35(1, Pt 2), 485-486.—Used the Adjective Check List to compare the personality characteristics of 84 institutionalized female narcotic addicts with those of 176 normal females (mean age = 25 yrs). The addicts checked more adjectives and described themselves as being less defensive, self-controlled, personally adjusted, need-achieving, dominant, enduring, orderly, nurturant, and deferent. They also described themselves as being more unfavorable, labile, heterosexual, exhibitionistic, autonomous, aggressive, succorant, and attracted to novel experiences. Collectively, results indicate the female addict engages in immature social interactions. It is suggested that further research involve a therapeutic approach aimed at the development of meaningful interpersonal relationships.—*Journal abstract*.

7668. Kirchner, John H. & Marzolf, Stanley S. (Wood County Mental Health Clinic, Bowling Green, OH) **Personality of alcoholics as measured by Sixteen Personality Factor Questionnaire and House-Tree-Person color-choice characteristics.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 627-642.—Describes 4 studies of measures of the alcoholic personality by the 16 Personality Factor Questionnaire (16 PF) and the House-Tree-Person (HTP) test. A total of 101 male and 11 female alcoholics were compared to 16 PF normative samples and normal college students studied previously. In a sample of 49 male alcoholics support was found for the 16 PF alcoholic personality reported in earlier studies on 4-7 scales. Differences in incidence of 20 chromatic characteristics of drawings and in sex of the HTP person drawings between normals and alcoholics were also discovered. Previous research on collegiates reported some low but significant point biserial correlations and discriminant functions between 16 PF traits and trait combinations, and 20 chromatic drawing characteristics. In 3 instances, alcoholic and college men's drawing characteristics correlated significantly ( $p < .05$ ) with the same 16 PF scale. In 3 other cases, identical findings occurred in correlations of alcoholic men and college women's drawings and traits. Comparison of the data from alcoholics and college students led to the conclusion that, in general, relationships between drawing characteristics and personality traits may well depend on the type of sample used. (41 ref)—*Journal abstract*.

7669. Knaus, William J. (Inst for Advanced Study in Rational Psychotherapy, New York, NY) **Overcoming procrastination.** *Rational Living*, 1973(Fal), Vol 8(2), 2-7.—Examines procrastination from a rational-emotive perspective. The irrational bases of procrastination, its resistance to change, and ways to overcome the problem are discussed. The procrastinator, a person with delayed self-development and self-maintenance, usually holds 2 irrational beliefs: he views himself as inadequate and the world as too difficult and demanding. Behavioral manifestations of these beliefs are described, and the major mechanisms through which change is resisted. Ways to reduce or minimize the tendency to procrastinate by self-management techniques are presented.—G. J. Frankel.

7670. Lewis, Peter W. & Patterson, David W. (Loyola U, New Orleans) **Acute and chronic effects of the voluntary inhalation of certain commercial volatile**



**solvents by juveniles.** *Journal of Drug Issues*, 1974(Spring), Vol 4(2), 162-175.—Reviews investigations of the physiological and psychological effects of inhalation of toxic solvents by juveniles. Studies indicate that most glue-sniffers are males around 13 yrs old who come from broken homes and who have histories of delinquency. Immediate effects of inhalation of toxic vapors range from acute inebriation to transient psychotic reactions. It is suggested that the pattern of chronic usage of intoxicating solvents resembles addiction to narcotics or alcohol. It is concluded that although the voluntary use of toxic solvents has serious consequences, it is not presently a major social problem among juveniles. (2½ p ref)—J. Kelly.

7671. Mariátegui, Javier. (U Nacional Mayor de San Marcos, Lima, Peru) **[Epidemiological aspects of alcoholism in Latin America.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Apr), Vol 20(2), 86-98.—Reviews epidemiological research on alcoholism in Argentina, Bolivia, Brazil, Costa Rica, Chile, Ecuador, Mexico, Peru, and Uruguay. Overall, these studies show higher alcoholism rates in poor, less well developed areas. The importance of social-anthropological studies on the role of alcohol in cultures undergoing transformations is emphasized. (76 ref)—English summary.

7672. McDougall, Joyce. (Paris Inst of Psychoanalysis, France) **The anonymous spectator: A clinical study of sexual perversion.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 289-310.—Reports a case involving an imaginary voyeur, an unknown other who watched the obsessional acts of the patient. Certain oedipal constellations in sexual perversion are explored by attempting to formulate the basic fantasies to which the oedipal "solution" gives rise and the economic means through which the ensuing ego identity is maintained.

7673. Murphy, H. B. (McGill U, Montreal, Quebec, Canada) **[Planning for an international comparative study of alcohol and alcohol abuse.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Apr), Vol 20(2), 121-131.—Discusses the problems faced by an epidemiologist doing research on alcoholism, mainly the lack of a precise definition of the disease and the unreliability of the sources of information. Several sources of epidemiological information are suggested which may help to obtain comparable and reliable data from several countries: hospital statistics, general medical practitioners, the police, and nonprofessional key informants who, through gossip, may provide information not available from other sources.—English summary.

7674. Negrete, Juan C. **[Cultural factors in epidemiological studies on alcoholism.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Apr), Vol 20(2), 112-120.—Epidemiological research on alcoholism has been hindered by the lack of an adequate definition of the disease; in fact, epidemiological studies of alcoholism are usually nothing but surveys of alcohol consumption. Despite this flaw, research studies have shown that different cultural patterns influence prevalence, occurrence, symptomatology, evolution, and methods of treatment. (24 ref)—English summary.

7675. Nettler, Gwynn. (U Alberta, Edmonton, Canada) **Explaining crime.** New York, NY: McGraw-Hill, 1974. vii, 301 p. \$4.95.—Describes and critiques methods

of research on crime and sociological and sociopsychological explanations of criminal behaviors. Also discussed are ways of unofficially and officially counting crime; some correlates of serious crimes; subcultural, structural, symbolic-interactionist, and control explanations of criminality; possible criminogenic conditions; and the cost of reducing crime. (32 p ref)

7676. Orford, Jim & Hawker, Ann. (Inst of Psychiatry, Addiction Research Unit, London, England) **Note on the ordering of onset of symptoms in alcohol dependence.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 281-288.—Notes that E. M. Jellinek's (1952) proposed phases in the development of alcohol dependence covered a wide diversity of areas. Other researchers have rejected these detailed proposals on the grounds that not all alcoholics experience all symptoms and those that do experience them do not necessarily experience them in the same order. Data from 59 halfway house residents confirm these 2 points. However, a small number of clusters of items were isolated which were reported to occur in characteristic sequence. These were first, the onset of psychological dependence; second, tremor, morning drinking, and amnesia; and, third, aspects of alcoholic psychosis. It is concluded that there is a characteristic ordering of new events and symptoms suggestive of a developmental process in alcoholism, but this ordering is apparent only if attention is confined to a limited part of the broad spectrum of events and symptoms associated with alcoholism. This process is obscured by a consideration of the social concomitants of alcohol dependence.—Journal abstract.

7677. Petrella, Fausto & Barale, Francesco. (U Pavia, Istituto di Clinica Psichiatria, Italy) **[The alcoholic's conjugal relationship.]** (Ital) *Rivista di Psichiatria*, 1974(Mar-Apr), Vol 9(2), 138-158.—Offers a general interpretation of the typical relational pattern of the alcoholic with his wife, based on observation of hospitalized patients and a review of literature. The relationship is described as pregenital sadomasochistic. (29 ref)

7678. Picou, J. Steven; Cosby, Arthur G.; Lemke, James W. & Azuma, Henry T. (Texas A&M U) **Occupational choice and perception of attainment blockage: A study of lower-class delinquent and nondelinquent black males.** *Adolescence*, 1974(Sum), Vol 9(34), 289-298.—Administered a questionnaire to 73 incarcerated and 68 nonincarcerated black male 9th-grade students. Results indicate lower-class black delinquents and nondelinquents desired prestigious occupational placement and were optimistic enough to plan for it. However, they were aware of possible blocks to their occupational success.

7679. Pirnay-Dufresne, Régine. (U Liège, Clinique Psychiatrique, Belgium) **[Incestuous intercourse in a large family.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Nov), Vol 73(6), 713-724.—Presents a case study of an incestuous father-daughter relationship in a family of 8 children. (English, Dutch, German, Italian & Spanish summaries)

7680. Rahwan, Ralf G. (Ohio State U, Coll of Pharmacy) **Speculations on the biochemical pharmacology of ethanol.** *Life Sciences*, 1974(Aug), Vol 16(4), 617-633.—Reviews experimental studies in animals and

man which have investigated the pharmacological, toxicological, and pathological effects of ethanol and alcohol consumption, and discusses proposed models for an etiology of alcohol addiction. (63 ref)

7681. Retka, Robert L. & Chatham, Lois R. (National Inst of Mental Health, Div of Narcotic Addiction & Drug Abuse, Bethesda, MD) **The addict personality.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 15-20.—Discusses the historical context of opiate drug addiction in the US. The results of opium addiction studies done in 1877-1920 are reviewed and the role of the Harrison Narcotic Act in changing the ecology of addiction is cited. The social context of addiction is stressed, and the existence of a single addict-personality type is disputed. The changing nature of addiction is considered a greater threat than its size, and the need is noted to match the diversity of addicts with an equally diverse range of treatment and prevention modes.—R. Tomasko.

7682. Rutstein, Eleanor H. & Goldberger, Leo. (Private practice, New York, NY) **The effects of aggressive stimulation on suicidal patients: An experimental study of the psychoanalytic theory of suicide.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 157-174.—Presented aggressive and neutral stimuli subliminally and supraliminally to 64 female hospitalized psychiatric patients, 32 of whom had made serious suicide attempts. The Multiple Affect Adjective Checklist (MAACL) and the Rorschach Test were used to measure hostility, depression, anxiety, and aggression before and after stimuli viewing. It was found that suicidal Ss showed significantly more depression (as measured by the MAACL) following subliminal aggressive stimuli than following neutral stimuli. Supraliminal presentation of aggressive stimuli was followed by a decrease in depression and an increase in outward aggression in suicidal Ss. It is concluded that aggressive drives result in pathological adaptations such as depression and self-destruction only when the suicidal patient is not consciously aware of their presence. (1½ p ref)—J. Kelly.

7683. Schmideberg, M. **Treatment of an acting-out suicidal girl addicted to phenobarbital.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 196-197.—Describes the behavior of a 20-yr-old woman who was treated for various psychiatric disorders.

7684. Sims, Mary. (Addiction Research Foundation, Toronto, Ontario, Canada) **Sex and age differences in suicide rates in a Canadian province: With particular reference to suicides by means of poison.** *Life-Threatening Behavior*, 1974(Fal), Vol 4(3), 139-159.—Reports data on changes in age and sex suicide rates and methods for a 20-yr period. Rate increases from the earliest base have occurred in all age-sex groups. The proportion of poison suicides has increased greatly beginning in 1960 for women, and in 1965 for men. Adults aged 30 and over account for most of the increase in ingested poisons; death by carbon monoxide also occurs with increasing frequency among all males, as do violent suicides in males under 30. Accidental poisonings follow a similar pattern. In view of increasing alcohol consumption, risks of concomitant alcohol-drug use are discussed,

as are certain protective features for women inherent in their disproportionately high use of medically prescribed drugs. (33 ref)—*Journal abstract*.

7685. Sours, John A. (Columbia U, Psychoanalytic Clinic for Training & Research) **Physical, mental, and therapeutic aspects of anorexia nervosa.** *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 419-439.—Discusses treatment of the patient with anorexia nervosa, based on the current physical status of the patient, the degree of regression, and the level of resistance apparent at that time. The primary and secondary signs of the illness are described as well as 3 of the most common types of patients in whom the primary anorexia nervosa syndrome is found. The disease's history, incidence, physical symptoms, and physiological concomitants are cited. A case is presented against the 2 extremes of treatment, the medical and the outpatient approach, and suggestions are made for tailoring the treatment to the patient. (39 ref)—R. S. Albin.

7686. Susman, Jackwell (Ed.). (American U) **Crime and justice: 1971-1972.** New York, NY: AMS Press, 1974. 491 p. \$15.—Presents a collection of 37 discussion and review papers on aspects of American crime and the judicial system's response to it to illustrate changing concepts of criminal justice within the social order. Topics include identity, personality, and role in crime; organizational and situational factors affecting crime; and community influences and social values in crime.

7687. US Dept of Justice. (Washington, DC) **Crimes and victims: A report on the Dayton-San Jose pilot survey of victimization.** Washington, DC: Dept of Justice, Law Enforcement Assistance Administration, 1974. vii, 191 p.—Tested survey methods and instruments in Dayton, Ohio and San Jose, California as a part of an effort by the President's Commission on Law Enforcement and Criminal Justice to measure the extent of common theft and assaultive violence in the US. Information was collected on rape, robbery, assault, burglary, and larceny. (19 ref)

7688. Varma, S. C. **Socio-cultural factors in problems of children.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 25-27.—Describes the cultural differences between American and Indian students (6-16 yrs old) in India, and suggests their relevancy to major differences in common behavior problems between the 2 groups.

7689. Wen, Chi-Pang. (Michigan State U, Coll of Human Medicine, Office of Health Services Education & Research) **Secular suicidal trend in postwar Japan and Taiwan: An examination of hypotheses.** *International Journal of Social Psychiatry*, 1974(Spring-Summer), Vol 20(1-2), 8-17.—Marked increases in suicide among young adults (ages 15-24) occurred in Japan in the late 1950s and in Taiwan in the early 1960s. In peak years, suicide caused over half of all deaths in this age group. 2-3 yrs after the peak in each country, the rate rapidly declined. Social factors commonly related to suicide are examined as possible causes, but all fail to explain the historical timing or age-specificity of the suicide waves. It is hypothesized that stress caused by World War II in Japan (1942-1945) and the massive immigration of refugees from mainland China into Taiwan (1948-1951) strongly affected children and predisposed them to



suicide as young adults, 13 yrs later. (28 ref)—*W. R. Street.*

7690. Whiskin, Frederick E. Treating depressed offenders in the court clinic. *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 136-142.—Reviews literature on and presents case histories of offenders to support the thesis that certain offenders express a depressive core of their personalities through their antisocial acting out. (15 ref)

7691. Wold, Carl I. & Tabachnick, Norman. (U Southern California) Depression as an indicator of lethality in suicidal patients. In R. J. Friedman & M. M. Katz (Eds), *The psychology of depression: Contemporary theory and research*. New York, NY: John Wiley & Sons, 1974. xvii, 318 p. \$15.

### Learning Disorders & Mental Retardation

7692. Abrams, Stanley & Weinstein, Edwin. (Permanente Clinic, Portland, OR) The validity of the polygraph with retardates. *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 11-14.—Tested the assumption that retardates cannot be evaluated on the polygraph. 4 groups of retardates of 4 each, with different levels of retardation, were examined with the polygraph by 2 operators. 7 Ss with IQ of 65 or higher could be evaluated, but in the 2 groups with IQ below 65 either the Ss were untestable or the results were meaningless. Despite the artificial test situation and small number of Ss, results are believed to be generalizable.—*R. J. Albers.*

7693. Allen, Gordon. (NIMH, Bethesda, MD) Aetiology of Down's syndrome inferred by Waardenburg in 1932. *Nature*, 1974(Aug), Vol 250(5465), 436-437.—Cites an early suggestion by a Dutch ophthalmologist that mongolism may be the result of a chromosomal deficiency brought about by "non-disjunction" or by "chromosomal duplication."

7694. Blakey, R. S. (U Aberdeen, Scotland) Moral judgments in subnormal adults and normal children. *British Journal of Mental Subnormality*, 1973(Dec), Vol 19(37, Pt 2), 85-90.—Investigated 5 aspects of Piaget's definition of moral judgment in 20 retarded adults (mean mental age = 6 yrs, mean chronological age 26 yrs) and 20 normal children (mean chronological age = 6 yrs). Ss' responses to a group of stories were coded and scored, and median scores were not significantly different between the groups or between males and females. It is concluded that retardates show similar levels of moral judgment to normal children.—*C. Wright.*

7695. Buschke, Herman & Fuld, Paula A. (Albert Einstein Coll of Medicine, Yeshiva U) Evaluating storage, retention, and retrieval in disordered memory and learning. *Neurology*, 1974(Nov), Vol 24(11), 1019-1025.—Describes 2 methods (selective reminding and restricted reminding) that are clinically useful for analyzing impaired memory and learning. These methods provide simultaneous analysis of storage, retention, and retrieval during verbal learning because they allow the patient to show learning by spontaneous retrieval without confounding by continual presentation. The method also allows patients to distinguish list learning from item learning, so that impaired memory

and learning can be analyzed further in terms of 2 stages of learning—item and list. (15 ref)—*Journal abstract.*

7696. Cook, J. W. (School Psychological Service, Guildford, England) Dyslexia: A critical comment. *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 51-60.—Discusses some of the reasons for the controversy surrounding the concept of dyslexia. A clear distinction between the medical and educational aspects of the problem is required. Although it may be medically meaningful to search for a special disease entity called "developmental dyslexia," educationally it makes more sense to treat the symptoms of poor progress in reading, without worrying greatly about which of the causative factors in primary. (42 ref)—*I. L. Zimmerman.*

7697. Dittmann, Werner. [The incidence of children with Down's syndrome in state schools for mentally retarded trainable classes.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 144-149.—Investigated the incidence of mongoloid children in the 602 state schools for the mentally retarded (trainable classes) in the West German Federal Republic. 21% of all children in these schools suffered from Down's syndrome; 53% were girls and 47% boys. (50 ref)

7698. Durfee, Kent E. (Scottsdale Psychiatric Ctr, AZ) Crooked ears and the bad boy syndrome: Asymmetry as an indicator of minimal brain dysfunction. *Bulletin of the Menninger Clinic*, 1974(Jul), Vol 38(4), 305-316.—The author cites his 1965 study of 275 children classified as mental retardates, learning disabled, delinquent, etc. Among these Ss asymmetry of the ears ranged from 67.8% to 96.2% ( $p = .005$ ). In the current study of 22 Ss, including some adults, significant asymmetry of the ears was likewise found ( $p = .009$ ). It is suggested that the described technique of measuring asymmetry may be a method of screening for the possible existence of congenital central nervous system defects.

7699. Eggert, Dietrich. (Pädagogische Hochschule Niedersachsen, Hannover, W Germany) [A comparative study on the social competence of trainable mentally retarded children and non-retarded children with the Vineland Social Maturity Scale.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 139-144.—A short German version of the Vineland Social Maturity Scale was tried out on 728 trainable mentally retarded children 7-12 yrs old and on 446 nonretarded children 2-6 yrs old. Psychometric data on reliability and validity were gathered, showing a relatively high usefulness of the scale even for nonretarded children. Problems of the relevance of the concept of social maturity as a classificational device for mental retardation, and the use of intelligence and psychomotor tests, are discussed. Although a 3-dimensional diagnosis (intelligence, motor, social competence) creates more possibilities for therapeutic procedures, it is concluded that the concept of social competence needs further elaboration to become a useful part of a multidimensional diagnostic and therapeutic system for classifying and treating mental retardation. (27 ref)—*Journal summary.*

7700. Fällström, K. & Aronson, M. [The effect of early psychological training of mentally retarded children.] (Swed) *Nordisk Psykiatrisk Tidsskrift*, 1972, Vol 26(8).

467-473.—Matched 2 groups of mongoloid children with respect to age (16-69 mo) and sex (2 boys and 6 girls in each group). One group received the following types of training: (a) sensory functions (exposure to musical instruments, tactile stimuli, and games involving color and form discrimination); (b) bodily needs (table manners, toilet training, etc); (c) intellectual functions (jigsaw puzzles, verbal games); (d) motorics: gross (e.g., climbing stairs), and fine (e.g., sewing); (e) memory (of location of toys); (f) control of aggressive behavior; (g) social functions (setting a table, serving food); (h) attention. The Ss were trained twice a week for an unspecified period of time; no details on teaching methods are offered. All were tested 4 times with Griffiths Mental Development Scales, 0-8 years. The trained children showed significantly greater increments in mental age (mean = 10.5 mo) than the matched controls (mean = 3.5 mo). Training improved performance on all subscales.—R. G. Wikmark.

7701. Johnson, Janet M. & Zinner, Carol C. (Ohio State U, Faculty for Exceptional Children) **Stimulus fading and schedule learning in generalizing and maintaining behaviors.** *Journal of Music Therapy*, 1974(Sum), Vol 11(2), 84-96.—Attempted to determine whether experimentally verified conditions for generalization and maintenance could be applied in a music therapy clinic. The Ss were 2 retarded boys at a state hospital and training center. A music preference test (Cotter and Toombs, 1966) was given to each. Both Ss preferred music to white or ambient noise, and both selected children's music and rock-and-roll music. Initial therapy goals were achieved: (a) to increase accuracy of color discriminations, and (b) to increase on-task behaviors, defined as proximity to the task and absence of vocalizations. Results demonstrate that the amount of therapist time and attention required to establish desired behaviors could be gradually decreased if specific plans for maintaining behaviors were applied.—F. O. Triggs.

7702. Kaplan, Bonnie J. **Malnutrition and mental deficiency.** In F. Rebelsky & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Reviews data on the interaction of malnutrition and mental deficiency. It is stated that although a causal connection has not been directly demonstrated in human Ss, the research contains compelling evidence that early malnutrition is a contributing factor in the incidence of mental deficiency. The physiology of malnutrition is examined. (3½ p ref)

7703. Kornmann, Reimer; Hils, Ursula; Riemer, Christa & Wäckerle, Rudolf. (Pädagogische Hochschule Heidelberg, Abteilung Lernbehindertenpädagogik, W Germany) **[Comparison of some validity criteria of the Hand-Dominanz-Test of Steingrüber and Lienert and the Leistungs-Dominanz-Test of Schilling for normal pupils and slow learners.]** (Germ) *Diagnostica*, 1974, Vol 20(3), 129-132.—Compared the retest reliabilities with an 8-wk interval of 2 measures of the degree of superiority of the dominant hand. The Hand-Dominanz-Test (HDT) by H.-J. Steingrüber and G. A. Lienert (1971) and the Leistungs-Dominanz-Test (LDT) by F. Schilling (1973) were administered to 24 slow learners 8-10 yrs old and to a matched group of normals. For the HDT the retest

reliabilities were .64 and .65 for the slow and normal groups; for the LDT they were .80 and .84.—M. Morf.

7704. Lambert, Jean-Luc. (U Liège, Belgium) **[Mental retardation and re-education: The behaviorist approach.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(1), 53-80.—Examines the application of operant conditioning techniques to the modification of the behavior of mental retardates in terms of self-help skills and social skills. Examples of research are given, including problems of body management, self-feeding, toilet training, social behaviors, the elimination of undesirable behaviors, and speech development. Research methods used in these studies are described. It is concluded that the development of behavioral techniques is required in Belgium. (French & English summaries) (47 ref)—*Journal summary*.

7705. Magerotte, G. (U Catholique Louvain, Ctr de Psychopathologie de l'Enfant et d'Orthopédagogie, Belgium) **[Scientific information in the area of mental retardation.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(1), 81-87.—Lists national and international organizations, specialized bibliographies, and the principal journals in English, French, and Dutch that deal with mental retardation.

7706. Magerotte, G. (U Catholique Louvain, Unite de Recherche en Pédiopsychiatrie, Belgium) **[Important aspects in the evaluation of mental handicaps: Intelligence and adaptive behavior.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(1), 3-7.—Attempts to broaden and delineate the concept of mental retardation. It cannot be reduced to an intellectual deficit alone; we must also take into account adaptive behavior and how its limits are laid down by society. Practical considerations about the measurement of intelligence and adaptive behavior and about prognosis are discussed. (French & English summaries) (42 ref)—*Journal summary*.

7707. Matsuda, Michihiko & Matsuda, Fumiko. (Chiba U, Japan) **[The effects of verbal reinforcement combinations on three-alternative discrimination learning in normal and mentally retarded children.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Mar), Vol 22(1), 40-44.—6 groups of 108 2nd graders and 6 groups of mentally retarded children (mean mental age 8½ yrs) performed 3-alternative discrimination and shift learning tasks of 2 dimensions, color and form, under 3 types of verbal reinforcement combinations. RW, RN, and NW. The mentally retarded NW group showed significant inefficiency in the original learning ( $p < .05$ ). No significant differences of the verbal reinforcement combinations were found between groups in the shift learning. Results indicate that mentally retarded children had more difficulty in using the information of W in the 3-alternative tasks than in 2-alternative tasks. —S. Choe.

7708. Metzler, Roberta K. (Augsburg Coll) **The use of music as a reinforcer to increase imitative behavior in severely and profoundly retarded female residents.** *Journal of Music Therapy*, 1974(Sum), Vol 11(2), 97-110.—Attempted to measure the influence of music as a reinforcer to increase imitative behavior in profoundly retarded female residents. The Ss, 30 retarded adults from a residential treatment center, were divided randomly into 3 groups: Group K had no music. Group



L had continuous music, and Group M had music as a reinforcer. Each S was tested individually for 18 trials of 10 min each. The 18 trials were divided into 2 conditions. Analysis of variance determined that there was no significant difference in each of the 18 trials. A trend analysis of variance, applied to both conditions for all 3 groups, showed no significant difference which could be attributed to the variable of music. There was no significant difference in the means of the 3 groups or in the interaction of groups times trials. Thus the variable of music as a reinforcer did not increase imitative behavior in the Ss studied, nor did it influence discriminatory behavior.—F. O. Triggs.

7709. Nissen, G. (Städtische Klinik für Kinder- und Jugendpsychiatrie Wiesengrund in Berlin-West, W Germany) [Play disturbances at pre-school age as precursors to learning difficulties of children and adolescents.] (Germ) *Acta Paedopsychiatrica*, 1974, Vol 40(6), 214-220.—Suggests that play disturbances in childhood are as frequent as learning disorders in children and adolescents, but are rarely diagnosed; skill in developmental psychology is needed to recognize them. As age-specific symptoms they depend on the basic neurosis structure, with a diversity of significance. Untreated, they undergo sequential symptom change in the course of subsequent mental development. Narrow pathogenic relations exist between play disturbances and family constellation. The play disturbances of 50 children showed a genesis influenced by early emotional frustration, professional employment of both parents, extreme indulgence and/or psychosomatic parental disease. Therapy must be both symptom focused and syndrome oriented. Only thus can mental maldevelopment be favorably influenced and age- or development-specific symptom change (learning or achievement disorders) be prevented.—G. Rubin-Rabson.

7710. Saito, Shigeru. [Facilitative effect of syntactical mediation on paired-associate learning by mentally retarded children.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 233-236.—Gave paired-associate learning tasks to 3 groups of 30 mentally retarded children. Syntactical mediations, one in the form of sentences, the other in the form of required compositions, were given to 2 experimental groups. The effects of these 2 levels of verbal mediations were compared with the effect of simple stimulus-response associative learning undertaken by the control group. Results indicate a significant effect of syntactical mediations on paired-associate learning ( $p < .01$ ).—S. Choe.

7711. Schachter, M. (Comite de l'Enfance Deficiente de Marseille, France) [Long-term psychological and social prognosis in cases of mongolian retardation followed for more than 10 years.] (Fren) *Annales Médico-Psychologiques*, 1974(Feb), Vol 1(2), 195-224.—Re-examines the unresolved problems of social adjustment presented by mongoloid children, and underscores the growing importance of this problem as a consequence of their improved survival rate over the past 30 yrs. 7 individual cases are reported of mongolian children placed in a setting that was optimal from a combined medical, familial, and pedagogic viewpoint. Their development is traced over a 10-yr period,

including adolescence and (for some) young adulthood. Contrary to the findings reported by some optimistic writers, the social and economic development of these children was minimal, despite optimal conditions for growth. Although they can learn more than was realized formerly, which grants them a degree of independence in everyday life, they were found, without exception, to be dependent for the rest on the guidance and protection provided by their parents and by society.—H. E. King.

7712. Skeels, Harold M. Adult status of children with contrasting early life experiences: A follow-up study. In F. Reber & L. Dorn (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Presents 21-yr follow-up data on the outcome of 13 mentally retarded children in the "Iowa studies" who experienced early intervention (experimental group) compared to 12 children who experienced a relatively nonstimulating environment. Experimental Ss showed a marked increase in rate of mental growth, whereas the comparison group showed progressive mental retardation. (20 ref)

7713. Spring, Carl & Capps, Carolyn. (U California, Davis) Encoding speed, rehearsal, and probed recall of dyslexic boys. *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 780-786.—Describes a model attributing poor recall to slow speech-motor encoding. The following results, predicted from the model, were obtained with 24 poor readers of normal intelligence and 24 normal readers from ages 7 to 13: (a) Poor readers named visually presented, nonword stimuli more slowly than normal readers; (b) fewer poor readers than normal readers employed a cumulative rehearsal strategy during a probed-recall task; (c) the use of cumulative rehearsal was significantly related to naming speed; (d) the performance of poor readers was inferior to that of normal readers for all but the most recently presented items of the probe-recall task; and (e) naming speed and use of cumulative rehearsal accounted for 91% of the true variance of early and middle serial positions of the probed recall task.—*Journal abstract*.

7714. Umetani, Tadao. (Tokyo U of Education, Japan) [A study of discrimination reversal-shift learning in mentally retarded children: Investigation by reaction time.] (Japn) *Japanese Journal of Educational Psychology*, 1973(Dec), Vol 21(4), 248-253.—21 mentally retarded and 21 normal children, all of mental age (MA) 6-8, performed discrimination reversal shift learning tasks consisting of 2 dimensions and 2 values. The number of trials and the simple reaction time (RT) for 4 successive reversal shifts were observed and analyzed. Results show that the number of trials decreased with the increase of MA for the normal children but not for the retarded; that the number increased for the retarded with the repetition of reversal shift, whereas the number decreased for the normal S; and that the RT was shorter and the response pattern was uniform for the retarded children in the original learning.—S. Choe.

7715. Vellutino, Frank R.; Pruzek, Robert M.; Steger, Joseph A. & Meshoulam, Uriel. (State U New York, Child Research & Study Ctr, Albany) Immediate visual recall in poor and normal readers as a function of orthographic-linguistic familiarity. *Cortex*, 1973(Dec), Vol 9(4), 370-386.—Tested the hypothesis that the

visual-perceptual skills of poor readers are comparable to those of normal readers; specifically, that poor and normal readers would encounter similar difficulties when presented with an unfamiliar orthography, and greater difficulties than normal readers who were becoming acquainted with the graphic and linguistic components of that orthography. Employing a task requiring visual recall of Hebrew words, the performances of 2 non-Hebrew groups (poor and normal readers) were compared with one another and with the performance of normal readers learning Hebrew. Response variables consisted of total number correct, as well as omission, orientation, sequencing, and substitution errors. It was expected that the performance of the 2 non-Hebrew groups would be comparable on all measures but that both groups would be inferior to the Hebrew group. The prediction was supported for total number correct, as well as for omission and orientation errors, but there were no reliable differences among the groups on the sequencing and substitution measures. Results provide additional evidence that visual-spatial deficit is an unlikely cause of reading disability and indirectly support the notion that the disorder is attributable to dysfunction in visual-verbal integration.—*R. Gunter.*

7716. **Wheldall, Kevin & Jeffree, Dorothy.** (U Birmingham, School of Education, England) **Criticisms: Regarding the use of the E.P.V.T. in subnormality research.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 140-143.—Argues against the common practice of estimating mental age on the basis of a score on a test of a specific ability, usually receptive vocabulary. It is shown how a relatively high vocabulary age may be achieved on the English Picture Vocabulary Test by subnormal children. The danger of using this as a mental age estimate is stressed, especially in subnormality research where a mental age matching paradigm is employed using normal and subnormal children.—*Journal abstract.*

### Speech Disorders

7717. **Burgraff, Roger I.** (US Air Force Hosp. RAF Lakenheath, England) **The efficacy of systematic desensitization via imagery as a therapeutic technique with stutterers.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 134-139.—Examined the short-term effects of systematic desensitization via imagery on the severity of stuttering in a group of 9 19-51 yr old adult stutterers. These effects were compared with those obtained through the use of a traditional symptomatic therapy approach with another group of 9 adult stutterers. The 2 groups of stutterers were matched for stuttering severity. Within the short time span of this study, both groups attained significant improvement using numbers of blocks and block duration ratios as measures of severity. There were no significant differences of improvement between the 2 groups. There was also a lack of correspondence between the severity of stuttering and the level of speech anxiety in various situations. (21 ref)—*Journal abstract.*

7718. **Conn, Philip.** (U Manchester, Hester Adrian Research Ctr, England) **The interrelations of alternatives in symbolic representation.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 92-101.

—Presents a schematic attempt to synthesize a heterogeneity of therapeutic methods by specifying them in terms of a common framework of defining criteria. After characterizing a concept of "code," (regarded as more generic than the term "language," the defining criteria of the framework), speech and commonly used alternatives to speech are classified in terms of the framework. The relevance of the framework to remediation is noted, and further therapeutic alternatives are delineated.—*Journal abstract.*

7719. **Michel, Donald E. & May, Nancy H.** (Florida State U) **The development of music therapy procedures with speech and language disorders.** *Journal of Music Therapy*, 1974(Sum), Vol 11(2), 74-80.—Discusses work since 1958 at Florida State University concerning the relationships between music therapy and speech therapy, resulting in a number of research studies and reports. A review of pertinent studies indicates that accumulated experience with the use of music therapy in speech and language disorders has produced a gradual refinement of procedures and evaluation. Support is growing for the idea that music therapy is not only an additional modality adjunctive to speech pathology, but that it has unique contributions to make, both independently and in interdisciplinary ways.—*F. O. Triggs.*

7720. **Prins, David & Nichols, Anne.** (U Washington) **Client impressions of the effectiveness of stuttering therapy: A comparison of two programs.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 123-133.—A total of 32 11-15 yr olds in residential and nonresidential stuttering therapy used a questionnaire to evaluate the effects of the 2 programs. Results show impressions of significantly greater improvement in speech fluency following residential therapy. Speech data support the questionnaire findings in terms of the magnitude of stuttering severity change in pre- vs posttherapy recordings. Results are related to differences in the pretherapy stuttering frequency of Ss and the nature of the 2 programs. Ss' impressions following the nonresidential program were that its primary effects were related to improvement in morale. Possibilities for altering this program to increase its effectiveness upon speech fluency are suggested. (17 ref)—*Journal abstract.*

7721. **Tudor, Carole & Selley, Wilfred G.** (U Exeter, Inst of Biometry & Community Medicine, England) **A palatal training appliance and a visual aid for use in the treatment of hypernasal speech: A preliminary report.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 117-122.

7722. **Wynter, Helen.** (Central School of Speech & Drama, London, England) **An investigation into the analysis and terminology of voice quality and its correlation with the assessment reliability of speech therapists.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 102-109.—Presents a brief account of a pilot study conducted in an attempt to discover which factors of voice quality were most likely in the opinion of speech therapists to require treatment, and the extent to which therapists agreed among themselves. 25 raters (16 qualified therapists and 9 3rd-yr students) were asked to assess tape recordings in terms of nasality, pitch deviation, hoarseness, breathiness, and stridency. Each aspect of voice quality was correlated to ascertain



whether or not it was significantly related to therapy and certain aspects were intercorrelated to discover the degree of variance or agreement between raters. It was found that stridency, hoarseness, and breathiness were significantly correlated with the need for treatment by raters, and that raters were more reliable in judging pitch than nasality.—*Journal abstract.*

### Physical & Toxic Disorders

7723. **Altshuler, Kenneth Z.** (New York State Psychiatric Inst, New York) **The social and psychological development of the deaf child: Problems, their treatment and prevention.** *American Annals of the Deaf*, 1974(Aug), Vol 119(4), 365-376.—Traces the pathways involved in normal development and how they may be interfered with by the absence of audition and by family responses in the case of a deaf child. Behavioral problems, problems of family, difficulties of motivation vs capacity that may eventuate, and the occasional more severe gradations of illness are discussed. Based on normal developmental tracks, preventive suggestions are offered which can aid in the healthy development of the deaf child. (37 ref)—*Journal abstract.*

7724. **Andersen, Marcia D. & Pleticha, Jane M.** (Schoolcraft Community Coll, Livonia, MI) **Emergency unit patients' perceptions of stressful life events.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 378-383.—Studied perceptions of recent stressful life events of 52 emergency unit patients (mean age = 34 yrs). The readjustment required by the stressful events was measured using the Social Readjustment Rating Scale. Patients' total readjustment magnitude score was extensive and significantly related to their perception of the severity of their medical problems. However, readjustment magnitude score was not related to their physicians' perception of the severity of their medical problem. When the relationship between specific stressful life events and specific symptomatology and diagnoses was examined, the readjustment magnitude score was found to be negligible. It is concluded that health professionals should routinely assess their patients' degree of readjustment to recent life changes and examine illness from this perspective.—*Journal abstract.*

7725. **Baker, Harry J.** **Famous persons who have been handicapped: A critical analysis.** In B. C. Ring & D. R. Schrader (Eds), *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.—Examines how various writers, musicians, inventors, educators, and scientists have overcome physical handicaps. Characteristics of the "will power" needed to overcome and compensate for deficiencies are discussed.

7726. **Bonfils, S. & de M'Uzan, M.** (B. Hôpital Bichat, Unité de Recherches de Gastroenterologie, Paris, France) **Irritable bowel syndrome vs ulcerative colitis: Psychofunctional disturbance vs psychosomatic disease?** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 291-296.—Questions the correctness of an exclusive etiology for the irritable bowel syndrome and ulcerative colitis, pointing out that the psychosomatic factors are integrated in a pathophysiological chain at

completely different neuropsychological maturation levels for the 2 diseases.

7727. **Borg, E. & Zakrisson, J.-E.** (Karolinska Inst, Stockholm, Sweden) **Stapedius reflex and monaural masking.** *Acta Oto-Laryngologica*, 1974(Sep-Oct), Vol 78(3-4), 155-161.—Performed experiments with 32 control university students to determine some normal features of the stapedius reflex, and with 20 Ss with unilateral peripheral facial palsy. The masking produced by narrow-band, low-frequency noise was measured in 3 Ss with total unilateral stapedius paralysis. The 3 Ss had normal hearing up to 8 kHz. Hearing thresholds were traced with pulsating tone of fixed frequency in the range 1-8 kHz. Masking was produced by .5 kHz continuous noise (.3-kHz bandwidth) in the intensity range 85-120 db sound pressure level. Measurements were obtained both from the ear with stapedius paralysis and from the ear with normal stapedius reflex, during the acute stage of the paralysis and after recovery. Below reflex threshold, masking was equal in both ears. Above reflex threshold it was consistently greater in the ear with stapedius paralysis. The difference was greatest at 6 and 8 kHz and reached about 50 db. After recovery masking was equal in both ears. It was shown that the antimasking effect of the stapedius reflex could be completely explained by its attenuation of the low-frequency masking noise. It is concluded that the stapedius reflex has an important influence on hearing at high frequencies by decreasing the masking produced by low-frequency sound. (German summary)—*Journal abstract.*

7728. **Bruhn, John G.; Paredes, Alfonso; Adsett, C. Alexander & Wolf, Stewart.** (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Psychological predictors of sudden death in myocardial infarction.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 187-191.—Studied 67 Ss with a myocardial infarction and 67 healthy controls. Psychological, sociological, physical, X-ray, and laboratory data were gathered at intervals for 7 yrs. On the basis of psychiatric interviews, 11 of 27 deaths were correctly predicted; on behavior pattern A, 7 of 18; and on a depression scale, 4 of 18 were correctly predicted. (24 ref)—*W. G. Shipman.*

7729. **Burnett, Loring L. & Struve, Frederick A.** (Kings Park State Hosp, NY) **The value of EEG study in minimal brain dysfunction.** *Journal of Clinical Psychology*, 1974(Oct), Vol 30(4), 489-495.—Presents a general discussion of the concept of minimal brain dysfunction (MBD) and explores the conflicting views on the EEG's diagnostic value in this condition. Several reasons for a negative evaluation are offered, and a positive position is explicated. The values and limitations of EEG findings for diagnosis, prognosis, and follow-up study of MBD individuals are described. It is suggested that in practical clinical approaches to MBD children the EEG provides only one of several useful procedures. (91 ref)—*Journal summary.*

7730. **Carlomagno, S. et al.** (U degli Studi di Napoli, Facoltà di Medicina e Chirurgia, Italy) **[Sanfilippo's disease: Genetic, clinical and biological study of two families.]** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 231-251.—The disease was suspected in a 6-yr-old girl and an 11-yr-old boy in 2 different families because of evidence of an autosomic recessive disorder, symp-

toms of progressive mental disorder, symmetrically hyperactive deep tendon reflexes, dwarfism, and radiologically evident bony abnormalities. The diagnosis was confirmed by quantitative and qualitative analysis of mucopolysaccharides that demonstrated an abnormal amount of urinary excretion.—*M. Stanford.*

7731. Cravioto, Joaquin; Hambræus, Leif & Vahlquist, Bo (Eds.). **Early malnutrition and mental development.** Uppsala, Sweden: Almqvist & Wiksell, 1974. 87 p. —Presents a collection of 21 empirical and discussion papers on the physiological, sociological, and psychological effects of malnutrition on prenatal and early child development which were presented at an international symposium held in Sweden in 1973. 2 additional papers on methodologies in studies of malnutrition and mental development which were presented at a World Health Organization workshop are included.

7732. de-Nour, A. Kaplan & Czaczkes, J. W. **Bias in assessment of patients on chronic dialysis.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 217-221. —7 nephrologists followed the condition of 96 patients in their units during hemodialysis for 3 yrs. Ss were globally assessed twice by the nephrologists and a 3rd time by the authors on whether they were doing well in complying with the diet, in rehabilitation, and in emotional condition. Compared to the authors' assessments, 5 of the nephrologists overestimated their patients' adjustment through the use of denial. There seemed to be a tendency for more denial in units where the patients were doing less well. It is suggested that the patients do less well because of the physicians' denial. —*W. G. Shipman.*

7733. Dikmen, Sureyya & Reitan, Ralph M. (U Wisconsin, Madison) **Minnesota Multiphasic Personality Inventory correlates of dysphasic language disturbances.** *Journal of Abnormal Psychology*, 1974(Dec), Vol 83(6), 675-679. —Compared the MMPI performances of 15 male dysphasic brain-damaged adults with the performances of 15 matched control brain-damaged Ss without specific language impairment. A significant overall difference on the 9 clinical scales combined was shown by multivariate analysis, with higher scores obtained by dysphasic Ss. Further univariate analysis showed significantly higher scores on the *Pd* and *Sc* scales. Results are discussed in terms of (a) evidence for a closer relation between MMPI variables and behavioral measures than between MMPI variables and neurological measures of lesion laterality, and (b) the interpretive limitations implied by uncritical transference of MMPI findings based on psychiatric patients and normals to patients with central nervous system lesions. The need for validation studies investigating social behavior correlates of MMPI results in brain-damaged samples is emphasized. (18 ref)—*Journal abstract.*

7734. Duchowny, Michael S.; Weiss, Ira P.; Majlessi, Heshmatolah & Barnett, Ann B. (Children's Hosp Ctr, Boston, MA) **Visual evoked responses in childhood cortical blindness after head trauma and meningitis: A longitudinal study of six cases.** *Neurology*, 1974(Oct), Vol 24(10), 933-940. —6 children with cortical blindness following head trauma or meningitis had visual evoked response (VER) studies initially performed shortly after the onset of blindness. On long-term follow-up examina-

tion, 3 Ss had evidence of visual deficit and 5 exhibited varying degrees of psychomotor retardation. Initial and follow-up VERs were analyzed and correlated with changes in visual and clinical status. Results suggest that change in sort latency VER components correlates with visual ability, whereas change in longer latency VER components correlates with level of psychomotor function. (20 ref)—*Journal abstract.*

7735. Evans, Kathleen; Hickman, Veronica & Carter, C. O. (MRC Clinical Genetics Unit, Inst of Child Health, London) **Handicap and social status of adults with spina bifida cystica.** *British Journal of Preventive & Social Medicine*, 1974(May), Vol 28(2), 85-92. —Describes the present physical handicaps and social status of 202 adult survivors of spina bifida cystica. 93 of the patients, mostly with uncomplicated meningocele, were living normal lives. However, 109 had a serious disability, including 3 who were mentally retarded. Data on employment, marriage, and reproduction of survivors are presented.

7736. Freedman, David A. (Baylor Medical Coll, Houston, TX) **On hearing, oral language, and psychic structure.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 57-69. —Reviews studies on the effects of some organismic factors (e.g., normal development of sight and hearing vs blindness or deafness) and related environmental factors (e.g., amount of mothering and sensory stimulation) on the development of personality, behavior, and cognitive processes. The high rate of an autistic-like syndrome among congenitally blind children appears to be due to sensory deprivation in the period of infancy during which differentiation of self and non-self occurs. By the time the use of speech and hearing becomes critical, deaf children have developed adequate ego structures to deal with the frustrations resulting from their deficiencies. It is suggested that although spoken language is an important instrument of communication and conceptual development, normal hearing and speech are not significant factors in the early phases of ego development. (2 p ref)—*J. Kelly.*

7737. Gainotti, G.; Caltagirone, C. & Carecchi, S. (U Cattolica del Sacro Cuore, Medical School, Milan, Italy) **[A case of pure alexia with color anomia.]** (Ital) *Archivio di Psicologia Neurologia e Psichiatria*, 1974(Apr-Jun), Vol 35(2), 144-163. —Presents a case study of the onset of "pure" alexia associated with right homonymous homianopia and color anomia following a transient left hemisphere ischemia. The patient presented no evidence of aphasia and no disturbance of writing, but he showed a clear literal alexia, and could read only by using his finger to trace the outline of each letter. Furthermore, he was completely unable to name and to select colors but he could match them for brightness and saturation. Findings are discussed from the viewpoint of "visual agnosia" and "visual-verbal disconnection."—*L. L'Abate.*

7738. Gelsz, D. & Steinhäusen, H.-Ch. (Universitätskinderklinik, Hamburg, E Germany) **[On the "psychological development of children with hydrocephalus.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 113-118. —Compared test battery scores of 35 hydrocephalic grade school boys and girls with scores of a normal control



group, and investigated the role of age of 1st neurosurgery, time between 1st clinical manifestation and neurosurgery, and number of surgical revisions. Hydrocephalics were inferior on intelligence and motor tasks. Age at surgery, and time lapse between 1st clinical manifestation and surgery, were negatively correlated with scores on intelligence tests, on following orders, and on motor tasks. The number of surgical revisions did not reveal such correlations. Specific test profile analysis of the hydrocephalics showed fewest defects in vocabulary and most defects in motor tasks. Test data are compared with respect to developmental aspects. (22 ref)—*H. A. Euler.*

7739. **Green, Walter B.** (Ithaca Coll) **The development of semantic differential scales for deaf children.** *American Annals of the Deaf*, 1974(Aug), Vol 119(4), 361-364.—Used a modified word association task to elicit a pool of 360 modifiers from 90 residential students from a state-supported school for the deaf. Results indicate that the modifiers commonly used by hearing children were also common in the language behavior of the deaf Ss.

7740. **Guazzi, G. C.; Ghetti, B.; Barbieri, F. & Cecio, A.** (U Napoli, Italy) **Myoclonus epilepsy with cherry-red spot in adult: A peculiar form of mucopolysaccharidosis. A clinical, genetic, chemical and ultrastructural study.** *Acta Neurologica*, 1973(Sep-Oct), Vol 28(5), 542-549.—Presents the case of a 28-yr-old female of Mediterranean origin, with blood-related parents, who had suffered from these symptoms since age 21. The histochemical, ultrastructural, and biochemical results and the urinary pattern of mucopolysaccharides suggest a particular form of mucopolysaccharidosis which could not be linked with any known disease or with any reported case. (18 ref)—*M. J. Stanford.*

7741. **Guilleminault, Christian; Wilson, Richard A. & Dement, William C.** (Stanford U, Medical School, Sleep Disorders Clinic & Lab) **A study on cataplexy.** *Archives of Neurology*, 1974(Oct), Vol 31(4), 255-261.—Observed cataplexy, an abrupt and reversible paralysis, in 50 REM sleep narcoleptics. The attacks lasted from a very few seconds to as long as 30 min. During attacks, the EEG remained similar to the normal baseline awake EEG recorded previously in each patient; however, there were short periods where REM sleep could not be eliminated. Electromyographic tracings recorded an abrupt drop of muscle tone during attacks, but the numbers of muscles involved varied from one attack to another. Normal jerk reflexes could not be elicited, and H-reflex, systematically studied in 5 patients, was abolished. An exceptional patient with "status cataplecticus" with more than 30 daily cataplectic attacks was given levodopa, levohydroxytryptophan, and atropine sulfate intravenously in separate trials with no beneficial effect. Intravenously administered clomipramine hydrochloride suppressed the attacks dramatically. (37 ref)—*Journal abstract.*

7742. **Gutezeit, Günter & Mai, Peter.** (Universitätskinderklinik, Kiel, W Germany) **[Tachistoscopic investigations concerning the grasping and estimating of amounts with mildly brain-injured children.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 130-139.—Tested theories which assume that brain-injured children with dyscalcul-

lia differ from children without brain injury in quantity estimation, especially under changed figure-ground relations, and in more frequent task perseveration. 40 mildly brain-injured children 7-10 yrs old were tested tachistoscopically on quantity estimation and motor tasks and compared to 38 control children without brain injuries but of comparable low intelligence. The brain-injured Ss performed more poorly in grasping and estimating amounts. Only the younger brain-injured Ss did significantly worse than the controls under changed figure-ground relations, and no difference in perseveration was found. Differences were observed, however, in gross motor coordination. The importance of remedial training and the possibility of integration into normal grade school classes are pointed out. (30 ref)—*H. A. Euler.*

7743. **Hagberg, Bo.** (U Hosp, Lund, Sweden) **A prospective study of patients in chronic hemodialysis: III. Predictive value of intelligence, cognitive deficit and ego defence structures in rehabilitation.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 151-160.—Administered psychological tests to 23 patients with chronic renal failure before hemodialysis began, to determine their primary intellectual level, signs of organicity, and dominant personality characteristics in terms of defense mechanisms. 21 of the 23 were tested 6 mo after dialysis and 16 were again tested after 12 mo. The patient group as a whole showed an average and constant intellectual level during the treatment period. Better intellectual level, fewer signs of organicity, and a more flexible defense structure were prognostically favorable but only within the 1st 6 mo of treatment. At both follow-ups, signs of isolation were a negative prognostic factor. (26 ref)—*W. G. Shipman.*

7744. **Hanne, B. & Gutezeit, G.** (Universitäts-Kinderklinik, Kiel, E Germany) **[Factor analysis concerning the solving behavior of risk children.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 119-125.—Assigned 82 "risk-children," born 1964, to the following groups on the basis of their scores on the Goettinger Form Reproduktions Test: no brain damage, definite brain damage, and possible brain damage. All Ss were tested on the WISC. Their solving steps were recorded on the subtests Picture Arrangement, Block Design, and Object Assembly. Results were factor analyzed which gave a different number of dimensions for each group. A psychological interpretation could not be given in every case, despite rotation. The factor structure of the group with definite brain damage was the least differentiated. In the other 2 groups the Block Design solving factor was the most important. It is argued that these subtests are valuable in the diagnosis of brain damage. (23 ref)—*H. A. Euler.*

7745. **Irvine, Elizabeth E.** **The risks of the register: Or the management of expectation.** In E. J. Anthony & C. Koupornik (Eds), *The child in his family: Children at psychiatric risk: III.* New York, NY: John Wiley & Sons, 1974. xxi, 547 p.—Emphasizes the need for increased interaction between the parents of the handicapped child and professionals in order to aid healthy personality development in both the child and others in his environment.

7746. Jeffrey, D. Balfour. (Emory U) **Some methodological issues in research on obesity.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 623-626.—Notes that results of numerous behavior-modification, weight-reduction studies have clearly demonstrated that obesity can be controlled. It is suggested that it is time to move beyond the demonstration stage and to begin studying the problems of obese patient dropouts, standardized improvement measures, long-term maintenance, cost-effectiveness analysis, research strategies, the development of behavioral predictors, and an analysis of both successes and failures. (16 ref)—*Journal abstract*.

7747. Johnstone, Eve C.; Allan, J. G.; Geraghty, B. P. & Russell, R. I. (U Glasgow, Scotland) **Psychiatric disturbance and postvagotomy diarrhoea.** *Journal of Psychosomatic Research*, 1974(Jun), Vol 18(3), 205-208.—The Standardized Psychiatric Interview, a self-rating scale, and the Middlesex Hospital Questionnaire were administered to 28 patients who had a vagotomy, 14 of whom then had diarrhea. The 2 groups did not differ in psychiatric abnormality.

7748. Kopyreninova, N. G. (Orenburg Pedagogical Inst, USSR) **[Formation of topographic images in the blind.]** (Russ) *Defektologiya*, 1972, No 4, 45-49.—Studied the conditions needed to form topographic images in 2 groups of blind Ss, 6 adults 21-45 yrs old and 6 children 12-16 yrs old. Ss were asked to remember 2 paths of approximately equal difficulty. After being introduced to a path by 1 of 2 methods—transversing it independently by following a sound or being led along it by a guide—S gave a verbal description of the path, sketched it, and attempted to walk it by himself. Then the 2nd path was introduced using the other method and the S's ability to remember it was tested. For adults either method established a precise image. For children only the method of independent movement following a sound proved effective. Results suggest that blind children should be trained to move about independently to help them overcome the habit of relying on a seeing guide.—E. C. Koffman.

7749. Korshunova, L. V. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) **[Spelling disturbances in deaf children who lost their hearing after the inception of speech.]** (Russ) *Defektologiya*, 1972, No 4, 41-45.—Discusses the results of observations of spelling in 1st- to 4th-grade deaf children who lost their hearing between the ages of 3 and 6 yrs, after they had begun to speak. Instances of strictly phonetic spelling of words by these Ss lead to the conclusion that even 5 and more years after the loss of hearing, deaf children can retain in memory clear auditory representations. Factors which might influence the clarity of this "inner hearing" are enumerated.—E. C. Koffman.

7750. Kristianson, Per. (U Uppsala, Sweden) **The personality in psychomotor epilepsy compared with the explosive and aggressive personality.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 221-229.—Discusses the problems of differentiating between the alcoholic personality and that of certain epileptics. The MMPI profile of a subgroup of psychomotor epileptics with bitemporal independent EEG spike foci was compared with the MMPI profile of a patient with explosive aggressivity caused by chronic alcoholism. Results show that the

profile for the alcoholic patient was characterized by the values of the MMPI Depression and Hypomania scales. However, the reactions suggested by these scale values in the profile of psychomotor epileptics may only be regarded as partial symptoms of the complete adhesiveness syndrome. The main part of the syndrome with paranoid and perseverative symptoms, along with the tendency to schizoadaptive reactions, was not characteristic of the alcoholic patients. Results suggest that the MMPI offers a means differentiating between the explosive aggressivity caused by chronic alcoholism and some defined personality changes in one important form of psychomotor epilepsy. (26 ref)—*Journal summary*.

7751. Lagos, Jorge C. (Children's Memorial Hosp, Oklahoma City, OK) **Seizures, epilepsy, and your child: A handbook for parents, teachers, and epileptics of all ages.** New York, NY: Harper & Row, 1974. xi, 238 p. \$7.95.—Presents a guide, in a question-and-answer format, to the nature, origins, diagnosis, treatment, and management of epilepsy. Topics include the relationship between epilepsy and mental retardation, the epileptic child and society, and behavioral and psychological problems in children with epilepsy.

7752. Lazarus, Gary M. **A clinical application of the visual evoked potential in the diagnosis of ophthalmic and neuro-ophthalmic pathology—organic and functional lesions: IV.** *Journal of the American Optometric Association*, 1974(Aug), Vol 45(9), 1056-1063.—Discusses the use of the clinical EEG in the diagnosis of organic and functional ophthalmic lesions. A review of relevant literature shows positive findings for visual evoked potentials in cases of color deficiency, retinitis pigmentosa, cerebral palsy, glaucoma, optic atrophy, pre- and post-chiasmal lesions, and amblyopia ex anopis. (92 ref)

7753. Lhermitte, François; Lecours, André R.; Ducarne, Blanche & Escourolle, Raymond. (Salpêtrière Hosp, Neurology & Neuropsychology Service, Paris, France) **Unexpected anatomical findings in a case of fluent jargon aphasia.** *Cortex*, 1973(Dec), Vol 9(4), 436-449.—Fluent-euathric-meaningless linguistic segments witnessing a tendency to paragrammatism and non-fluent-dysarthric-meaningful linguistic segments witnessing a tendency to agrammatism were observed to coexist in the oral linguistic productions of a right-handed cerebrovascular accident patient with severe "Wernicke's aphasia." Extensive bilateral cortico-subcortical infarcts were found at autopsy: among other structures, Broca's area and Wernicke's area proper, together with their interconnecting fibres of the arcuate bundle, were almost completely destroyed; there was little involvement of the left supramarginal gyrus and complete sparing of the left angular gyrus; the striatum, pallidum, and thalamus were bilaterally uninvolved. It is suggested that motor control in the production of fluent-euathric-meaningless jargon was assumed by the spared subcortical gray and that only the 115:non-fluent-dysarthric-meaningful productions constituted a direct expression of the destruction of Broca's area.—R. Gunter.

7754. Lubovskii, V. I. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) **[Higher nervous activity and psychological characteristics of children**



with a delay in development.] (Russ) *Defektologiya*, 1972, No 4, 10-16.—Summarizes the author's experiments on the motor conditioning of children with minimal brain damage and other studies of their cognitive functioning. 30 children showing delayed development were compared with normal and mentally retarded children on such conditioning phenomena as (a) the speed of establishing a simple conditioned response (CR); (b) the stability of a CR; (c) the effect of extraneous stimuli on a CR; and (d) the S's verbal account of the establishment of a CR, stimulus generalization, and stimulus differentiation. Other studies were concerned with such tasks as incidental learning, mediated memorization, and the classification of objects. However, children with delayed development form a heterogeneous group, and not every child manifests all the characteristics described.—E. C. Koffman.

7755. Machemer, Peter. [The problem of diagnosing mild brain injuries of early childhood in children.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 125-129.—Critiques high occurrence of diagnosis of mild brain injuries of early childhood. 3 assumptions implicit in these diagnoses—(a) delineation of a clearly circumscribed symptom complex, (b) diagnosis as uncovering causes of symptoms, and (c) indication of specific treatments from the diagnostic classification—are critically scrutinized and rejected. It is argued that diagnosis is legitimate only if specific treatments can be made available. (32 ref)—H. A. Euler.

7756. Mencher, George T.; Clack, T. Dean & Rupp, Ralph R. (Children's Hosp. Hearing & Speech Clinic, Halifax, Nova Scotia, Canada) **Decruitment and the growth of loudness in the ears of brain-damaged adults.** *Cortex*, 1973(Dec), Vol 9(4), 335-345.—Investigated "decruitment," the inability of patients with temporal lobe damage to perform the Alternate Binaural Loudness Balancing (ABLB) and to satisfactorily balance tones of equal intensity. Poor performance has been attributed to an abnormally slow growth of loudness in the ear contralateral to the lesion, but findings of this study indicate that decruitment is actually the inability to integrate and relate auditory tasks presented dichotically.

7757. Modestin, J. (Psychiatrische Universitätsklinik, Bern, Switzerland) [On the pathogenesis of delirious states.] (Germ) *Confinia Psychiatrica*, 1974, Vol 17(1), 42-52.—It is suggested that the delirious, toxic-confusional states occasionally observed during administration of various psychotropic drugs are essentially atropine-like psychoses induced by an anticholinergic component of the drugs mentioned. On the other hand, an enhancement of the central sympathetic tonus as an expression of central vegetative imbalance is considered as a possible explanation for the development of delirious states due to the withdrawal of alcohol and/or drugs. Both hypotheses were tested. On a single-blind basis the parasympathomimetic agent physostigmine was administered intravenously to 15 delirious patients. Delirious states observed during therapy with various psychotropic drugs reversed, and delirious states due to withdrawal of alcohol and/or drugs were not influenced by physostigmine, the difference between the 2 groups being statistically significant. Thus, the 1st hypothesis

was confirmed, the 2nd was not. It is evident that the same psychopathological syndrome develops not only for various etiological reasons but also on the basis of various pathogenetical mechanisms.—*Journal abstract.*

7758. Money, John. (Johns Hopkins U Hosp) **Turner's syndrome and parietal lobe functions.** *Cortex*, 1973(Dec), Vol 9(4), 387-393.—Reports that many girls with Turner's syndrome (irrespective of sex-chromatin type) exhibit a degree of space-form dysgnosia, directional-sense dysgnosia, and mild numerical disability that suggests a developmental parietal lobe anomaly. It is presumably related to the chromosomal defect basic to the syndrome, perhaps by way of a fetal neurohormonal mechanism that might affect space perception as it pertains to the sex-related mechanism of territorial behavior. A contrary developmental deficit has been identified in mildly retarded boys.—R. Gunter.

7759. Morreale, V.; Gargano, M. A. & Rallo, G. (U Catania, Facoltà di Medicina e Chirurgia, Italy) **Atypical West's syndrome: Illustration of a clinical case.** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 264-274.—The syndrome is described in a girl 3 yrs and 10 mo old exhibiting symptoms of encephalopathy and epilepsy which can be included in this syndrome. This case, with symptoms referable to various clinical syndromes, poses the question of whether it is valid to delineate these forms of infantile epileptic encephalopathy rigidly in different nosological pictures. It is suggested that the forms be included in one classification. (23 ref)—M. Stanford.

7760. Nielsen, Johannes & Tsuboi, Takayuki. (Arhus State Hosp, Cytogenetic Lab, Risskov, Denmark) **Electroencephalographic examination in the XYY syndrome and in Klinefelter's syndrome.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 236-237.—Made EEG studies of 25 males with the XYY syndrome and 59 with Klinefelter's syndrome. Abnormal EEG was found in 32% of the XYY syndrome Ss and in 19% of Ss with Klinefelter's syndrome; 4 males showed specific EEG abnormalities. None of the XYY syndrome Ss had suffered from epilepsy. 3 Klinefelter syndrome Ss had suffered from epilepsy, and 6 had suffered from conversional hysterical fits.

7761. Pavlovský, P. & Pokorná, P. (U Karlova, Výzkumná psychiatrická laboratoř, Prague, Czechoslovakia) **Anxiety and fear as symptoms of burns.** (Czech) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 32-34.—Reviews literature on emotional problems of persons who suffered burns. The incidence of anxiety and phobic fear in 250 patients hospitalized with burns and examined psychiatrically is reported. Results show that although such symptoms occur relatively often, they are not typical manifestations of the burns but are secondary complications with specific etiology. They are due either to traumatic experiences during the injury, concomitant injury to the central nervous system (e.g., postconcussional syndrome), or premorbid inadequate and psychopathic personality. Several illustrative clinical cases are briefly presented. (Russian & English summaries)—V. Fischmann.

7762. Pontius, Anneliese A. (New York U, Medical School) **Basis for a neurological test of frontal lobe system functioning up to adolescence: A form analysis**

of action expressed in narratives. *Adolescence*, 1974(Sum), Vol 9(34), 221-232.—354 stories told by 137 2-4 yr olds, previously published by E. J. Pitcher and E. Prelinger (1963), were reanalyzed for the form of action, rather than content. Developmental phases were identified which parallel those revealed in actual behavior during these years, when there exists a specific gross inability to switch the principle of action of an ongoing activity, particularly on verbal command. This inability is associated with the known neuro-anatomical immaturity of the frontal lobe system. It is theorized that an analogous parallel development exists through adolescence and the early twenties. Therefore, the more subtle dysfunctioning that may occur at this later age could also be studied by analyzing narratives.—A. Krichev.

7763. Pujol Doménech, J. & Ferrer Raldúa, J. (Clínica Psiquiátrica Universitaria, Hospital Clínico y Provincial, Barcelona, Spain) [A case of pseudo paraphrenic psychosis in the course of the development of a terminal renal deficiency.] (Span) *Revista de Psiquiatria y Psicología Médica*, 1973(Oct), Vol 11(4), 261-268.

7764. Pyeryeslyani, L. I. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) [Characteristics of attention in children with a delay in development.] (Russ) *Defektologiya*, 1972, No 4, 23-28.—Studied attention in children with a delay in development (minimal brain damage) by measuring the latency periods of their motor reactions to tactile stimuli under various distracting conditions. Vibrators were strapped to the wrists of 15 Ss with a delay in development, 12 mildly retarded Ss, and 16 normals. Each S had to respond as quickly as possible with the hand being stimulated while simultaneously hearing noise, music, or a story. Children with a delay in development had a longer mean reaction time (RT) than did the normals, and the variability of their RT was greater. RT did not change as a function of type of distracting sound for normals, but children with a delay in development were hampered more by the simultaneous presentation of a story than by the other distractors. It is concluded that children with a delay in development have deficits in speed of processing information and in ability to concentrate attention. The use of RT as a diagnostic tool is discussed.—E. C. Koffman.

7765. Rassidakis, N. C. et al. (U Athens, Greece) **Schizophrenia, psychosomatic illnesses, diabetes mellitus and malignant neoplasms.** *International Mental Health Research Newsletter*, 1974(Spr), Vol 16(1), 1, 12.—Studied the relationship between diabetes mellitus and schizophrenia, psychosomatic illnesses, and cancer in an attempt to validate previous research indicating that diabetes mellitus belongs on the psychosomatic illness continuum. Ss were 306 cancer patients and 324 schizophrenics randomly selected from admissions to 3 hospitals in Athens, Greece, and 300 control Ss representing the statistical incidence of diabetes mellitus, cancer, schizophrenia, and the psychosomatic illnesses in the general Greek population in 1972. Chi-square analysis found (a) cancer patients were significantly ( $p < .001$ ) less attacked by diabetes mellitus or psychosomatic illnesses than the general population and (b) schizophrenics were significantly ( $p < .001$ ) less diagnosed as having diabetes mellitus, cancer, or psychoso-

matic illnesses than the general population. The findings offer support for including diabetes mellitus on the psychosomatic continuum. Further discussion elucidates and challenges contrary findings, and suggests the utilization of projective techniques to study the personality structure of diabetic patients.—C. A. Heikkinen.

7766. Robinson, David. (Inst of Psychiatry, Addiction Research Unit, London, England) **Becoming ill.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 277-281.—Discusses 2 questions involved in becoming ill: (a) How do people define particular illness conditions? (b) How do they come to occupy the social position of sick person or patient? The social situation is important in both questions. People acquire a body of knowledge about their illness which is likely to include some kind of classification of episodes, evaluation of the nature and significance of common symptoms, and predictions relating to the probable outcome of illnesses and their usual handling.—W. G. Shipman.

7767. Rockson, Stanley; Stone, Richard; Van der Weyden, Martin & Kelley, William N. (Duke U, Medical Ctr) **Lesch-Nyhan syndrome: Evidence for abnormal adrenergic function.** *Science*, 1974(Dec), Vol 186(4167), 934-935.—Studied 10 children, from 18 mo to 16 yrs old, with the Lesch-Nyhan syndrome. 6 patients with the severe form of this X-linked disorder had a virtually complete deficiency of the enzyme hypoxanthine-guanine phosphoribosyltransferase (HGPRT), characterized by mental retardation, spasticity, and self-mutilation. They exhibited an apparently unique pattern of adrenergic dysfunction characterized by elevated plasma dopamine  $\beta$ hydroxylase activity and an absence of pressor response to acute sympathetic stimulation. Patients with a partial deficiency of HGPRT without self-mutilation did not exhibit these abnormalities of adrenergic function. (29 ref)—*Journal abstract*.

7768. Rodgers, Beckett; Ferholt, Julian & Cooper, Carol L. (Yale U, School of Nursing, Pediatric Nursing Program) **A screening tool to detect psychosocial adjustment of children with cystic fibrosis.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 420-426.—Describes a tool to assess psychosocial adjustment of school-age children with cystic fibrosis which uses 3 instruments: a standardized open-ended parent interview, a self-administered teacher questionnaire, and a self-administered parent demographic data form. The 3 instruments enabled the pediatric nurse practitioner to make a clinical assessment of the child's psychosocial adjustment. This assessment was checked for validity by means of a social worker interview, and tested on 20 6-12 yr old children, their parents, and their teachers. Findings show that the standardized semistructured interview with the parent was the best method of screening the child's psychosocial adjustment. (15 ref)—*Journal abstract*.

7769. Sander, Elisabeth. (Paedagogische Hochschule Rheinland, Aachen, Fed Rep Germany) **[A comparative study of the visual perception of handicapped and normal children.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(May-Jun), Vol 23(4), 149-157.—Compared 4 groups of handicapped children: 40 cerebral palsied, 40 physically disabled but not brain-injured, 40 minimally brain-injured but not physically disabled, and 40 in a special school for children with



learning disabilities. All were between 7 and 10 yrs old, with IQs between 70 and 90. The groups were also compared with a group of 40 normal but younger children, whose average mental age was the same as the average chronological age of the handicapped children. All Ss were given 4 tests of visual perception, a test of simultaneous number perception, and an arithmetic test. The normal Ss performed better than the disabled ones in nearly all the tests, and the cerebrally palsied children performed worst. It is argued that disabled children with the same characteristics as the described experimental groups, especially palsied children, need more intensive visual perceptual training than younger normal children. (26 ref)—*Journal summary*.

7770. Schacht, Joachim. [The psychology of skin diseases.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974, Vol 22(1), 67-85.—Presents 4 case studies to illustrate the relation between a person and the skin diseases that he may experience. Allergies may in great part be conversion symptoms. The anthropological ambiguity of the skin makes it an excellent organ to portray unconscious conflicts, particularly the ambivalent emotions associated with earlier disturbances in communication with the mother. (English summary)—S. D. Babcock.

7771. Schnaper, Nathan et al. Management of the dying patient and his family. New York, NY: MSS Information Corp, 1974. 198 p. \$15.—Presents a collection of 19 previously published articles on the psychological management of the terminally ill patient and the effects of his death on family members. Topics include the concerns of the dying patient, nursing problems of the terminally ill, the physician's moral obligations to his patient, and the care of the seriously ill or dying child.

7772. Shoshin, P. B. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) [Recognition of simple visual stimuli by children with a delay in psychological development.] (Russ) *Defektologiya*, 1972, No 4, 35-40.—Studied recognition thresholds for simple visual stimuli in 19 children with a delay in development (minimal brain damage), 23 mildly retarded children, 20 normal children, and 10 adults. Child Ss were 9-11 yrs old. Stimuli, 1-6 dots, were presented tachistoscopically. Thresholds for normal children were similar to those for adults; thresholds for children with a delay in development were even higher. With unsymmetrically arranged stimuli having more than 4 elements, under conditions of increasing exposure, 20 mentally retarded Ss showed "split" thresholds. They began by responding correctly on almost 100% of the trials, but with further increases in exposure the number of errors rose sharply until much longer presentation times were employed. This did not occur in any normals and in only 3 children with a delay in development. The significance of these results for the differential diagnosis of children with a delay in development and for their education is discussed.—E. C. Koffman.

7773. Solomon, George F.; Amkraut, Alfred A. & Kasper, Phyllis. Immunity, emotions and stress. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine*,

Amsterdam, 1973: *Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7774. Suetsugu, Motohiro & Mitsuyama, Yoshio. (Kyushu U. Faculty of Medicine, Fukuoka, Japan) [Two autopsy cases of olivo-ponto-cerebellar atrophy.] (Japn) *Kyushu Neuro-psychiatry*, 1972(Dec), Vol 18(3-4), 176-182.—Case 1 was a 56-yr-old coal miner, who had developed slowly progressive gait, speech, and coordination disturbances, rigidity, and dysuria, and died about 4 yrs after onset of the illness. Neuropathological examination revealed severe neuronal loss of the pontine nuclei and the inferior olivary nuclei with demyelination and gliosis of the cerebellopontine fibers. In addition, degeneration in the substantia nigra and the striatum was observed as "associated lesion." Case 2 was a 62-yr-old single woman who had suffered from gait disturbance, parkinsonism, and both incontinence and orthostatic hypotension with loss of consciousness. She died in status epilepticus 3 yrs after onset of the symptoms. Neuropathological findings were similar to those of Case 1, except that no lesions in the substantia nigra and striatum were observed. The spinal cord was not examined. Results indicate that olivopontocerebellar atrophy is associated with both striato-nigral degeneration and Shy-Drager syndrome. (English summary)—S. Ashida.

7775. Teshima, Hideki; Inoue, Sadahisa; Ago, Yukihiko & Ikemi, Yujiro. (Kyushu U, Fukuoka City, Japan) Plasmic activity and emotional stress. In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine*, Amsterdam, 1973: *Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7776. Toulaitos, John & Lindholm, Byron W. (Auburn U) Influence of parental expectancies and responsiveness on achievement motivation of minimally brain-injured and normal children. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 395-400.—16 families with minimally brain-injured children and 16 families with normal children were matched on a number of characteristics. It was found that the 2 groups differed with regard to mothers' expectancies for achievement, fathers' rewards for success and punishment for failure, and children's need for achievement. Moreover, parents had a significant influence on their children's achievement motivation but patterns of relationships were not the same for the 2 groups.—*Journal abstract*.

7777. Tourkow, Lawrence P. Psychic consequences of loss and replacement of body parts. *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 170-181.—Discusses reports presented at the 1973 annual meeting of the American Psychoanalytic Association. These dealt with blind infants and their mothers; the psychoanalytic view of cardiac transplantation and of renal hemodialysis and transplantation; and the psychological reactions in congenital amputations.

7778. Tridenti, A.; Ragionieri, M.; Rigamonti, P. P. & de Risio, C. [Investigation into the personality of patients with gastric and duodenal ulcer by means of Rorschach and Rosenzweig tests.] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1400-1428.—Examined 30 male and 2 female 21-47 yr old patients at the Institute

of Surgical Pathology, University of Parma, for duodenal or gastric ulcers. Anamneses showed in many cases a preoccupation with economic problems and a possible negative position with regard to the father. The Rosenzweig Picture-Frustration Study showed tendencies toward affective coercion, ambition beyond capacities, self-affirmation/renunciation ambivalence, intrapunitive, and impunitivity. The Rorschach showed coercion, extratensivity, insufficient affective maturity, low degree of resources especially in comparison with ambitions, and "shock" at the 4th chart. (French & English summaries) (34 ref)—*L. Klinkon*.

7779. Weinstein, Edwin A. (Mt Sinai Medical School, City U New York) **Sexual disturbances after brain injury.** *Medical Aspects of Human Sexuality*, 1974(Oct), Vol 8(10), 10-31.—Describes different sexual disorders and behavior patterns that occur after specific types of brain injury. In some patients libido may be diminished, while in others it is increased. The most conspicuous disturbances of sexual behavior usually appear after lesions of the limbic system. Changes in sexual behavior in brain-damaged patients are often abnormal by reason of the circumstances in which they occur, rather than through their intrinsic nature. Electroconvulsive shock therapy can also cause changes in sexual behavior. The relationship between the premorbid personality of the patient, habitual modes of coping with stress, and channels of social relations after injury are examined.—*L. Gorsey*.

7780. Wiegel-Crump, Carole & Koenigsknecht, Roy A. (Northwestern U, Speech & Language Clinics) **Tapping the lexical store of the adult aphasic: Analysis of the improvement made in word retrieval skills.** *Cortex*, 1973(Dec), Vol 9(4), 411-418.—Drilled 4 aphasics who had obvious word-finding difficulties in 18 therapy sessions on 20 of 40 words that each patient had failed to retrieve on a pretherapy confrontation naming test. No work was done with the other 20 words. After each 6 sessions, Ss were retested on the 20 drilled and 20 nondrilled words. Though there was some inter-S variability, all showed essentially the same pattern of improvement: they increased their ability to retrieve words on which they had been drilled, and they also responded correctly and with reduced latency to the nondrilled items. Improvement was noted also on nondrilled items outside the superordinate categories from which drill words were selected. Data support the argument that in amnesic aphasia there is no reduction in the lexical store itself, but rather an impairment of the ability to retrieve bits of information from the store. Therapy is viewed as a mechanism for improving the general retrieval process, not merely as a setting for teaching vocabulary via rote memorization.—*R. Gunter*.

7781. Yegorova, T. V. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) **[Characteristics of memory in children with a delay in development.]** (Russ) *Defektologiya*, 1972, No 4, 16-23.—Studied memorization in 60 9- to 10-yr-old Ss, of whom 40 attended 1st- or 2nd-grade classes for children with a delay in development and 20 attended ordinary 2nd- or 3rd-grade classes. Ss had 5 trials on each of 2 equally difficult lists. When learning List 1, the groups did not differ statistically in the number of items reproduced on

Trial 1, but the normals did significantly better on Trial 5. Analyzing items reproduced into those reproduced on a previous trial and those reproduced for the 1st time led to the conclusion that children with a delay in development are impaired in retaining "old" information. Comparing performance on Lists 1 and 2, 35% of the normals showed an improvement, 10% a decrement; 12.5% of the children with a delay in development showed an improvement, 37.5% a decrement. Analysis of items reproduced when examples of the same concept were grouped together in recall led to the conclusion that fatigue in children with a delay in development hindered their using this rational strategy.—*E. C. Koffman*.

7782. Zharyenkova, G. I. (USSR Academy of Pedagogical Sciences, Inst of Defectology, Moscow) **[Performance of children with a delay in psychological development on tasks which include visual models and verbal instruction.]** (Russ) *Defektologiya*, 1972, No 4, 29-35.—Studied the performance of 20 1st and 2nd graders with a delay in psychological development (minimal brain damage) on 3 groups of tasks: (a) A visual model was presented which displayed all information necessary to perform the task; (b) A visual model was present which displayed some of the information necessary to perform the task, with verbal instructions supplementing the model; (c) All instructions were verbal. 20 mentally retarded and 20 normal 1st and 2nd graders also participated. Unlike the normal Ss, Ss with a delay in development (a) made an abundance of spontaneously corrected errors, (b) did not improve their performance over trials, and (c) had difficulty in fulfilling several requirements simultaneously. The greatest differences between the 3 groups appeared on tasks with only verbal instructions. While the normal Ss made practically no errors, Ss with a delay in development had difficulties in completing the tasks and the mentally retarded children were unable to complete them.—*E. C. Koffman*.

## TREATMENT AND PREVENTION

7783. ———. **[The 13th Kyushu Association of Neuropsychiatry Conference: 1971. Toward new treatments for schizophrenia: Symposium.]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Apr), Vol 18(1), 7-25.—The main topics discussed were (a) new drug treatments, (b) dynamic psychiatry, (c) behavior therapy, and (d) new ways to involve the patient's family.

7784. Aring, Charles D. (U Cincinnati, Medical School) **The Gheel experience: Eternal spirit of the chainless mind.** *JAMA: Journal of the American Medical Association*, 1974(Nov), Vol 230(7), 998-1001.—Describes the care offered to the mentally ill in Gheel, Belgium. The emphasis placed on community participation in the care-giving process is discussed, along with the history of Gheel, patient classification procedures, types of personalized care, and the general facilitative atmosphere considered to be almost perfect for the rehabilitation of the mentally ill.

7785. Badosa-Gallart, Juan. (Hosp del Sagrado Corazón, Barcelona, Spain) **[Encopresis.]** (Span) *Revista de Psiquiatría y Psicología Médica*, 1974(Jan-Mar), Vol



11(5), 321-330.—Describes treatment of various types of anal incontinence.

7786. **Burton, Lindy (Ed.).** (Queen's U Belfast, Northern Island) **Care of the child facing death.** London, England: Routledge & Kegan Paul, 1974. xi, 225 p. \$15.50.—Presents a collection of 17 papers which discuss the general problem of the dying child and suggest ways of helping both the child and his family. Specific topics include problems facing parents and children following diagnosis, observations of parents and children facing repeated child mortality, the role of education in helping the child with a potentially fatal disease, and bereavement and the rebuilding of family life.

7787. **Deabler, Herdis L.; Fidel, Edward; Dillenkoffer, Robert L. & Elder, S. Thomas.** (VA Hosp, New Orleans, LA) **The use of relaxation and hypnosis in lowering high blood pressure.** *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 75-83.—Attempted to determine whether high blood pressure (hypertension) could be lowered through muscular relaxation and hypnosis. 6 nonmedicated hypertensive patients were used as controls while another 6 served as treatment Ss receiving muscular relaxation and hypnosis procedures. 9 patients on stabilized antihypertensive medication also received muscular relaxation and hypnosis procedures. Significant lowering of both systolic and diastolic pressures were obtained in both the no-drug and drug groups receiving treatment, but there was no significant reduction in the control group. Hypertensive levels were reduced through muscular relaxation and completely eliminated during hypnosis. Instruction was given in self-relaxation and self-hypnosis to promote continuation of beneficial effects after hospitalization.—*M. V. Kline.*

7788. **Ellis, Richard H. & Wilson, Nancy C.** (Ft Logan Mental Health Ctr, CO) **Evaluating treatment effectiveness using a goal-oriented automated progress note.** *Evaluation*, 1973, Mono 1, 6-11.—Describes a fully automated progress note system for evaluating psychiatric treatment programs in terms of explicitly defined goals. 703 goal statements are grouped into categories: medical, symptom, self-concept, patient-initiated interaction, other-initiated interaction, and disposition plan. Patients, staff, and community members participate in determining treatment goals. The complete progress note for each patient includes (a) previously selected goals and treatment methods; (b) ratings of the importance of each goal and its degree of attainment, and the effectiveness of each method; and (c) a composite success score for each goal, based on ratings of its degree of attainment weighted by ratings of its importance.—*J. Adams-Webber.*

7789. **Erickson, Milton H. & Rossi, Ernest L.** **Varieties of hypnotic amnesia.** *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 225-239.—Presents 8 detailed examples of the varieties of hypnotic amnesia found in clinical and naturalistic settings, together with a number of E. Erickson's innovative approaches to inducing hypnotic amnesia. The relevance of these examples for current experimental work in hypnotic amnesia is discussed. A case is made for conceptualizing hypnotic amnesia in clinical practice as "state-bound."

The significant place of amnesia is summarized.—*M. V. Kline.*

7790. **Freudenberger, Herbert J. (Ed.).** **The free clinic handbook.** *Journal of Social Issues*, 1974, Vol 30(1), 208 p.—Presents a special issue of the *Journal of Social Issues* which contains 20 articles on the problems and rationale of free clinics, the organization of specific services, administrative and staff issues, and types of free clinics. Topics include the role of the clinic coordinator, establishing a laboratory, gay counseling, free clinics and the law, special problems of clinics serving minority populations, and the psychology of the counseling staff in a free clinic.

7791. **Gunderson, John G.** **The influence of theoretical models of schizophrenia on treatment practice.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 182-199.—Reports on papers presented at the 1973 annual meeting of the American Psychoanalytic Association meeting. Discussions covered the influence on theories and treatment of community psychiatry and psychopharmacology, of the defense and deficit models, and of other theoretical constructs. The last presentation attempted to provide a simplified outline of transactional modes and to trace some of the theoretical and therapeutic consequences.

7792. **Kales, Anthony; Kales, Joyce D. & Bixler, Edward O.** (Pennsylvania State U) **Insomnia: An approach to management and treatment.** *Psychiatric Annals*, 1974(Jul), Vol 4(7), 28-44.—Presents 2 case histories to illustrate common underlying problems in insomnia and their effective management. Factors leading to insomnia are grouped in 3 categories: situational (e.g., job worries), medical (especially when pain is a symptom of the physical problem), and psychological (e.g., as in manic depressive illness). It is stated that most cases of insomnia are secondary to psychological problems, although patients often deny this possibility. The pros and cons of medication in the management of insomnia are explored. It is suggested that areas of concern that are common in persons suffering from insomnia should be investigated by therapists in an active, direct way. (24 ref)—*C. Wright.*

7793. **Kaplan, Helen S.** (Cornell U, Medical School) **Fiction and fantasy: No-nonsense therapy for six sexual dysfunctions.** *Psychology Today*, 1974(Oct), Vol 8(5), 77-86.—Describes methods successfully used to relieve impotence, premature ejaculation, retarded ejaculation, frigidity, female orgasmic dysfunction, and vaginismus. Nearly all patients who follow the prescribed exercises find that their problems can be totally resolved. Therapy sessions involve both partners and seldom number more than 20 sessions.—*E. J. Posavac.*

7794. **King, Lorna J.** **A sensory-integrative approach to schizophrenia.** *American Journal of Occupational Therapy*, 1974(Oct), Vol 28(9), 529-536.—Based study of 15 chronic schizophrenics on the hypothesis that defects in the proprioceptive mechanism result in lack of sensory integration; this leads to lack of perceptual constancy, poor body image, inadequate motor planning, and fatigue producing postural patterns. These handicaps are hypothesized to result in severe emotional stress and to predispose patients to hallucinatory phenomena. Treatment principles and implications for preventive pro-

grams are discussed. It is suggested that the neurophysiological theories of A. Ayres (1972, 1973) provide a unified model which satisfactorily links P. Schilder's (1933) observations with current studies. (43 ref)—*Journal abstract.*

7795. **Labar, Paule.** (Psychomedical Polyclinic, Liège, Belgium) [Treatment of nocturnal enuresis in children based on neurophysiology of sleep.] (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 608-619.—21 children 5-8 yrs old were treated for enuresis by having to keep their own charts on the times and volumes of their bedwetting. Using these charts, hours for awakening could be established which eventually led to a cure in 13 cases. The remaining cases were found to be slovenly in chart-keeping and to have more disturbed relationships with their parents. The differences between this approach and behavior modification and psychotherapy are discussed. (English, Dutch, German, Italian & Spanish summaries)—*E. Coché*

7796. **Ryback, Ralph S.** (McLean Hosp, Alcohol & Drug Abuse Services, Belmont, MA) **The problem oriented record in psychiatry and mental care.** New York, NY: Grune & Stratton, 1974. xi, 192 p.—Describes the rationale, uses, evaluation procedures, and goals of the problem-oriented record (POR) in psychiatric care, a conceptual framework to expedite and improve the medical care. The 4 sequential sections of the POR—data base, problem list, plans, and follow-up—are detailed, and the relevance of the POR to the computer and professional standards review organizations is discussed. (3 1/4 p ref)

7797. **Shapiro, Alexander.** (Harperbury Hosp, Herts, England) **Fact and fiction in the care of the mentally handicapped.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 286-292.—Examines the past and present state of mental handicap services and discusses the propositions that (a) it has not been shown that the care of the mentally handicapped is a medical concern and (b) the care of the mentally handicapped is a "generalism" rather than a "specialism."

7798. **Spence, Donald P. & Lugo, Marta.** (New York U) **The role of verbal clues in clinical listening.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 109-131.—Studied the influence of 2 modes of listening—listening for specific unambiguous signal words and listening for larger symbolic themes—on the accuracy of clinical judgment. 25 undergraduates listened to 17 passages from the clinical transcript of an ulcer patient and attempted to decide which statements had been followed by reports of stomach pain during therapy. When Ss were undistracted, the number of correct responses was at chance level. The number of Ss scoring above chance was increased when Ss were required to write a random series of numbers, first at a slow pace and later at a fast pace, while listening. It is suggested that Ss distracted by number writing were more accurate judges because they were forced to listen to the types of verbal clues which were the most powerful predictors of patient symptom reporting. It is concluded that patterns of attention are more important than the amount of attention given to clinical material and that the selection of verbal clues on which to base clinical judgments is influenced by prior conceptions of the patient, by the

amount of attention available for the listening task, and by initial priming instructions.—*J. Kelly.*

7799. **Sullivan, Philip R.** **Treatment of acute schizophrenia: The place of ECT.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 467-469.—Compared the results of a treatment approach based on a combination of electroconvulsive therapy (ECT), phenothiazine therapy, and nonintensive psychotherapy with the findings of a study of treatment approaches in which these methods were separately utilized. 100 consecutive 1st psychiatric admission, adult patients with a diagnosis of schizophrenia were chosen for study. 56% of the patients were treated with ECT. After their period of hospitalization, 88% of the patients were discharged as improved. Results show that the average hospital stay under combined treatment was 31 days as opposed to 130 days in the fastest of the separately used methods. It is concluded that the combination treatment is capable of producing a superior remission in a shorter time.—*B. Lindsey.*

7800. **Szasz, Thomas S.** (State U New York, Upstate Medical Ctr, Syracuse) **Justice in the therapeutic state.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II.* Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.—Discusses the concept of "contract" as a social device and its implications for the "therapeutic" control of human relations. Differences between legal and medical approaches to social control are examined in terms of the treatment of illness and the extent of individual freedom in the judicial and scientific-technological environments. (17 ref)

7801. **Thauberger, Patrick C. & Thauberger, Eileen M.** (U Saskatchewan, Regina, Canada) **A consideration of death and a sociological perspective in the quality of the dying patient's care.** *Social Science & Medicine*, 1974(Aug), Vol 8(8), 437-441.—Discusses some of the component interactions on the meaning of death with respect to the quality of patient care. Univariate analyses frequently yield information that is static, inappropriate, irrelevant or nongeneralizable to dynamic contexts. An increased emphasis on multivariate analysis, which is considered an appropriate research paradigm for the investigation of the dying patient's dynamic social treatment system, is suggested for the enhancement of the quality of the dying patient's care. (31 ref)—*Journal abstract.*

7802. **Vasilchenko, G. S.** (Ministry of Health, Moscow, Russian SFSR) **[Systemic approach in sexual pathology.]** (Czec) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 3-10.—Criticizes the practice of treating patients with sexual problems by different medical specialists and explains the necessity for the creation of an independent discipline of sexual pathology. The new discipline should be a synthesis of urology, gynecology, endocrinology, neuropathology, and psychiatry which deals with different components or subsystems of the sexual system. The value of systemic approach is demonstrated on selected clinical cases. Basic stages in systemic analysis of sexual disorders are outlined and a scale of vectors determining the male sexual constitution is presented. (Russian & English summaries)—*V. Fischmann.*



### Psychotherapy & Psychotherapeutic Processes

7803. Adams, Paul L. (U Miami) **Psychotherapy with obsessive children.** *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 471-491.—Discusses the importance of the study of the natural history of childhood obsessive disorders and the results achieved with various types of therapies. In general, obsessive children who are untreated seem to fare best when their illness has occurred in a setting of depression and worse when the basic processes are schizophrenic or psychopathic. A one-to-one therapist-patient relationship is suggested. 6 points are given for assessing the changes that can occur with the kind of treatment recommended: decreased symptoms, behavior changes, self-image, ego structure, superego changes, and interpersonal relations. The role of the parents in the child's improvement is emphasized. Case examples are provided. (19 ref)—R. S. Albin.

7804. Antonelli, Ferruccio. (Catholic U Rome, Italy) **[The usefulness and limitations of hypnotherapy in psychosomatic medicine.]** (Ital) *Medicina Psicosomatica*, 1972(Jan), Vol 17(1), 31-40.—Hypnosis and autogenous training are looked upon favorably by Italian experts in psychosomatic medicine. Both techniques can be used in short-term therapy which is the method of choice in treating psychosomatic symptoms, but some clinical danger exists when hypnosis tries to suppress a symptom without having first understood its psychodynamic significance. The best use of hypnosis seems to be in the context of psychodynamic psychotherapy; however, in some cases the depth and source of pathology may require prolonged therapy and hypnosis may not be advisable. (English & French summaries) (16 ref)—D. Araoz.

7805. Bailis, Susan S. & Adler, Gerald. (Tufts U, Medical School) **Co-therapy issues in a collaborative setting.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 599-606.—Discusses some difficulties encountered by physician and social worker co-therapists working with patients and families in the intensive short-term psychiatric unit of a general hospital. Aspects of the relationship between co-therapists (e.g., the nature of the working alliance, personality conflicts arising from random assignment of co-therapists, and sexual identity issues) are examined. Examples are cited in which co-therapists displayed feelings of helplessness in the therapeutic situation, overidentified with particular family members, and used family meetings to help individual patients avoid work on personal problems. It is concluded that although co-therapy is a valuable technique, some significant issues are involved in its use.—J. Kelly.

7806. Best, J. F. & Jones, J. G. (U Western Australia, Nedlands) **Movement therapy in the treatment of autistic children.** *Australian Occupational Therapy Journal*, 1974(Apr-Jun), Vol 21(2), 72-86.—Conducted a study of 4 autistic children to determine the value of a physical activity program in the treatment of autism. 3 Ss were given 30 swimming sessions and 10 movement education sessions; the other S participated only in the movement education sessions. Results indicate that Ss were capable of learning motor skills to a discernable level, and it is suggested that such a program may

contribute to the development of the autistic child's total growth. (36 ref)—M. E. Pounsel.

7807. Bey, Douglas R. & Chapman, Robert E. (U Illinois, Medical School, Peoria) **Psychiatry—the right way, the wrong way, and the military way.** *Bulletin of the Menninger Clinic*, 1974(Jul), Vol 38(4), 343-354.—Contrasts the principles and practices of combat military psychiatry with the private practice of civilian psychiatry.

7808. Black, F. William; Williams, Alfred V. & Bowen, Clotilde D. **Electroconvulsive treatment (ECT) in illicit drug-related psychosis: Case reports.** *Military Medicine*, 1974(Nov), Vol 139(11), 887-888.—Describes the use of electroconvulsive shock treatment (ECT) in 6 male 20-24 yr old patients admitted to the hospital for psychotic reaction associated with heavy illicit drug use. Findings indicate that ECT may be used effectively as a short-term treatment for patients who are refractory to the usual psychiatric treatment.

7809. Booth, Gotthard. **Cancer and the psyche.** *International Mental Health Research Newsletter*, 1974(Spr), Vol 16(1), 15-16.—Presents the argument, based on psychoanalytic theory and on research results, that cancer is somatization of depression. Cancer therapy must therefore deal directly with the causal depression by satisfying the strong underlying need for close interpersonal relationships. (23 ref)

7810. Bornstein, Philip H. (U Montana) **"I" language-induced anxiety.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 453-454.—Presents a 6-step procedure which allows the therapist to obtain a clear statement of problematic behavior from patients who are unable to define problems presently experienced. The technique described makes use of a combined behavioral-gestalt approach in the gathering of diagnostic information.

7811. Bragard, A. & Toye, N. (Counseling Ctr for Children & Adolescents, Verviers, Belgium) **[Reflections on the therapeutic attitude in a case of infantile psychosis.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 581-590.—Presents the case of an 11-yr-old girl whose therapy of 2½ yrs was centered around issues of communication between her and the other members of her family. (English, Dutch, German, Italian & Spanish summaries)

7812. Bumpass, Eugene R.; Via, Bobby M.; Forgotsen, Judith H. & Fagelman, F. Diane. (U Texas, Health Science Ctr, Dallas) **Graphs to facilitate the formation of a therapeutic alliance.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 500-516.—Discusses the use in psychotherapy of linear graphs representing the chronological sequence and intensity of patient feelings, external stimuli, and patient behavior. 5 cases in which cooperative construction of graphs by therapist and patient increased patient understanding of and control over acting-out behavior are presented. Patients suffering from neurotic personality disorders or borderline syndrome showed the most impressive changes as a result of use of the graphing technique. It is concluded that graphing can be an effective tool in psychotherapy with patients who have difficulty forming an observing ego and a therapeutic alliance. (23 ref)—J. Kelly.

7813. Büttner, Christian. [Therapy in educational homes.] (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Jul), Vol 23(5), 182-188.—Points out the main conditions which may restrict the work of a client-centered therapist in educational homes; e.g., institutional conditions, the therapist's self-concept, and assumptions about the etiology of deviant behavior. Institutional changes can be initiated only in the light of the social aims of home education.

7814. Černý, M. (U Karlova, Výzkumná psychiatrická laboratoř, Prague, Czechoslovakia) [Therapeutic use of posthypnotic suggestion evoked by autostimulation.] (Czec) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 11-16.—Reports on the effect of posthypnotic therapeutic suggestions, associated by the hypnotherapist with stimuli whose source lies in the patient himself. Any movement by the patient, e.g., pressing thumb against forefinger, may become the signal evoking the suggestions. The technique was used with 34 chronic neurotic and psychosomatic patients 21-57 yrs old who responded positively to 3 preceding hypnotic sessions. Treatment resulted in 6 complete remissions, 23 improvements, and 5 exclusions (no change). It is uncertain whether the remissions and improvements will be permanent. Main advantage of the technique is that it enables patients to produce posthypnotic suggestions under any circumstances with minimal interference from external influences. (Russian & English summaries)—V. Fischmann.

7815. Cancro, Robert; Fox, Norma & Shapiro, Lester E. (Eds.). (U Connecticut, Health Ctr) *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.—Presents a collection of 12 papers which give an overview of the schizophrenic syndrome and illustrate a variety of therapeutic strategies in the areas of individual, family, and group psychotherapy; somatic, pharmacological, behavioral, and early intervention techniques; and brief hospitalization, rehabilitation, and extramedical procedures.

7816. Check, David B. *Sequential head and shoulder movements appearing with age-regression in hypnosis to birth*. *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 261-266.—Suggests that sequential head and shoulder movements occurring during age-regression to the birth process are valuable indicators of validity for the subsequent verbal reporting. It is unlikely that hypnotized Ss will know the mechanisms of vaginal delivery. Other criteria for assessing factual nature of reporting involve acceptance only when physiological and ideomotor responses occur before the S knows what is reflected at these deeper levels of awareness.

7817. Cheney, Thomas. (U Georgia) *Attitude similarity, topic importance, and psychotherapeutic attraction*. *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 2-5.—Studied the effect of attitude similarity and topic importance on attraction in a natural setting by exposing 75 prison inmates, incarcerated for public intoxication, to varying attitudes of a psychotherapist prior to hearing him in a taped therapy session. The therapist's attitudes were either similar or dissimilar to the S's and pertained to either alcoholism (important) or general (unimportant) issues. Attraction was assessed using the Client's Personal Reaction Questionnaire developed by J. D.

Ashby et al. A group of control Ss received no attitudinal information. Ss were more attracted to the therapist after receiving alcohol items regardless of degree of similarity expressed.—*Journal abstract*.

7818. Collier, Herbert L. (Greater Phoenix Psychiatric Ctr, AZ) *Enuresis and encopresis*. In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.—Discusses psychological variables and treatment of enuresis and encopresis in children in terms of family genetics and personality predisposition.

7819. Collier, Herbert L. (Greater Phoenix Psychiatric Ctr, AZ) *The patient with somatic symptoms*. In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.—Discusses factors which affect symptom choice in psychophysiological disorders and the influence of therapist orientation on symptom type and expression. Suggestions for understanding and treating specific somatic symptoms (e.g., obesity and stomachache) are presented. (21 ref)

7820. Criddle, William D. (Inst for Rational Living, Northwest Branch, Seattle, WA) *Guidelines for challenging irrational beliefs*. *Rational Living*, 1974(Spring), Vol 9(1), 8-13.—In learning and using rational-emotive therapy, the 1st step toward permanent change is to challenge. This consists of convincing oneself of the illogical, irrational, and unrealistic aspects of one's emotion-producing ideas, accomplished by questioning, applying logic to ideas, and replacing the illogical ideas with rational, logical ones.

7821. Crosa, Giuseppe. (U Genoa, Clinic for the Nervous & Mental Diseases, Italy) [Considerations regarding the prevailing autogenous modality of the recall phase of autogenous training exercises.] (Ital) *Medicina Psicosomatica*, 1972(Jan), Vol 17(1), 47-51.—Autogenous training exercises lead to complete muscle relaxation. The recall phase has proven more beneficial if it is slowed down, rather than treated rapidly as in hypnosis. By extending the recall phase the patient is helped to benefit from his autogenous training in keeping an optimal muscle tone during his daily activities. The more gradual, slower, autogenic recall phase, which is the logical consequence of the spontaneous transition from the state of passivity to that of awareness, is described in detail. (French & English summaries)—D. Araoz.

7822. David, Charles A. (Dalhousie U, Victoria General Hosp, Halifax, Nova Scotia, Canada) *The use of the confrontation technique in the battered child syndrome*. *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 543-552.—Presents a case in which the confrontation technique was used successfully to help a battering parent gain control over her punitive treatment of her child. Some causative factors in the development of the battered child syndrome are discussed. Treatment of the battering parent is a psychiatric emergency since its primary goal, protection of the child, must be reached quickly. Once some patient-therapist rapport has been established, the use of authoritative confrontation statements which direct the patient to control battering impulses intensifies transference and relieves the anxiety and guilt of the patient by allowing him to rely on the



therapist as an external source of control. It is concluded that the confrontation technique can be an effective tool in psychotherapy with battering parents.—*J. Kelly.*

7823. **DeVoge, Catherine.** (Larned State Hosp. KS) **A behavioral approach to RET with children.** *Rational Living*, 1974(Spr), Vol 9(1), 23-26.—Based on the principle that people feel the way they think and that overt behavior is an expression of these feelings, a method of teaching disturbed children to think rationally was tested. It was hypothesized that children who were strongly and consistently rewarded for verbal expressions of rational thinking would gain more control of their behavior than those who were not so reinforced. 16 children 8-13 yrs old, not mentally retarded, were randomly assigned to 1 of 2 groups. Each group met twice weekly for 4 wks. Group A received rational-emotive therapy. Excerpts from anecdotal records of behavior problems before and after the group experience are reported. Results support the hypothesis, suggesting that reinforcing rational statements results in change toward more self-controlled behavior.—*G. J. Frankel.*

7824. **Ferrannini, Luigi et al.** (U Bari, Istituto di Psichiatria, Italy) [Family dynamics in a group of psychotics as determined by the doctor's observations, patient's viewpoint, and projective testing of family members.] (Ital) *Rivista di Psichiatria*, 1974(Mar-Apr), Vol 9(2), 79-137.—Followed 8 families in individual and group therapy. The most significant observations relate to the complete dominance of 1 parent in all decisions, with no real emotional relationship with the offspring. Children's roles seemed to be static, and their behavior, based on an overacted interpretation of the roles of the father and mother, was more useful in preserving parental self-confidence than in developing the children's own maturity. The more or less overt repression of offspring attempts at self-government and the severe control of their sexual life were evident manifestations of the parental need for self-confidence. (76 ref)—*Journal summary.*

7825. **Frank, Jerome D.** (Johns Hopkins U, Medical School) **Therapeutic components of psychotherapy: A 25-year progress report of research.** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 325-342.—Summarizes the experiments of the Johns Hopkins Psychotherapy Research Unit on brief psychotherapy of psychiatric outpatients. Major findings were that the beneficial results of psychotherapy include 2 components, activation of patients' expectations and learning of social skills; that psychiatric outpatients showed a marked decrease of symptoms in response to placebos, the degree of response depending on the interaction between the patient's momentary state at a particular time and the situation; and that an interview preparing patients for therapy led to more appropriate behavior in therapy and to greater clinical improvement. Data are summarized concerning factors related to remaining in treatment and to short-term improvement. Aspects of the long-term course of psychiatric outpatients revealed by 5- and 10-yr follow-up studies are reviewed. (51 ref)—*Journal abstract.*

7826. **Friedenberg, Edgar Z.** (Dalhousie U, Halifax, Nova Scotia, Canada) **Laing's relationship to philosophy.** *Review of Existential Psychology & Psychiatry*, 1973,

Vol 12(2), 105-128.—Examines R. D. Laing's concept of mental illness, his approach to psychotherapy, and the relationship of his work to the principles of existential philosophy and existential psychotherapy.

7827. **Friedman, Henry J.** (Tufts—New England Medical Ctr, Boston, MA) **New considerations in the treatment of certain adolescent patients.** *Adolescence*, 1974(Sum), Vol 9(34), 155-168.—Deals with issues of values, limit setting, and confrontation during psychotherapy with adolescents whose parents have abandoned their position of authority and may openly advocate their adolescent's indulgence in rebellious and self-destructive behavior. Analytic neutrality must be abandoned in such cases. 3 case histories are reported.

7828. **Goeppert, S. & Geoppert-Frank, H. C.** (Albert-Ludwigs-U, Freiburg, Switzerland) [Some considerations on class-specific behavior in psychoanalysis and psychotherapy.] (Germ) *Confinia Psychiatrica*, 1974, Vol 17(1), 53-68.—Presents a sociolinguistic analysis of primary and secondary process and the relations of transference and countertransference in response to the adoption by some psychoanalysts of class-specific linguistic behavior in describing therapeutic problems. It is argued that psychoanalytic treatment of working-class patients cannot be considered as compensatory speech education. A new concept of illness and therapy is advanced with respect to the specific function of speech for working-class people.—*I. N. Mensh.*

7829. **Gottman, John M. & Leiblum, Sandra R.** (Indiana U) **How to do psychotherapy and how to evaluate it: A manual for beginners.** New York, NY: Holt, Rinehart & Winston, 1974. vii, 184 p.—Presents a step-by-step manual for beginning therapists on the principles, techniques, and results of psychotherapy. A flow chart of the treatment process in psychotherapy is presented, and subsequent chapters clarify the therapeutic processes involved, including designating the organization system, determining how the decision to seek treatment was made, administering problem assessment, negotiating therapeutic contracts, and assessing the impact of a planned intervention. (7 p ref)

7830. **Gottschalk, Louis A.** (U California, Coll of Medicine, Irvine) **The application of a method of content analysis to psychotherapy research.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 488-499.—Discusses possible applications of the author's content analysis method to psychotherapeutic research. Some steps in the development of the method (e.g., the definition of psychologic dimensions to be measured, construction and validation of scales, and training of reliable scorers) are described briefly. The use of the method in studies on the prediction of treatment outcome, and in psychosomatic, psychophysiology, and psychopharmacological research relevant to psychotherapy is reviewed. It is suggested that the value of a content analysis method to psychotherapy lies in its ability to measure specific psychologic states precisely and accurately. (29 ref)—*J. Kelly.*

7831. **Gray, William & Gray, Lucille R.** (Malden District Court Clinic, MA) **Court clinic therapy: Theory and practice.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 153-158.—Describes a family treatment therapy program in which the

family structure is a part of both the clinic and the court. Co-therapists serve as parent models, and students and disposition officers serve as other models for family behavior.

7832. Grüss, Ursula & Bach, Otto. [How intensive should and may the treatment of psychoses be? Considerations on somatherapy from the sociopsychiatric viewpoint.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(May), Vol 26(5), 287-294.—Recommends intensive somatic therapy of psychoses with a regimen of fast intervention, initial electroshock with sufficient frequency, and large doses of neuroleptic medications, specifically fluphenazine, haloperidol, trifluoperazine, butyrylperazine, and metoprenazine.—K. J. Hartman.

7833. Hanley, F. W. Individualized hypnotherapy of asthma. *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 275-279.—Describes 2 cases in which asthma was treated with an individualized hypnotherapeutic approach.

7834. Harris, Jay E. (Albert Einstein Coll of Medicine, Yeshiva U) A design for psychotherapy with schizophrenic patients. In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7835. Hellwig, Karen & Memmott, Rae J. (El Camino Coll) Co-therapy: The balancing act. *Small Group Behavior*, 1974(May), Vol 5(2), 175-181.—Discusses the ingredients for a successful relationship between cotherapists: (a) open communication, (b) mutual acceptance of each other as peers, (c) acceptance of differing opinions, (d) knowledge of the assets and limitations of each, (e) willingness to give and accept constructive criticism, and (f) cotherapist dialogue prior to and following group sessions.

7836. Hill, Clara E. (Southern Illinois U, Carbondale) Sex of client and sex and experience level of counselor. *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 6-11.—Examined how sex of client and sex and experience level of the counselor affected behaviors in counseling. 12 male and 12 female counselors, half inexperienced and half experienced, each recorded the 2nd counseling session with 1 male and 1 female client. Satisfaction items, frequency counts of counselor and client verbal behavior, activity levels, and judges' ratings were obtained for each session. Results indicate that same-sex pairings had more discussion of feelings by both counselor and client, and that inexperienced males and experienced female counselors were more active and empathic and elicited more feelings from clients than did their counterparts. (17 ref)—*Journal abstract*.

7837. Hodnett, Mary L. (U Texas, Arlington) A broader view of art therapy. *Art Psychotherapy*, 1973(Fal), Vol 1(2), 75-79.—Proposes that art therapy should supplement its early subservience to psychoanalysis by stressing self-actualization through creativity in keeping with humanistic psychology, and by adopting an existentialist emphasis on the uniqueness of the person. Behavior modification through art work and music has been applied to retarded and disturbed children by T. Gaston. The full benefit of art therapy will be realized, however, only when its objectives reach beyond social

adjustment to acquaint clients with the broad range of aesthetic expression practiced by artists. (19 ref)—R. Arnheim.

7838. Hofmann, Adele D. & Becker, R. D. (New York U—Bellevue Medical Ctr, NY) Psychotherapeutic approaches to the physically ill adolescent. *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 492-511.—Presents a selective review of the psychological reactions of adolescents to illness and hospitalization. A critical examination of defensive and coping mechanisms invoked to combat anxiety is systematically discussed. Therapeutic guidelines are suggested which will encourage those preexisting and naturally occurring healthy strategies essential to satisfactory readjustment after hospitalization. The characteristic responses of adolescents to medical or surgical crises are reviewed. The importance of recognizing the anxieties actuated by illness, surgery, or hospitalization among this age group, is stressed. The role of the consulting psychiatrist or psychologist on the medical unit is considered. (36 ref)—R. S. Albin.

7839. Kavalier, Susan I. (Postgraduate Ctr for Mental Health, New York, NY) Dance therapy with retarded children. *International Mental Health Research Newsletter*, 1974(Spr), Vol 16(1), 9-11.—Describes, in the context of other therapeutic efforts with retarded children, the difficulty of determining experimentally, in 1 study, the general effectiveness of short-term dance therapy even when individual changes were clearly apparent. (32 ref)

7840. Keller, James F.; Croake, J. W. & Brooking, Janis Y. (Virginia Polytechnic Inst & State U) Effects of a program in rational thinking on anxieties in older persons. *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 54-57.—Investigated the effects of a program of rational-emotive education on irrational thinking and self-reported anxiety in 30 individuals 60 yrs of age and older. Experimental and control groups each comprised 15 individuals. Both groups were pretested using the Adult (Irrational) Ideas Inventory and the State-Trait Anxiety Inventory. The experimental group received 4 wks of study in rational-emotive education while the control group waited its turn for the study. Both groups were posttested in the 5th wk. The control group showed no significant declines in irrational thinking or anxiety, but the experimental group did. (15 ref)—*Journal abstract*.

7841. Killory, J. F. (Carroll Coll) In defense of corporal punishment. *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 575-581.—In defense of corporal punishment, 4 criteria for punishment are enumerated, and comments are made concerning side effects both specific to a punishment and common to all procedures. Punishment techniques available to parents and therapists are discussed.—*Journal abstract*.

7842. Klopfer, Walter G. & Reed, Max R. (Eds.). (Portland State U) Problems in psychotherapy: An eclectic approach. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.—Presents a collection of 9 papers which illustrate alternative approaches to the treatment of various types of patients seen in psychotherapy, including the suspicious, suicidal, or seductive patient, the patient with somatic symptoms, the patient



not ready for behavior therapy, and the silent patient in group therapy.

7843. Klopfer, Walter G. (Portland State U) **The suspicious patient.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp. 1974. xi, 178 p.—Discusses possible causes of suspiciousness in patients and how it may be reinforced. Suggestions for handling this type of patient by different types of therapists (e.g., client-centered, psychoanalytic, or behavior therapists) are presented.

7844. Klopfer, Walter G. (Portland State U) **The seductive patient.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp. 1974. xi, 178 p.—Considers how the intimate nature of all psychotherapeutic approaches may result in seductiveness on the part of the patient toward the therapist and how this problem can be handled in the course of treatment. Suggestions for working with the sexual tension in psychotherapy for both male and female therapists working with male and female patients are presented.

7845. Lalli, Nicola; Bordin, Manilio & Cuzzolaro, Massimo. (U Roma, Istituto di Psichiatria, Italy) **[The doctor-patient relationship.]** (Ital) *Rivista di Psichiatria*, 1974(Jan-Feb), Vol 9(1), 41-62.—Citing the cases of 4 female and 3 male psychiatric outpatients 28-69 yrs old, it is suggested that when a doctor does not understand the psychological meaning of the symptoms offered by the patient he encourages the patient to "organize" a somatic syndrome. The doctor should look upon the patient as a whole to treat him effectively. It is suggested that about 45% of the outpatients of any general practitioner are neurotic. (19 ref)—N. De Palma.

7846. Lehmann, B. W. **[The search for identity: A Rogerian approach.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 385-398.—Discusses the Rogerian approach to rehabilitating the S reported by T. de Wever (see PA, Vol 53:Issue 4). An S who has difficulty in defining her identity can be rehabilitated by responding to statements by the clinician in terms of a system of positive and negative reinforcements to her expressions.—A. J. Ter Keurst.

7847. Levenson, Edgar A. (William Alanson White Inst, New York, NY) **Changing concepts of intimacy in psychoanalytic practice.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 359-371.—Considers that concepts of intimacy are a by-product of a changing society. The trend is towards more active interaction between patient and therapist. Intimacy—openness to the other person as he is—results from an authentic engagement of the therapist with the patient. It requires that the therapist recognize the perspectivistic reality of the patient's world and abstain from moving the patient into change.

7848. Levin, Sidney. (Harvard U, Medical School, Boston) **A brief note on the "undoing" of childhood traumatic experiences through environmental manipulation.** *Bulletin of the Menninger Clinic*, 1974(Jul), Vol 38(4), 365-368.—Notes that the undoing of childhood traumas through environmental intervention often requires the cooperation of parents as well as others.

Efforts at undoing are more likely to be successful if the traumatizing person participates personally in the undoing process.

7849. Lievens, P. (U Louvain, Belgium) **[Psychotherapy with adolescents.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 630-653.—Suggests that psychotherapy with adolescents encounters major difficulties such as nosology and hospitalization. Outpatient interview and therapy also pose special problems. Psychotherapy with adolescents is different from child psychotherapy and adult psychotherapy. The characteristics are, among others, the flexible choice of the therapeutic method in the course of the same therapy, the type of verbal relationship that needs more than a positive neutrality, the importance of the contact with the patient and of the relations with the parents. The importance of combining psycho- and pharmacotherapy is stressed. (English, Dutch, German, Italian & Spanish summaries)—*Journal summary*.

7850. Marcus, Ned. (Jewish Child Care Assn, New York, NY) **Yawning: Analytic and therapeutic considerations.** *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 406-418.—Presents the case of a 13-yr-old boy living in a small group residence. A major symptom was continuous yawning during psychotherapy. It is shown that the active analysis of this nonverbal expressive behavior was of value in understanding and treating a youngster who, because he was so withdrawn, would not otherwise have been amenable to the standard one-to-one approach. The literature concerning nonverbal expressive behavior is reviewed. Yawning, in this case, served a dynamic need to regress. Yawning, when appropriate, may be viewed as a regression in the service of the ego, facilitating a more relaxed, more resourceful utilization of passivity. (16 ref)—R. S. Albin.

7851. Meltzer, Donald. (Tavistock Clinic & Inst of Psycho-analysis, London, England) **Narcissistic foundation of the erotic transference.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 311-316.—Advances the thesis that the dynamic approach to the problem of erotization of the transference, and therefore to the problem of a powerful type of resistance which may lead to acting-out in and out of transference, does not adequately reveal the complexity of mental functioning, nor does interpretation along these lines successfully promote working through. Instead it is suggested that the structural approach, especially that aspect of it which views narcissism and object relations from an organizational viewpoint, is more satisfying intellectually and more potent in practice. This concept is illustrated by the case of a young woman in which the erotic transference resistance had been broken into by the revelation in a dream of a hidden area of narcissistic organization which functioned as a collusion against parental standards.—M. J. Stanford.

7852. Mosher, Loren R. (NIMH Ctr for Studies of Schizophrenia, Rockville, MD) **Psychiatric heretics and the extra-medical treatment of schizophrenia.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7853. Pagano, Vittorio. [New perspectives of psychotherapy in psychosomatic disorders.] (Ital) *Medicina Psicosomatica*, 1972(Jan), Vol 17(1), 23-29.—Suggests that the general practitioner must find his own psychotherapeutic style since much of his work deals with psychosomatic symptoms. Physicians need training in psychotherapy and awareness of their role in this area. (English & French summaries)

7854. Parietti, Piero. (H. Bernheim Clinic, Ctr for the Study of Hypnosis, Verona, Italy) [Hypnotherapy in psychosomatic disorders.] (Ital) *Medicina Psicosomatica*, 1972(Jan), Vol 17(1), 41-46.—Analyzes the role of hypnosis in psychosomatic manifestations. Psychotherapy, defined in terms of insight and understanding, will use hypnosis as a tool to aid such insight when emotional factors cause somatic dysfunctions. Hypnosis is no longer used to remove symptoms but to help diagnose and treat the personality disturbances which might be at the root of symptoms: it is not therapy but an adjunct to it. Hypnosis is seen as an "induced psychosomatic state", i.e., as the possibility of orienting the client's psyche towards an understanding of changes which might be effected in his bodily functions. The words used in producing hypnosis are interactive sound stimuli, image evokers, and a means of communication at the conscious level.—D. Araoz.

7855. Peck, Edwin C. (U California, Irvine) **The relationship of disease and other stress to second language.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 123-133.—Applies concepts about bilingualism to the everyday practice of general psychiatry. Past studies, though useful, do not concentrate on the effects of stress on self-expression in a 2nd language. A case study illustrates such effects in detail. To make accurate clinical assessments when consulting with bilingual patients, the psychiatrist must add these questions to his mental status assessment: (a) At what age and in what place did the patient learn his 1st language? (b) What are the attitudes towards his 1st language in his current environment? (c) Is the patient under stress, and how is the stress affecting his self-expression in his 2nd language?—*Journal summary.*

7856. Peck, Michael L. & Wold, Carl I. (Narcotics & Drug Abuse Rehabilitation Program, Long Beach, CA) **The suicidal patient.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.—Presents a clinically-oriented analysis of suicidal behavior in patients and possible therapist responses. A review of previous findings on the evaluation of suicide potential, special risk groups, management of the suicidal patient, and crisis intervention techniques and some sample case histories are presented (24 ref)

7857. Powell, John R. (Michigan State U, Counseling Ctr) **Understanding male homosexuality: Developmental recapitulation in a Christian perspective.** *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 163-173.—Reviews etiological explanations of male homosexuality. Theories that are concerned with family pattern dynamics are considered credible and are related to biblical teachings regarding marriage and the family. The concept of developmental recapitulation as a means of guiding therapy is discussed and related to a mode of

multiple therapy with male clients having homosexual concerns. (16 ref)—*Journal abstract.*

7858. Priest, Peter N. (U Auckland, Medical School, New Zealand) **The destiny of psychological therapies: Convergence or divergence?** *British Journal of Medical Psychology*, 1972(Sep), Vol 45(3), 209-219.—Reviews data on the relative merits of psychotherapeutic methods. 2 conflicting "pipe-dreams" are examined: that behaviorism techniques are superior and that a unity of disparate approaches is taking place. The 2nd position is viewed as particularly dangerous and is analyzed in detail. Its emphasis on "process" research, the assumption that all orientations are at the same stage of their development, and its simplistic eclecticism are challenged. Hardened attitudes toward behavior therapy are considered unjustified. It is concluded that a confrontation between approaches would help force evaluation of the methods on their results. (3 p ref)—R. Hall.

7859. Razin, Andrew M. (Albert Einstein Coll of Medicine, Yeshiva U) **The A-B variable and therapist persuasiveness.** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 244-255.—Investigated the hypothesis that A therapists are more persuasive than B therapists. (A-B distinctions were made on the basis of Strong Vocational Interest Blank responses.) 15 male and 6 female therapists each tape recorded 3 therapy sessions with 1 of their neurotic outpatients, and 3 sessions with 1 of their schizoid or schizophrenic outpatients. Therapists, patients, and an independent rater rated (a) patients' acceptance of therapists' "messages" to them, (b) therapists' embodiment of 4 correlates of persuasiveness, and (c) therapists' general persuasiveness. Analyses of variance showed significant A > B differences on 2 measurements: message acceptance rated by rater and total-of-4 correlates rated by therapist; the 7 other analyses showed nonsignificant A > B differences. Results are interpreted as essentially null or at best mildly supportive of the hypothesis. (43 ref)—*Journal abstract.*

7860. Reed, Max R. (Portland State U) **Psychotherapy: A modern Tower of Babel.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.—Discusses the proliferation of psychotherapeutic approaches, from the beginnings of psychoanalysis to the neo-Freudians and finally to the more recent existential, learning, and conditioning approaches. Differences between approaches in terms of the extent of explicit control over patients and the extent to which the disciplines view their methods as having specificity or generality are discussed. (4 p ref)

7861. Rosenheim, Eliyahu. (Bar-Ilan U, Ramat Gan, Israel) **Humor in psychotherapy: An interactive experience.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 584-591.—Discusses the uses of humor as a psychotherapeutic technique. The use of a humorous orientation requires the therapist to be relatively free from defensiveness and ready for mutuality with the patient. Humorous exchanges during therapy can impinge a patient's ability to perceive himself and his relations to others accurately, can serve as affect releasers for depressed, schizoid, or obsessive patients, and can help overcome the resistance of adolescent



patients. It is concluded that humor is valuable in psychotherapy because its intrinsic qualities of intimacy, humaneness, and directness help the therapist and patient form a closer, more informal working alliance.—J. Kelly.

7862. Ryle, Anthony & Lipshitz, Susan. **Towards an informed countertransference: The possible contribution of repertory grid techniques.** *British Journal of Medical Psychology*, 1974(Sep), Vol 47(3), 219-225.—Discusses the use of repertory grid techniques in investigating and understanding countertransference. It is suggested that such techniques can provide evidence on (a) how the therapist views the patient in terms of the patient's feelings, (b) how far these and other feeling constructs relate to each other, and (c) how these countertransference constructs relate to constructs describing behavior or transference reactions.—M. E. Pounsel.

7863. Schatzberg, Alan F.; Lobis, Robert A. & Westfall, Michael P. (Harvard U, Medical School, Boston) **The use of psychodrama in the hospital setting.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 553-565.—Discusses the benefits and some potential antitherapeutic effects of the use of psychodrama in a hospital setting. Summaries are presented of 8 cases drawn from a weekly psychodrama group composed of voluntary inpatient participants representing a range of diagnoses, ages, and cultural backgrounds. Psychodrama with hospitalized psychiatric patients was found to be most useful in promoting acknowledgement and expression of affects, teaching socialization and communications skills, and analyzing behavior patterns and ego defenses. The use of psychodrama sometimes led to destructive expression of anger, limited exploration of uncharged material, and acting-out behavior. It is suggested that the beneficial effects of psychodrama can be achieved with other therapeutic methods which have fewer inherent risks and limitations.—J. Kelly.

7864. Schneck, Jerome M. **Observations on the hypnotic nightmare.** *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 240-245.—Discusses the hypnotic nightmares of a patient, focusing on the equivalence of the hypnotic nightmare with the spontaneous nocturnal nightmare of the same S. Functional attributes of hypnotic dreams and nightmares are alluded to. Little has appeared in the literature on the hypnotic nightmare in comparison to material on other hypnotic experiences. The nature and content of the hypnotic nightmares of the present S, in their regressive features with oedipal components, are consistent with reactivation of certain childhood conflicts at this point in the hypnoanalysis and with the transference relationship.—M. V. Kline.

7865. Schwartz, Barry J. & Snow, Laurence H. (Medical Coll Pennsylvania, Philadelphia) **On getting kicked out of medical school.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 574-583.—Describes some character types found among students (mostly women) who failed medical school and sought psychotherapy prior to seeking readmission. Students who failed were found to have sufficient manifest motivation, but displayed over-cathected latent motiva-

tion, rigid self-images, and inflexible defensive systems. (15 ref)

7866. Schwartz, Ronald M. (U California, Medical School, Los Angeles) **Sexual history taking.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 405-408.—Outlines techniques that are useful in taking sexual histories. Methods include utilizing free flow of thought and words with only occasional guidance by the interviewer, but this method is thought to be too cumbersome and impractical. The direct method of following an outline which includes chief complaint, present illness, and past history, taken with a certain amount of flexibility on the part of the interviewer, is considered to be more successful. It is important that the interviewee progress comfortably from stage to stage of the interview. It is recommended that the interviewer maintain the 3 C's of counseling: calm, confidence, and concern.—A. de la Haba.

7867. Serban, George & Gidynski, Christina B. (New York U—Bellevue Medical Ctr, NY) **Schizophrenic patients in community: Legal misinterpretations of "right to treatment."** *New York State Journal of Medicine*, 1974(Oct), Vol 74(11), 1977-1981.—Presents evidence that postdischarge schizophrenic patients suffer from a lack of awareness of psychological impairment which prevents them from participating in outpatient remedial care programs. The extent of insight into mental condition and the premorbid functioning of 419 schizophrenic Ss were assessed through self-reports and psychiatric evaluation within 6 days of hospitalization. It was found that Ss' social functioning in the community prior to admission had been impaired, and that Ss were confused about reasons for admission and the severity of their illness. It is concluded that discharged schizophrenic patients who experience a recurrence of symptomatology do not have sufficient insight to seek rehabilitative treatment which might prevent repeated hospitalization. (21 ref)—J. Kelly.

7868. Sirois, F. (Hôtel-Dieu du Sacré-Coeur de Jésus, Child Psychiatry Service, Quebec, Quebec, Canada) **[Clownery and the child.]** (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 654-658.—Some symptomatological and psychodynamic aspects of clown behavior and the child are discussed and illustrated with clinical cases. (English, Dutch, German, Italian & Spanish summaries)

7869. Soubrier, Jean-Pierre. **[Chemotherapies and psychotherapies: Are they complementary or antagonistic? A personal study.]** (Fren) *Annales Médico-Psychologiques*, 1974(Feb), Vol 1(2), 225-233.—Asserts that chemotherapy and psychotherapy arise from different conceptions of the problem confronting a psychiatric patient, that each is valid, and that a proper model for their simultaneous use is based on the idea that different kinds of care apply to different needs. To fail to prescribe chemotherapeutic treatment, carefully selected to be appropriate for the individual, from today's broad array, is to deny the patient the assistance of a proven therapeutic aid. To treat only "target symptoms" by biologically active substances, however, is to neglect the psychosocial or existential concerns that may be central to finding a cure. Suicide provides a dramatic example of the need to treat at 2 levels, as many patients who

commit suicide are under chemotherapy at the moment. Some, ironically, choose an acute intoxication with psychotropic agents (e.g., tricyclic antidepressants) as their means of self-destruction.—*H. E. King.*

7870. **Straatmeyer, Alvin J. & Watkins, John T.** (Problems-In-Living Ctr, Sioux Falls, SD) **Rational-emotive therapy and the reduction of speech anxiety.** *Rational Living*, 1974(Spr), Vol 9(1), 33-37.—Compared the effectiveness of a complete course of rational-emotive therapy (RET) in treating public-speaking anxiety with that of 3 other procedures: (a) a modified RET procedure, omitting the element of dispute; (b) an attention placebo; and (c) a no-treatment control condition. 57 Ss participated, in 4 experimental groups corresponding to the 4 methods. To determine the effectiveness of each treatment in reducing speech anxiety, 2 self-report and 2 behavioral measures were used. The hypothesis that Ss who received RET would show improvement was supported.—*G. J. Frankel.*

7871. **Szasz, Thomas S.** (State U New York, Upstate Medical Ctr, Syracuse) **The myth of psychotherapy.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 517-526.—Discusses the metaphorical character of implicit comparisons between psychotherapy and medical treatment, and examines the uses of the vocabulary of psychotherapy. It is argued that the interactions between patient and therapist which are conventionally called psychotherapy do not involve psyches and are not necessarily therapeutic. Jung correctly rejected Freud's use of science to legitimize psychotherapy and instead saw psychoanalysis as a system of secular ethics. It is suggested that psychotherapy is a process of personal influence which reflects the values, personalities, and aspirations of its theorists and practitioners. The assumption that the outcome of psychotherapy will be therapeutic for the patient is not always valid. (17 ref)—*J. Kelly.*

7872. **Trexler, Larry.** (Camden Cty Community Mental Health Ctr, NJ) **The suicidal person and the restoration of hope.** *Rational Living*, 1973(Fal), Vol 8(2), 19-23.—Employs a rational-emotive approach in discussing treatment for suicidal clients. Determining whether and to what extent an individual is suicidal is primary. Investigating suicidal tendencies, whether the client has thought of suicide or not, follows. A theme of hopelessness, defined as the cognitive negative evaluation of the future, is frequently present, created by distorted cognitions. Often the psychological problem is a belief of being totally incapable of dealing with the situation and an insistence on not deserving to live. This is combined with views of the self as inadequate and unworthy, perception of the world as demanding and frustrating, and of the future as continuing failure. The therapist's task is to confront the client's feelings of helplessness, and ultimately train him to see the irrationality of his ideas. The therapist's perspective in working with these cases is discussed.—*G. J. Frankel.*

7873. **Turco, Ronald.** **Eskimo youth: Culture and conflict.** *Journal of Pastoral Care*, 1974(Mar), Vol 28(1), 36-39.—Discusses cultural patterns of Eskimo youth in Alaska, the conflicts of adaptation to American culture, and the unique therapeutic problems created by these conflicts. Complications in treatment arise from language differences, from local norms of acceptable

behavior, and from the need to modify standard psychological tests and examinations which do not apply to objects or situations in daily Eskimo life. 3 personality traits are prominent in young Eskimos: suspiciousness, anger, and depression. Ways of resolving issues by use of group therapy are mentioned.—*B. Smith.*

7874. **Tustin, Frances.** (Child Guidance Training Ctr, London, England) **Therapeutic communication between psychotherapist and psychotic child.** *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 440-450.—Presents clinical and theoretical material in support of the hypothesis that psychotic children are protecting themselves against the premature experience of being disconnected from the mother. They have developed an insulation from sensory experience. The therapist must attempt to reach them by offering more realistic means of protecting and using their vulnerable areas. The importance of a stable treatment setting is emphasized, and several case examples are presented. The overinflated expectations of life by these children are unrealistic and must be changed from a source of disappointment to an acceptable and bearable challenge.—*R. S. Albin.*

7875. **Valentine, John H.** (U Pennsylvania, Medical School) **Alienation and the family history.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 592-598.—Discusses the use of detailed reconstructions of family history in psychotherapy with patients whose symptoms stem from rootlessness and alienation. Oral traditions learned in childhood, family records, and mementos are used to recreate the characters, life-styles, and critical choices of past family members. Theoretical bases for the family history technique provided by the work of C. G. Jung, E. Erikson, H. S. Sullivan and others are described briefly. 3 cases in which the therapeutic reliving of historical family drama helped patients to develop a richer, more personal, and more congruent identity are presented. It is suggested that use of the family history technique can help patients relate their personal conflicts to a wider historical and cultural context.—*J. Kelly.*

7876. **Walker, Priscilla C.** (Medfield State Hosp, MA) **The hypnotic dreams: A reconceptualization.** *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 246-255.—Hypnotic suggestions to "dream now" have been used to produce a response called the hypnotic dream. Previous research has assumed that this dream is something over and above ordinary waking fantasy, and has attempted to demonstrate this difference by comparing the hypnotic dream with the nocturnal dream by stressing the unique role of the "trance" in producing the hypnotic dream. However, the data have not sufficiently supported this contention. The clearest way of conceptualizing the hypnotic dream seems to be to relate it to directed fantasy. The conceptualization best fits the available data and also suggests further research which would be meaningful.—*M. V. Kline.*

7877. **Waltzer, Herbert.** **The umbilicus as vagina substitute: A clinical note.** *Psychoanalytic Quarterly*, 1974, Vol 43(3), 493-496.—Cites the case of a female who regarded her umbilicus as though it were her vagina.

7878. **Ward, Alan J. & Leith, Virginia M.** (Eastern State School & Hosp, Trevoise, PA) **The joint treatment of an "autistic" child by clinical psychology and speech therapy.** *International Journal of Child Psychotherapy*,



1973(Oct), Vol 2(4), 451-470.—Reports the use of structural therapy in treating a 3½-yr-old autistic girl on an outpatient basis. Focus of the treatment was on the improvement of body image and human relationships. The patient was initially nonrelating, nonverbal, hyperactive, and fearful. The therapy and its progress are described in detail. 16 mo of treatment helped her to develop warm relationships with her immediate family, to start using simple words and short phrases for communication, to become less hyperactive, and to begin establishing peer relationships. The importance of differential diagnosis in early childhood disorders, of the choice of therapeutic strategy, and the relevance of improved body image and human relationships are stressed. (15 ref)—R. S. Albin.

7879. Warren, Sue A. (Boston U) **The distressed parent of the disabled child.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.

7880. Will, Otto A. (Austen Riggs Ctr, Stockbridge, MA) **Individual psychotherapy of schizophrenia.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7881. Wittkower, E. D. & Warnes, Hector. (McGill U, Section of Transcultural Psychiatric Studies, Montreal, Quebec, Canada) **Cultural aspects of psychotherapy.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 566-573.—Discusses cultural factors which influence the choice of preferred forms of psychotherapy and the possibility of transference of Western style psychotherapy to non-Western societies. Some psychotherapeutic methods used in developing nations, and in industrialized nations with contrasting world views (e.g., Russian "pathogenic psychotherapy," German "autogenic training," and Japanese "Morita therapy") are described. Attempts to apply Western psychotherapeutic procedures in non-Western countries often give rise to language difficulties, suspicion and distrust of the therapist, and serious clashes of the ideologies of patient and therapist. Acceptance of Western psychotherapy in developing nations will depend on the training of larger numbers of native therapists and on cultural changes. In the meantime, traditional healers will continue to play an important role in the treatment of the mentally ill in developing countries. (17 ref)—J. Kelly.

7882. Wohl, Julian. (U Toledo) **Third parties and individual psychotherapy.** *American Journal of Psychotherapy*, 1974(Oct), Vol 28(4), 527-542.—Discusses some problems associated with legitimate and illegitimate intervention in individual psychotherapy by 3rd parties who claim to have interests, rights, or concerns regarding the patient. 3rd party intervention may occur when the patient is a minor, when psychotherapy is conducted in an institutional setting, or when the patient is financially dependent. Legitimate 3rd party interests can threaten the confidentiality of the therapeutic relationship and expose the therapist to conflict of interest situations. It is suggested that therapists need to accept the existence of legitimate 3rd parties and to develop clear guidelines for dealing with 3rd party intrusions. A contractual ap-

proach to psychotherapy allows patient and therapist to determine mutually agreed upon rules regarding 3rd party intervention. (17 ref)—J. Kelly.

7883. Wolstein, Benjamin. (William Alanson White Inst, New York, NY) **"I" processes and "me" patterns: Two aspects of the psychic self in transference and countertransference.** *Contemporary Psychoanalysis*, 1974(Jul), Vol 10(3), 347-357.—Discusses the relationship between "I" processes and "me" patterns and how they affect therapeutic inquiry in practice. The therapeutic process becomes a shared experience between psychoanalyst and patient and is both psychic and ego-interpersonal involving their individual, subjective "I" processes and their objective, social "me" patterns.

7884. Worpell, Donald F. **Hypnotherapy with a hallucinating schizophrenic.** *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 134-137.

7885. Young, Howard S. (Family Service, Montgomery County, PA) **A framework for working with adolescents.** *Rational Living*, 1974(Spring), Vol 9(1), 3-7.—Suggests therapeutic guidelines for working with adolescents within a rational-emotive framework. A systematic, well-structured process is described that includes 4 stages: developing a relationship, defining the problem, teaching the principles of rational thinking, and encouraging change. Therapeutic efforts directed toward reality-facing and constructive problem-solving are highly recommended. Techniques to accomplish these ends, with particular emphasis on their use with adolescents, are presented.—G. Frankel.

7886. Zenz, H.; Brähler, E. & Braun, P. [The validity of on-off patterns as criteria for progress in psychotherapy.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 326-338.—Used W. H. Holtzman's inkblot test as an experimental situation to test changes in communication patterns between therapist and client due to better understanding. 18 male students served as Ss. Analysis of variance of the computer-registered reaction times to the standard questions of the E and frequencies of interaction between E and S indicate that a decrease in E participation and a decrease in reaction times are reliable signs of progress in understanding the experimental situation. It seems, therefore, that the on-off patterns can be used as a criterion for progress in therapy.—W. J. Koppitz.

#### Drug Therapy & Drug Rehabilitation

7887. Abuzzahab, Faruk S. & Kulkarni, Anant S. (U Minnesota Hosp) **A pilot investigation of clinical effects of PM-33, a new anti-anxiety agent.** *Current Therapeutic Research*, 1974(Nov), Vol 16(11), 1181-1186.—Investigated the clinical properties of PM-33, a phenetidine derivative, in 13 neurotic patients. 10 completed the 3-6 wk study and received 50-600 mg/day. Patients were evaluated at 0, 3, and 6 wks using the MMPI, Brief Psychiatric Rating Scale (BPRS), and Wittenborn Psychiatric Rating Scales. Statistically significant improvement was observed among the items of MMPI, BPRS, and Wittenborn scales and in the global severity of illness. Insomnia and headache were present as side effects but decreased with continued treatment. Drowsiness increased with treatment. Tremor was present but

probably was not related to the drug. Nausea, vomiting, dry mouth, and blurred vision were also present.

—*Journal abstract.*

7888. **Ayd, Frank J.** (Taylor Manor Hosp, Ellicott City, MD) **A critical evaluation of molindone (Moban): A new indole derivative neuroleptic.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 447-452.—Reviews data gathered from almost 9 yrs of clinical experience with the neuroleptic molindone. Reports in the literature and the author's personal experience with this drug indicate that molindone is a safe, relatively nontoxic neuroleptic having essentially minor and transient side effects and that its therapeutic efficacy is equivalent to other potent antipsychotics in the treatment of various forms of acute and chronic schizophrenia. Slightly higher milligram doses of molindone are required, compared to some other neuroleptics, to achieve the same therapeutic response. Because some patients who have been unresponsive to or intolerant of all other neuroleptics do respond to molindone, it is concluded that this neuroleptic should be considered a useful addition to the list of antipsychotic drugs. (31 ref)  
—*B. Lindsey.*

7889. **Ayd, Frank J.** (Taylor Memorial Hosp, Ellicott City, MD) **Once-a-day dosage tricyclic antidepressant drug therapy: A survey.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 475-480.—Responses to a questionnaire mailed to a sample of 1,000 private practice and 1,000 hospital-based psychiatrists indicate a high percentage among them of prescribers of single daily dosages of tricyclic antidepressant drugs. The safety and effectiveness of this method of treatment are detailed, together with such advantages as greater likelihood of compliance with prescription instructions.

7890. **Bancroft, John; Tennent, Gavin; Loucas, Kypros & Cass, James.** (U Oxford, Warneford Hosp, England) **The control of deviant sexual behaviour by drugs: I. Behavioural changes following oestrogens and anti-androgens.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 310-315.—Assessed the effects of cyproterone acetate and ethinyl estradiol on sexual behavior of 12 sexual offenders, using a combination of behavioral, attitudinal, and physiological measures. There was no significant difference between the drugs on any measure. They were equally effective in reducing frequency of sexual thoughts and sexual activity, whereas only cyproterone acetate produced a weak effect in reducing erectile and subjective responses to erotic stimuli. The possibility of a placebo effect cannot be excluded. On the dosages used, neither drug produced troublesome side effects. (23 ref)—*Journal summary.*

7891. **Campanella, G. & Pennetta, R.** (U Bari, Clinica delle Malattie Nervose e Mentali, Italy) **[Experience in the treatment of Parkinson's disease with L-Dopa associated with a decarboxylase inhibitor (Ro 4-4602).]** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 252-263.—Studied 19 male and 3 female patients who were given both drugs for 5-28 mo. Their symptoms improved quickly and markedly with only "central" levodopa side effects. This therapy is more easily handled and rapidly effective than levodopa therapy alone, requires fewer administrations during the day, and

abolishes "peripheral" side effects of levodopa.—*M. Stanford.*

7892. **Carpani, L.** (Istituto Psichiatrico Provinciale "G. Antonini," Limbiate, Italy) **[One-year experience in the treatment of chronic schizophrenic states by floripipamide (Piperonil).]** (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1489-1497.—Administered only Piperonil in doses of 240-400 mg/day to 50 females whose histories included several years' hospitalization, intensive treatment with neuroplegics and Rauwolfia derivatives, and incapacity for group therapy. Results show shorter durations of hallucination and delirium, minimal side effects, and a growing desire and capacity in every case to harmonize with the environment. It is concluded that Piperonil is especially effective in autistic cases and that it has considerable advantages over other butyrophene derivatives discussed. (French & English summaries) (30 ref)—*L. Klinkon.*

7893. **Cuskey, Walter R. & Premkumar, T.** (U Pennsylvania) **A differential counselor role model for the treatment of drug addicts.** *Health Services Reports*, 1973(Aug), Vol 88(7), 663-668.—Discusses the various treatment modalities available to drug addicts, particularly the model using counselors in differential roles. Addicts' needs during the following plans of treatment are outlined: crisis intervention, progressive treatment, and social re-entry. Counselor roles include the ex-addict counselor, junior counselor, and senior counselor. The matching of counselor skills and wages, status of the counselor, and the addicts' need for different relationships are discussed.—*R. S. Albin.*

7894. **de Giacomo, P. & Pierri, G.** (U Bari, Clinica per le Malattie Nervose e Mentali, Italy) **[Clinical evaluation of bromazepam with special reference to the obsessive and phobic syndromes.]** (Ital) *Acta Neurologica*, 1974(May-Jun), Vol 29(3), 307-313.—Administered bromazepam to 20 female patients 20-74 yrs old. The drug was well tolerated and had a therapeutic effect in 40% of the cases. It is probably more beneficial than other benzodiazepines.

7895. **El-Yousef, M. Khaled & Manier, D. H.** (Vanderbilt U) **Effects of conjugated estrogens on plasma butaperazine levels.** *Psychopharmacologia*, 1974, Vol 39(1), 39-41.—Utilized a randomly assigned controlled-experimental grouping with a crossover design, using Ss as their own controls, to study the effects of conjugated estrogens on plasma butaperazine (Repoise) levels in 6 postmenopausal female schizophrenic patients. Significantly higher plasma butaperazine levels were measured following both a single loading dose and with maintenance doses of oral butaperazine in Ss when they were taking conjugated estrogens as compared to when they were not taking conjugated estrogens. The underlying mechanisms for these findings and their clinical implications are discussed briefly.—*Journal abstract.*

7896. **Fox, Vernelle.** (U Southern California, Medical School) **Dynamics of substance abuse and management.** In *B. C. Ring & D. R. Schrader (Eds), Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.—Describes



rehabilitation service requirements for 4 types of addiction—alcoholism, sedative dependency, teenage "chemical rebellion," and narcotics addiction. The unique characteristics of each type of abuse, the services required by each type, and potential barriers to providing these services are discussed.

7897. **Gardos, George.** (Boston State Hosp. MA) **Are antipsychotic drugs interchangeable?** *Journal of Nervous & Mental Disease*, 1974(Nov), Vol 159(5), 343-348. —Studied the interchangeability of effective antipsychotic compounds in a clinical setting. 60 formerly hospitalized chronic schizophrenics were randomly assigned to chlorpromazine, thiothixene, or continued doctor's choice medication groups. Dose of antipsychotic medication and schedule of administration were kept constant. During the 2-yr study period 16 patients (44%) in the combined chlorpromazine and thiothixene groups ("switched group") underwent clinical deterioration to an extent that they had to be terminated from the study. Only 2 patients (12%) of the control group relapsed during the same period. The significant difference in relapse rates is attributed to the change in antipsychotic medication. Relapses were equal in number during the 1st and 2nd 6 mo of the study. The new antipsychotic (chlorpromazine or thiothixene) may have delayed but did not prevent the relapse of these patients.—*Journal abstract*.

7898. **González López, J. L.** [Monoclorimipramine in schizophrenia.] (Span) *Revista de Psiquiatria y Psicología Médica*, 1974(Jan-Mar), Vol 11(5), 315-320.—Presents 22 cases where patients improved with use of the drug and describes 5 cases in detail.

7899. **Howard, James S.** (Eastern State Hosp, Williamsburg, VA) **Haloperidol for chronically hospitalized psychotics: A double-blind comparison with thiothixene and placebo: A follow-up open evaluation.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 458-463. —Compared the treatment efficacy and side effects of haloperidol (Haldol) with those of thiothixene and those of placebo in an intensive program designed to release chronically hospitalized psychiatric patients from custodial care through the use of high doses of the chemotherapeutic agents. 46 women considered intractable psychotics, mean age 46.5 yrs and mean duration of illness 20.3 yrs, were selected for the study. Daily dosage was individually determined and did not exceed 200 mg of either active compound over the trial period (12 wks maximum). Results of 3 rating scales as well as treatment success consistently favor haloperidol. 43% of the haloperidol-treated patients, 31% of the thiothixene-treated patients, and 23% of the placebo-treated patients were considered no longer to require custodial care. It is concluded that haloperidol has a wide margin of safety for prolonged usage and that its treatment efficacy is not dependent upon the age or chronicity of the patient.—*B. Lindsey*.

7900. **Kline, N. S. & Shah, B. K.** **A pattern of antidepressant effect of tryptophan & imipramine in males and females.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 481-483.—Explicated sex differences in response to drug treatment. 15 male and 19 female patients in active depressive phase were randomly assigned to tryptophan or imipramine treatment for a

period of 6 wks. Tryptophan total daily dose was 3-6 g; imipramine total daily dose was 150-225 mg. Whereas an analysis of variance did not yield significant differences in average therapeutic ratings attributable to the drugs, the ratings of female patients were significantly lower ( $p < .05$ ) than those of males for both tryptophan and imipramine. Sex differences in drug effectiveness are indicated.—*B. Lindsey*.

7901. **Lehmann, Heinz E.** (Douglas Hosp, Montreal, Quebec, Canada) **The somatic and pharmacologic treatments of schizophrenia.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7902. **Lievens, Paul.** (U Louvain, Belgium) [Use of psychotropic drugs in infantile psychoses.] (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 591-607. —Presents a case history of an autistic child 2 yrs and 4 mo old who was treated with a combination of neuroleptic medication and psychotherapy for several years. (English, Dutch, German, Italian & Spanish summaries)

7903. **Martin, William E.; Loewenson, Ruth B.; Resch, Joseph A. & Baker, Abe B.** **A controlled study comparing trihexyphenidyl hydrochloride plus levodopa with placebo plus levodopa in patients with Parkinson's disease.** *Neurology*, 1974(Oct), Vol 24(10), 912-919.—30 65-67 yr old patients were treated with trihexyphenidyl hydrochloride plus levodopa or placebo plus levodopa for 6-8 mo. No differences were observed between the groups in terms of dosage of levodopa required to maintain optimal function, the extent of the beneficial response, and the incidence of adverse reactions. (18 ref)

7904. **Moldofsky, Harvey; Tullis, Carol & Lamon, Richard.** (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **Multiple tic syndrome (Gilles de la Tourette's syndrome).** *Journal of Nervous & Mental Disease*, 1974(Oct), Vol 159(4), 282-292.—Studied biological and psychosocial features which influence the outcome of haloperidol treatment of multiple tic syndrome. Data from 15 11-40 yr old patients show that responders to haloperidol who have a family history of tics may suffer from a genetic and metabolic disorder, whereas nonresponders, who are inclined to perinatal abnormalities and have a later onset of tics, have an acquired disorder. Behavioral disturbances and psychosocial adaptation may influence or be influenced by drug usage. The hypothesis of uric acid metabolic abnormality was not supported, but dopaminergic and/or  $\gamma$ -hydroxybutyrate neural systems may be implicated. (34 ref)—*Journal abstract*.

7905. **O'Connor, Gerald.** (Florida State U) **Structural impediments in rehabilitation programs for drug addicts.** *Journal of Drug Issues*, 1974(Spr), Vol 4(2), 99-106. —Illustrates some problems arising from a unidimensional social control approach to drug treatment programs through a description of addict and parole agent interactions in a halfway house for adult male addicts. Attitudes of addicts included nostalgia for the pleasurable experiences of drug use, attachment to a deviant subculture, and low frustration tolerance. Parole agents acted as authoritarian, paternalistic controllers who viewed addiction as a personal and moral problem,

rather than as a social problem. Interactions between addicts and parole agents resulted in hostility and distance, rather than in development of a working therapeutic community. It is suggested that drug addiction treatment programs should emphasize social change as well as social control and should redefine the role of parole agents.—*J. Kelly.*

7906. Perales C., J. Alberto; García M., Alberto; Infantes P., Víctor & Valle E. D., Godofredo. (Clinica San Antonio, Lima, Peru) [Comparative study of clotiapine and trifluoperazine in acute paranoid schizophrenia.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 207-213.—Carried out a double-blind study of trifluoperazine and a new antipsychotic drug, clotiapine, with 30 patients in the acute stage of paranoid schizophrenia. Each of the 2 groups of 15 Ss received one of the drugs and the therapeutic and secondary effects were assessed by means of standard scales and clinical procedures. Results show a statistically significant difference in favor of clotiapine, which was more useful than trifluoperazine in reducing several psychotic symptoms such as hostility, paranoid mood and thought, and emotional isolation. (17 ref)—*English summary.*

7907. Prien, Robert F. & Caffey, Eugene M. (VA Hosp. Central Neuropsychiatric Research Lab, Perry Point, MD) **The current status of lithium prophylaxis.** *Diseases of the Nervous System*, 1974(Oct), Vol 35(10), 470-471.—Summarizes controlled studies which showed that lithium was more efficacious than imipramine or placebo in reducing the severity of episodes of primary affective illness (mania and depression). The importance of identifying lithium responders and of comparing the drug with other treatment methods is stressed. (18 ref)

7908. Ransom, Raymond A. (Harlem Hosp Ctr, Alcoholism Program, New York, NY) **Comprehensive alcoholism program.** *Psychiatric Annals*, 1974(May), Vol 4(5), 73-83.—Describes the major treatment goals and strategies of a multiservice, multidisciplinary alcoholism treatment program at Harlem Hospital Center. Facilities include a detoxification unit, an outpatient clinic, and a therapeutic halfway house. Following complete medical and psychiatric evaluation, patients are referred to appropriate clinics and given supportive family and individual psychotherapy. Rehabilitation and training are stressed, and strong ties are maintained with Alcoholics Anonymous and similar organizations. The need to understand the sociocultural backgrounds of patients, and to include recovered alcoholics and individuals of similar backgrounds on the staff is stressed.—*C. Wright.*

7909. Reese, Christine C. (Norwich State Hosp, CT) **Forced treatment of the adolescent drug abuser.** *American Journal of Occupational Therapy*, 1974(Oct), Vol 28(9), 540-544.—Describes techniques of force or coercion used to admit and maintain 48 adolescent drug abusers in a treatment program. The coercion came from 3 sources: parents, a significant adult, or the courts. Analysis of a treatment model designed for forced inpatient treatment indicates that patients' attitudes changed from seeking self-destruction to using constructive measures to cope with their psychosocial problems.—*Journal abstract.*

7910. Ré, Osvaldo. (Riker Labs, Northridge, CA) **2-dimethylaminoethanol (deanol): A brief review of its clinical efficacy and postulated mechanism of action.** *Current Therapeutic Research*, 1974(Nov), Vol 16(11), 1238-1242.—Reports evidence from the literature that deanol is effective in the management of learning and behavior (hyperkinesia) disorders of childhood. Deanol represents the only well-documented pharmacological alternative to the use of amphetamine and amphetamine-like drugs in the management of these children. There is strong evidence that deanol is effective also in levodopa-induced dyskinesias and Huntington's chorea. These findings, however, need reconfirmation. It is important that the drug be used at appropriate dosage and for prolonged periods. Research suggests that deanol may be helpful in other neurological disorders (e.g., tardive dyskinesias and mania). With respect to deanol's mechanism of action, it has been demonstrated that the drug is a precursor of choline and that it crosses the brain barrier; evidence strongly suggests that deanol is a precursor of acetylcholine. (15 ref)—*Journal abstract.*

7911. Rizzitelli, F. & Spina, A. (Ospedali Riuniti de Foggia, Div Neurologica, Italy) [The effect of imipramine-desipramine association on depressive disorders: EEG study during spontaneous sleep.] (Ital) *Acta Neurologica*, 1973(Sep-Oct), Vol 28(5), 580-587.—Carried out a study with 5 females and 3 males, of whom 4 suffered from severe forms of depression, 3 from depressive neuroses, and 1 from psychomotor arrest. Ss were divided into 2 groups, the 1st group receiving imipramine and desipramine and the 2nd group imipramine only. Clinical and laboratory studies were done and EEGs taken before and several times during the 32-day treatment. While the administration of imipramine alone influenced the sleep pattern only slightly after 1 mo, imipramine and desipramine together altered the patients' sleep remarkably after 4 days, with gradual normalization occurring. Specific improvements were established from a clinical viewpoint and from the EEGs. (Italian & English summaries) (27 ref)—*M. J. Stanford.*

7912. Robinson, David. (U London, Inst of Psychiatry, England) **Alcoholism as a social fact: Notes on the sociologist's viewpoint in relation to a proposed study of referral behaviour.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 91-97.—Suggests probable areas of concern of sociologists involved in referral behavior, particularly as it relates to alcoholism. A sociologist's definition of alcoholism and the component parts of that definition are also offered.

7913. Robinson, J. T.; Chitham, R. G.; Greenwood, R. M. & Taylor, J. W. (Roffey Park Hosp, Horsham, England) **Chromosome aberrations and LSD: A controlled study in 50 psychiatric patients.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 238-244.—Conducted a controlled study of chromosome aberrations of 100 lymphoid cells in each of 50 psychiatric patients and 50 controls. Results show no significant difference between the control and patient Ss and support the latest review of the literature which indicates that LSD does not cause chromosome breakage. (23 ref)

7914. Robinson, Marilyn B. (Burke Rehabilitation Ctr, White Plains, NY) **Levodopa and Parkinsonism.** *Ameri-*



*can Journal of Nursing*, 1974(Apr), Vol 74(4), 656-661. —Describes the psychological effects of Parkinson's disease including inability to perform activities of daily living, acute depression, social isolation, and strained family and personal relationships. Effective rehabilitation of Parkinson's disease by chemotherapy with resultant role reversals is described as problematical for the S and family.

7915. Rucker, T. Donald. (Ohio State U, Coll of Pharmacy) **Drug use: Data, sources, and limitations.** *JAMA: Journal of the American Medical Association*, 1974(Nov), Vol 230(6), 888-890. —Discusses characteristics and sources of drug utilization data (e.g., demographic and socioeconomic differences in drugs used and the type of data obtained from manufacturers, prescribers, dispensers, and patients). Limitations of these sources of information are examined, and the need for a model information system for prescription services to support professional decision making in patient care is discussed. (24 ref)

7916. Salmoni, G.; Amati, A.; Vacca, L. & Giambelluca, A. (U Napoli, Facolta di Medicina e Chirurgia, Italy) [Clinical and therapeutic considerations on the effect of bromazepam, (Ro 5-3350), a new benzodiazepine derivative, on obsessive-compulsive and phobic symptoms.] (Ital) *Acta Neurologica*, 1973(Sep-Oct), Vol 28(5), 588-609. —Presents individual descriptions of the cases of 7 males and 8 females 21-59 yrs old hospitalized at the University of Naples. Clinical, personal, and psychodynamic data were gathered. Patients were interviewed frequently and 11 were given Rorschach tests. Blood and urine studies were done and EEGs were taken. The amount of bromazepam administered varied according to patient. Observation periods were 3-5 wks, longer for a few patients. Bromazepam was subjectively well tolerated, showing good therapeutic effects without damaging liver and kidney functions. It is considered satisfactory in view of the well-known fact that psychopathological manifestations in obsessive-compulsive and phobic patients are generally resistant to drugs. (Italian & English summaries)—*M. J. Stanford*.

7917. Sathananthan, Gregory L.; Rick, William; Matz, Rodney & Angrist, Burton M. (New York U, Medical Ctr) **Psychomotor effects of a new CNS stimulant, Abbott 34519.** *Current Therapeutic Research*, 1974(Nov), Vol 16(11), 1177-1180. —Conducted a study with 8 depressed inpatients to determine a dosage of A-34519 which could be used in a more definitive study to evaluate the drug's antidepressant effect. Under conditions of this study, the drug induced stimulant and neurological effects which made it almost impossible to elicit any antidepressant effect. 3 patients showed a partial or complete remission during the placebo lead-in phase of the study. This is consistent with prior observations that placebo response is common in depressive illness. The minimal "improvement" observed in some patients may have been nonspecific central nervous system stimulation rather than true antidepressant effect. The effects of this drug in this group of patients do not suggest a potent antidepressant effect which has rapid onset at doses below those giving severe stimulation and dysphoria. The usefulness of A-34519 in

certain other depressive illnesses can be ascertained only with another clinical trial.—*Journal abstract*.

7918. Scelles, F.; Mahuzier, G.; Saby, J. & Borenstein, P. (Hôpital psychiatrique de Villejuif, France) [Usefulness and dosage of ornithine-carbamyl-transferase in a psychiatric milieu.] (Fren) *Annales Médico-Psychologiques*, 1974(Feb), Vol 1(2), 183-193. —The dosage required for ornithine-carbamyl-transferase activity provides a valuable auxiliary for determining the hepatic innocuousness of a treatment regime. Its sensitivity permits a monitoring of the reactivity of the hepatic cell to changes in drug therapy, or even to changes in dose levels, in certain Ss. Both drug and alcohol addiction are related to increases in the activity of this enzyme.—*H. E. King*.

7919. Schuckit, Marc A. & Cahalan, Don. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Evaluation of alcohol treatment programs.** *US Navy Medical Neuropsychiatric Research Unit, Technical Report*, 1974(Jul), No 74-53, 32 p. —Discusses evaluation theory and procedures as they pertain to alcoholism treatment programs. After a review of the literature on alcoholism treatment, concrete guidelines are presented for doing evaluation research. (5 p ref)

7920. Shelley, Edward M.; Mendlewicz, Julien & Fieve, Ronald R. (Columbia U, Coll of Physicians & Surgeons) **Affective disease health maintenance organization: Patterns of lithium response.** *New York State Journal of Medicine*, 1974(Sep), Vol 74(10), 1766-1768. —Studied the effectiveness of a health maintenance program for patients with recurrent affective disease. 20 manic-depressive and recurrent depressive patients, whose average age was 51.9 yrs, were given maintenance doses of lithium carbonate over a 78-wk period. Ss were seen at least 1 time/mo by a rating team of psychiatric nurses and aides who administered a structured interview using a manic-depressive rating scale. It was found that 14 Ss did not require additional medication or psychiatric consultation. It is concluded that treatment programs emphasizing "well-care" and prevention of affective episodes can be successful with manic-depressive and depressive patients.—*J. Kelly*.

7921. Small, Joyce G. & Kellams, Jeffrey. (Indiana U, Medical School, Larue D. Carter Memorial Hosp) **Early hospital experience with fluphenazine decanoate.** *Disorders of the Nervous System*, 1974(Oct), Vol 35(10), 453-456. —Studied treatment effects of the depot injectible drug fluphenazine decanoate (FD) and the impact of its availability upon hospital practice. Hospital pharmacy records were used to identify those patients who received the medication initially as inpatients, who had received more than 2 injections of the drug, and who were followed for a minimum of 6 wks. 5 males and 8 females, mainly diagnosed schizophrenics 22-47 yrs old, met the inclusion criteria and were selected for FD injection, primarily because they could not be relied upon to take oral medications. Results show that the outcome of treatment was considered satisfactory in only 5 of the patients; in the others, unusually severe and prolonged side effects indicated discontinuation of the drug after an average of less than 2 mo. This finding suggests that depot injectible phenothiazines may be

unsafe when exposure to such drugs occurs without intermittent respites. (23 ref)—*B. Lindsey.*

7922. Soloway, Irving H. (Temple U) **Methadone and the culture of addiction.** *Journal of Psychedelic Drugs*, 1974(Jan), Vol 6(1), 91-99.—Describes changes in the culture of the urban heroin addict following introduction of a methadone maintenance outpatient program. The functionally adaptive aspects of heroin addiction were determined through interviews with 103 active illegal drug users. Primary methadone abuse and the relation of cocaine use to methadone are also considered. Findings contradict funding agency reports of the methadone program's success in reducing drug abuse and criminal activity and in encouraging addict employment. It is concluded that methadone has been assimilated into the addict's culture as another form of drug abuse.—*R. Tomasko.*

7923. Sweet, Richard D. & McDowell, Fletcher H. (New York Hosp—Cornell Medical Ctr, NY) **Plasma dopa concentrations and the "on-off" effect after chronic treatment of Parkinson's disease.** *Neurology*, 1974(Oct), Vol 24(10), 953-956.—Measured plasma concentrations of levodopa during "on" (mobile and dyskinetic) and "off" (akinetic or tremulous) episodes in 10 patients. Results show that (a) levodopa levels were higher during "on" than during "off" spells, (b) a diet containing less than 10 gm/day of protein resulted in higher plasma levodopa levels, and (c) the "on-off" effect was greatly relieved by low protein diets in 3 of 11 patients. (40 ref)

7924. van Praag, H. M. (Psychiatric U Clinic, Groningen, Netherlands) **Therapy-resistant depressions: Biochemical and pharmacological considerations.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine*, Amsterdam, 1973: *Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

7925. Vitezza, Matteo. (Regina Margherita Hosp Board, Div of Neurology, Messina, Italy) **[Psychopharmacological therapy with pyritinol hydrochloride in child psychiatry.]** (Ital) *Medicina Psicosomatica*, 1972(Jan), Vol 17(1), 53-69.—Reports on the use of pyritinol hydrochloride (Encephabol) in psychiatric disorders of children, mainly postencephalitic epileptic syndromes, character disorders, and mental deficiency. Ss were 120 children 5-15 yrs old with organic brain damage, divided into 3 age groups (5-7, 7-12, and 12-15). To evaluate the results, the Wechsler-Bellevue Intelligence Scale, the Bender-Gestalt, and other tests were administered. It was found that the drug acts on perception, cognitive functions, memory, emotions, and motor and visual coordination, thus showing it to have psychotropic properties affecting higher psychic activities. (English & French summaries)—*D. Araoz.*

7926. Whiskin, Frederick E. **An interview with a patient under the influence of marijuana.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 198-199.—Compares an interview of a 19-yr-old marijuana user with an interview of a sodium amyltal user under light hypnosis. It is suggested that in both cases, the repressive ego forces were weakened enough so that the patient could speak in a language quite close to the unconscious meanings of drug usage.

## Behavior & Group Therapy

7927. Altamura, Leonard S. & Chitwood, P. R. (Calhoun-Cleburne Mental Health Ctr, Anniston, AL) **Covert reinforcement and self-control procedures in systematic desensitization of gagging behavior.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 563-566.—A case of chronic gagging associated with numerous topographically dissimilar conditional stimuli in a 26-yr-old male was successfully treated in 11 sessions of behavioral therapy. A flexible, multifaceted approach was applied utilizing systematic desensitization, covert reinforcement, and self-control procedures.

7928. Anderson, Kathryn A. & King, H. Elizabeth. (U Oregon, Medical School) **Time-out reconsidered.** *Journal of Instructional Psychology*, 1974(Spr), Vol 1(2), 11-17.—Traced the development of the use of time-out (TO) from positive reinforcement from its origins in the laboratory to its current application in child treatment and school settings. The differences among the quite diverse procedures currently carrying the label TO are described, with special emphasis directed at unintended behavioral problems produced by the inappropriate use of TO procedures. Because of the inappropriate use of TO procedures, and subsequent public criticism, it is recommended that (a) TO should be used only by trained or properly supervised professionals, teachers, and parents, (b) the child in TO should be vigilantly monitored, (c) new labels should be found for procedures which have little in common with each other, and (d) public understanding and cooperation should be sought. (18 ref)—*Journal abstract.*

7929. Bass, Barry A. (Towson State Coll) **Sexual arousal as an anxiety inhibitor.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 151-152.—Reports that a 24-yr-old male was successfully treated for impotence using a variant of systematic desensitization. The treatment substituted sexual arousal for the relaxation response used in conventional desensitization. "Insight" gained as a result of treatment is discussed.—*Journal abstract.*

7930. Billings, James H.; Rosen, David H.; Asimos, Chris & Motto, Jerome A. (U California, Medical Ctr, Langley Porter Neuropsychiatric Inst, San Francisco) **Observations on long-term group therapy with suicidal and depressed persons.** *Life-Threatening Behavior*, 1974(Fal), Vol 4(3), 160-170.—Describes a long-term, open-ended group for depressed and suicidal individuals who had made suicide attempts. 200 persons participated in the sample groups over a 46-mo period, with only 10 suicide attempts and 1 suicide occurring in this high-risk group during the period of the study. Observations corroborate some findings and differ from other reported experiences with groups of individuals who have manifested suicidal behavior. Recommendations for starting groups of suicidal persons are presented, and it is stressed that this method of therapy appears to be an effective mode of suicide prevention.—*Journal abstract.*

7931. Book, Howard E. (New Mount Sinai Hosp, Toronto, Ontario, Canada) **Hypnosis, aversive conditioning and transference improvements.** *American Journal of Clinical Hypnosis*, 1974(Apr), Vol 16(4), 256-260.—Describes the successful treatment of a



patient with amphetamine abuse who received aversive conditioning under hypnosis.

7932. **Brudny, Joseph et al.** (Bellevue Hosp Ctr, New York, NY) **Sensory feedback therapy as a modality of treatment in central nervous system disorders of voluntary movement.** *Neurology*, 1974(Oct), Vol 24(10), 925-932.—Used audiovisual sensory feedback from muscles to treat 36 patients, most of whom had received conventional therapy for up to 25 yrs with limited or no improvement. Ss learned volitional control of the functionally defective muscle group by means of audiovisual displays of integrated myoelectric activity from the monitored muscles. As volitional control of motor activity was achieved, the exteroceptive feedback was gradually withdrawn. 32 Ss responded with varying degrees of improvement ranging from functional "recovery" to symptomatic relief within 8-12 wks. It is suggested that a significant number of patients with disrupted internal feedback loops can incorporate the learned movement pattern by using those components of the neuromuscular system that are still functionally available. (22 ref)—*Journal abstract*.

7933. **Burchard, John.** (U Vermont, Clinical Training Program) **Behavior modification with the delinquent offender.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973. xv, 132 p. \$9.75.

7934. **Burger, A. W.** (U Amsterdam, Psychological Lab, Netherlands) **[A plan of behavior therapy for J.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 355-363.—Suggests that the basic problem of the S (whose initial is "J") described by T. de Wever (see PA, Vol 53:Issue 4) is total dependence on the approval of others. The process of rehabilitation would include a systematic desensitization of the S by which she would learn to tolerate the absence of sympathy by others. The S must discard her self-imposed dictum, which may be stated "I must satisfy everyone because everyone must find me nice." The desensitization process employs a rational emotive therapy that includes "flooding," a technique consisting of a series of disquieting situations which the S must learn to tolerate. Desensitization would also include assertive training by which the S would learn self-assertion to replace her almost total dependence on the approval of others.—*A. J. Ter Keurst*.

7935. **Caird, William K. & Wincze, John P.** (Dalhousie U, Halifax, Nova Scotia, Canada) **Videotaped desensitization of frigidity.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 175-178.—Videotaped cassettes of heterosexual behavior were arranged in a hierarchy and shown to a 24-yr-old sexually frigid female by her husband, who acted as therapist. Following 7 sessions, significant improvement in the couple's heterosexual behavior was reported. Therapeutic gains were maintained at a 9-mo follow-up. (17 ref)

7936. **Cantor, Alfred J.** **How to turn on the power of your mind with alpha-theta UNITROL: Gateway to the unconscious for creativity, self-healing, enlightenment with the UNITROL of Yoga and Zen.** New York, NY: Hippocrates Press, 1973. xv, 193 p.—Describes a

program of self-control of alpha and theta brain waves—UNITROL—to enhance peace of mind, creativity, and self-awareness. 13 meditations, based on the teachings of Yoga and Zen, the concept of the mind as memory, and methods of achieving tranquility and inner peacefulness by relaxation and free-association procedures are described.

7937. **Carr, John E.** (U Washington) **Behavior therapy in a case of multiple sexual disorders.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 171-174.—The case of a 25-yr-old male is presented to illustrate an approach to the treatment of multiple sexual disorders. The intervention program described involved careful orchestration of a variety of behavioral techniques in order to differentiate the complex contingency relationships and modify the target behaviors.

7938. **Cayner, Jay J. & Kiland, James R.** (Norwood Hosp, Marshfield, WI) **Use of brief time out with three schizophrenic patients.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 141-145.—Brief 5-min response-contingent time out was used to eliminate the inappropriate behavior of 2 female and 1 male 43-56 yr old hospitalized psychiatric patients who were diagnosed as chronic schizophrenics. The procedure was effective in eliminating the aberrant behavior.—*Journal abstract*.

7939. **Chrisman, Marilyn.** (Los Angeles County-U Southern California Medical Ctr, Los Angeles) **Dyspnea.** *American Journal of Nursing*, 1974(Apr), Vol 74(4), 643-646.—Describes psychological interventions for the avoidance or reduction of respiratory disorders. The S's perception of his respiratory distress is identified as the primary factor for diagnosis. Effective psychological interventions include: (a) development of empathic relationships, (b) positive reinforcement of effective ventilation, and (c) use of desensitization exercises for situations of respiratory distress.—*R. G. Gibson*.

7940. **Ciani, Nicola.** (U Roma, Istituto di Psichiatria, Italy) **[Family psychiatry and the pragmatics of communication.]** (Ital) *Rivista di Psichiatria*, 1974(Jan-Feb), Vol 9(1), 1-40.—Utilizes 4 clinical cases and citations from the literature to relate the development of family psychiatry to the rules of human communication: i.e., "impenetrability, the endless game, point-counterpoint, and complementary relationships." Phenomenology, symptomatology, and family intervention are important in understanding behavior. (28 ref)

7941. **Clegg, Hugh G.** (Devereaux Hall/Manor Unit, Devon, PA) **Group analytic practice in the therapeutic community.** *Devereaux Forum*, 1974(Win), Vol 9(1), 1-6.—Outlines the possible use of a psychoanalytic model in group therapeutic interactions. A brief summary is given of the overt and covert dynamics that may occur in different phases of therapy and the role the therapist may play in each.

7942. **Daniels, Lloyd K.** (Central Connecticut State Coll) **A single session desensitization without relaxation training.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 207-208.—In a single 2-hr desensitization session, the entire hierarchy of 15 steps was completed by a 19-yr-old male with a small animal

phobia. Immediately following this and 6 mo later the patient was able to stroke and fondle laboratory rats.

7943. Davis, Robert W. (McLoughlin Mental Health Ctr for Clackamas County, Oregon City, OR) **The patient unready for behavior therapy.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.

7944. Ellis, Albert. (Inst for Advanced Study in Rational Psychotherapy, New York, NY) **Rational-emotive therapy in groups.** *Rational Living*, 1974(Spring), Vol 9(1), 15-22.—Describes how rational-emotive therapy utilizes group work to facilitate change to rational thinking and appropriate emotions. Not all emotions are considered appropriate; inappropriate feelings are held to be caused by irrational beliefs.

7945. Ellis, Albert. (Inst for Advanced Study in Rational Psychotherapy, New York, NY) **Are cognitive behavior therapy and rational therapy synonymous?** *Rational Living*, 1973(Fall), Vol 8(2), 8-11.—Expresses doubt that rational-emotive therapy and cognitive behavior therapy are synonymous. The 2 approaches are differentiated by comparing their theoretical emphasis, desensitization procedures, homework assignments, operant conditioning, and emotive and cognitive emphasis. Rational-emotive therapy (RET) stresses the cognitive factor in the acquisition and change of emotional reactions, while cognitive behavior therapy stresses environmental and mediational processes. RET goes beyond symptom removal methods to obtain deep-rooted philosophic changes. It extends to desensitization of feelings and philosophies rather than merely responses. Homework assignments are done in real life, checked by cognitive challenging, and accompanied by cognitive restructuring. RET may overlap cognitive behavior therapies, but its special theoretical and practical emphasis differentiates it from them.—G. J. Frankel.

7946. Filmer-Bennett, Gordon T. (Div of Corrections, Bureau of Clinical Services, Madison, WI) **The silent patient in the group.** In W. G. Klopfer & M. R. Reed (Eds), *Problems in psychotherapy: An eclectic approach*. Washington, DC: Hemisphere Publishing Corp, 1974. xi, 178 p.

7947. Girodo, Michel. (U Ottawa, Ontario, Canada) **Yoga meditation and flooding in the treatment of anxiety neurosis.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 157-160.—9 18-42 yr old patients diagnosed as anxiety neurotic had their anxiety symptoms monitored by an anxiety symptom questionnaire before practicing yoga meditation at each training session. After approximately 4 mo of practice, 5 patients improved significantly and the other 4 failed to show any appreciable decline in anxiety symptoms. These 4 then engaged in imaginal flooding, in the course of which anxiety decrement occurred. Analysis of patient characteristics suggested that yoga meditation was beneficial for patients with a short history of illness and that flooding was effective in those with a long history. Questionnaire data suggested that the former patients had higher cognitive symptom scores.—*Journal abstract.*

7948. Goldberg, J.; Katz, S. & Yekutieli, E. (Bar Ilan U, Ramat Gan, Israel) **The effects of token reinforcement**

**on the productivity of moderately retarded clients in a sheltered workshop.** *British Journal of Mental Subnormality*, 1973(Dec), Vol 19(37, Pt 2), 80-84.—Investigated use of a token economy with 7 moderately to mildly retarded Ss (mean IQ = 58, mean age = 17 yrs) in a sheltered workshop. Baseline levels of production and preferences for reinforcing items were determined over a 28-day period. Tokens were awarded hourly and exchanged daily at first, with increasing intervals during the 21 experimental days. Productivity increased by 42% during reinforcement and dropped to below-baseline levels after termination of reinforcement. The interaction of the token reinforcement with the reinforcing effect of E's presence and interaction is stressed.—C. Wright.

7949. Hall, Jane S. & Holmberg, Margaret C. (Frank Porter Graham Child Development Ctr, Chapel Hill, NC) **The effect of teacher behaviors and food serving arrangements on young children's eating in a day care center.** *Child Care Quarterly*, 1974(Sum), Vol 3(2), 97-108.—Studied methods of increasing the sampling of different foods by 2 children attending a day care program. All the experimental conditions increased food sampling either singly or in combination. No statistical analyses were performed.

7950. Hannie, Thomas J. & Adams, Henry E. (Charity Hosp, New Orleans, LA) **Modification of agitated depression by flooding: A preliminary study.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 161-166.—Hypothesized that flooding therapy (FT) would be superior to both support therapy (ST) and no-treatment control (NTC) in eliminating the agitated depression which had resulted in the hospitalization of the 21 18-44 yr old females. Pre- and posttreatment measures included the Mental Status Schedule, the Multiple Affect Adjective Check List, the Fear Survey Schedule III, and the WAIS Digit Symbol subtest. The FT and ST Ss attended 3 individual therapy sessions per week for a total of 9 sessions, while the NTC group received no individual sessions but remained on the unit for a similar period of time. Results indicate that, as hypothesized, flooding was the most effective regime.—*Journal abstract.*

7951. Hausman, Margareta. **Parents' groups: How group members perceive curative factors.** *Smith College Studies in Social Work*, 1974(Jun), Vol 44(3), 179-198.—Investigated the treatment of parents in group psychotherapy at a child guidance clinic as seen by the parents and the group therapists. The 2 major schools of thought regarding the approach to parents' groups are contrasted: one emphasizes ego-oriented guidance, the other stresses the development of insight leading to deeper personality change. Parents and therapists evaluated treatment differently as to the importance of the group as family analogy and as to what constituted therapeutic gain. The study points to the need for more effective communication between group leaders and group members.—M. W. Linn.

7952. Hiltz, Philip J. **Behavior mod.** New York, NY: Harper's Magazine Press, 1974. xi, 242 p. \$7.95.—Discusses the theoretical, practical, and ethical strengths and weaknesses of the field of behavior modification. The potential for misuse and abuse of the technology of



behavior by the medical and bureaucratic establishments is examined, along with the documented evidence of its success in treating a variety of psychological and behavioral problems. (4 p ref)

7953. Houle, Thomas A. (Devereaux Foundation, CT) **The use of positive reinforcement and aversive conditioning in the treatment of encopresis: A case study.** *Devereaux Forum*, 1974(Win), Vol 9(1), 7-14.—Describes the procedure and results of a behavior modification program aimed at eliminating encopresis in a 12-yr-old male. A short-term follow-up revealed no symptom substitution.

7954. Ikuta, Takumi. (Kyushu U, Faculty of Medicine, Fukuoka, Japan) **[A behavior therapy for tic: "Counting."]** (Japn) *Kyushu Neuro-psychiatry*, 1972(Dec), Vol 18(3-4), 183-188.—Reports results of a new "counting" method applied in treating a 16-yr-old girl with tic. During the 1-hr sessions, which took place twice a day for 15 consecutive days, the girl sat quietly in her room, pressing the lever of a counter each time the tic occurred. She was instructed not to try to stop the tic, but merely to press the lever for each occurrence just as if she were counting some other person's tics. The number on the counter was visible to the girl. The rate of tic decreased progressively as the number of treatment sessions increased. (English summary) (18 ref)—S. Ashida.

7955. Jensen, Judith L. & McGrew, W. Leona. (Biola Coll) **Leadership techniques in group therapy with chronic schizophrenic patients.** *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 416-420.—Assessed the level of anxiety experienced by 2 groups of 5 male and 5 female chronic schizophrenics who participated in 2 types of group therapy. One group was structured and the leaders maintained a directive role, while the other group was a nonstructured one, with the leaders assuming a nondirective role in the group process. The State-Trait Anxiety Inventory was used to assess anxiety levels, and blood pressure and pulse rate were used as measures of physiological arousal. Significantly more anxiety and/or arousal was experienced by Ss in the structured than in the nonstructured group. No differences in pulse rate were observed. When blood pressure measures taken before the groups began were examined, Ss in the structured groups exhibited higher levels of arousal than Ss in the unstructured group. Males had higher anxiety scores than females. (32 ref)—*Journal abstract*.

7956. Johnson, Richard K. & Meyer, Robert G. (U Louisville, Psychology Clinic) **Phased biofeedback approach for epileptic seizure control.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 185-187.—A phased biofeedback method for seizure control was used in an 18-yr-old female. Based on reports that epileptic seizures can be prevented by EEG biofeedback, a phased sequence of relaxation training, electromyogram feedback, and feedback of alpha and theta EEG frequencies was employed to develop a low arousal, antistress response. Intervention over a 1-yr period resulted in a 46% decrease in monthly seizures. Follow-up showed maintenance of decreased seizure activity. Self-report and charges in locus of control

orientation affirm the learning of an effective antistress response.—*Journal abstract*.

7957. Jongerius, P. J. (Psychotherapeutic Ctr, Halstereen, Netherlands) **[Cooperating with others about yourself: Group psychotherapy.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Jul), Vol 29(5), 377-384.—Discusses the rehabilitation of the S described by T. de Wever (see PA, Vol 53:Issue 4) from the viewpoint of group psychotherapy. This rehabilitative device deals with the problem of the patient's identity with the therapy group, including her concept of the differences between herself and the group, her concept of the motives of the group, and the techniques that the group employs to assist her in reducing her feelings of inadequacy.—A. J. Ter Keurst.

7958. Joseph, Brian S. (Erich Lindemann Mental Health Ctr, Boston, MA) **Lessons on heroin abuse from treating users in Vietnam.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 742-744.—2 psychiatric workers and a chaplain established a voluntary, 3-wk, therapeutic community program for heroin users in their Vietnam unit, intended for users who were psychologically stable. The program was a failure, apparently partly because the more stable heroin users were able to work effectively and did not enter the program; those who did take part usually entered under pressure, such as threat of prosecution, and apparently had been significantly disturbed before becoming users. The need to constantly reevaluate widely held assumptions about drug abuse is stressed.—*Journal abstract*.

7959. Karapetian, Mary. **Modeling variables and procedures with socially withdrawn children.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 22-38.—Presents a review of the literature on the rationale of modeling, how it functions as a learning process, the effects of reinforcement and punishment on modeled responses, the effects of individual and situational variables on modeling behaviors, and the effectiveness of modeling with socially withdrawn children. The treatment of withdrawn children usually involves 2 approaches—anxiety reduction by close interpersonal contact and the development of appropriate social skills. The use of shaping, desensitization, and a combination of these with modeling in treating withdrawn children is discussed. It is concluded that modeling is a durable, flexible, and efficient method of teaching behaviors. (19 ref)—L. Gorsey.

7960. Katz, Roger C. (U of the Pacific) **Single session recovery from hemodialysis phobia: A case study.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 205-206.—In an 18-yr-old male renal patient with a phobia for hemodialysis, the phobia was quickly and successfully resolved by the combined use of systematic desensitization, fading of stimulus control, and social reinforcement.

7961. Kau, Mary L. & Fischer, Joel. (U Hawaii, School of Social Work) **Self-modification of exercise behavior.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 213-214.—Describes the senior author's use of a self-behavior modification program to successfully increase exercise behavior.

7962. Knepler, Kenneth N. & Sewall, Susan. (Ozaukee County Mental Health Clinic, Port Washington, WI)

**Negative practice paired with smelling salts in the treatment of a tic.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 189-192.—After only 80 min of massed practice paired with "smelling salts" (aromatic ammonia), a facial-eye-blink tic of 4-yr duration in a 20-yr-old male declined significantly. By the 6-mo follow-up, almost total symptom remission had occurred.

7963. **Kondáš, O.** (U Komenského, Katedra psychologie, Bratislava, Czechoslovakia) [Developmental trends of psychotherapy by learning.] (Slovak) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 39-44.—Presents a paper given at the meeting of the Slovak Psychiatric Association. The history, stages, trends, schools, and representatives (mostly American) of behavioral therapy are reviewed and discussed. The application, limitations, and overall significance of "therapy by learning" are briefly evaluated. (Russian & English summaries) (21 ref)

7964. **Le Boeuf, Alan.** (Hollymoor Hosp, Northfield, England) **Aversion treatment of headbanging in a normal adult.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 197-199.—A case of headbanging in a 23-yr-old male, normal in all other respects, was treated by the application of a mild punishment contingency (interruption of recorded music or an alarm) which could be self-imposed at home. The undesired behavior was removed over a 45-day period. At follow-up improvement was maintained.

7965. **Leibowitz, J. Michael & Holcer, Pauline.** (U Nebraska, Medical Ctr, C. Louis Meyer Children's Rehabilitation Inst) **Building and maintaining self-feeding skills in a retarded child.** *American Journal of Occupational Therapy*, 1974(Oct), Vol 28(9), 545-548.—Used operant conditioning techniques to teach a 4-yr-old echolalic female with severe behavior problems to accept an increasing variety and texture of foods while concurrently developing appropriate self-feeding skills. S had existed for 3 yrs on a diet consisting primarily of cinnamon toast, bacon, milk, and eggnog. 15 working days were required to teach her to self-feed and accept nutritionally balanced meals. Progress in other self-help areas accompanied the acquisition of self-feeding skills, which were still present 5 mo after termination of treatment.—*Journal abstract.*

7966. **Levine, Fredric M. & Fasnacht, Geraldine.** (State U New York, Stony Brook) **Token rewards may lead to token learning.** *American Psychologist*, 1974(Nov), Vol 29(11), 816-820.—Questions the widespread use of tokens to effect desired changes in behavior. Analysis of data from attribution-type research demonstrates that learning to perform an activity on the basis of external, token reinforcement does not generalize to natural reinforcement but leads, instead, to a decrease of intrinsic interest in the activity. Withdrawal of the token reinforcement often reduces performance. This may be because the generalization paradigm used is often either a discrimination or an extinction paradigm. It is suggested that employment of token reinforcement be restricted to situations in which an important behavior has a low base-rate of occurrence. (26 ref)—*B. Lindsey.*

7967. **Lowenstein, L. F.** **The treatment of moderate school phobia by negative practice and desensitization procedures.** *Association of Educational Psychologists'*

*Journal & Newsletter*, 1973(Win), Vol 3(3), 46-49.—Studied 12 children whose school phobias were expressed in various bodily ailment complaints and anxieties related to school attendance and leaving home. 2 matched groups of 6 children each, ages 9-14 yrs, were subjected to either J. Wolpe's systematic desensitization technique or discussion sessions. After 5 wks of treatment, both groups underwent a 5-wk period of a verbal extinction procedure known as negative practice. While both groups improved, a greater reduction in personal distress was experienced by children in the desensitization group. Improvement in academic work was also reported by the schools they attended. A 6-mo follow-up indicated that improvement was maintained.—*I. L. Zimmerman.*

7968. **Lubetkin, Barry S. & Fishman, Steven T.** (Inst for Behavior Therapy, New York, NY) **Electrical aversion therapy with a chronic heroin user.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 193-195.—A 23-yr-old male graduate student who had been using heroin for 3 yrs was treated with electrical aversion conditioning. The drug-taking behavioral sequence was broken into discrete phases which the patient imagined and verbalized. An 8-mo follow-up showed him to be drug free.

7969. **Mahoney, Michael J.** (Pennsylvania State U) **Cognition and behavior modification.** Cambridge, MA: Ballinger, 1974. xv, 351 p.—Discusses the rationale, principles, procedures, criticisms, and moral issues involved in cognitive behavior modification. Models of covert conditioning and cognitive learning, the therapeutic implications of these models, and measurement and theory in mediational research are evaluated. (40 p ref)

7970. **Marti Tusquets, J. L. & Cabrero Avila, L.** [Experience in group psychotherapy.] (Span) *Revista de Psiquiatria y Psicología Médica*, 1973(Oct), Vol 11(4), 225-237.—Discusses group experiences as they relate to psychosocial phenomena, behavior and its analysis, group thinking, fantasy, group structure, corrective experiences, and group functioning in institutional settings. (38 ref)

7971. **Mash, Eric J. & Terdal, Lelf G.** (U Calgary, Alberta, Canada) **Behavior-therapy assessment: Diagnosis, design and evaluation.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 587-601.—Discusses the development of behavior-therapy assessment as it relates to social learning theory and practice of behavior modification. Characteristic features of behavior-therapy assessment are outlined and discussed. A framework is provided for considering assessment in terms of initial decision-making and selection of target behavior, design of treatment programs, and evaluation of outcome of treatment. Problems concerning reliability, validity, and generalizability are discussed in relation to each of the phases in assessment. (38 ref)—*Journal abstract.*

7972. **Mathews, A. M.; Johnston, D. W.; Shaw, P. M. & Gelder, M. G.** (U Oxford, Warneford Hosp, England) **Process variables and the prediction of outcome in behaviour therapy.** *British Journal of Psychiatry*, 1974(Sep), Vol 125, 256-264.—Examined variables measured before and during behavior therapy or nonspecific treatment of 36 phobic patients to determine their possible relevance to outcome and to the processes occurring during successful treatment. Measures ob-



tained before treatment did not provide a useful guide to outcome, with the possible exception of high extraversion scores, which were associated with good response irrespective of treatment given. Flooding treatment was associated with a greater initial increase in heart rate, which disappeared after 8 treatment sessions but did not seem to influence outcome. Ratings of phobic anxiety, made by Ss who were improved after desensitization or flooding, declined systematically during treatment. Anxiety experienced when thinking about phobic situations showed a consistent decline after preparatory interviews were completed, but estimated anxiety in real life did not begin to decrease until immediately before the *in vivo* practice phase of treatment.—*Journal summary*.

7973. Meeks, John E. (Psychiatric Inst of Washington, Child & Adolescent Services, DC) **Structuring the early phase of group psychotherapy with adolescents.** *International Journal of Child Psychotherapy*, 1973(Oct), Vol 2(4), 391-405.—Presents techniques for encouraging the open expression of emotions in adolescent psychotherapy groups and for promoting and maintaining group cohesion. These techniques include verbalization by the therapist of feelings, establishment of therapeutic contacts, and a variety of artificial contrivances in which the therapist actively encourages group members to perform certain actions or take particular roles that facilitate the expression of emotion. It is suggested that these techniques are secondary to an overall understanding of group process and individual psychodynamics by the therapist. Thus, they can succeed only if the therapist has a genuine wish for open emotional interaction with his young patients and sufficient skill to use the interaction for therapeutic ends. Case examples are provided.—R. S. Albin.

7974. Meichenbaum, Donald & Cameron, Roy. (U Waterloo, Ontario, Canada) **The clinical potential of modifying what clients say to themselves.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 103-117.—Describes a research program on the efficacy of self-instructional training procedures with clinical populations such as schizophrenics, hyperactive children, neurotics, low creativity college students, and cigarette smokers. Studies indicate that it might be useful to combine the clinical concerns of semantic therapists with the armamentarium of behavior therapists. A number of behavior therapy procedures including desensitization, modeling, and operant and aversive conditioning were altered in order to include the client's self-statements in the treatment regimen. Results indicate that when standard behavior therapy was augmented with self-instruction, greater treatment efficacy, more generalization, and greater persistence of treatment effects were obtained. It is concluded that the environmental consequences per se are not of primary importance in modifying maladaptive behaviors, but rather what the S says to himself about those consequences.—C. P. McCreary.

7975. Nau, Sidney D.; Caputo, James A. & Borkovec, Thomas D. (U Iowa) **The relationship between credibility of therapy and simulated therapeutic effects.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 129-133.—Assessed the effect of

variable credibility of treatment procedures on avoidance behavior in 3 studies with a total of 175 female and 24 male snake-fearful undergraduates (as measured by Gear's Fear Survey Schedule). Ss were pretested and then presented with descriptions of, and rationales for, various therapy and placebo conditions. Subsequently, the Ss were asked to assume that they had received 5 wks of therapy by the described treatment, to simulate its effects on the posttest, and to rate its credibility. While 1 experiment demonstrated that Ss simulated more positive treatment outcome under preferred treatment conditions, no mean differences in outcome were found among placebo and therapy rationale conditions in the 2 other experiments. Simulated therapy response and rated credibility were, however, significantly correlated in all 3 studies.—*Journal abstract*.

7976. Orval, Joseph. [An experimental group therapy technique aimed at teaching social skills to children and character-disordered adolescents.] (Fren) *Acta Psychiatrica Belgica*, 1973(Sep), Vol 73(5), 620-629.—Conducted successful group therapy with institutionalized youngsters. The daily practice of responsibility, participation, and commitment helped to resolve many institutional problems such as tension, antagonism, and discipline. (English, Dutch, German, Italian & Spanish summaries)

7977. Parsell, Sue & Tagliareni, Elaine M. (California State U, San Francisco) **Cancer patients help each other.** *American Journal of Nursing*, 1974(Apr), Vol 74(4), 650-651.—Describes the use of group-centered therapy for Ss with incurable cancer. Group themes focused upon feelings of helplessness and dependency, meaning of death, and estrangement from family and friends. Implications for nursing and medical treatment of cancer Ss are discussed.

7978. Paul, Gordon L. (U Illinois) **Experimental-behavioral approaches to "schizophrenia."** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7979. Ravich, Robert A. & Wyden, Barbara. (Cornell U, Medical School, New York) **Predictable pairing: The structures of human atoms.** New York, NY: Peter H. Wyden, 1974. 288 p. \$8.95.—Using case histories as illustrations, a diagnostic approach to the problems of intimate relationships is described—the Ravich Interpersonal Game/Test (or the Train Game). Varying behavior patterns which frequently occur in couples (e.g., dominant-submissive or cooperative-competitive) are described and analyzed.

7980. Reisinger, James J. (Holy Spirit Community Mental Health Ctr, Camp Hill, PA) **Masturbatory training in the treatment of primary orgasmic dysfunction.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 179-183.—Treated a 23-yr-old college woman in a laboratory setting for primary orgasmic dysfunction by employing masturbatory training with erotic stimuli. Heart-rate readings reached their maximums in correspondence with reports of orgasm during intervention. A 6-mo follow-up verified client ability consistently to achieve orgasm. (20 ref)

7981. Rigo, L. (Ctr Medico Psico Pedagogico della Provincia di Treviso, Italy) [Further contribution to the

group technique of "imagerie mentale" in adults.] (Ital) *Rivista Sperimentale di Freniatria e Medicina Legale delle Alienazioni Mentali*, 1972(Oct), Vol 96(5), 1429-1459.—Reviews various stages of this therapy with examples and guidelines. Correct grouping, setting, and relaxation-facilitating procedures are important in the preparatory phase. Throughout, the therapist must keep participants involved without too much intervention and, taking cues from the group's tone and the individual's psychic needs, guide development to a positive shared experience stage. Also stressed are group conversations to keep experiences in perspective. (French & English summaries)—L. Klinkon.

7982. Rose, Sheldon D. (U Wisconsin, School of Social Work, Madison) **Training parents in groups as behavior modifiers of their mentally retarded children.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 135-140.—Natural and foster parents' groups were taught a number of principles of behavior modification and how to apply them to their retarded children. Group leaders used programmed booklets, modeling and behavior rehearsal, lecturing and discussion, weekly assignments, and positive reinforcement. As weekly assignments, the parents read a programmed text, counted and charted their children's behavior, and intervened with reinforcement, extinction, time outs, modeling, cueing, and rehearsal procedures. Following completion of training in 11 groups, 27 of the 33 families entering the program successfully modified 55 of the 58 behaviors for which plans were initiated. (24 ref)—*Journal abstract*.

7983. Rubinstein, David. (Temple U, Medical School) **Techniques in family psychotherapy of schizophrenia.** In R. Canero, N. Fox & L. E. Shapiro (Eds). *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

7984. Scheer, Robert R. **Modification of insomnia using chaining techniques: A case report.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 39-47.—Attempts to teach a 25-yr-old male college student who suffered from transient bouts of insomnia how to control his own sleep patterns by using chaining techniques that would establish a discriminative stimulus for falling asleep. S was instructed to keep a diary for 4 wks to determine what type of activities immediately preceded going to bed and how long it took to fall asleep. Insomnia usually occurred when the typical chain of presleep behaviors was interrupted. S was instructed to follow the same chain of behaviors each night; the pattern was to be followed as often as necessary until he was successful in falling asleep. During the 60-day treatment phase, the rate of insomnia dropped to 60% of the baseline rate, and in 5 of the 6 cases of insomnia, S fell asleep after following the presleep behavioral chain 1 time. At a 1-yr follow-up, S reported that insomnia occurred approximately 1-2 times/mo, but that the chain was still effective in inducing sleep.—L. Gorsey.

7985. Scignar, C. B. (Behavior Therapy Ctr, New Orleans, LA) **Exposure time as the main hierarchy variable.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 153-155.—Describes 2

cases of hypochondriacal obsessional neuroses in a 22-yr-old female and a 38-yr-old male in which the hierarchy consisted of allowing the patient to visualize the obsessive phobic scene for varying periods, beginning with a few seconds, and eventually increasing to several minutes. This proved to be successful in both cases.—*Journal abstract*.

7986. Sipich, James F.; Russell, Richard K. & Tobias, Lester L. (U Illinois, Psychological & Counseling Ctr) **A comparison of covert sensitization and "nonspecific" treatment in the modification of smoking behavior.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 201-203.—49 volunteer participants in a study to reduce cigarette smoking, were randomly assigned to 1 of 5 experimental conditions: covert sensitization, attention-placebo, self-control, monitoring control, or no-contact control. Ss in the 1st 3 conditions received 6 individual contacts over a 2-wk treatment period. Ss in all 3 of these "treatment" conditions significantly decreased smoking behavior. There were no significant differences between these groups at the end of treatment or at follow-up. Although smoking rates increased during follow-up, Ss were still smoking significantly fewer cigarettes than baseline at the end of 6 mo.—*Journal abstract*.

7987. Slucki, Henry. (U Southern California, Medical School) **Behavioral tape recorder.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 167-168.—Reports that an audio tape recorder may be used to record behavior as an on-off event in time. Actuation of the switch produces a 60-Hz noise (buzz) on tape. Uses and applications of this recording technique to behavioral research and therapy are discussed.

7988. Smith, Marcia D. **The use of behavior therapies in the treatment of school phobia.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 48-62.—Describes the origins and characteristics of school phobia and evaluates the relative effectiveness of behavioral therapies based on either operant, classical, or a combination of these conditioning paradigms in terms of the child's return to school, his performance in school after his return, and evidence of symptom substitution. It is concluded that school phobia can be successfully treated by any one of these 3 procedures. However, further research is needed in the areas of follow-up investigations, comparative studies of behavior therapy and psychotherapy with respect to remission rates, comparisons of operant and classical conditioning therapies, and parent and teacher involvement in the treatment of school phobia. (23 ref)—L. Gorsey.

7989. Spiegel, John P. (Brandeis U) **The family: The channel of primary care.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 785-788.—Suggests that family therapy is one of the most important channels of primary care in preventive psychiatry. Its growth in recent years is pointed out, noting that it now reaches into every area of clinical practice. Although problems are found in the field—theoretical inconsistency, lack of attention to ethnic and subcultural differences in families, and economic issues—it is contended that family therapy promises new and more effective forms of



mental health services for people who previously could not afford them.—*Journal abstract.*

1990. Steinfeld, George J. & Mabli, Jerome. (Federal Correctional Inst, Danbury, CT) **Perceived curative factors in group therapy by residents of a therapeutic community.** *Criminal Justice & Behavior*, 1974(Sep), Vol 1(3), 278-288.—The Narcotic Addiction Rehabilitation Act (NARA) therapeutic community at the federal correctional institution in Danbury, Connecticut, utilizes up to 15 hrs of group procedures weekly, as well as a reward system and an inmate status system. 50 NARA therapeutic community residents were administered Yalom's 60-item Q-sort of characteristics of successful therapy patients. Insight-related items were most highly ranked, followed by existential and catharsis factors, respectively. These results were compared to those of I. D. Yalom (1970), and highest-ranked items were examined. Implications for understanding therapeutic communities are discussed.—*Journal abstract.*

1991. Stephenson, Richard M. & Scarpitti, Frank R. (Douglass Coll, Rutgers State U) **Group interaction as therapy: The use of the small group in corrections.** Westport, CT: Greenwood, 1974. xiii, 235 p. \$12.50.—Reports a 4-yr study of the operation and effectiveness of group therapy program specifically designed to change the behavior of juvenile law violators. Specific details of the program are presented, how the group integrates, develops, and operates in guided interaction sessions; techniques used to persuade participants to change their behavior; methods of evaluating group outcomes; and characteristic authority and participant roles created by the group meetings. MMPI data for the participants are also presented. (4¼ p ref)

1992. Suedfeld, Peter & Ikard, Frederick F. (Rutgers State U) **Attitude manipulation in restricted environments: IV. Psychologically addicted smokers treated in sensory deprivation.** *British Journal of Addiction*, 1973(Jun), Vol 68(2), 170-176.—Based a study of 5 psychologically addicted smokers on 3 hypotheses: (a) sensory deprivation (SD) disrupts complex cognitive behavior, (b) the maintenance of a stable belief structure in the face of a persuasive attack represents such a complex behavior, and (c) the induction of belief instability by a message leads to attitude change. Ss, whose smoking rates were between 30-50 cigarettes a day, underwent a procedure consisting of 24 hrs of SD with periodic taped messages. 2 of the Ss were given "booster" sessions 2 mo later. All Ss reported that their craving for cigarettes disappeared during and for some days after the treatment, and all showed significant reductions in smoking rate for at least 2 wks afterwards. Results also show that 3 Ss had not smoked or craved cigarettes for at least 1 mo. (19 ref)—*Journal abstract.*

1993. Usandivars, Raúl J. [Group and myth.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 161-167.—Considers the therapeutic group as a generator of myths and the task of the group therapist to build up a tale, using the contributions of each member. The tale is then described to the group in fragments with each interpretation. Studying a series of myths produced by a group helps the therapist to understand what happens during the session and also the

changes taking place in a group from 1 session to the next.—*English summary.*

1994. Wijesinghe, B. (Claybury Hosp, Woodford Bridge, England) **A vomiting phobia overcome by one session of flooding with hypnosis.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 169-170.—Reports that a 24-yr-old female patient with a long-standing vomiting phobia was treated by flooding under a hypnotic trance. A follow-up 1 yr after treatment showed that she had remained free of her phobia.

1995. Wodarski, John S.; Feldman, Ronald A. & Flax, Norman. (Washington U, George Warren Brown School of Social Work) **Group therapy and antisocial children.** *Small Group Behavior*, 1974(May), Vol 5(2), 182-210.—Discusses the use of selected techniques of behavior modification in working with antisocial children in groups. A formula for determining the "conformity proneness" of certain group members is based upon "the proportion of members who must enact a given behavior in order to receive reinforcement" and "the proportion of members who are to receive reinforcement for the enacted behavior." It is suggested that group contingencies may be more effective than individual contingencies in changing some behaviors. (54 ref)—G. R. Breed.

1996. Wolberg, Lewis R. & Schwartz, Emanuel K. (Eds.). (New York U, Medical School, Postgraduate Ctr for Mental Health) **Group therapy: 1973: An overview.** New York, NY: Intercontinental Medical Book Corp, 1973. viii, 232 p.—Presents a collection of 18 papers on various alternative strategies in group psychotherapy and the problems and issues involved in their use. Topics include psychotherapy with deaf mutes, acting out in group psychotherapy, a synergistic systems approach to family therapy, psychoanalytic group therapy, and the group as a matrix of the individual's mental life.

1997. Wright, Wilbert; Morris, Kenneth T. & Fetting, Burt. (Central Michigan U, Counseling Ctr) **Comparative effects of social skill development.** *Small Group Behavior*, 1974(May), Vol 5(2), 211-221.—Measured the self-concept (Tennessee Self Concept Scale and self-report) of male and female college freshmen before and after participation in a structured ( $n = 7$ ), an unstructured ( $n = 8$ ), or a no-treatment ( $n = 11$ ) group. Treatment groups met for 8 wks. Significant increases in Tennessee Self Concept Scale subscale scores (Self-Satisfaction, Personal Self, Social Self, Positive Self) occurred for the unstructured group. Positive Self scores increased for the control group. The structured group showed no changes.—G. R. Breed.

1998. Wynne, Lyman C. (U Rochester, School of Medicine & Dentistry) **Family and group treatment of schizophrenia: An interim view.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment.* New York, NY: Behavioral Publications, 1974. xviii, 326 p.

1999. Yule, William; Sacks, Ben & Hersov, Lionel. (U London, Inst of Psychiatry, England) **Successful flooding treatment of a noise phobia in an eleven-year-old.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 209-211.—An 11-yr-old boy with a severe phobia for loud noises was treated in 2 sessions of flooding treatment following the failure of in vivo

desensitization. The boy has remained free of phobia behavior over a 25-mo follow-up period.

8000. Zarle, Thomas H. & Willis, Steven. (Purdue U) **A pregroup training technique for encounter group stress.** *Journal of Counseling Psychology*, 1975 (Jan), Vol 22(1), 49-53.—Determined the efficacy of induced affect as a pregroup training experience for coping with stress related to participation in an encounter group. 26 undergraduates who volunteered to participate in an encounter group randomly were assigned to 3 treatment groups, induced-affect training plus the encounter group, induced-affect training only, and encounter group only. The following hypotheses were supported: (a) group participants who did not receive the induced-affect pregroup training would demonstrate significant increases on the Neuroticism scale of the Eysenck Personality Inventory and (b) group members who did receive such training would not manifest such increases. (16 ref) —*Journal abstract*.

### Psychoanalysis

8001. Adatto, Carl P. (Louisiana State U) **Evolution of the transference in the psychoanalysis of an adolescent boy.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8002. Ammon, Günter. [The narcissistic deficit as a problem of psychoanalytic treatment: A contribution to the theory and practice of a retrieval of ego development.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(4), 201-215.—Suggests that some patients with a permanent mistrust of the psychoanalyst may not be showing resistance or negativism, but a special form of psychic illness, different from neuroses: archaic ego illness. This is a substitute for missing psychic structure and compensates for damage to ego development which occurred in the symbiotic phase of early childhood. It is a narcissistic deficit, a "hole in the ego" arresting psychic development. Instead of analytic dissolution it is important to communicate directly with the patient about his archaic anxieties of being forsaken and help him to overcome them. Freud (1914) formulated the therapeutic program for neuroses: "to remember, to repeat, to work through"; for the archaic ego illness the formula must be: "to repeat, to retrieve, to remember, to work through."—H. Bruml.

8003. Aronson, Gerald. (Los Angeles Inst for Psychoanalysis, CA) **Some types of transference and countertransference.** *Bulletin of the Menninger Clinic*, 1974 (Jul), Vol 38(4), 355-359.—Delineates 3 forms of transference phenomena: the normal, the eroticized and the archaic. It is suggested that all patients in analysis manifest these forms in differing proportions. Methods of dealing with transference phenomena are discussed.

8004. Astigueta, Fernando D. (Postgraduate Ctr for Mental Health, Group Therapy Clinic, New York, NY) **Bion, Tavistock, the Argentine school and psychoanalytic group psychotherapy.** *International Mental Health Research Newsletter*, 1974 (Spr), Vol 16(1), 6-9.—Gives a perspective in which Bion's work on groups can be adapted to psychoanalytic group psychotherapy. Examples and discussion show how the therapist, by combining appropriate focus on the "here and now" with

traditional psychoanalytic techniques, can enable group members to overcome projections of social stereotypes or roles, and become a work group fostering individual personality development.

8005. Astley, M. Royden. **Psychoanalysis: The future.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 83-96.—Discusses the present difficult times for psychoanalysis, which offer little hope of improvement in the near future. Psychoanalysts are currently viewed as irresponsible, irrelevant, or unimportant, causing many to become frightened and confused. However, one current development that may have favorable results is the trend of psychoanalysis toward the study and resolution of social issues and toward activity in mental health programs.—D. R. Marino.

8006. Dahl, Hartvig. (New York U, Research Ctr for Mental Health) **A quantitative study of a psychoanalysis.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 237-257.—Applied quantitative measures, including a computer content analysis technique, to tape-recorded data obtained from the psychoanalysis of a young woman. 53 psychological variables were chosen for study and P-technique factor analysis was used to group them into family, sexuality, dream, anxiety, and resistance categories. Estimates of the amount of each factor present were used to divide analytic sessions into working hours, middle hours, and resistance hours. A content analysis of the patient's speech using the categories of the Harvard III Psychosociological Dictionary revealed that there were more self references during working hours, and more references to others and nonspecific objects during resistance hours. It is concluded that quantitative measures such as simple computerized content analyses can describe clinical material adequately and can discriminate between qualitatively different psychoanalytic sessions.—J. Kelly.

8007. Dahl, Hartvig. (State U New York, Downstate Medical Ctr, Brooklyn) **The measurement of meaning in psychoanalysis by computer analysis of verbal contexts.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 37-57.—Describes one of a series of quantitative studies of a single psychoanalysis in order to demonstrate the systematic methods for quantitatively and objectively selecting, reducing, and describing data in audio recordings. It is concluded that there is a need for systematic methods of this kind to measure meaning.

8008. Dauntton, Elizabeth. (Case Western Reserve U) **Treatment of a bisexual conflict in prepuberty and adolescence.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8009. de Blécourt, A. [Considerations about a referred "nameless" patient.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974 (Jul), Vol 29(5), 335-353.—Analyzes the behavior of the S described by T. de Wever (see PA, Vol 53:Issue 4) with reference to several well-known psychoanalytic syndromes: identification, projection, regression to childlike behavior, denial as a defense mechanism, and lack of integration in emotionalized behavior from puberty to adulthood. The prognosis is made that under favorable circumstances considerable improvement is



likely to appear in the adjustment of the S.—A. J. Ter Keurst.

8010. Farrell, Dennis. (C. F. Menninger Memorial Hosp, Topeka, KS) **The prediction of terminability in analysis.** *Bulletin of the Menninger Clinic*, 1974(Jul), Vol 38(4), 317-342.—Reviews the psychoanalytic literature on analyzability and on termination. A case study is presented which illustrates the emotional effect of the anticipation of termination.

8011. Grand, Stanley & Pades, Herbert. (State U New York, Downstate Medical Ctr, Brooklyn) **The transition from sleep to wakefulness: Implications of a study of the organization of laboratory dream reports for the psychoanalytic situation.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 58-82.—Attempts to link the REM awakening situation to the free association situation in psychoanalysis by focusing upon the fluctuations between silence and verbalization in transitional states of consciousness characteristic of both situations. A study of the laboratory dream reports of a neurotic patient in psychotherapy revealed that the considerable variation in the time between the signal to awaken and the initiation of dream reporting was related to certain formal linguistic aspects of the manifest dream reports. An attempt is made to specify how such data may be helpful to the clinician, and problems for future research, are outlined. (50 ref)—*Journal summary*.

8012. Harley, Marjorie (Ed.). **The analyst and the adolescent at work.** New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8013. Joseph, Edward D. (Mt Sinai School of Medicine, City U New York) **An aspect of female frigidity.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 116-122.—Presents a fragment from the analysis of a woman, one of whose symptoms was frigidity, which contained among its many determinants the direct preservation of certain libidinal impulses arising from the oedipal period of development.

8014. Kaplan, Donald M. (Private practice, New York, NY) **A technical device in psychoanalysis and its implications for a scientific psychotherapy.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 25-41.—Examines Freud's use of the free association technique as an experimental method to investigate symptom formation, and discusses the question of whether traditional psychotherapeutic techniques are relevant to modern personal problems. Free association is seen as a technical device analogous to methods of scientific observation which gain information about a phenomenon by obstructing its normal activity. The inability of the patient to comply with the technique's demand for full disclosure reveals mental obstructions to patient and therapist. It is suggested that contemporary alternatives to the classical psychotherapeutic method avoid crucial personal and social problems by stressing immediacy, impact, and sensation. It is concluded that the Freudian psychoanalytic paradigm is still a viable approach to solving questions concerned with self-knowledge. (1 p ref)—J. Kelly.

8015. Keller, Ursula. [Ego-splitting in perversion.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(4), 216-229.—Views the perverse reaction as an archaic ego-illness which was considered by Freud (1938) to be ego-

splitting. While Freud considered perversion untreatable, dynamic psychiatry sees it as amenable to analytic therapy. It is a result of damage to an interpersonal process between the growing child and the mother, with a resulting archaic ego-illness in the form of a narcissistic deficit of the ego.

8016. Knapp, Peter H. (Boston U, Medical School) **Segmentation and structure in psychoanalysis.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 14-36.—Discusses structural organization, a naturalistic approach to the study of the psychoanalytic situation. The method involves the task of dividing the interview transcripts into meaningful segments and then proceeding, segment by segment, from actual utterances to inferences about emotions, defenses, constellations of transference fantasy, and their structural organization. The purpose is to follow the activity of the therapist and the flow of the patient's associative attention as it shifts in mode, type of content, and temporal focus. (59 ref)—D. R. Marino.

8017. Kramer, Selma. (Philadelphia Psychoanalytic Inst, PA) **Episodes of severe ego regression in the course of an adolescent analysis.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8018. Maddi, Salvatore R. (Chicago U) **The victimization of Dora.** *Psychology Today*, 1974(Sep), Vol 8(4), 90-94, 99-100.—Examines Freud's discussion of his treatment of Dora and concludes that Freud was unethical and ineffectual. Freud tried to convince Dora that her neurotic symptoms were the result of her sexual feelings. In reality, Dora was living among adults who were deceitful and she required support, not attempts to convince her that she caused her own problems. Dora quit analysis after 3 mo. Her symptoms ceased after she successfully confronted a married couple who had participated in the deceit surrounding her.—E. J. Posavac.

8019. McCann, Marie E. (Cleveland Psychoanalytic Society, OH) **Mourning accomplished by way of the transference.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8020. Nell, Renee. (Country Place, Litchfield, CT) **The reflections of the liberation movement in the unconscious.** *International Mental Health Research Newsletter*, 1974(Spr), Vol 16(1), 2-5.—Interprets the liberation movements in terms of the Jungian animus, or thinking function, and anima, the feeling function. Examples from dream analysis stress the paramount need to reconcile these opposite principles within individuals seeking liberation. Seeking sex-linked roles or sexual partners that permit only the individual's animus or anima to function is self-defeating; true liberation exists in the peaceful reconciliation of opposites within oneself, not in their elimination or in continual strife.—C. A. Heikkinen.

8021. Niederland, William G. (State U New York, Downstate Medical Ctr, Brooklyn) **The Schreber case: Psychoanalytic profile of a paranoid personality.** New York, NY: Quadrangle, 1974. xvi, 172 p. \$8.95.—Presents a collection of 19 discussion and interpretative papers on various aspects of the case of Daniel Paul

Schreber (1842-1911), one of the most famous paranoid personalities in psychological literature. Topics include the content of Schreber's delusions, the merits of Freud's account of the case, data on the father-son relationship, and various other psychodynamic aspects of the case. (152 ref)

8022. Sachs, Lisbeth J. **An unusual object choice during the Oedipal phase.** *Psychoanalytic Quarterly*, 1974, Vol 43(3), 477-492.—Presents a psychoanalytic case study of a boy in the oedipal phase. After undergoing an eye operation at 4 yrs old, he blamed his mother and withdrew his love for her. He regressed to an angry, clinging child, and turned to his female dog as his oedipal love object. In treatment he acted out his fury at his mother. When this was worked through, he gave up the dog as an oedipal substitute and returned to his oedipal relationship with his parents.

8023. Schimel, John L. **Youth culture: The psychopathology of materialism.** *Adolescence*, 1974(Sum), Vol 9(34), 245-254.—Suggests that adolescents who come for psychoanalysis are rarely interested in understanding either themselves or outer reality. They want things (friends, achievement, recognition, things to work better for them) and when the things come about, they leave therapy although often no wiser.

8024. Schleisinger, Herbert J. (U Colorado, Medical Ctr, Denver) **Problems of doing research on the therapeutic process in psychoanalysis.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 3-13.—Discusses the requirements of scientific research which involves a clinical psychoanalytic situation. Imposing an additional research purpose upon a therapeutic analysis intrudes into the psychoanalytic situation and increases its complexities. The researcher's 1st obligation is to determine whether or not psychoanalysis is taking place. He must also demonstrate that the research procedures have not distorted the psychoanalytic process. Another research requirement is that the data be complete and public. For the sake of simplicity the working model of the psychoanalysis may be only a partial or crude version of the actual psychoanalysis as it occurs under clinical conditions; but an oversimplified model may yield only trivial results. Thus, the situation under research must be representative of the clinical model of psychoanalysis. Sample size and replicability are other problems which the researcher must consider. Control of research bias and of the patient's material is necessary.—D. R. Marino.

8025. Settlage, Calvin F. (San Francisco Psychoanalytic Inst, CA) **The technique of defense analysis in the psychoanalysis of an early adolescent.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8026. Shengold, Leonard. **The metaphor of the mirror.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 97-115.—Describes the mirror as a metaphor for the mind. Inasmuch as images of the self and of objects can be presented in the mirror, most conflicts can be enacted there. All the main psychic dangers, as well as the specific reassurances that try to counteract them, motivate mirror acts and fantasies. Emphasis is placed on the mirror reflections of narcissistic and libidinal conflicts in those people who regress as a

result of traumatic overstimulation in childhood. In them, the presence of an unsynthesized introject acts as a "devil behind the glass" of the mind. Exorcism by analysis is needed to free them to think reflectively, playfully, and meaningfully, and to restore their sense of self. (29 ref)—*Journal summary*.

8027. Sonnenberg, Stephen M. **Children of survivors.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(1), 200-204.—Reports 3 psychoanalytic cases presented in a workshop at the 1973 annual meeting of the American Psychoanalytic Association: a boy whose father had fled the Nazis, a boy with a learning disturbance, and a boy born after the war whose mother had been left guilty and dependent on her parents.

8028. Sprince, Marjorie P. **A contribution to the study of homosexuality in adolescence.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

8029. Stamm, Julian L. **A unique poetic sublimation of conflicts revived during termination.** *Psychoanalytic Quarterly*, 1974, Vol 43(3), 427-437.—Reports a psychoanalytic case, especially the terminal phase of the analysis. A poem written by the patient for the final session affirmed that his struggle with passivity and illness had ended.

8030. Winkler, Walter Th. (Westfälisches Landeskrankenhaus Gütersloh, W Germany) [The derealization and depersonalization syndrome: With a report on an analytic therapy.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(4), 230-241.—Describes various views on derealization and depersonalization and discusses the difference between objectified ego-image and the nonobjectifiable primary ego. The self-actualization of the primary ego is seen as the basic function which provides the foundation for all other ego-functions. During derealization and depersonalization the self-actualization of the ego is impaired; perceived objects have no ego-quality and the ego remains in an "observation position." A patient is described whose progress in therapy provides important information about ego structure.—H. Bruml.

8031. Worden, Frederic G. (Massachusetts Inst of Technology, Neurosciences Research Program) **Questions about man's attempt to understand himself.** *Psychoanalysis & Contemporary Science*, 1972, Vol 1, 38-54.—Discusses the relationship between science in general and psychoanalysis by exploring some questions about the nature of psychoanalysis (e.g., What does it mean to understand another person?; Why isn't psychiatry more scientific?; What is a psychiatrist?; What is mind?). Science attempts to understand the world of objects by locating explanatory causes, whereas psychoanalysis attempts to understand living subjects through a search for explanatory meanings. It is suggested that although the scientific method is an inappropriate tool for conducting the interpersonal transactions of psychotherapy, information gained from investigations in the neurosciences can extend man's understanding of himself. (19 ref)—J. Kelly.

#### Counseling & Community Mental Health & Crisis Intervention

8032. Adams, Wesley J. (U Alberta, School of Household Economics, Div of Family Studies, Canada)



**The marriage counselor and interspousal communication.** *Western Psychologist*, 1973, Vol 4(4), 112-117.

—Communication between partners is considered the most common problem brought to marriage counselors. 7 propositions concerning interpersonal communication problems are set forth: (a) Communication is an integral part of, and not separate from an interpersonal relationship. (b) The quality of communication within a relationship often reflects where that relationship is in its development. (c) Communicative acts represent a striving toward fulfilling "something" within each individual. (d) Communication occurs at different levels. (e) Communication is "more or less" programed with minor innovative variations. (f) Communication may be problematic within a relationship because of outside factors. (g) Communication is a never-ending attempt to understand and to be understood. Each proposition is discussed and its importance in marital counseling considered.—D. R. Evans.

8033. Addario, Dominick & Rodgers, Thomas A. (U California, San Diego) **Some techniques for the initial interview in couples therapy.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 799-800.—Describes techniques including discussing the early months of marriage and courtship, rating the couple's commitment to the marriage by means of a simple scale, and introducing the concept of trading behaviors as "homework" for the marriage partners. The belief is stated that the techniques will be helpful to both the novice and the experienced marriage counselor and will offer a structure that will elicit maximum verbal and nonverbal information from the couple.—*Journal abstract*.

8034. Allan, Thomas K. & Allan, Kathryn H. (U Maryland) **Group counseling of the disadvantaged.** In R. E. Hardy & J. G. Cull (Eds), *Group counseling and therapy techniques in special settings*. Springfield, IL: Charles C Thomas, 1974. ix, 166 p.—Proceeds from a general discussion of the positive aspects of using group counseling in treating the disadvantaged to more specific discussions on defining the disadvantaged, selecting group members, and identifying change in the individual.

8035. Allen, Priscilla. **A consumer's view of California's mental health care system.** *Psychiatric Quarterly*, 1974, Vol 48(1), 1-13.—Discusses the current condition of mental health care in the state hospital and in the board and care home system in California. Popular myths concerning the benefits or disadvantages of community vs hospital care for the mentally ill are cited briefly. Ambiguities in the concept of "treating people in the community" are outlined; it is questioned whether residents of board and care homes are actually able to live "in the community" and whether the "treatment" as it presently exists is, in reality, a viable treatment. Many aspects of board-and-care-home living institutionalize a person as much as some hospital care. The need for more resources to be allocated to state hospitals is mentioned, with the argument that fewer and far better hospitals should be the emphasis for future funding. However, the need for increased resources to overcome inadequacies of board and care homes is stressed as of prime importance. Specific problems of the latter are described, and suggestions are made for

general improvement of the state's mental health care delivery.—B. McLean.

8036. Beigel, Allan. (Southern Arizona Mental Health Ctr. Tucson) **Planning for the development of comprehensive community alcoholism services: Organizational approaches.** *Journal of Drug Issues*, 1974(Spring), Vol 4(2), 142-148.—Discusses issues underlying community approaches to comprehensive alcoholism services. The development of truly comprehensive community-based alcoholism programs will require state and local governments to enter nontraditional service areas and to cooperate with community agencies. The advantages and disadvantages of control of alcoholism services by single agencies, multiple agencies, or private profit-making corporations are examined. It is suggested that development of effective community alcoholism services will require careful attention to pre-program planning, funding, and organizational structure.—J. Kelly.

8037. Berry, C. Markam. (Private practice, Atlanta, GA) **Counseling in the medical office.** *Journal of Psychology & Theology*, 1974(Sum), Vol 2(3), 174-181.—Discusses the principles of *paraklesis* as the basis of an in-process counseling technique which can be used by the practicing physician. Distinctions are drawn between this technique, intervention, and nouthetic counseling.

8038. Blocher, Donald H. (U Minnesota) **Developmental counseling.** (2nd ed). New York, NY: Ronald Press, 1974. ix, 318 p.—Presents an overview of the sources of counseling therapy, the philosophical bases for counseling, and methods of maximizing human effectiveness, based on the idea that human development is organized around life stages and is expressed in various social roles and coping and mastery behaviors. Psychometric, ethical, and methodological issues in counseling are also examined.

8039. Breitmeyer, Rudolf G.; Bottum, Greg & Wagner, Bernard R. (Adolf Meyer Ctr, Decatur, IL) **Issues in evaluative follow-up for a residential program.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 804-806.—Distinguishes between clinical follow-up and monitoring, or evaluative follow-up, and describes some of the characteristics of an adequate monitoring system. Basic issues involved in planning a follow-up design are discussed, including examining the specific reasons for follow-up, involving the appropriate staff, determining the technical components, and testing the design.—*Journal abstract*.

8040. Buchta, Roger C.; Range, Donald L. & Wetzel, Richard D. (Belleview Mental Health Out-Patient Ctr, IL) **Characteristics of crisis outreach clients.** *Crisis Intervention*, 1974, Vol 5(4), 17-24.—Describes a method which combines a crisis intervention phone service with emergency home visits. Characteristics of a sample of clients visited are given; many of them subsequently entered a treatment program.

8041. Buckles, Nancy J. & Parker, Austin T. (Indiana U) **Married couples workshop: Problems and process.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 431-434.—Describes a workshop consisting of 4 couples recruited from the psychiatric division of a university clinic. Participation was limited to couples married at least 2 yrs and whose marriages had been failures from the beginning, but who were not

seriously considering divorce. The encounter workshop was held over 26 meetings, totaling 76 hrs. The goals were to enhance recognition and expression of feelings, to encourage self-definition to others, and to foster synthesis of internal feelings with external behavior. The case histories of the 4 couples are presented. It is concluded that, with 1 exception, the participants moved toward the desired goals, and that for all the couples communications were improved.—*A. de la Haba.*

8042. Burgess, John; Nelson, Ronald H. & Wallhaus, Robert. (Adolf Meyer Ctr, Research & Evaluation, Decatur, IL) **Network analysis as a method for the evaluation of service delivery systems.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 337-344.—Attempts to show how network analysis may be applied to various ongoing mental health operations. (18 ref)

8043. Carderón N., Guillermo. [Community psychiatry: Basic concepts and goals.] (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 194-200.—Describes the basic concepts and goals of community psychiatry and suggests several parameters which may be used to define important new ideas in this field.

8044. Carp, Joel M. & Goldstein, Melvin. (Bernard Horwich Jewish Community Ctr, Chicago, IL) **Better living without chemistry: Some program alternatives to drug abuse.** *Journal of Drug Issues*, 1974(Spr), Vol 4(2), 149-161.—Presents excerpts of case materials from 2 community-based drug programs which provide services such as telephone counseling, walk-in counseling, parent education, and discussion groups at local high schools.

8045. Easton, Karl. (Mt Sinai School of Medicine, City U New York) **Residential facilities for hospital-discharged former mental patients: Aspects in development.** *New York State Journal of Medicine*, 1974(Sep), Vol 74(10), 1762-1765.—Discusses community problems created by recent emphasis on community-based residential treatment of formerly hospitalized mental patients. It is suggested that both long-term custodial care facilities and actively therapeutic rehabilitative facilities are needed. (20 ref)

8046. Fairbanks, Rollin J. (Episcopal Theological School, Cambridge, MA) **Some current trends in marriage counseling.** *Journal of Pastoral Care*, 1974(Mar), Vol 28(1), 13-16.—Comments on current aspects of marriage counseling: the trend toward family counseling, counseling "ex-married" and prospective marriage partners, group counseling, increased tolerance of sexual activities, women's roles, and the effect of the personal philosophy of the counselor.

8047. Flipot, G. & Rucquoy, G. (U Catholique de Louvain, Faculté de Médecine, Belgium) [Comparative study of the Rorschach of patients attending a marriage counseling center and of patients attending a general psychiatry consultation.] (Fren) *Acta Psychiatrica Belgica*, 1973(Nov), Vol 73(6), 762-784.—Presents Rorschach data obtained from both partners in 10 couples who had come to a marriage counseling center. Similarities and differences between the partners were examined in 5 aspects of their personalities, demonstrating much similarity between partners. These findings were compared with Rorschachs of 10 couples in which one

partner had sought psychiatric help. In the latter group there were more manifest neurotic problems and less similarity between the partners, and sexual difficulties were less apparent. The attitude towards the presenting symptom was also different: it was seen mostly as a problem of the applying patient rather than as the partner's problem, which was the case in many of the couples in marriage counseling. (English, Dutch, German, Italian & Spanish summaries)—*E. Coché*

8048. Getz, William; Wiesen, Allen E.; Sue, Stan & Ayers, Amy. (U Washington, School of Social Work) **Fundamentals of crisis counseling.** Lexington, MA: D. C. Heath, 1974. xiv, 184 p.—Presents a discussion of the rationale, procedures, and goals of crisis intervention and counseling and several case histories to illustrate different approaches to handling crisis. Definitions of crisis, how to select an effective counselor, methods of interviewing with different types of clients, and procedures in telephone counseling are discussed.

8049. Grace, Helen K. (U Illinois, Medical Ctr) **The development of a child psychiatric treatment program.** New York, NY: Schenkman, 1974. 224 p.

8050. Groen, J. J. (U Leiden, Psychiatric Inst, Netherlands) **The challenge of the future: The prevention of psychosomatic disorders.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine*, Amsterdam, 1973: *Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

8051. Halpern, Werner I. (Rochester Mental Health Ctr, Children & Youth Div, NY) **The child guidance clinic in a community mental health center: A five-year report.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 292-300.—Describes the transition of a child guidance clinic to a community health center where the change was characterized by an accelerated caseload, more efficient use of manpower, and diversification of programs despite the loss of organizational autonomy. (23 ref)

8052. Hamdi, Mark E. (State U New York, Albany) **Crisis intervention as a model for facilitating the adjustment of severely homesick children.** *Devereaux Forum*, 1974(Win), Vol 9(1), 15-20.—Discusses the possibility of using a crisis intervention model in treating severe homesickness. The method is illustrated by a case study of a 10-yr-old male who had emotional problems and received residential treatment at a summer camp.

8053. Holen, Michael C. & Kinsey, William M. (Kansas State U) **Preferences for three theoretically derived counseling approaches.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 21-23.—Examined differences in potential-client preference and believed effectiveness for counseling approaches based on behavioral, client-centered, and psychoanalytic theory using 57 college students. Analyses of S responses to randomly ordered same-client, same-problem demonstration tapes of each approach indicated that the behavioral approach was significantly more highly preferred and believed more effective than either the client-centered or psychoanalytic approach. No significant differences were found between ratings of client-centered and psychoanalytic approaches. While the preference for behavioral counseling merits further theoretical and empirical investigation.



more importantly, preference and believed-effectiveness differences suggest that counseling outcomes should be investigated as a function of the acceptability to the client of actual counseling behaviors.—*Journal abstract.*

8054. Holton, Wilfred E.; New, Peter K. & Hessler, Richard M. (Northeastern U) **Citizen participation and conflict.** *Administration in Mental Health*, 1973(Fal), 96-103.—Specifies crucial issues affecting citizen participation in poverty area community mental health centers. Using 6 case studies, 3 models of citizen participation are described: the elitist model, the advisory model, and the consumer control model. Sources of conflict which inhibit effective citizen participation include (a) differing definitions of citizen participation, (b) conflicting vested interests, and (c) fear of the unknown. A transitional model of change is proposed to facilitate moving toward workable consumer control.—*R. J. Albers.*

8055. Johnson, Roswell D. (Brown U, Health Services) **Alcohol and the college campus.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 216-219.—Presents a technique devised to help the problem drinker on campus through the combined efforts of a sympathetic, knowledgeable faculty member such as a dean, chaplain, or physician, and 2 peers, close concerned friends of the involved student. The group meets with the drinker, frequently one who already is in difficulty because of violent behavior while drunk. They attempt to help him see his problem and encourage him to seek group or individual treatment. The likelihood of his dismissal from the institution if he does not seek such help is pointed out. Alcoholism in the US is discussed, and the need for an effective preventive program is stressed.—*A. de la Haba.*

8056. Kern, Joseph C. **Evaluating community drug abuse agencies.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 129-139.—Describes a 6-category code for evaluating the effectiveness of community-based drug treatment and prevention agencies in organizing their activities to meet programmatic goals.

8057. Kiresuk, Thomas J. (Hennepin County Mental Health Service, MN) **Goal attainment scaling at a county mental health service.** *Evaluation*, 1973, Mono 1, 12-18. Describes goal attainment scaling (GAS) in the evaluation of individual treatment programs. GAS consists of (a) a set of dimensions selected for each patient, (b) a schedule for assigning weights to dimensions, (c) a list of expected outcomes for each dimension, (d) a follow-up assessment of these outcomes, and (e) a total score summarizing outcomes across all dimensions. Intake scores are compared with follow-up scores to estimate change during treatment. GAS data for 170 patients indicate test-retest reliabilities of .70 for outcome scores and .88 for content, and interscorer reliability of .70 (22 ref).—*J. Adams-Webber.*

8058. Koumans, Alfred J. (Massachusetts Inst of Technology) **Planned informality: Alternate to drug programs.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 169-173.—Describes the successful use of existing facilities in a university community in its dealings with problems related to illegal drug use by students. As opposed to a formal program, this informal network of tutors, housemasters, faculty advisors, counseling deans, psychiatrists, and instructors

provided a human environment with de-emphasis on identifying drug takers as "ill," "drug-users," or "deviants." A supportive atmosphere was established, and the management of problems was left to those close to the scene. A drug test kit was developed and made available to the students on an anonymous, confidential basis. It is believed that this informal approach enhanced the social fabric of the community, and may have contributed to diminished drug use and related problems.—*A. de la Haba.*

8059. Kugel, Linda. (Carroll City Mental Health Service, North Conway, NH) **Combining individual and conjoint sessions in marital therapy.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 795-798.—Discusses the author's approach of seeing troubled marital partners individually and together for a total of 3 sessions/wk over a limited period of time. Approximately 55 couples were seen in a rural mental health center in the past 2 yrs. It was found that the individual sessions permitted each partner to gain an understanding of his own dynamics and helped emphasize each individual's responsibility for the success or failure of the relationship. The conjoint sessions focused on issues and problems facing the couple. The approach resulted in improved relationships in most cases. A case example is presented.—*Journal abstract.*

8060. Langan, Charles J. (Suicide Prevention & Crisis Service, Community Interchange, Buffalo, NY) **A preliminary structure for standards for crisis outreach services.** *Crisis Intervention*, 1974, Vol 5(4), 2-7. Presents the nucleus of a structure with skeletal content for crisis service standards. Ways in which such standards facilitate quality services are summarized.

8061. Leslie, Robert C. & Veldhuisen, John F. (Graduate Theological Union, Pacific School of Religion, Berkeley, CA) **Family counseling and the minister.** *Journal of Pastoral Care*, 1974(Mar), Vol 28(1), 3-12.—Discusses the appropriateness of family counseling for the minister: its family context, its ecological orientation, its varied emphases, its active intervening role in confrontation of reality, and its expectations of effecting change. Through interventions at the family rather than the individual level, frozen patterns of habitual interaction can be freed and unfamiliar usefulness ways of interacting modeled. A simulated family counseling conducted by a minister trained in family therapy is described, and 37 principles of counseling illustrated in the session are pointed out.—*Journal abstract.*

8062. Lubin, Bernard; Bangert, Charles J. & Hornum, Robin K. (Greater Kansas City Mental Health Foundation, MO) **Factor structure of psychological assessment at a community mental health center.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 455-460.—2 factors were derived from 40 assessment variables using principal components and varimax rotation applied to data derived from 387 adult applicants to a community mental health center and their relatives. Factor 1 represents the relatives' report of the patients' overall emotional-behavioral disturbance, and Factor 2 is the patients' self-report of depression. The factors have a simple structure, and the concepts, therefore, can be regarded as well-defined and independent. Several

correlates of the 2 factors are presented. (19 ref)  
*Journal abstract.*

8063 Lubin, Bernard; Hornstra, Robijn J. & Love, Allen. (Greater Kansas City Mental Health Foundation MO) **Initial treatment assignment as a function of patient self-assessment and/or family assessment of patient.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2) 495-498. A standardized interview, administered at intake to a cohort of 611 applicants to a community mental health center and to 433 of their family members, showed that patients who received hospitalization as their initial assignment were assessed as significantly more ill by their families than those who received other initial outpatient assignments. Patients who were hospitalized did not see themselves as being more ill, however. Patients assigned to medicine clinic saw themselves as significantly less psychologically ill. (15 ref)—*Journal abstract*

8064 Lucco, Alfred A. & Ephross, Paul H. (U Maryland, School of Social Work & Community Planning, Baltimore) **Behavior expertise and social policy: Observations on the care, feeding, and utilization of child development experts.** *Child Care Quarterly*, 1974(Sum), Vol 3(2), 87-96. Discusses the proper role of child development experts (CDEs) in assisting parents and child care workers. CDEs are advised to make standards realistic and goals explicit, and to emphasize cause-effect relationships. Values and biases should be clearly stated so that parents have the opportunity to accept or reject them. It is proposed that unrealistic standards will lead to harmful feelings of inadequacy in parents and child care staff. Both child-rearing advice and the operation of child care facilities should maximize parental control and reinforce parent's rights to influence children's experiences.—J. H. Feldstein.

8065 Macht, Lee B. (Cambridge-Somerville Mental Health & Retardation Ctr, Cambridge Hosp, MA) **On community-based care.** *Psychiatric Annals*, 1974(Jun), Vol 4(6), 80-92. Describes the history of community-based care for psychiatric problems, defining 5 levels of mental health service, ranging from out-of-area treatment facilities to foster homes. The need for evaluation at all levels and for integration of mental health with other human services is stressed.

8066 Manalis-Swennen, L.; Rucquoy, G. & Quirijnen, R. (U Catholique de Louvain, Faculte de Medicine, Belgium) **[Comparison between a university marriage counseling center and a similar community center.]** *Acta Psychiatrica Belgica*, 1974(Nov), Vol 4(2), 785-802. Compared 2 centers attended monthly by 1000 Catholic Belgian adults who tend to ask for help rather late in the development of their problems. 4 major differences were noted: (a) The clientele of the community center tended to be older and married longer, with more children, and there were more farmers and laborers among them. (b) The community center was attended mostly by women, the partner rarely cooperated. (c) Presenting complaints were more global at the community center and stressed sexual problems less. (d) There was less true therapy done in the community center, thus the number of sessions tended to be lower. (English, Dutch, German, Italian & Spanish summaries)—E. Cocher

8067 Meacham, Mary & Acey, Katherine T. (Suicide Prevention & Crisis Service, Crisis Outreach Service, Buffalo, NY) **Considerations in evaluating a crisis outreach service.** *Crisis Intervention*, 1974, Vol 5(4), 25-35. Recommends procedures for appropriate evaluation of crisis services. Goals, methods, and manpower needs of such services are discussed.

8068 Mettich, Jonathan M.; Schwartz, Al & Thum, Wendy. (Bernard M. Baruch Coll—Mt Sinai Medical School, City U New York) **An assessment of provider behavior in shared professional facilities.** *Public Health Reports*, 1974(Jul-Aug), Vol 89(4), 307-314. Studied provider behavior when there is an increase in demand for outpatient care. Providers in 32 shared professional facilities (SPFs) in New York City were surveyed by a team making unannounced site visits. The survey assessed whether the SPFs "meet standards of continuity, coordination, accessibility and acceptability. It was found that these criteria were not met. (19 ref)

8069 Mill, Cyril R. (NTI Inst for Applied Behavioral Science, Contracts & Consultation Div, Arlington VA) **Short-term consultation in organization development for mental health agencies.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 726-729. Suggests that mental health facilities unable to afford long term programs of organization development (OD) such as those used by industry, can benefit by brief OD consultation directed at small units or specific problems. The origins and principal techniques of OD are discussed, and ways are described in which brief OD consultation was used for facilitating work relationship between a new medical director and key staff, handling a committee's frustration at lack of direction, and helping an expanded child guidance clinic form a cohesive staff.

*Journal abstract*  
8070 Mounsey, Mark X. (Assn of Child Care Workers, Bronx, NY) **A legal challenge to child care services.** *Perspective and prospects.* *Child Care Quarterly*, 1974(Sum), Vol 3(2), 125-129. Discusses implications of a lawsuit charging the New York City child care system with religious and racial discrimination. Private system with religious and racial discrimination. Private system with religious and racial discrimination. Private system with religious and racial discrimination.

(religious) contract agencies are charged with religious discrimination. The most difficult cases: black children from slums. A pragmatic approach to behavior change emphasizing child care workers rather than psychiatrists is suggested. (10 ref)

8071 Salfutis, Donald H. (Thomson, Frank A. & Hallinan, Patricia R. (Southern California Medical School) **Mental health courses on a foundation for change in a rural community.** *Community Mental Health Journal*, 1974(Fall), Vol 10(3), 194-203. Describes a university effort to assist a rural community in developing a mental health education program for primary interveners within the community. Program goals were established and evaluated on a pre- and posttest basis, and compared with a questionnaire survey of community professionals within the community. Results suggest some significant change in the desired direction of the learning groups.

8072 Nelson, Scott H.; Rotstein, Paul B.; Shurvell, Marion & Mackenzie, Richard. (U.S. Dept of Labor, Marine Corps, Washington, DC) **"Turning on" a national agency: The Job Corps drug workshop experience.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 209-222.



—Discusses the process of developing a series of drug training workshops for a non-health agency and some of the principles and procedures used in successful workshops. Suggestions for other drug education programs are provided.

8073. **Orten, James D.** (U Tennessee, School of Social Work) **A transactional approach to suicide prevention.** *Clinical Social Work Journal*, 1974(Spring), Vol 2(1), 57-63. —Discusses the origin of suicide and gives examples of professional interventions which are viewed as less helpful than transactional approaches. Focus is on handling suicide calls. The ways in which transactional analysis can be used to effectively intervene in suicide crises are described.

8074. **Perlmutter, Felice.** (Temple U, School of Social Administration) **Prevention and treatment: A strategy for survival.** *Community Mental Health Journal*, 1974(Fall), Vol 10(3), 276-281. —Argues that the described National Institute of Mental Health (NIMH) prevention design will eliminate the problem of prevention activity, and that if prevention is a valid activity in community health, alternate strategies must be sought. Previous studies and current NIMH priorities are offered as support of the argument that prevention activity must be organizationally separated from service delivery. (20 ref)

8075. **Pulvermacher, Gerald D.** (Rideau Regional Ctr, Smith's Falls, Ontario, Canada) **Report on a home-management project at Rideau Regional Centre.** *Ontario Psychologist*, 1974(Oct), Vol 6(4), 19-23. —Describes a project which demonstrates that many retarded children could function outside an institution after the parents have been trained to act as therapists for the child.

8076. **Ramsden, Marna.** **Shaping the future: Home management: The past six years.** *Ontario Psychologist*, 1974(Oct), Vol 6(4), 14-17. —Traces the development of a program designed to help parents cope with the behavior of their mentally retarded children at home.

8077. **Reilly, Peter R.; Cohen, Roberta B. & Lundy, Nancy A.** (Child Guidance Clinic, Providence, RI) **Diagnostic interviewing with youthful offenders.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 153-158. —Discusses 18(2)153-158 problems inherent in interviewing youthful offenders and presents a method that allows the interviewer to (a) assess the mental status of the youth and (b) develop a disposition plan based on the youth's goals and desires. It is suggested that since action-prone youngsters are often unwilling or unaccustomed to talking about their feelings, these feelings must be inferred from perceptions and fantasies. 6 case samples are presented to illustrate the method. —*M. E. Pounsel.*

8078. **Reinhart, Richard A.** **The family drug awareness group: A citizen-initiated example of effective community concern.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 151-155. —Describes a model designed to involve parents in drug education programs. The model has been adopted in a high drug-incidence area in southern California and it is suggested that it has potential applicability in other areas.

8079. **Reiter, Gregg F. & Kilmann, Peter R.** (Brigham Young U) **Mothers as family change agents.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 61-65.

—Studied the impact of a counseling program for mothers on the perceptions and behavior of family members. The mother, father, and 18-12 yr old problem child of 13 experimental and 11 control families were evaluated before and after 7 weekly counseling sessions. Pre- and postexperimental measures included the Family Concept Q Sort, a family decision-making task, and a behavioral data chart maintained by the mother. The experimental spouses experienced a significant increase in perceived family integration. The experimental families reflected a significant increase in the number of positive responses and a significant decrease in the number of negative responses used by the 3 family members. The undesirable behaviors of problem children within the experimental families decreased significantly. —*Journal abstract.*

8080. **Rizzo, Nicholas D.** (Lawrence Court Clinic, MA) **Strategies of interviewing in the court clinic.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 121-135. —Presents 9 case histories to illustrate methods of interviewing acutely upset, disturbed, psychotic, irrational, uncooperative, disinterested, or unmotivated offenders.

8081. **Rollin, Stephen A. & Arey, James.** (Florida State U) **A community action drug abuse program: The parent-helper.** *Journal of Drug Issues*, 1974(Spring), Vol 4(2), 176-180. —Describes a program which trained volunteers to work as community-based paraprofessional counselors with parents of drug-abusing children. Trainees were graduate students in a counselor education program, and volunteers represented a cross section of the community. The 50-hr training program emphasized basic counseling skills, basic drug information, and available community resources which dealt with drug problems. After completing the course, volunteers served as parent-helpers in a local telephone counseling service. It is suggested that future training programs would benefit from more extensive advertising for volunteers and from greater emphasis on drug crisis intervention. —*J. Kelly.*

8082. **Rosenberger, John W.** (Harlem Hosp Ctr, New York, NY) **Community psychiatry.** *Psychiatric Annals*, 1974(May), Vol 4(5), 51-56. —Describes the theoretical approach and practical application of community psychiatry at the Harlem Hospital Center. Provision of mental health education and consultation to the community is the Community Psychiatry Division's main function. Various modes of consultation are employed with specific social service agencies by a staff that includes a psychiatrist, 2 social workers, a mental health worker and a community liaison worker. Staff members are encouraged to participate in community activities and have done so in the areas of crime prevention, welfare rights, etc. 4 direct treatment programs have been developed by the division, 3 of which are now under other departments. —*C. Wright.*

8083. **Rubino, C. A.** **Community services: Legitimate at last.** *Ontario Psychologist*, 1974(Oct), Vol 6(4), 9-13. —Describes the development of a mental retardation unit within the child and adolescent outpatient department of a large metropolitan psychiatric hospital and how it functions as a community resource for clients and agencies.

8084. Ryan, William P. (Project Youth Drug Prevention Program, Queens, NY) **Diminishing adult responsiveness to the drug problem: An explanation and a remedy.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 205-208.—It is suggested that the decreasing number of adults attending community-oriented meetings on the problem of youthful drug abuse is a result of feelings of impotence engendered in adults by the failure of previous rallying meetings. Further, meetings focused around adult-adolescent interactions seem to produce greater response because of the hope they instill. —*Journal abstract.*

8085. Saeger, Vernon. (Suicide Prevention & Crisis Service, Crisis Outreach Service, Buffalo, NY) **Considerations for crisis outreach training.** *Crisis Intervention*, 1974, Vol 5(4), 8-16.—Presents goal objectives and content of a 9-session crisis outreach training program. It is anticipated that the outline will be useful in developing other training programs.

8086. Schneider, Jorge; Levinson, Hilliard & Weiss, Wanda M. **Community services in an adolescent program.** *Adolescence*, 1974(Sum), Vol 9(34), 177-184.—Describes 2 yrs of experience in developing an adolescent program with strong community ties. To meet the needs for psychiatric services for adolescents, experimentation and creativity are necessary. A case report is included which illustrates the community aspects of working with problem adolescents.

8087. Schwartz, Stephen. (Hahnemann Community Mental Health Ctr, Philadelphia, PA) **Decentralizing a community mental health center's service delivery system.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 740-742.—After disbanding a mental health center's emergency and outpatient services, staff members were reorganized into a decentralized service that consisted of 5 teams stationed throughout the catchment area. At the end of 2 yrs the number of outpatient cases from the catchment area increased significantly, while the referral of outpatients to the inpatient service remained stable.

8088. Shows, W. Derek. (Duke U, Medical Ctr) **A sleeping epidemic among first-grade children: Crisis intervention.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 332-336.—Describes the psychological factors involved in and the treatment program designed for treating the patterned sleeping behavior of 6 1st-graders in a small southern rural community. The role of the consultant in dealing with the community crisis is presented as an example of crisis intervention.

8089. Shupe, Anson D. (Indiana U) **Development of mental health services among existing community institutions in rural areas: The case of the Japanese Kumiai.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 351-358.—Discusses the Kumiai, a type of interest organization, as one method of increasing the number of modern community health professionals and facilities in rural areas of Japan. (23 ref)

8090. Shute, Robert E. & Swisher, John D. (Pennsylvania State U, Addictions Prevention Lab) **Training models for drug abuse prevention: Recommendations for the future.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 169-178.—Analyzes 3 major training modalities

for drug abuse prevention as a basis for presenting a recommended model for future training efforts.

8091. Slavson, S. R. **Child-centered group guidance of parents.** New York, NY: International Universities Press, 1974. x, 333 p. \$3.95.—Describes a technique for helping parents who have problems in child rearing and parent-child tensions to understand what it means to be a child and the responsibilities of being a parent. The historical background of child-centered group guidance, the dynamics of the discussion and guidance processes, the relationship of group guidance to group psychotherapy, and implications for general mental health and family climates are also examined.

8092. Spivak, Mark. (Moadon Shalom, Jerusalem, Israel) **A conceptual framework for structuring the housing of psychiatric patients in the community.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 345-350.—Discusses the housing of psychiatric patients in terms of its dynamic placement within a conceptual framework of rehabilitation that specifies the goal of the rehabilitation process to be the resocialization and behavioral organization of the individual according to the norms, values, and expectations of the larger community. An attempt is made through facet analysis to specify those conditions associated with desocialization and to relate them to a definition of social articulation. The social structure of the housing situation is analyzed in terms of those dimensions postulated to counteract conditions associated with behavioral disorganization. —*Journal abstract.*

8093. Stone, Gerald L. & Stebbins, Larry W. (U Western Ontario, London, Canada) **Effect of differential pretraining on client self-disclosure.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 17-20.—Studied the effectiveness of pretraining, a method of teaching clients behavioral skills useful in counseling, in teaching 30 college students to self-disclose. 3 modeling procedures were used to teach this verbal skill: video model, audio model, and no model. The number of self-references emitted during a 20-min interview was tabulated. Results indicate the video-model group was the most effective, followed by the audio-model group. No sex differences were found. (19 ref) —*Journal abstract.*

8094. Tangari, Anthony. (Menninger Clinic, Topeka, KS) **Family involvement in the treatment of a psychiatric inpatient.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 792-794.—Discusses the short-term diagnostic and treatment unit at a hospital which emphasizes maximum involvement of the family in the treatment process. The 16-bed unit deals with acute psychiatric crises in 6-8 wks of intensive treatment. Family members are required to accompany the patient to the preadmission interview and remain available for several days after admission. Frequent visits to the patient are encouraged; they are followed 3 days/wk by hour-long meetings involving several patients, their families, and staff. It is found that the meetings increase communication between patients and their families by providing a supportive group setting in which family members can explore their feelings and ventilate their anxieties. Unit staff believe this approach helps reduce recurrence of problems that precipitated hospitalization. —*Journal abstract.*



8095. Weiss, James; Freeborn, Donald K. & Lamb, Sara. (Portland State U) **Use of mental health services by poverty and nonpoverty members of a prepaid group practice plan.** *Health Services Reports*, 1973(Aug), Vol 88(7), 653-662.—Describes a study carried out (a) to determine the distribution of psychiatric diagnoses and utilization rates for 7,000 poverty group members and for 7,000 general members of the Kaiser Foundation Health Plan; (b) to compare referral rates for the 2 groups to the Plan's mental health clinic; and (c) to compare how the 2 groups kept their appointments at the clinic. The poverty group used more psychiatric sources than the general Health Plan sample, were more often referred to the mental health clinic, and broke more clinic appointments. Possible reasons for these differences are discussed. (25 ref)—R. S. Albin.

8096. Westermeyer, J. & Hausman, W. (U Minnesota) **Mental health consultation with government agencies: A comparison of two cases.** *Social Psychiatry*, 1974(Oct), Vol 9(4), 137-141.—Presents 2 case histories, one successful and one unsuccessful, of mental health planning consultation with government agencies. Both cases involved programs designed to provide treatment and rehabilitation for drug dependent persons—American Indians and a minority group in another country. Examination of these 2 cases emphasizes the importance of (a) explicit task definitions, (b) access of the consultant to policy makers, (c) access to the target population, (d) consultant control over his own schedule, and (e) adequate logistic support. Recommendations for achieving these objectives within a bureaucratic framework are presented. (18 ref)—*Journal abstract*.

8097. Westermeyer, Joseph & Hausman, William. (U Minnesota) **Cross cultural consultation for mental health planning.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 34-38.—Describes 4 sets of relations between consultant, consultee, and target population which vary with ethnic similarities and differences among these parties to social action programs. Each set presents its own problems. Guidelines for training and methods for cross-cultural consultation are presented. (25 ref)

8098. Winer, Jerome A.; Dinello, Frank A.; Pasca, Alyce & Weingarten, Samuel. (U Chicago) **"Extra-establishment" university mental health services.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 248-250.—Surveyed 39 university mental health service directors in 20 Illinois universities with regard to their opinions about student-operated "extra-establishment" mental health services. Such services exist on 90% of the campuses surveyed and include "rap" centers, free clinics, and telephone hotlines, usually staffed by nonprofessionals with or without professional back-up. Responses varied from a positive position that "extra-establishment" services filled a definite need that arose with the widespread use of drugs, and that the more services available to students the better, to negative comments concerning lack of counselor training and possible damage to the patient seeking help. Professionals are urged to examine these services and to begin outcome studies of their work.—A. de la Haba.

8099. Wogan, Michael & Amdur, Millard J. (U Connecticut) **Changing patterns of student mental**

**health, 1964 to 1972.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 202-208.—Compared data from 2 psychiatric clinic samples taken in 1964 (188 cases) and in 1972 (200 cases) to identify any changes in characteristics of students using the clinic. In 1972, clinic students were more likely to be female, more independent, married, graduate students, or more advanced undergraduates. The greater awareness of women's roles and role-conflicts, plus more available women therapists, may account for the increased number of females in the sample. More patients lived off campus and more married couples were seen, either individually or conjointly. It appears that patients experience the same emotional difficulties they did in the past, very often associated with establishing separate personal identities, as differentiated from their family backgrounds.—A. de la Haba.

8100. Wolk, Donald J. & Tomanio, Anthony J. (U Bridgeport) **A community-school problem-solving approach to the drug situation.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 157-168.—Results of 3 methods used to evaluate sessions on the drug problem indicate that participants experienced personal learning, increased understanding, and increased sensitivity to others. They also worked on concrete plans to resolve identified school-community problems related to drugs and communication. (15 ref)

### Physical Treatment

8101. Becker, D. & Igoins, L. [Dynamic approach to life-style attributable to chronic hemodialysis.] (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 536-551.—Studied medical and clinical data and Rorschach protocols for a group of 55 patients 14-25 yrs old undergoing long-term hemodialysis for chronic renal disease. The sample was heterogeneous with respect to physical, psychological, and sociocultural factors. Analysis of the various data revealed the following: (a) the importance of constraints, frustrations, and traumas because of their repetitive and uncontrollable nature and the amount of anxiety they entailed; (b) the Ss' capacity for tolerance, which was more marked as the danger became nearer and more real, requiring a massive and rapid mobilization of all defense mechanisms; and (c) the dynamic and precarious character of the attained equilibrium, which was usually fixed at the level of the primary processes, explained by intellectual displacement, and characterized by a certain poverty of fantasy in Ss' responses.—Z. M. Cantwell.

8102. Eisenberg, Louis; Taub, Harvey A. & DiCarlo, Louis. (VA Hosp, Syracuse, NY) **Acupuncture therapy of sensorineural deafness: Evaluation study.** *New York State Journal of Medicine*, 1974(Oct), Vol 74(11), 1942-1949.—Evaluated the effectiveness of acupuncture treatment in 4 studies with 10 female and 15 male volunteers. It was found that many Ss reported subjective improvement in hearing ability which was not substantiated by standard audiometric tests.

8103. Fox, Renée C. & Swazey, Judith P. (U Pennsylvania) **The courage to fail: A social view of organ transplants and dialysis.** Chicago, IL: University of Chicago Press, 1974. xviii, 395 p.—Presents a discussion of the social, ethical, and philosophical

aspects of medical transplants and dialysis procedures based on a series of case studies. Various social phenomena generated by these techniques, including the "gift-exchange" dimensions of transplantation, the psychological and sociological aspects of the "gift of life," problems created by professional uncertainty, and the scarcity and equity of organ distribution.

8104. Hynie, J. (U Karlova, Sexuologický ústav, Prague, Czechoslovakia) [Preventive custodial therapy of sexual delinquents serving their sentence.] (Czec) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 29-31. —Asserts that the first goal of correctional institutions in a socialist state is the quickest and most efficient re-education of criminal offenders. Such a goal could be achieved by preventive custodial therapy of offenders serving prison terms. In the case of sexual offenders, consideration of the following approaches is recommended: (a) voluntary surgical or other therapy when indicated, (b) removal of serious offenders to prisons with available hospitals for surgical castration therapy, (c) concentration of cases suitable for adaptation therapy in institutions where psychiatric control and hormonal therapy are available, and (d) special institutions with adequate therapeutic facilities for preventive detention and further therapy of dangerous sadists released from prison. (Russian & English summaries)—V. Fischmann.

8105. Keith, Robert L.; Ewert, Josephine C. & Flowers, Charles R. (Mayo Clinic, Rochester, MN) Factors influencing the learning of esophageal speech. *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 110-116.—Conducted a study of 49 male laryngectomized patients (mean age = 63 yrs) to determine the relationship between degree of mastery of esophageal speech and various educational and psychologic factors. 3 variables were found to correlate significantly with the final speech proficiency rating: initial speech proficiency rating, depression (MMPI Scale 2), and educational level. Results indicate that age and the educational and psychological variables investigated in this study are not as important to success in learning esophageal speech as indicated by previous authors. However, those variables may be important in individual cases. (21 ref)—*Journal abstract*.

8106. Lewis, Mary A. (U California, Primex Program, Los Angeles) Child-initiated care. *American Journal of Nursing*, 1974(Apr), Vol 74(4), 652-655.—Discusses the effects on children's attitudes and behavior toward their health of a problem-oriented approach by public health personnel. This approach is based on concepts from learning and decision-making theories. Ss were 400 inner-city children 5-12 yrs old in a Kansas City elementary school. An instrument measuring Ss' health and illness attitudes was developed for pre- and posttest measures. The problem-oriented approach was a method of (a) formulating hypotheses, (b) generating options for management, and (c) treatment with the S. Anecdotal evidence indicates that this approach increased Ss' initiation and participation in their health care. Implications for public health care are considered.—R. G. Gibson.

8107. Minckley, Barbara B. (VA Hosp, Palo Alto, CA) Physiologic and psychologic responses of elective surgical patients: Early definite or late indefinite

scheduling of surgical procedures. *Nursing Research*, 1974(Sep-Oct), Vol 23(5), 392-401.—Compared 2 groups of 30 patients who had the same type of corrective hip surgical procedure by the same orthopedic surgeon over a 6-mo period to test the effect of prolonged indefinite presurgical waiting vs early definite scheduling of the surgery. Patients were tested for physiologic and psychologic variables (e.g., changes in pulse rate, blood pressure, and standardized mood check lists). Little demonstrable difference was found in the quality of recovery of patients who had early or late surgery when variables were comparable and patients were convinced the surgery would relieve pain and restore function. A method for evaluating postoperative recovery for specific surgical patient populations is demonstrated. (26 ref)—*Journal abstract*.

8108. Scott, David L. (Whiston Hosp, Prescott, England) Hypnoanalgesia for major surgery: A psychodynamic process. *American Journal of Clinical Hypnosis*, 1973(Oct), Vol 16(2), 84-91.—Reviews literature on the use of hypnoanalgesia for surgery. Few indications remain today, due to many advances in modern anesthesia. One possible indication (nonessential cosmetic surgery on poor anesthetic risk patients) is illustrated with a case history.

8109. Tauš, L. & Sušická, L. (OUNZ, Psychiatrické oddělení, sexuologická ambulance, Liberec, Czechoslovakia) [Five-year observation of five sexual deviants after therapeutic intervention.] (Czec) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 51-55.—Reports postoperative observation with catamnesis of 5 socially dangerous sexual deviates on whom pulpectomy (therapeutic castration) was performed. Positive effects were indicated but the number of observed cases was too small to permit generalization. A cautious approach to such surgical therapy is recommended. (Russian & English summaries)

### Social Casework & Rehabilitation

8110. Acher, Martin. (U Oregon) Rehabilitation and poverty. In B. C. Ring & D. R. Schrader (Eds), *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3. —Discusses indications of the failure of antipoverty programs (e.g., underemployment, health status, and delinquency indices), and suggests some areas that warrant further research if the poor are to be successfully involved in rehabilitation programs. Administrative, social policy, training, and client requirements are also examined.

8111. Becker, Robert E. (U Connecticut, Health Ctr) The challenge of rehabilitation. In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.—Reviews the use and importance of social and vocational rehabilitation activities in the treatment of the mentally ill. Types of rehabilitative experiences are described, and a sociopsychiatric rationale for the clinical use and development of rehabilitation techniques for schizophrenic patients is outlined. (17 ref)



8112. **Borenzweig, Herman.** (U Southern California, School of Social Work) **Role enactment: A social work method for inducing behavior change.** *Clinical Social Work Journal*, 1974(Spring), Vol 2(1), 15-28.—Views role enactment as a basic concept of intervention theory, encompassing all the verbal aspects of any therapy system. Environmental manipulation, behavior modification, moral exhortation, cognitive techniques, suggestion and autosuggestion, and ways in which these techniques relate to role enactment are discussed. Whether the self selects a role, or the role forms the self, role enactment produces changes in perception, opinion, and behavior. The extent to which these changes are temporary or long lasting has not yet been determined. Nevertheless, empirical evidence supports the conclusion that role enactment is a means of producing changes in behavior.—S. R. Stein.

8113. **Craddock, George W.; Davis, Calvin E. & Moore, Jeanne L.** (Vocational Rehabilitation Project, Pittsburg, CA) **Social disadvantage and dependency: A community approach for the reduction of dependency through vocational rehabilitation.** Lexington, MA: D. C. Heath, 1970. xiii, 138 p.—Describes the background, operation, and outcome of an educational and vocational rehabilitation program for the disadvantaged in Pittsburg, California, which was based on the idea that the economically and culturally disadvantaged could fully participate in the planning and implementation of this type of program. The concept of the "Nitty Gritty Scale," which describes the organizational processes and procedures used in developing services and participants, administrative functions, operations of the local community councils, outcome and survey data, and outgrowths of the basic program are examined. (4 p ref)

8114. **Cull, John G. & Hardy, Richard E. (Eds.).** (Virginia Commonwealth U) **Rehabilitation techniques in severe disability: Case studies.** Springfield, IL: Charles C Thomas, 1974. xiii, 238 p. \$10.75.—Presents a collection of 14 articles which use the case-study approach to examine the special problems associated with the rehabilitation of severely-disabled individuals, including the mentally retarded, the epileptic, the blind and the blind diabetic, the spinal cord injured, the cancer patient, and the cardiovascular disease and pulmonary patient.

8115. **Davidson, William S. & Seidman, Edward.** (U Illinois) **Studies of behavior modification and juvenile delinquency: A review, methodological critique, and social perspective.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 998-1011.—Studies of the use of behavior modification techniques with delinquent youth are reviewed according to the type of behavior to be modified: educational, program, and delinquent behavior per se. While these investigations indicate an overall pattern of positive results, the definitiveness of the conclusions is restricted by methodological weaknesses. Issues regarding the relevance of this literature to the area of social policy decisions, and its impact on the various social systems that affect the lives of the youth who become labeled as delinquent, are discussed. (64 ref) —Journal abstract.

8116. **Fitzgerald, Thomas J.** **Contingency contracting with juvenile offenders.** *Criminology: An Interdisciplinary*

*Journal*, 1974(Aug), Vol 12(2), 241-248.—Tested 20 Ss to determine whether Ss on probation and under court order to pay fines would show an increased rate of work when positive contingencies of reinforcement were used in the form of contingency contracts. (17 ref)

8117. **Gorodischer, C.** (Beilinson Hosp, Cleft Palate Service, Petach Tikvah, Israel) **The social worker in the development of a service for cleft palate children.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 21-22.—Describes the functioning of a social worker in a prototype for the more extensive care of handicapped children and their parents. Success is claimed for counseling in the development of an experimental surgical technique.

8118. **Grant, G. W.; Moores, B. & Whelan, E.** (U Manchester, England) **Assessing the work needs and work performance of mentally handicapped adults.** *British Journal of Mental Subnormality*, 1973(Dec), Vol 19(37, Pt 2), 71-79.—Compared instructors' predictions of success or failure on 8 specific tasks with actual individual performances of 27 mentally handicapped adults (mean vocabulary age = 6.6 yrs, mean chronological age = 27.6 yrs). There were an average of 6 inaccurate predictions of failure on each task, and estimates of the number of trials that would be required to reach a criterion exceeded actual numbers of trials taken. These trends were particularly pronounced for female Ss. Results indicate that assessment of retardates' vocational potential and of the effectiveness of training programs should be more accurate and regular.—C. Wright.

8119. **Greenwood, Reed.** (U Arkansas) **Assessment of external effects in rehabilitation research.** *Journal of Applied Rehabilitation Counseling*, 1974(Fal), Vol 5(3), 138-142.—Develops the theory that evaluative research in rehabilitation calls for approaches which recognize that rehabilitation outcome is determined by a complex group of factors. A review is provided on the need for expanding the parameters of evaluative research to a system approved at both mezzo- (intermediate) and macrosystem levels, focusing on external or environmental influences affecting rehabilitation outcome. Specific external factors at mezzo and macro levels include social climate, geography, social mores and folkways, economic conditions, and institutional policies and practices. —Journal abstract.

8120. **Griffiths, R. David.** (Welsh National School of Medicine, Cardiff) **Rehabilitation of chronic psychotic patients: An assessment of their psychological handicap, an evaluation of the effectiveness of rehabilitation, and observations of the factors which predict outcome.** *Psychological Medicine*, 1974(Aug), Vol 4(3), 316-325.—Describes an investigation concerned with the description, treatment, and follow-up of 50 patients selected by age (18-55 years), diagnosis (psychotic), and the presence of work problems (unemployed for more than 12 mo). The patients were of below average intelligence, and substantial numbers were characterized by low drive to return to work, unrealistic attitudes, a lack of self-confidence, and adverse attitudes towards the existence and extent of handicap. Results of an evaluative and experimental study indicated that a rehabilitation program was unsuccessful in changing attitudes and





**prospect for prison reform.** *Psychiatric Annals*, 1974(Mar), Vol 4(3), 21-42.—Discusses the history of penal reform and the changing nature of prisons and prisoners, using the 1971 revolt at Attica prison as an example of the radicalization of prisons. Most changes advocated by modern reformers have been known for over a century. Obstacles to their implementation arise from legislative overcriminalization (i.e., prosecuting victimless crimes), and the lack of a political constituency for penal reform. Requirements for amelioration include (a) greater funding, (b) creation of true careers in penal service via training programs to decrease turnover and include women and minority group members, and (c) involvement of the legal profession and the judiciary in reform. It is concluded that a humane correctional system is possible.—C. Wright.

8130. Newman, Donald J. (State U New York, Albany) **In defense of prisons.** *Psychiatric Annals*, 1974(Mar), Vol 4(3), 6-17.—Examines contemporary approaches to crime control, noting the strong trend toward decriminalization of victimless crimes. Other strategies for change include (a) diversion of individuals from the stigmatization of typical criminal processing and (b) decarceration—either by closing all maximum security prisons or maintaining limited facilities for the most dangerous offenders. Obstacles to decarceration center around the lack of viable alternatives for community supervision of these offenders. Alternative possibilities are discussed, including vigilante justice, increased use of civil commitment procedures, electronic surveillance, and reinstitution of the death penalty. It is noted that strategies of alternative intervention employed in the juvenile justice system have often been unsuccessful. Decarceration without acceptable alternatives is seen to be a dangerous undertaking. (27 ref)—C. Wright.

8131. Prosky, Phoebe S. (Ackerman Family Inst, New York, NY) **Family therapy: An orientation.** *Clinical Social Work Journal*, 1974(Spr), Vol 2(1), 45-56.—Discusses basic techniques and orienting principles for professionals new to family therapy. Issues arising in the 1st family session, as well as issues of ongoing therapy, are presented. Specific suggestions given to help the new therapist include making home visits, sculpting the family, posing paradoxes, and retooling the family.

8132. Reilly, Mary. (U Southern California) **Competency as a battered concept.** In B. C. Ring & D. R. Schrader (Eds), *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.—Discusses the idea of human competency within an epistemological framework and how it can be assessed with reliability and validity outside of the medical model. The need for an interdisciplinary approach to the study of competency is emphasized because of the 2 languages involved in medical and behavioral models of competency.

8133. Ring, Barbara C. & Schrader, Donald R. (Eds.). *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.

8134. Rosen, Marvin & Kivitz, Marvin S. (Elwyn Inst, PA) **Beyond normalization: Psychological adjustment.** *British Journal of Mental Subnormality*, 1973(Dec), Vol 19(37, Pt 2), 64-70.—Examines the concepts of normalization and adaptation in treatment of retardates, noting contradictions in definition and application. Specific positive criteria of adjustment for retardates may differ from those for nonretarded individuals. Although personality traits of retardates who adjust poorly have been identified, predictors of positive adjustment are not available. 7 dimensions defining adjustment in retardates are proposed. Adaptation of such constructs would permit formulation of more explicit goals in rehabilitation and education.—C. Wright.

8135. Sackheim, Gertrude. (Private practice, Los Angeles, CA) **Dream analysis and casework technique.** *Clinical Social Work Journal*, 1974(Spr), Vol 2(1), 29-35.—Although dreams are not considered essential to casework treatment, they may be helpful in reinforcing interpretations, overcoming resistances, and presenting feelings previously denied. Clinical examples are provided to illustrate the usefulness of dream analysis in casework.

8136. Sampson, Allan. (Florida State U, Statistical Counseling Ctr) **Post-prison success prediction: A preliminary Florida study.** *Criminology: An Interdisciplinary Journal*, 1974(Aug), Vol 12(2), 155-173.—Applies several approaches to increasing the prediction of post-prison success, using a random sample of 200 prison system releasees. A cluster analysis of a subpopulation was shown to be superior to using either (a) parolee vs expirer population differences or (b) a variant on another state's base expectancy scale model. (19 ref)

8137. Shaw, John. (U Manchester, England) **The self in social work.** London, England: Routledge & Kegan Paul, 1974. xiii, 109 p. \$9.50(cloth), \$4.74(paper).—Develops the argument that life-long human development is the basis for social work intervention and that understanding the individual, as well as the political and social implications, is the ultimate goal of the social worker. The views of major psychologists on self-concept and theories of self-actualization are reviewed and related to the idea of life-long development. Practical methods of facilitating this development are also examined. (3 p ref)

8138. Shervington, Walter. (NIMH, Bethesda, MD) **Prison, psychiatry and mental health.** *Psychiatric Annals*, 1974(Mar), Vol 4(3), 43-60.—Provides statistics showing that correctional institutions control many individuals and consume much tax money. The high recidivism rate in federal prisons is seen as an indication that the goal of rehabilitation has not been achieved. The desirability of community-based rehabilitation is illustrated by a description of a controlled study of such a program. Because conflicts between treatment and custodial personnel have resulted in inefficiency and even legal action, it is suggested that the prison psychological staff provide educative and counseling services for other staff as well as prisoners. Goal-oriented group activities are recommended, with individual therapy reserved for crisis situations.—C. Wright.

8139. Smith, Robert R.; Wood, Larry F. & Milan, Michael A. (Rehabilitation Research Foundation, Experimental Manpower Lab for Corrections, Montgomery,

AL) **Ex-offender employment policies: A survey of American correctional agencies.** *Criminal Justice & Behavior*, 1974(Sep), Vol 1(3), 234-246.—Results of a survey of the 50 state correctional systems, the District of Columbia Department of Corrections, and the Federal Bureau of Prisons indicate that 44 of the 52 agencies have dropped whatever blanket prohibitions they may have had on the hiring of ex-offenders. Of these 44 agencies, 38 employed a total of 280 ex-offenders at the time of the survey. Slightly more than half the ex-offender employees held positions such as counselor, teacher, and correctional officer, which involved extensive interaction with the inmate population. The work performance of the ex-offenders was routinely rated as equal or superior to that of nonoffender counterparts, with respondents generally advocating more widespread employment of ex-offenders in the criminal justice system.—*Journal abstract.*

8140. **Strean, Herbert S.** (Rutgers State U, Graduate School of Social Work, New Brunswick) **Choosing among practice modalities.** *Clinical Social Work Journal*, 1974(Spr), Vol 2(1), 3-14.—Presents a brief history of social work practice and discusses various treatment modalities: the classical treatment model in social work, family therapy, work with small groups, crisis intervention, and short-term treatment. The client's level of psychosocial maturation and state of resistance are considered in relation to the different forms of treatment.

8141. **Strickler, Martin & Bonnefil, Margaret.** (Los Angeles Psychiatric Service/Benjamin Rush Ctr, CA) **Crisis intervention and social casework: Similarities and differences in problem-solving.** *Clinical Social Work Journal*, 1974(Spr), Vol 2(1), 36-44.—Distinguishes between crisis intervention and social casework in terms of goals, process, and structure. Clinical material is presented to highlight similarities and differences between the 2 treatment modalities.

8142. **Upadhyay, R. K.** (Ranchi U, Hosp for Mental Disease, Post-graduate Training Ctr, India) **Casework and psychotherapy.** *Indian Journal of Psychiatric Social Work*, 1973(Jul), Vol 2(1), 35-38.—Discusses the differences between case work and psychotherapy, with emphasis on the development of case work from history-taking through the impact of Freud to the intervention in the patient's psychosocial life. Differences between case work and psychotherapy are the level of consciousness addressed, the nature of techniques employed, the types of problems dealt with, and the ultimate objectives. It is concluded that case work consists of supportive and reeducative psychotherapy, plus social services in terms of concrete assistance.—*D. Berliner.*

8143. **Zeiller, B.; Tomkiewicz, S. & Finder, J.** **[Recidivism of juvenile delinquents: Report on 108 very difficult adolescents cared for and educated in an honor-system home.]** (Fren) *Hygiène Mentale (Supplement de l'Encéphale)*, 1973(Jul-Aug), Vol 62(2), 33-58.—Discusses the generally favorable adjustment of 108 male juvenile delinquents 10 yrs after release from an experimental home operated on an honor system. The majority (65) continued to report low-grade chronic anxiety and depression. 68 had married and only one had been divorced; those who did not marry reported

grave difficulties with homosexuality or sexual inhibitions. Most of them (92) were steadily and gainfully employed, chiefly at unskilled labor. Excellent prognosis for societal adjustment is related to stable work, marriage, prolonged absence of antisocial behavior, and a lively interest in the meaning of life. Prognosis is less favorable when these goals are not achieved.—*K. J. Hartman.*

#### Hospital Programs & Hospitalization & Institutionalization

8144. **Abrams, Lloyd et al.** (U Maine, Orono) **Transferable tokens: Increasing social interaction in token economies.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 447-452.—Notes that patients in token-economy programs are generally unable to reinforce each other's behavior with tokens, and social interaction among patients is usually minimal. In the present study, all 18 patients on a token economy ward of a state hospital were given a daily allowance of special transferable tokens in addition to whatever other tokens they earned. Transferable tokens could be spent by any patient except the one to whom they were issued. Both the frequency of social interaction and the number of different patients interacted with increased significantly.—*Journal abstract.*

8145. **Alpander, Guvenc G. & Gutmann, Jean E.** (U Maine, Orono) **A model for measuring the impact of change on an organization.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 719-723.—During a study at a psychiatric hospital in Maine, a model was developed for measuring organizational climate after the introduction of a geographical unit system brought a major change in the hospital's structure. Through questionnaires and interviews, attitudes of 124 team workers and 26 team leaders toward 9 factors, generally accepted as determinants of organizational climate, were examined. Areas studied included gaps in role perception between workers and supervisors, relationships among members and leaders of ward teams, motivational factors, and staff perceptions of the impact of change.—*Journal abstract.*

8146. **Altamirano, Guillermo & Clarke, Nancy W.** (U Chile, Facultad de Medicina, Santiago) **[Organization of a psychiatric ward for children and adolescents.]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 180-186.—Describes a psychiatric service in Santiago, Chile. The emphasis is on primary prevention.

8147. **Aring, Charles D.** **Gheel revisited.** *JAMA: Journal of the American Medical Association*, 1974(Nov), Vol 230(6), 849.—Discusses the social implications of the trend to release long-term mental patients from state hospitals. The need for community acceptance and support is emphasized in a brief reference to the city of Gheel in Belgium which has been caring for released mental patients in a "boarding out" system under church and state sponsorship for centuries.

8148. **Barker, Philip (Ed.)** (Charles Burns Clinic, Birmingham, England) **The residential psychiatric treatment of children.** New York, NY: Halsted, 1974. xiii, 354 p. \$22.50.—Presents a collection of 12 papers which examine the work of child psychiatric hospital units in



Britain, emphasizing the varying philosophies, treatments, and organization of the units. Topics include the treatment of various specific childhood disorders (e.g., psychosomatic and conduct problems), the theoretical aims of inpatient psychiatric treatment for children, and the role of the child psychiatric nurse. (14 p ref)

8149. Berkowitz, D. A. (NIMH, Adult Psychiatry Branch, Bethesda, MD) **Termination and transfer in a psychiatric hospital.** *Social Psychiatry*, 1974(Oct), Vol 9(4), 131-136.—Studied patient reactions to termination and transfer at the annual resident turnover in a psychiatric institution over a 3-yr period. Using a participant-O method, data were obtained from interviews with the patients (mostly 18-25 yr olds) and from examinations of physician order books, nursing records, and hospital census sheets. Restrictions, an index of patient turmoil, were greatest during the change-over period. However, these restrictions were spread evenly throughout the patient population, despite individual differences in loss sustained. The disturbance of this period thus cannot be explained solely as the response of patients to separation and object loss. An alternative hypothesis to that of object loss—that patient turmoil reflects a hospital-wide crisis related to unconscious assumptions of the staff—is suggested. (15 ref)—*Journal abstract*.

8150. Bhaskaran, K. & Dhawan, N. (Hosp for Mental Diseases, Kanke, India) **A comparison of the effects of hospitalization on long-stay and recently admitted female schizophrenic patients.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 72-77.—Studied the attitudes and behavior of 2 groups of Indian female schizophrenics in relation to the duration of their stay in a psychiatric hospital. The long-term group (48 Ss) had been institutionalized for at least 2 yrs; the short-term group (50 Ss) for 2-6 mo. The long-term group had been ill for a longer time before admission, showed less interest in discharge from the hospital, and received fewer visits and letters than the short-term group. Length of stay was unrelated to diagnosis. There was a tendency for long-term patients to attend occupational therapy less often. Results are interpreted as consequences of prolonged institutionalization.—*W. R. Street*.

8151. Bonstedt, Theodor. (U Cincinnati) **Concrete goal-setting for patients in a day hospital.** *Evaluation*, 1973, Mono 1, 3-5.—Describes a 5-step system for evaluating progress in the treatment of psychiatric outpatients in a day hospital: (a) A deadline is set for a progress review of every case. (b) Concrete goals are determined for each patient. (c) Individual treatment programs for reaching these goals are developed. (d) Particular staff members assume responsibility for each case. (e) A date is set for the next review, at which time goals, methods, and staff may be changed. The main advantages of this approach are increased agreement among staff about specific treatment objectives and more explicit criteria for evaluating progress.—*J. Adams-Webber*.

8152. Carini, Esta; Douglas, Dorothy M.; Heck, Lois D. & Pearson, Marquerite. (Connecticut Dept of Mental Health, Hartford) **The mentally ill in Connecticut: Changing patterns of care and the evolution of**

**psychiatric nursing: 1636-1972.** Hartford, CN: Connecticut Dept of Mental Health, 1974. 554 p.—Describes changes in the role of psychiatric nurses and their forms of treatment in 3 Connecticut state hospitals from 1868 to 1972. A historical review of Connecticut statutes relating to the mentally ill and the type of treatment available before the establishment of state hospitals (1636-1868), data on staffing patterns collected by questionnaire, and the kinds of community resources available in the state for the mentally ill are also described. (14 p ref)

8153. Carr, Robert. **Violent and dangerous men in British prisons: Dispersal policy.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 192-195.—Describes a prisoner dispersal program which makes provisions for the incorporation of segregation units within existing prisons, strengthening security and control, constructing new facilities, and increasing the numerical and organizational figures of prison staffs.

8154. Cleghorn, John M. (McMaster U, Medical Ctr, Hamilton, Ontario, Canada) **Organization of psychosocial care in a teaching hospital.** In H. Musaph (Ed), *Proceedings of the 2nd Congress of the International College of Psychosomatic Medicine*, Amsterdam, 1973: *Mechanisms in Symptom Formation*. New York, NY: S. Karger, 1974. vii, 303 p.

8155. Desroches, Fred. (U Waterloo, Ontario, Canada) **Patterns in prison riots.** *Canadian Journal of Criminology & Corrections*, 1974(Oct), Vol 16(4), 332-351.—Discusses patterns of prison riots, noting increased destructiveness and demands for media coverage. Danger is greatest for inmate "undesirables"—hostages are often protected by inmate security forces. A sociological theory related to officials' disruption of inmate society is favored in a discussion of possible causal factors. (French abstract) (35 ref)

8156. Dinwiddie, F. William. (Edgemoade, Roanoke, VA) **Reciprocity of emotional transactions: A crucial issue in residential care and treatment.** *Child Care Quarterly*, 1974(Sum), Vol 3(2), 119-124.—Discusses the importance of emotional reciprocity—the child's ability to give of himself unselfishly—in successful family relationships. Children lacking this ability are emotionally draining, and incur rejection. They require institutional care in which a number of staff members interact with them. Reciprocity should be the treatment goal, and reinforced, but behavioral conformity may be the only goal possible with severely damaged children. Children who develop reciprocity may be placed in foster or group homes, and those who do not may be successfully placed in situations where conformity is sufficient, such as the military.—*J. H. Feldstein*.

8157. Doherty, Edmund G. (Wayne State U) **Therapeutic community meetings: A study of communication patterns, sex, status, and staff attendance.** *Small Group Behavior*, 1974(May), Vol 5(2), 244-256.—Examined the communication patterns during therapeutic community meetings of staff and patients of a private psychiatric hospital over a 6-wk period. During the 2nd and 3rd 2 wks, number of staff attending was half that of the 1st 2 wks. Amount of verbal participation of 6 groups was analyzed: (a) 6 psychiatrists and residents, (b) 5 social workers and occupational therapists, (c) 5 nurses, (d) 9

aides, (e) 26 male patients, and (f) 19 female patients. For physicians, nurses, and male patients, participation was greater during the 4 wks of reduced staff attendance than during the 1st 2 wks. Both sex and status contributed to frequency of participation: male patients spoke and were spoken to more frequently than all other groups; physicians (all male) spoke and were spoken to more frequently than were nurses (all but one of whom was female).—G. R. Breed.

8158. Dörken, Herbert. (U California, San Francisco) **Reorganization of California state hospitals: Impact on the allied health professions.** *Administration in Mental Health*, 1973(Fal), 42-51.—Describes the process of reorganizing state hospitals along treatment program lines instead of along hierarchical superintendent-medical director lines. The reorganization included decentralization of inpatient services and a complete revision of personnel classifications and pay scales for all medical and nonmedical management positions. The effects of this reorganization on psychology staffing are discussed.—R. J. Albers.

8159. Faltus, F. & Petrášek, J. (U Karlova, Psychiatrická klinika, Prague, Czechoslovakia) **[Psychiatric problems in intensive care units.]** (Czec) *Československá Psychiatrie*, 1973(Feb), Vol 69(1), 23-28.—Describes the character and function of intensive care units in departments of internal medicine and classifies various traumatic influences affecting both patients and staff. 4 kinds of psychiatric problems are presented: (a) symptomatic disorders connected with basic somatic disease, (b) reactive states arising during hospitalization, (c) disturbances connected with release of the patient from the unit, and (d) disorders arising in the staff itself. The importance of close cooperation between internist and psychiatrist and the possibility of psychiatric therapy on intensive care units are discussed. (Russian & English summaries)—V. Fischmann.

8160. Gold, Marsha R. & Rosenberg, Robert G. (Abt Assoc, Cambridge, MA) **Use of emergency room services by the population of a neighborhood health center.** *Health Service Reports*, 1974(Jan-Feb), Vol 89(1), 65-70.—Compared the use of a hospital emergency room and a health center by identifying all children's visits to each facility during a 4-wk period. The health center was used by almost 4 times as many children (801) as the emergency room (223). About  $\frac{1}{3}$  of emergency room visits occurred when the health center was closed. White children and those living outside a housing project were more likely to be taken to the emergency room.—S. Blackman.

8161. Gralnick, Alexander & D'Elia, Frank. (High Point Hosp, Port Chester, NY) **A social nursing-therapy service: Concept and development.** *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 1-7.—Describes a long-term program of redefining professional roles in a psychiatric hospital. Duties of therapists, administrators, and nurses were made more similar. Group treatment replaced much individual therapy and formerly isolated therapy units were joined. The theory underlying these changes is discussed.

8162. Greene, James A. (Hill Crest Hosp, Birmingham, AL) **Restructuring staff time: The eight-day week.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11),

733-735.—A significant drop in the average length of patient hospitalization, in cost per patient, and in staff absenteeism resulted from instituting a new work schedule, consisting of working 10 hrs/day for 8 days and then having 6 days off, among the staff of a private psychiatric hospital.

8163. Gruenberg, Ernest M. (Columbia U, Coll of Physicians & Surgeons) **Benefits of short-term hospitalization.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.—Discusses safety, method of diagnosis, treatment availability, and the benefits of asylum (i.e., a nurturing environment), burden sharing, insight, and partnership as indications for short-term hospitalization of psychiatric patients.

8164. Gunzburg, H. C. (Hosp for the Mentally Subnormal, Birmingham, England) **The physical environment of the mentally handicapped: VII. "39 steps" leading towards normalized living practices in living units for the mentally handicapped.** *British Journal of Mental Subnormality*, 1973(Dec), Vol 19(37, Pt 2), 91-99.—Stresses the therapeutic importance of the design and environment on inpatient units for the mentally retarded. A checklist of 39 desirable features relating to physical characteristics and routine ward practices is presented for wards of no more than 20 ambulatory inpatients. Explanations and practical suggestions for implementation of improvements are included. 3 levels of managerial decision-making on such units are discussed.—C. Wright.

8165. Herridge, C. F. (West Middlesex Hosp, Isleworth, England) **Aircraft noise and mental health.** *Journal of Psychosomatic Research*, 1974(Aug), Vol 18(4), 239-243.—Conducted 2 studies to see whether aircraft noise affected mental health. Both compared the number of admissions to a psychiatric hospital from the Maximum Noise Area (MNA) to those from a less noisy area surrounding a London airport. Study 1 showed that psychiatric inpatient admission rates were significantly higher from the MNA than from outside it and that the person most at risk was the single, widowed, or separated older woman who was already neurotic. Study 2, which defined the high noise zone more precisely, showed the same general trend but the results were not significant.—W. G. Shipman.

8166. Herz, Marvin I. (New York State Psychiatric Inst, New York) **Brief hospitalization and aftercare.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.—Discusses reasons for and goals of hospitalization for persons with psychiatric disorders, and reviews evidence on the effectiveness of brief hospitalization. Characteristics of the optimal hospital milieu are described, and alternatives to long-term hospitalization (e.g., aftercare, day hospitalization, supervised residences, and outpatient therapy) are examined. (34 ref)

8167. Higgenbottam, John A. **New directions for institutions and institutional psychologists.** *Ontario Psychologist*, 1974(Oct), Vol 6(4), 30-33.—Psychological services, increasingly important in institutions for the



mentally retarded, will become more so as institutional populations, which are changing toward the more severely retarded, produce greater demands for psychological intervention. As researcher-consultants, psychologists are integral to phasing out traditional services and developing community services for the retarded.

8168. Hirschowitz, Ralph G. (Harvard U. Medical School, Boston) **Two psychiatric hospitals in transition: Studies in staff behavior.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 730-733.—Observed the behavior of professional staff at 2 university-associated psychiatric hospitals in transition which had previously served selected patients through traditional structures, values, and operations. One hospital became a comprehensive community mental health center, required to serve all catchment-area patients. The other, which had stressed psychoanalytically oriented care, was forced by fiscal crises to admit more short-term patients, of different class and ethnic backgrounds, whose care was paid for by third-party insurance. In adapting to the changes, staff members in both hospitals passed through phases similar to those described by E. Kubler-Ross (1969) in the anticipation of loss: denial, anger, bargaining, depression, and acceptance.—*Journal abstract*.

8169. Ho, Man Keung & Norlin, Judy. (U Oklahoma, School of Social Work) **The helper principle and the creation of therapeutic milieu.** *Child Care Quarterly*, 1974(Sum), Vol 3(2), 109-118.—Discusses the establishment of a therapeutic milieu in a residential home for delinquent boys by using staff and clients as helpers. The helper may benefit from the status of his role and diversion from his own problems. Helpers provide tours for applicants and orientation for new residents, and assist in work with families of clients. Helpers should be similar to those with whom they work, but not identical in interests and values. Use of staff members in screening job applicants made interviews less threatening and improved communication regarding the status of various jobs.—*J. H. Feldstein*.

8170. Honigfeld, Gilbert & Klein, Donald F. (Sandoz Pharmaceuticals, Hanover, NJ) **The Hillside Hospital patient progress record: Explorations in clinical management by objective and exception.** *Evaluation*, 1973, Mono 1, 19-22.—Describes a computer-based clinical review system for graphically charting and evaluating psychiatric treatment programs in relation to predetermined quantitative goals. Therapists select a list of target areas for each patient. A quantitative goal is set in each target area using a 7-point scale to represent the degree of improvement expected. Patients' current status ratings are checked periodically against these goals. Patients are rated also in terms of their overall level of functioning. These data can be aggregated for comparing the effectiveness of therapists and treatment methods. This system is undergoing modification following a 2-yr pilot study.—*J. Adams-Webber*.

8171. Jones, Maxwell & Weeks, Margaret. (Ft Logan Mental Health Ctr, Denver, CO) **Systems approach to a correctional institution.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973, xv, 132 p. \$9.75.—Discusses various components of systems theory (e.g., the authority system, 2-way communication,

shared decision making, and social learning) which are applicable to the problems and goals of correctional systems.

8172. Jones, Maxwell. (Ft Logan Mental Health Ctr, Denver, CO) **Therapeutic community principles.** In L. M. Irvine & T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: II*. Springfield, IL: Charles C Thomas, 1973, xv, 132 p. \$9.75.—Discusses the principles, goals, organization, and effects of therapeutic communities in terms of shared decision making, social learning, and leadership processes. Implications for psychiatry and community mental health are noted.

8173. Letcher, Patricia B.; Peterson, Lars P. & Scarbrough, Dorothy. (VA Hosp, Tuscaloosa, AL) **Reality orientation: A historical study of patient progress.** *Hospital & Community Psychiatry*, 1974(Dec), Vol 25(12), 801-803.—Describes a reality orientation program for elderly confused and disoriented patients, conducted at a Veterans Administration hospital as part of its total rehabilitation program. Results, based on a study of 125 male patients whose mean age at admission was 82.8 yrs, showed that 32% improved while 68% remained the same; only 1 S regressed. Findings indicate that reality orientation can prevent the decline of a large number of patients while actually improving the condition of others.—*Journal abstract*.

8174. Loveland, Catherine A. & Little, Verda L. **Juvenile correctional system.** *American Journal of Occupational Therapy*, 1974(Oct), Vol 28(9), 537-539.—Discusses the integration of occupational therapy into a multidisciplinary consultative clinic that serves a state juvenile correctional system. The areas in which the occupational therapist functions are sensory integration, visual motor training, vocational day care, recreation and crafts, staff training, and student supervision. These services are described as illustrative of the potential use of occupational therapy in a nontraditional setting.—*Journal abstract*.

8175. May, Philip R. & Cohen, Jerome. (VA Hosp, Brentwood, CA) **The mental health engineer: An agent for institutional change.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 735-739.—Argues that mental health delivery systems lose potential effectiveness because of the gap between research and application, a gap that is likely to become even wider as knowledge becomes more compartmentalized. The creation of a new class of professionals is proposed who would act as intermediaries and change agents to translate current research knowledge into programs. These professionals, defined as mental health engineers, would function as constructive critics and active, responsible participants in change. Ways in which the mental health engineer might help decrease hospital admissions, reduce staff alienation, or change a ward treatment program are suggested.—*Journal abstract*.

8176. McInnis, Titus; Himelstein, Howard C.; Doty, David W. & Paul, Gordon L. (U Illinois) **Modification of sampling-exposure procedures for increasing facilities utilization by chronic psychiatric patients.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 119-127.—Sampling-exposure procedures by J. P. Curran et al (1973) increased the use of off-unit facilities and services, with generalization to contiguous

announce-only conditions in a milieu group but not in a social-learning group of chronic mental patients ( $N = 56$ ). However, the social-learning group showed comparable increases when ineligibility due to standing fines and possible token shortages was removed and when eligibility for off-unit facilities and services could be obtained by an additional payment on standing fines. Results for the social-learning group demonstrate that modifying treatment programs is preferable to concluding prematurely that patients are "unresponsive to treatment." Practical suggestions are offered for treatment of chronic patients by (a) treating heterogeneous groups to maximize the value of good modeling, (b) occasionally reinstating sampling-exposure procedures to "boost" performance, and (c) using the purchase-eligibility procedure in combination with response-costs to maintain exposure to backup reinforcers in token programs.—*Journal abstract.*

8177. Moore, Austin. (Harlem Hosp Ctr, New York, NY) **Adult psychiatric ambulatory care service.** *Psychiatric Annals*, 1974(May), Vol 4(5), 22-23.—Summarizes the activities of Harlem Hospital Center's adult ambulatory psychiatric service, which include an outpatient clinic, ward consultation services, a comprehensive geriatric day care program, and a socialization program. The service's objective is eventual interconnection of all units to permit pooling of resources and staff.

8178. Murphy, Lois B. **Growing up in Garden Court.** New York, NY: Child Welfare League of America, 1974. 282 p. \$4.95.—Describes experiences with the child residents of Garden Court, 1 of the psychiatric residential units of the Children's Hospital of the Menninger Clinic. Problems, procedures, and other issues involved with the day-to-day care, educational needs, staff relationships, communication between children and adults, problem behaviors, and the outcome of a group of children in Garden Court are detailed.

8179. Nachumi, Gideon. (Harlem Hosp Ctr, Adult Psychiatric Clinic, New York, NY) **Adult psychiatric clinic.** *Psychiatric Annals*, 1974(May), Vol 4(5), 23-35.—Recounts the particular problems encountered in ghetto psychiatric clinics (e.g., limited staff, large addict populations, and difficulties in coordination with social service agencies). Harlem Hospital Center's clinic emphasizes relief of acute symptoms and intervention in the social milieu, with a limited possibility of long-term psychotherapy. A problem of "therapeutic unambition" in inner-city hospitals is described, and the need for the program self-evaluation is stressed. Effects of the psychosocial realities of ghetto life on subsequent symptomatology and willingness to request treatment are examined.—*C. Wright.*

8180. Nichols, Glennadee A. et al. **Patients' perceptions of important, satisfying and dissatisfying aspects of army hospitalization.** *Military Medicine*, 1974(Nov), Vol 139(11), 871-878.—Administered a questionnaire about hospitalization experiences to 562 adults hospitalized on medical and surgical wards in 11 Army medical facilities in the US. Ss were grouped as stayers (i.e., those who remained in the hospital) and leavers (i.e., those who chose to leave). Stayers and leavers had similar perceptions of the importance of 87% of the items regarding hospitalization, but the impor-

tance they attached to 9 items was significantly different. 86% of all Ss were satisfied overall with their hospitalization. Inadequate communication between hospital personnel and patients contributed significantly to patient dissatisfaction. There were significant differences in the satisfaction of respondents in relation to 6 biographical variables. Patients hospitalized 2 wks or more, respondents on active duty, persons 18-26 yrs of age, unmarried Ss, and men were less satisfied than persons hospitalized for less than 2 wks, retired persons or dependents, Ss over 25, married Ss, and women. (17 ref) —*Journal summary.*

8181. Offir, Carole W. **Field report—Civil rights and the mentally ill: Revolution in bedlam.** *Psychology Today*, 1974(Oct), Vol 8(5), 60-72.—Reports on recent legal rulings that have made several significant changes in institutions for the mentally ill. A class action suit in Alabama has resulted in the decision that those involuntarily committed must be offered treatment. A 2nd change, now going into effect, is that patients must be paid for labor performed while hospitalized. A 3rd change is that involuntary long-term commitment occurs far less frequently than it did 5 yrs ago. Reforms can fail, however, if outpatient services are not provided and if political considerations and misguided community pressures force retrenchment.—*E. J. Posavac.*

8182. Sabbatini, F. & Furlan, P. M. (U Torino, Clinic for Mental & Nervous Disease, Italy) **Attempts at family approaches and re-entry with chronic patients nearing release.** [Ital] *Neuropsichiatria*, 1972(Jan), Vol 28(1-2), 53-57.—Describes attempts to reduce the difficulty of family re-entry by long-term hospitalized patients. To enhance the resocialization of chronic patients and to improve family attitudes toward their hospitalized relatives, a system was tried by which groups of 6-10 patients would visit one of the patients' families for a day. The patient whose family was to be visited would volunteer to be "host for the day." A psychiatrist and an attendant accompanied the patients during the visits. While no statistical data are reported, this system seemed to help both patients and families change stereotyped attitudes more quickly. It also benefited the psychiatric staff by giving them a more dynamic understanding of patient-family relationships and by improving their own attitudes. (English, French, & German summaries)—*A. Felice.*

8183. Saunders, Bruce T. (Waterford Country School, Educational & Clinical Services, Quaker Hill, CT) **Diagnostic-prescriptive educational programming in a multi-modal residential treatment center.** *Devereaux Forum*, 1974(Win), Vol 9(1), 27-37.—Explains the procedure and describes the results of programming in individual curriculum areas rather than using general ability assessments in school planning for children in residential treatment. A detailed example of one such program is included.

8184. Schween, Peter H. (Harlem Hosp Ctr, New York, NY) **The Psychiatric Ward Consultation and Liaison Service.** *Psychiatric Annals*, 1974(May), Vol 4(5), 35-51, 83.—Outlines the functions of the psychiatric consultation and liaison service of Harlem Hospital Center, noting difficulties and needs particular to an inner-city patient population. Activities include formal



and informal training of both psychiatric and nonpsychiatric personnel and short-term psychotherapy. The value of liaison nurses who perform tasks ranging from brief supportive therapy to education of psychiatric ward nurses is discussed. Special services are focused on hemodialysis and burn patients and their unique psychiatric problems. Problems common to all consultation efforts and those unique to ghetto hospitals are described.—C. Wright.

8185. Severin, Nelda K. & Becker, Robert E. **Nurses as psychiatric consultants in a general hospital emergency room.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 261-267.—Psychiatric nurses served as consultants to 199 patients and to physicians in a general hospital emergency room. The nurses successfully managed 66% of the psychiatric referrals in the emergency room over a 5-mo period and required only telephone consultation in a majority of the remaining cases to develop and implement a satisfactory treatment plan. It is suggested that resistance to using nurses in this new role results from anxiety generated in the emergency room staff and physicians.—*Journal abstract.*

8186. Shah, Jyotsna H. (Central Bureau of Correctional Services, Dept of Social Welfare, New Delhi, India) **Probation services in India.** *International Journal of Offender Therapy & Comparative Criminology*, 1974, Vol 18(2), 187-191.—Discusses the application of probation laws in various East Indian states, including the number and training of personnel, institutional and noninstitutional care, and proportionate numbers of cases treated and cases released on probation.

8187. Shihadeh, Emile S. & Nedd, Albert N. (U Alberta, Faculty of Business Administration & Commerce, Edmonton, Canada) **The perception of parole prison activity.** *Canadian Journal of Criminology & Corrections*, 1974(Oct), Vol 16(4), 403-410.—Examined attitudes of 169 penitentiary inmates and 89 staff members toward rehabilitative activities of prison parole officers, who assess inmates' progress and readiness for release. Higher scores on a 9-item questionnaire developed by content analysis of interviews with staff and inmates indicated more positive perceptions. Mean normalized scores of the staff were significantly higher than those of inmates ( $p < .05$ ), and inmates who participated in counseling activities had more favorable perceptions than those who did not. Other hypothesized differences between participants and nonparticipants did not appear, and more research is suggested on the influence of voluntary vs involuntary participation on attitudes. (French abstract)—C. Wright.

8188. Storlie, Frances. (Portland State U) **Double entendre in a CCU.** *American Journal of Nursing*, 1974(Apr), Vol 74(4), 666-668.—Describes in narrative form a coronary patient's experience during her admission to a hospital cardiac care unit. The specialized terminology and behavior of the medical and nursing staff were confusing and frustrating to the patient.

8189. Sumner, Joan H.; Mueser, Sonja T.; Hsu, Louis & Morales, Rafael G. (Greystone Park Psychiatric Hosp, NJ) **Overcorrection treatment for radical reduction of aggressive-disruptive behavior in institutionalized mental patients.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 655-662.—Attempted to extend and evaluate a

new treatment, overcorrection, for the radical reduction of aggressive-disruptive behavior. The treatment emphasized 4 specific attributes: reeducation in prosocial adaptive responses; an extended period of work and effort; time out from general positive reinforcement; and prevention of any reinforcement from the disruptive behavior itself. Ss were 7 chronic female patients in a behavior-modification token-economy program in a state mental hospital. The treatment consisted of having S restore her disturbance to an extent that greatly improved the previous situation. Overcorrection required S to apologize and reassure all persons present that the disturbance would not be repeated. Data show that the average reduction for experimental Ss at the end of 8 wks was 91%. The average reduction for all controls at the end of 8 wks was 55%. However, the monotonic decreasing trend of the mean number of incidents over weeks for the experimental group was significantly greater than that of the control group. Additional data indicate that the inhibition of the maladaptive behavior lasted with little assistance from the staff. Thus, overcorrection may be considered a generally effective therapeutic procedure. The unexpected significant reduction in the control group was ascribed to the influence of modeling.—*Journal abstract.*

8190. Tizard, Jack & Tizard, Barbara. (U London, Inst of Education, England) **The institution as an environment for development.** In M. P. Richards (Ed), *The integration of a child into a social world*. London, England: Cambridge University Press, 1974. 316 p. \$15.50.—Examines some of the factors affecting the development of young children in long-stay residential care, including child-care personnel, extra-institutional experiences, and staff-child interaction. (21 ref)

8191. Trudel, Gilles; Boisvert, Jean-Marie; Maruca, Francesco & Leroux, Paul-André (Ctr Hospitalier Saint-Jean-de-Dieu, Montréal, Québec, Canada) **Unprogrammed reinforcement of patients' behaviors in wards with and without token economy.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Sep), Vol 5(2), 147-149.—Compared unprogrammed reinforcement practices in a ward with token economy and in a control ward. The token economy ward contained 49 psychiatric patients and the control ward contained 48. Results clearly show that in unprogrammed interactions between staff and patients that were not formally part of the treatment, the aides of the token economy ward reinforced appropriate behaviors more than did those on the control ward.—*Journal abstract.*

8192. Vanden Heuvel, Kees J. (Rideau Regional Ctr, Smith's Falls, Ontario, Canada) **Some observations on a new mental retardation program for Ontario.** *Ontario Psychologist*, 1974(Oct), Vol 6(4), 24-29.—Views the Ontario government's decision to reduce by half the number of institutionalized retardates as a shift to "community-based institutions." The approach taken by 1 hospital to increase its community involvement is described.

8193. VanScoy, Holly C. & Bordelon, Karen J. (Meridell Achievement Ctr, Austin, TX) **Patient's perceptions of the residential treatment staff: Revisited.** *Adolescence*, 1974(Sum), Vol 9(34), 237-244.—110 children and adolescents in a residential center for

emotionally disturbed youth rank-ordered 10 staff members on their ability to meet the resident's personal needs for succorance, deference, achievement recognition, and playmirth. Results indicate same-sex staff were ranked higher. Staff members were ranked differently by younger and older patients, and by psychotic and nonpsychotic patients, except in achievement recognition. Therapists and child care workers were perceived as having the most potential to meet the patient's needs.—A. Krichev.

8194. Vigod, Zena L. (U New Brunswick, Fredericton, Canada) **A prison therapeutic community and its decision-making structure.** *Canadian Journal of Criminology & Corrections*, 1974(Oct), Vol 16(4), 411-420.—Describes the division and processes of decision making in a therapeutic community within a federal penitentiary, particularly in relation to the incompatible penal goals of custody vs treatment. Comparative research on the internal dynamics of such communities and on other treatment modalities in prisons is suggested. (French abstract)

8195. Wertheimer, J.; Bircher, L. M.; Périer, M. & Périer, J. (Hôpital Gériatrique, Prilly/Lausanne, Switzerland) **[Activity of an ambulatory center of psychogeriatrics.]** (Fren) *Social Psychiatry*, 1974(Oct), Vol 9(4), 143-154.—Studied sociodemographic factors, motivations for consultation, number of contacts, and treatment outcome in 1,219 psychiatric geriatric patients in an ambulatory care center. 29% of the patients were male and 71% female, a distribution different from that of the general area population where 60% of the people over 64 yrs of age were women. Singlehood was overrepresented, in that 54% of the patient population was married compared with 70% of men in the general population; for women the discrepancy was 22% and 35%, respectively. Most women had been housewives, and 58% of the men came from lower occupational levels. The most common reason for clinic contact was medical, followed by social and family problems. 81% of the patients also exhibited physical symptoms in addition to psychiatric problems. 42% had organic brain disease, 33% showed depression, and 11% were delirious. Depressed patients required more clinic visits than the other patient groups. 31% were eventually hospitalized, 26% were under medical supervision, and 16% had died.—English abstract.

8196. Wilking, Virginia N. (Harlem Hosp Ctr, New York, NY) **The Division of Child Psychiatry.** *Psychiatric Annals*, 1974(May), Vol 4(5), 56-73.—Analyzes available staff and facilities in Harlem Hospital Center's Division of Child Psychiatry, stressing its limited resources and lack of inpatient facilities. Services are specialized within age groups in accordance with a developmental viewpoint. 3 programs—developmental, child, and adolescent—provide therapeutic education, consultation with pediatric outpatient departments and clinics, emergency consultation, recreational programs, school liaison activities, consultation with parents, and liaison with family courts. Goals involve consolidation of services and 10-yr prospective review of care provided in order to adapt programs to further serve community needs.—C. Wright.

8197. Williams, Paul. (Whitechurch Hosp, Cardiff, Wales) **The district general hospital psychiatric unit and the mental hospital—some comparisons.** *British Journal*

*of Preventive & Social Medicine*, 1974(May), Vol 28(2), 140-145.—Compared information obtained on all acute psychiatric patients admitted to a new general hospital psychiatric unit and those admitted to a mental hospital. Patients admitted to the general hospital unit tended to be younger, of higher social class, neurotic rather than psychotic, and to have had fewer previous admissions than patients admitted to the mental hospital.

## EDUCATIONAL PSYCHOLOGY

8198. Huteau, M. (U René Descartes, Paris, France) **[Professional preferences of first year psychology students.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(10-12), 629-631.—Conducted a questionnaire survey to determine which of 7 professional activities were preferred by 365 beginning psychology students. 75% of Ss were female. The activities were presented in pairs, and each S made 21 judgments of preference. The 3 most often selected activities concerned social aspects of psychological work: therapy, consultation, and counseling.

8199. Long, Huey B. (U Georgia, Coll of Education) **Lifelong learning: Pressures for acceptance.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 2-12.—Reviews literature which documents an increasing awareness in American society that education is a continuing, lifelong activity. 3 forces are seen as combining to strengthen the concept of lifelong learning: the basic human need to learn, rapid social and technological change, and institutional pressure of both a philosophical and practical nature. The implications of this concept are discussed. (36 ref)—E. S. Goodman.

8200. O'Brien, Thomas C. (Southern Illinois U, Edwardsville) **Some comments on British education.** *Elementary School Journal*, 1974(Oct), Vol 75(1), 42-49.—Compares the British and American systems of education from the viewpoint that the differences reflect the dissimilarities between the 2 cultures. The British system is characterized by localisms that can result in wide differences in the programs of neighboring schools. The emphasis is on caring for the welfare of the children as they are instead of compelling them to attain a certain norm, and on the "organic nature" of the child, which implies that his educational activities should be based on his life, interests, and abilities.—A. J. Ter Keurst.

8201. Yee, Albert H. (Ed.). (U Wisconsin, Madison) **Perspectives on management systems approaches in education: A symposium.** Englewood Cliffs, NJ: Educational Technology Publications, 1973. xi, 154 p.—Presents a collection of 8 theoretical and discussion papers on the feasibility and applications of systems approaches to educational planning and evaluation. Topics include objectives-based management strategies for large educational systems, the limits of scientific-economic-technological approaches to education, behavioral objectives and performance contracting, models of rationality in systems theory, and a guide to selected readings in systems sciences.



## School Administration &amp; Educational Processes

8202. Adams, Gerald R. & LaVoie, Joseph C. (U Nebraska, Omaha) **The effect of student's sex, conduct, and facial attractiveness on teacher expectancy.** *Education*, 1974(Fal), Vol 95(1), 76-83.—Investigated the bias effect of sex of child, conduct, and facial attractiveness on teacher assessment of a student's parents, peer relations, attitudes, and work habits. 295 female and 55 male teachers of Grades 1-6 were asked to predict parent interest, peer relations, attitudes, and work habits after examining a student progress report to which was attached a color photograph of the student. The fictitious student was either a boy or girl whose facial attractiveness was previously rated as low, moderate, or high, and whose grades on social and personal growth were manipulated to appear satisfactory or unsatisfactory. Teacher predictions on all measures were significantly influenced by the student's conduct, while facial attractiveness exerted little effect. (15 ref)—*Journal abstract*.

8203. Babb, Charles W. (Middle Tennessee State U) **Relationships between concerns and verbal behavior in elementary school teachers.** *Journal of Instructional Psychology*, 1974(Spr), Vol 1(2), 21-26.—Used a teacher concerns model as a conceptual base for observing 4 groups of elementary school teachers ( $N = 92$ ) on selected behavioral characteristics. 2 null hypotheses, that there were no statistically significant differences in verbal behavior among the 4 groups differentiated on the basis of level of concern and yrs of teaching experience, were rejected. Regardless of experience, elementary school teachers were more concerned for pupil need than for self-adequacy, were more indirect in their verbal interactions, and were more aware of higher cognitive processes.—*Journal abstract*.

8204. Bobilya, L. Jerry & Yarber, William L. (Columbus School for Girls, OH) **Reflections on the role of the advisors to the health service.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 177-181.—Analyzes the responsibilities of the faculty advisor to student health advisory boards with respect to motivating the student members, promoting responsible interpersonal relationships among them, and providing counseling when required. Recommendations are made for methods of appointing advisors.

8205. Boyce, Max W. (State Coll of Victoria, Toorak, Australia) **Student teacher misconceptions of manifestations of anxiety in children from different socio-economic/ethnicity backgrounds.** *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 138-139.—Asked 90 students in a teacher's college how they thought children from 2 socio-economic backgrounds in Melbourne would respond to 16 items taken from the Children's Manifest Anxiety Scale. Teacher predictions were compared with actual responses of 240 children from the 2 backgrounds. On most of the items the student teachers made incorrect predictions. Recommendations for teacher training are offered.—*R. Brislin*.

8206. Brunner, Joseph. (Montclair State Coll) **The development of learning modules for the training of content teachers in reading: A focus on progress.** *Reading World*, 1974(Oct), Vol 14(1), 44-48.—Discusses the development and use of learning modules in competency-based teacher education programs in read-

ing. Problems in the use of modules are described; e.g., there is a tendency to limit the postevaluation to pencil-and-paper tests, and developers use educational terminology that students may not be familiar with. Consequently, modules need to be clearly written and a systematized method of evaluation should be established.—*C. K. Miller*.

8207. Canter, Lee & Paulson, Terry. (Orange County Mental Health Services, Santa Ana, CA) **A college credit model of in-school consultation: A functional behavioral training program.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 268-275.—Describes a pilot study which combined the didactic structure and credit of a college seminar with the immediate relevance, support, and training of a traditional in-school consultation. Data support the effectiveness of this model in training teachers as therapeutic change agents in their classrooms.

8208. Centra, John A. (Educational Testing Service, Princeton, NJ) **College teaching: Who should evaluate it?** *Findings*, 1974, Vol 1(1), 5-8.—Assessed the reliability of colleague evaluations of instructor classroom performance and compared colleague and student ratings of the same instructors. 16 items selected from the Student Instructional Report—items subject to observation during a class visit—were used for the comparison. Each teacher being evaluated was observed and rated twice by each of 3 colleagues for a total of 6 separate ratings. Colleagues proved to be very generous in their ratings. A reliability analysis was conducted on ratings given to the 54 teachers for whom complete data were available. A correlational analysis was used to test the level of agreement between responses of students and colleagues to the 16 items. It is concluded that students were better raters than colleagues. Ways of improving colleague ratings to use in conjunction with student ratings are discussed.—*R. Hall*.

8209. Colvin, Ralph W. & Zaffiro, Esther M. (Eds.). (State Coll Arkansas) **Preschool education: A handbook for the training of early childhood educators.** New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Presents a collection of 11 papers on various administrative, training, evaluative, and curriculum issues involved in early childhood personnel training programs.

8210. Cormany, Robert B. (West Shore School District, Pupil Services, Lemoyne, PA) **Faculty attitudes toward standardized testing.** *Measurement & Evaluation in Guidance*, 1974(Oct), Vol 7(3), 188-194.—Examined the attitudes of 1,027 teachers and counselors in 45 school districts toward the use of standardized tests. Ss' scores on an inventory of faculty attitudes toward standardized testing were analyzed on 8 demographic variables—sex, position, grade level, highest degree attained, previous membership on a test advisory committee, knowledge of the district's standardized testing program, number of years in education, and number of courses taken in tests and measurements. All but the last 2 variables showed significant differences in scores at the  $p < .01$  level.—*Journal abstract*.

8211. Doyle, Walter & Redwine, Judith M. (North Texas State U, Coll of Education) **Effect of intent-action discrepancy and student performance feedback on teacher behavior change.** *Journal of Educational Psychol-*

ogy, 1974(Oct), Vol 66(5), 750-755.—Studied the influence of 2 types of verbal feedback on changes in teacher perceptions and behavior. The experiment was conducted in a microteaching-type laboratory setting in which 36 experienced junior high school teachers taught the same content to 2 groups. Feedback between sessions consisted of information about (a) discrepancy between stated intent (S's estimate of how he or she would teach) and observed behavior and (b) student learning outcomes. Teacher behavior was coded using interaction analysis categories. Feedback treatments were associated with significant changes in teacher intent. No significant effects were observed for teacher behavior or for the interaction of treatments. (15 ref)—*Journal abstract*.

8212. Edeburn, Carl E. & Landry, Richard G. (South Dakota State U) **Self-concepts of students and a significant other, the teacher.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 505-506.—Results of testing teachers and students suggest that a teacher's self-acceptance is related to the development of good self-concepts by students in Grades 3-5.

8213. Eubanks, Eugene E. (U Delaware) **A study of perceptions of black and white teachers in de facto segregated high schools.** *Education*, 1974(Fal), Vol 95(1), 51-57.—In 2 studies, a total of 97 teachers from 6 de facto segregated high schools in a large midwestern school district completed a questionnaire on their perceptions of job satisfaction; teacher-student relations; status of a white high school as opposed to a black high school; attributes essential for the success of a teacher; and behavioral, emotional, and social characteristics of all students in their high schools. The 1st study involved a comparison between 47 teachers in white high schools and 50 teachers in black high schools on the above 5 variables. Teachers in white high schools differed significantly from teachers in black high schools on all variables except attributes of a teacher essential for the success of a teacher. The 2nd study compared 25 white teachers from black high schools and 25 black teachers from black high schools on the variables. No significant difference was found between the 2 groups on any of the variables.—*Journal abstract*.

8214. Falk, William W. & Cosby, Arthur G. (Texas A&M U) **School desegregation and the educational projections of rural black youth.** *Rural Sociology*, 1974(Spr), Vol 39(1), 28-41.—Investigated the effects of school desegregation on the educational attitudes of black youth. Members of a sample of rural Texas black youth were interviewed in their sophomore (1966), senior (1968), and post high (1972) years. In 1966 all students were attending segregated schools, but by 1968 approximately half were in desegregated schools. This allowed attitudes before desegregation (1966) to be compared with short-run (1968) and long-run (1972) effects of desegregation. While neither educational aspirations nor educational expectations were affected to a significant degree, the desegregated group was more likely than the segregated group to define their life-chances in racial terms, and to see the schools they had previously attended as detrimental.—*Journal abstract*.

8215. Farmer, James A. (U California, Los Angeles) **Impact of "lifelong learning" on the professionalization of adult education.** *Journal of Research & Development in*

*Education*, 1974(Sum), Vol 7(4), 57-67.—Reviews literature providing an assessment of the degree of professionalization which has been achieved in adult education and considers the "identity crisis" which lifelong education programs may precipitate. The adult educator may adopt attitudes which are reactionary, conservative, liberal, or radical; each attitude will have different effects on further professionalization of adult education. (36 ref)—*E. S. Goodman*.

8216. Follman, John; Wiley, Russell; Geiger, Glen & Lavelly, Carolyn. (U South Florida) **Effects of halo-effect instructions on level of ratings and intercorrelations.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 392.—Results support the conclusion that mere instructions to college student raters to consider each item on rating scales independently of all other items does not reduce halo effect.

8217. Fox, David J.; Steinmann, Anne & Losen, Stuart M. (City Coll, City U New York) **The impact of sex education on the sex-role perceptions of junior high school students.** *International Mental Health Research Newsletter*, 1974(Spr), Vol 16(1), 13-14.—Compared 125 male and 156 female white, upper middle-class, 8th-grade students (experimental group) with 37 male and 30 female students of similar backgrounds in a neighboring junior high school (control group), to determine the effect of an 8-wk sex education course. Measures included the Developmental Inventory of Feminine Values and the Developmental Inventory of Masculine Values, which place individuals on a family-oriented-self-oriented continuum. Pre-post *t* test comparisons of self-perception and ideal-self perception showed that (a) control Ss were significantly ( $p < .001$ ) more self-oriented than experimental Ss at pretest, although both groups were near midrange; (b) control Ss did not change over time; and (c) experimental males, but not experimental females, changed significantly ( $p < .001$ ) toward greater self-orientation. In light of other research showing that males experience more self-ideal discrepancies than females, the findings indicate promise in this area for even short-term school-based programs.—*C. A. Heikkinen*.

8218. Furniss, W. Todd. **Retrenchment, layoff, and termination.** *Educational Record*, 1974(Sum), Vol 55(3), 159-170.—Discusses the problems institutions face in re-assignment, nonpromotion, or dismissal. Although the courts have recognized that inflation, stable or decreasing enrollments, etc., might cause employee terminations, they have also recognized that institutions must not use "financial exigency" as an excuse for ridding themselves of "troublemakers." Supplementary procedures are suggested for objectively choosing the faculty an institution will retain in the event of abnormally high terminations.—*R. Gutzke*.

8219. Gitter, A. George & Fishman, Janet E. (Boston U, Communication Research Ctr) **Social indicators of educational opportunity: I.** *CRC Report*, 1973(Nov), No 68, 144 p.—Developed 2 types of factor analytical social indicators—factor scores and basic variables—which were shown to apply in aggregating multivariate education data. State indicators of educational input and educational output for 1960 were computed. They were used as dependent measures, with region, density,



urbanization, percent of whites, personal income, and nonwhite migration as independent variables, in analyses of variance and covariance. The relationships between social indicators of educational input and output were tested, both with and without controlling for environmental context of the relationships. Procedures for computing both state and national indicators for a base year, and any subsequent one, are described. (5½ p ref)  
—*Journal abstract.*

8220. Hiemstra, Roger. (U Nebraska) **Community adult education in lifelong learning.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 34-44. —Discusses how home, school, and community can be linked to facilitate lifelong learning. The concept of the educative community proposes that most people, organizations, and agencies be included as potential contributors to the educational process. The community education movement is described, together with several successful examples. Implications related to future educational needs and roles are outlined, with special attention to the changes required of teachers and administrators. (36 ref)—*E. S. Goodman.*

8221. Holt, John. **Not so golden rule days.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Proposes that compulsory school attendance laws should be changed or overturned in the courts, both in the interests of children and of the schools. It is suggested that a policy of resistance to these laws can achieve some results in the interim.

8222. Honig, Alice S. & Fears, Lois M. (Syracuse U, Coll for Human Development) **Practicum.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95. —Discusses the history, purposes, and major elements of practicum experiences in the field of education. Issues involved in the relationship of practicum objectives to practicum decisions, supervision and staff utilization, program settings, and assessment of the practicum experience are examined. (3 p ref)

8223. Kaplan, Louis. **Pupil personnel services guidelines for introducing and developing a program of accountability.** Princeton, NJ: National Assn of Pupil Personnel Administrators, Mono. No. 3, 1974. 16 p.

8224. Kirkland, John. (U Missouri, Columbia) **Divergent thinking and academic course orientation.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 518.—Undergraduates classified as having an arts or a science academic course orientation were given a test of divergent thinking. Art-oriented students evidenced significantly more unique responses to the test than did science-oriented students.

8225. Klinzing, Dene G. & Klinzing, Dennis R. (U Delaware) **An examination of the verbal behavior knowledge and attitudes of day care teachers.** *Education*, 1974(Fal), Vol 95(1), 65-71.—Examined the verbal behavior, knowledge, and attitudes of day-care teachers, and the interrelationships of these factors. Data were collected from 53 randomly selected teachers from 20 randomly selected day-care centers. Results of statistical analyses reveal that the day-care teachers were student-centered in their verbal behavior, were lacking in their

knowledge of child development principles and practices, and had positive attitudes about some day-care related concepts. A relationship was also found among the teachers' verbal behavior, knowledge, and attitudes.  
—*Journal abstract.*

8226. Knight, Tony. (La Trobe U, Ctr for Urban Education, Bundoora, Vic, Australia) **Powerlessness and the student role: Structural determinants of school status.** *Australian & New Zealand Journal of Sociology*, 1974(Jun), Vol 10(2), 112-117.—Argues for a strong structural interpretation of student behavior in the school, focusing on situational factors rather than on "person blame." It is suggested that schools could be institutions where individual change is encouraged; where teachers and students offer the sort of leadership that strengthens decision-making skills, promotes cultural initiative, and enhances political competence.  
—*Journal summary.*

8227. Knox, Alan B. (U Illinois) **Higher education and lifelong learning.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 13-23.—Illustrates ways in which universities can help school teachers and administrators continue their education by relating action problems to knowledge resources. Examples include an inservice peer review project for teachers, a process for increasing administrative competence, and defining components of the mentor role for planning and guiding adult learning. Attention is directed to methods for linking knowledge-producing systems with knowledge-using systems through the universities' role in sponsoring continuing education.—*E. S. Goodman.*

8228. Korim, Andrew S. (American Assn of Community & Junior Coll, Aging Project, Washington, DC) **Older Americans and community colleges: A guide for program implementation.** Washington, DC: American Assn of Community & Junior Colleges, 1974. 126 p.—Presents guidelines for establishing new relationships between community colleges and the elderly in terms of services, training, and other supportive programs. The status of training programs related to the field of aging, expanding and improving manpower programs, establishing centers for senior citizens, and obtaining community resources are examined.

8229. Kozol, Jonathan. **Chapter Two from Death at an early age.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Discusses incidents of whippings in the Boston, Massachusetts, schools, the attitudes behind them, and the implications of the associated behavior.

8230. Kuhn, David J. (U Wisconsin, Parkside) **Modern biology and society: A program for the inservice teacher.** *Journal of Instructional Psychology*, 1974(Spr), Vol 1(2), 27-34.—Describes an inservice program designed to aid biology teachers in involving secondary students in the study of ecology, genetics and behavior. Programs and curricula which emphasized the social implications of life science and relevant pedagogical techniques and media are discussed. (20 ref)

8231. Levitin, Teresa E. & Chananie, J. D. **Responses of female primary school teachers to sex-typed behaviors in male and female children.** In F. Reblsky & L. Dorman (Eds), *Child development and behavior*. (2nd

ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.  
—Studied the responses of 40 female primary school teachers to descriptions of aggressive or dependent behaviors attributed to hypothetical male or female students, using a  $2 \times 2$  factorial design. Teachers were randomly assigned to 1 of 4 sex and behavior pairings. Teachers showed a clear preference for dependent behavior regardless of the student's sex and for the dependent girl vs other sex/behavior pairings. Achievement behavior was the most approved, and achieving girls significantly more liked than achieving boys.

8232. Lotecka, Lynn. **A project advocating humanistic education: An evaluation of its effects on public school teachers.** *Journal of Drug Education*, 1974(Sum), Vol 4(2), 141-149.—An evaluation of a seminar on preventing drug abuse shows that participating classroom teachers gained significantly in drug knowledge. There were also significant changes in attitudes concerning drug abuse, child development, and pedagogy.

8233. Mandel, Richard L. (U Pennsylvania) **Judicial decisions and organizational change in public schools.** *School Review*, 1974(Feb), Vol 82(2), 327-346.—Examines the effectiveness of the law as an instrument for educational change. Existing research shows that judicial decisions are relatively ineffective in changing schools and the behavior of school administrators. Explanations are advanced for this ineffectiveness in terms of role conflict theory. It is concluded that school administrators require a new model of school governance which incorporates judicially prescribed norms. (32 ref)—C. K. Miller.

8234. Manley-Casimir, Michael E. (L. W. Downey Research Assoc, Edmonton, Alberta, Canada) **School governance as discretionary justice.** *School Review*, 1974(Feb), Vol 82(2), 347-362.—Develops a model of school governance in terms of discretionary justice. The model is presented as judicially compatible and responsive to judicial norms. School administrators who adopt this approach would find accommodation to judicial decision less difficult and the schools themselves would become more just. (31 ref)—C. K. Miller.

8235. Martin, Felix. (Gwinnett County Schools, Lawrenceville, GA) **The effect of grade level upon teacher reinforcement preferences.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 199-203.—Examined a total of 103 elementary, middle, and high school teachers to test the hypothesis that reinforcement preferences are dependent on both the nature of the judging Ss and the target group about whom these judges are making reinforcement preferences (i.e., elementary, middle, or high school students). Evidence indicates a relationship between age or grade level of pupils and the perceived potency of possible reinforcers by teachers. From a 14-category reinforcement schedule, the elementary, middle, and high school teachers differed in their preference of possible reinforcers on 5 categories: positive physical contact, accepts ideas, direct concrete reinforcement, token concrete reinforcement, and asks questions.—*Journal abstract.*

8236. Marvell, J. (St Osyth's Coll of Education, Clacton, England) **Religious beliefs and moral values: The influence of the school.** *Educational Research*,

1974(Feb), Vol 16(2), 94-99.—Studied influence of teachers on religious beliefs and moral values in 2 multiracial comprehensive schools. Of 102 teachers interviewed, most saw character development as their primary aim in teaching, but results indicated that teacher influence on pupils was not substantial. It is suggested that a more open approach is needed in this area of school life.

8237. Mason, W. Dean. **Aging and lifelong learning.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 68-76.—Discusses the developmental tasks and learning needs of older adults and how lifelong learning programs can contribute to continued well-being. Data is provided on the extent of educational services offered to older persons by community and junior colleges. (20 ref)

8238. Maxim, George W. (West Chester State Coll) **The role of research in competency-based teacher education.** *Education*, 1974(Fal), Vol 95(1), 94-96.—Contends that school teachers have neither the knowledge of nor the interest in empirical research applicable to teaching behavior and school programing decisions. It is suggested that this problem can be minimized if competency-based teacher education programs would include activities designed to develop skills for interpreting and applying research findings.

8239. Miller, P. J. (U Alberta, Edmonton, Canada) **Student and teacher attitudes towards education: An exploratory study.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 251-258.—Describes a 2-part investigation of student and teacher attitudes in which a conceptual model was developed to isolate significant attitudes and a questionnaire based on the model was constructed and administered to a total of 510 university students and practice teachers. An analysis of questionnaire data revealed significant attitudinal differences in students' and teachers' perceptions of education, with students indicating more child-centeredness in their responses.—*Journal abstract.*

8240. Nel, B. F. (U Pretoria, S Africa) **The phenomenological approach to pedagogy.** *Journal of Phenomenological Psychology*, 1973(Spr), Vol 3(2), 201-215.—Seeks to further the attempt of modern philosophical anthropology to treat pedagogy—the theory of the upbringing and education of the child—as a subject worthy of study independently of the practical considerations which these activities may involve. The phenomenological method is advanced as being most appropriate to a comprehension of the presential field of the child and of the interpersonal encounters through which he becomes humanized. Following M. J. Langeveld's theory (1944), 5 basic characteristics of the pedagogical situation are specified. This situation is considered to be one in which the child must receive the support of loving care to actualize his potentials and to be shaped morally through communicative relationships.—B. Lindsey.

8241. Nelson, Edward A. & Uhl, Norman P. (North Carolina Central U) **A factorial study of the attitude scales on the College Student Questionnaire with students at a predominantly black university.** *Multivariate Behavioral Research*, 1974(Oct), Vol 9(4), 395-405.—Examined the dimensionality of attitudes on the College Student Questionnaires (CSQ) administered to



772 black, entering freshmen. The correlation matrices for the 66 attitude items were analyzed using a principal axes factor analysis with an oblique rotation. Among the 11 factors, which accounted for 37% of the variance, the following were interpreted: Family Independence vs Cohesiveness, Autonomy vs Influenceability from Peers, Non-Affiliative vs Affiliative Peer Orientation, Concern for Social Problems, Aesthetic Interest, and Interest in Politics and World Affairs. These factors were compared with the original CSQ Attitude Scales, and a number of similarities and differences were noted. The items from the CSQ Liberalism Scale did not form any general interpretable factor, and the items from the CSQ Peer Independence Scale formed 2 distinct factors. Findings imply that special scales—corresponding with the factors found in the study—should be considered when studying attitudes of students attending predominantly black colleges and universities.—*Journal abstract.*

8242. Nicoletti, John A. & Patterson, Tom W. (Colorado State U) **Attitudes toward busing as a means of desegregation.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 371-376.—Attitudes toward enforced school busing were studied among 24 black, 167 white, and 34 Chicano adults in Denver, Colorado, in relation to 6 factors. Significant associations were found between type of attitude expressed and race, children enrolled in school, membership in the Parent-Teachers Association, expectation toward the quality of education to be obtained by busing, and home ownership. The number of contacts with the schools by the respondents was not related to attitudes toward busing. Supporters of busing emphasized the provision of equal educational opportunities for all children and improved communication among ethnic groups, while those opposed to busing emphasized the disruption of the neighborhood school concept as the bases for their attitudes. Issues related to the implementation of the plan are considered.—*Journal abstract.*

8243. Ogilvie, E. **Creativity and curriculum structure.** *Educational Research*, 1974(Feb), Vol 16(2), 126-132.—10- and 11-yr-old children in 5 schools with environments varying greatly in structured formality were tested for their ability to handle complexity, associative fluency, and originality in game-like situations free from time and examination stresses. Results show a curvilinear relationship between creativity of students and informality level of the classroom, suggesting that school environments influence creativity, but the assumption that progressive environments are more favorable must be qualified. Curriculum structure does not affect creativity-intelligence relations; the major influences appear to be average intelligence of the groups and extent to which creativity tasks require school learning, especially verbal skills. Results support the threshold theory of the interrelationship between intelligence and creativity. (29 ref)—J. B. Francis.

8244. Peters, Donald L. & Dorman, Lynn. (Pennsylvania State U, Coll of Human Development) **Program planning and program goals.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Discusses previous studies and theories which may be useful for making

administrative decisions about curricula and goals and objectives in planning educational training programs. The specification of the program's theoretical orientation, the assessment of trainee entry behavior and aspirations, and the program staff's experience are among the sources suggested for decision making. (2 p ref)

8245. Peters, Donald L. & Fears, Lois M. (Pennsylvania State U, Coll of Human Development) **Program personnel.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Presents suggestions for acquiring adequate early education program personnel, including adjunct and consulting relationships, the development of consortiums, differentiated staffing, and generally flexible treatments of staff qualifications. Student selection and services are major issues which determine the "personality" of a program and which are a means of insuring program success.

8246. Peters, Donald L. & Honig, Alice S. (Pennsylvania State U, Coll of Human Development) **Program design and implementation.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Presents suggestions for program requirements, behavioral objectives, and curriculum components for early childhood education personnel training programs. Methods of matching decision outcomes to program goals, tracking sequences of decisions to insure their goal orientation, and designing alternative approaches based on environmental and personnel characteristics are discussed. (17 ref)

8247. Peters, Donald L. (Pennsylvania State U, Coll of Human Development) **Dissemination.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Discusses ethical considerations in the evaluation and dissemination of early childhood education program information, including professional standards and the credibility of evaluative research. Responsibilities of program administrators in disseminating information are briefly considered.

8248. Rubovits, Pamela C. & Maehr, Martin L. **Pygmalion black and white.** In F. Reber & L. Dornon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Observed the behavior of 66 teachers following manipulation of an expectancy regarding potential in 264 7th and 8th grade students. Teachers gave preferential treatment to "gifted" students; this pattern depended to some extent on race of the student. In general, black students were treated less positively than whites, and blacks labeled "gifted" were subjected to more discrimination than those labeled "nongifted." High-dogmatic teachers, while encouraging whites, tended to ignore blacks. (21 ref)

8249. Ryan, William P. (Molloy Coll) **Workshops about the physical structure of the classroom: An interesting way to work with teachers.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 242-246.—Presents a method for school psychologists to work with teachers in

an innovative way. A review of the literature suggests that the physical structure of the classroom affects the learning process. Educators generally seem unaware of the impact of these factors upon the learning process. A workshop approach, which encompassed a theoretical frame of reference, experience with a classroom model, and concrete suggestions about classroom changes was utilized.—*Journal abstract*.

8250. Sanjuan Najera, Manuel; Fernandez Uria, Elias & Marteles Lopez, Pascual. (U Zaragoza, Inst de Ciencias de la Educacion, Spain) [Analysis of professor-student verbal interaction.] (Span) *Revista de Psicologia General y Aplicada*, 1974(May-Jun), Vol 29(128), 555-561.—Presents a method of classifying classroom interaction using 16 categories. 2 examples are given of data showing percentages for each category based on classroom observations.

8251. Scheller, Reinhold. (U Trier-Kaiserslautern, W Germany) [Self-assessment and ideal image assessment of prospective elementary-school teachers.] (Germ) *Psychologische Beiträge*, 1973, Vol 15(3), 419-433.—Investigated self-concept and ideal self-concept of teacher candidates in sociometric tests with 179 college freshmen: 62 from schools of education, 61 from schools of technical science, and 56 from schools of economic sciences. Ss were asked to rate themselves on a 15-item, 7-step polarity scale based on E. Roth and R. Cattell. In a 2nd test, they were asked to imagine and describe an ideal person they would like to emulate. The obtained answers show that the group of education students were characterized by a greater difference between self-concept and ideal self-concept and by a lesser degree of self-confidence than the 2 other groups. After a detailed analysis and correlation of the data, it is concluded that the lack of self-confidence of teachers can be detected at the beginning of their studies and that it is not a product of their special education and training. (2 p ref) (English & French summaries)—*T. Fisher*.

8252. Seaton, Hal W.; Lasky, Elaine Z. & Seaton, Jane B. (U Akron) **Teacher and specialist: A communication gap?** *Education*, 1974(Fal), Vol 95(1), 90-91.—Attempts to identify problems which arise from lack of communication between teacher and specialists providing services to the exceptional child. Guidelines are given for implementing a more efficient system for communicating information to the classroom teacher.

8253. Sedlacek, William E. & Brooks, Glenwood C. (U Maryland, Counseling Ctr) **Racism in the public schools: A model for change.** *Journal of Non-White Concerns in Personnel & Guidance*, 1973(Apr), Vol 1(3), 133-143.—Used a model designed to combat racism in white or white-oriented schools in 2 suburban school systems that had experienced racial problems. Conferences, which consisted of small-group and general sessions, were divided into 6 stages which explored cultural and racial differences, racism and how it works, racial attitudes, sources of racial attitudes, what could be done about behavior, and methods of implementing ideas developed in the latter stage. Results of a questionnaire mailed to participants following the conferences indicate that some participants were eager to learn and change while others were uninterested, and were uninvolved in and unwilling to change. It is

suggested that additional steps must be taken by individual school systems to implement programs that will have long-range effects.—*M. E. Pounsel*.

8254. Swift, David W. (U Hawaii) **Situations and stereotypes: Variations in the school administrator's role.** *Elementary School Journal*, 1974(Nov), Vol 75(2), 69-78.—The roles of a school principal include administrator, who may be overloaded with the details of his position; public relations man, who emphasizes the school's public image; disciplinarian/entertainer, who may use aversive or supporting reinforcements to "keep order"; and educator, concerned with the effectiveness of teaching methods.

8255. Tan-Willman, Conchita. (U Toronto, Ontario, Canada) **Assessment and prediction of creativity in teaching.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 393-394.—A high-creative and a low-creative group of student teachers ( $n = 40$ ) were established on the basis of averaged ranks on a verbal and a nonverbal test of creative thinking. 2 series of classroom observations showed that the high-creative group gave more original but not more fluent nor flexible teaching performance. A teacher-creativity index correlated significantly with more subtests of the verbal test than of the nonverbal test of creative thinking.—*Journal abstract*.

8256. Trachtman, Gilbert M. (New York U, School of Education) **T.O.D.D.: An innovative approach to innovation in the elementary school.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 233-241.—Presents a case study of a successful school consultation in which it was proposed to a board of education members that the initiative for change be handed back to the faculty. Focus was placed on the initiation of certain processes, with product being a secondary consideration.

8257. Trujillo, Rupert. (U New Mexico, Coll of Education) **The program and community participation.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.—Discusses the rationale for community participation in childhood education programs, factors that can facilitate or impede community participation, and procedures for gaining community understanding and orienting both staff and community members to the goals of the program. Examples of programs based on community support (e.g., story reading and day care) are presented. (38 ref)

8258. Valind, Brigitte & Petterson, Inga-Lill. [Studying without teachers: Questionnaire data from upper secondary school students during a teachers' labour conflict.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Apr), No 233, 59 p.—During a Swedish school conflict, when many teachers were not present in the schools, student data were collected by means of postal questionnaires from 2 groups: (a) a random sample from the first and last grades of all the upper secondary schools in Malmö and (b) a special group of 5 complete classes who had 2 yrs earlier taken part in a study on student democracy. Questionnaire data concerned both the work situation during the conflict and student influence in the schools. Results show that there was considerable motivation to organize studies, although there were indications that the students were too little



trained in co-planning and independent planning.  
—English abstract.

8259. Walker, Richard N. **Body build and behavior in young children: I. Body build and nursery school teachers' ratings.** In F. Reblsky & L. Dormon (Eds), *Child development and behavior*. (2nd ed). New York, NY: Alfred A. Knopf, 1973. xxiii, 470 p.—Photographs of 73 male and 52 female nude nursery school students were rated for type of physique. Physique ratings were compared to behavioral data obtained from 63 rating scales. Predictions of physique-behavior correlations were tested. Results indicate that important associations did exist and that these were similar to associations found in a prior study of college-age men.

8260. Webster, William J. & Mendro, Robert L. (Dallas Independent School District, TX) **The effects of a videotape feedback system on classroom teacher behavior.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 189-198.—Videotaped 159 teachers in 8 matched schools to examine the effects of a staff development program utilizing knowledge of objectives and immediate videotape feedback to modify the behavior of classroom teachers; concomitants of teacher success in the program were also investigated. Experimental Ss improved cognitive behaviors but not affective behaviors more than controls. Characteristics contributing to positive behavioral changes were dissatisfaction with perceived effectiveness, teaching experience, recency of latest degree, teacher attitude toward students, and student achievement. (17 ref)—*Journal abstract*.

8261. Williamson, Janet A. (Pennsylvania State U) **Survey of attitudes of directors of campus health centers toward potential college nurse practitioners.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 197-199.—Surveyed health center directors in 39 2-yr colleges and 358 baccalaureate and/or graduate student institutions regarding attitudes toward an expanded role for the college nurse. This would include duties ranging in complexity from developing and evaluating health education programs and performing complete physical examinations, to ordering, interpreting, and assessing results of laboratory and X-ray tests. 81% of directors of 4-or-more-year institutions (74% were physicians) responded favorably; 60% of directors of 2-year institutions (86% were nurses) supported the concept. It is believed that the greater physician support lay in the conviction that the program would alleviate doctor shortages in college health centers, and at less cost.—*A. de la Haba*.

8262. Winchel, Ronald; Fenner, Diane & Shaver, Phillip. (Columbia U) **Impact of coeducation on "fear of success" imagery expressed by male and female high school students.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 726-730.—Tested 240 male and female high school seniors for fear of success, some while attending coed and some while attending noncoed high schools. The kind of elementary school the Ss had attended, coed or noncoed, was also recorded. Results indicate that (a) both male and female Ss expressed more negative themes when writing stories about a successful female than when writing about a similarly successful male; (b) the coed vs noncoed distinction was a potent predictor of fear of success response in female Ss,

especially at the elementary school level; and (c) when negative consequences of success were mentioned, they were usually social or affiliative if the successful figure in the story was female and nonaffiliative if the figure was male. (11 ref)—*Journal abstract*.

8263. Wolfe, Joan M. (Maryland State Dept of Health & Mental Hygiene, Baltimore) **Patient education.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 231-233.—Describes patient education in a comprehensive college health program including the consideration of the student's need and motivations and the necessity of a constructive, enthusiastic attitude on the part of the college nurse.

8264. Yee, Albert H. (U Wisconsin, Madison) **Schools and progress in the People's Republic of China.** *Educational Researcher*, 1973(Jul), Vol 2(7), 5-15.—Presents descriptions of the methods, types of schools, rationale, facilities, and programs in the educational system of the People's Republic of China, based on the author's 1972 visit. Comparisons between the author's experience in 1947-1948, the present cultural and political contexts of education, and the influence of the collective spirit on education are discussed.

#### Curriculum Development & Teaching Methods

8265. Abelson, Willa D.; Zigler, Edward & DeBlasi, Cheryl L. (Yale U) **Effects of a four-year Follow Through program on economically disadvantaged children.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 756-771.—Longitudinal and cross-sectional comparisons were made of 109 economically disadvantaged children in 1 Follow-Through and several non-Follow-Through primary school programs. A longitudinal comparison was also made of the economically disadvantaged and nondisadvantaged children in the Follow-Through program. Clear-cut program effects were found in the 4th yr (grade 3) when Follow-Through children were superior to non-Follow-Through children on IQ, achievement, and social-motivational measures. The Follow-Through program did not result in the economically disadvantaged children attaining the level of intellectual achievement displayed by the nondisadvantaged children. (30 ref)—*Journal abstract*.

8266. Adams, Eva W. & Allen, LeRoy B. (U Delaware) **Pilot project to develop a home economics curriculum for the middle school.** *Journal of Instructional Psychology*, 1974(Spring), Vol 1(2), 52-56.—Describes a program which was designed to assist adolescents' intellectual, physical, social, and emotional growth. Included are selected illustrations of materials that were developed in the pilot project. (17 ref)

8267. Amdur, Millard J.; Nichols, Margaret; Boroto, Daniel R. & Shay, Barbara L. (U Connecticut) **Issues in developing a multidisciplinary sex education program in a public university.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 364-369.—Presents a critical evaluation of a multidisciplinary sex education program, emphasizing unsuccessful aspects in order to help other institutions avoid these pitfalls. The danger exists that a program in a public university might, in the interests of pleasing administration and legislature, become so diffused and watered-down as to be of little use to the students seeking information. Inadequate

teacher training also can result in a poor program. Hidden agendas may occur with 1 discipline attempting to prove itself superior to or more relevant than the others. Alternatives to the traditional professionally sponsored sex education programs include student-run programs backed up by guest lecturers and consultants, and the assembling of a sex information library. A bibliography for such a library is appended.—*A. de la Haba.*

8268. Baldwin, Bruce A. & Wilson, Robert R. (U North Carolina, Human Sexuality Information & Counseling Service) **A campus peer counseling program in human sexuality.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 399-404.—Discusses a peer-operated human sexuality counseling program on a state university campus, beginning with the organization, growth, and rapid acceptance by the students. 3 basic services are provided: (a) information-education, (b) crisis intervention-counseling, and (c) intermediary referral. Innovative directions taken by the service include the formation of a human sexuality library, small group discussions, and question-answer periods, which have resulted in the formation of a speaker's bureau within the service, a workshop on problem pregnancy counseling, the writing of educational materials. Student staff volunteers find the experience rewarding and sometimes, as a result, enter careers in the health professions.—*A. de la Haba.*

8269. Barber, Lucie W. (Union Coll, Character Research Project) **The counselor as general contractor: Implications for curriculum.** *Character Potential*, 1974(Oct), Vol 7(1), 22-27.—Outlines a developmental curriculum based on the model of personality developed by J. H. Peatling and A. L. Miller-Tiedeman (see PA, Vol 53:Issue 3), but written nontheoretically. The educational goals for 4 general levels of development are specified from the model. Existing and planned curricular materials are indicated. The ultimate goal is the integrated decision-maker who centers self in decision-making. This is the third of 4 papers in a symposium on career, choice, and the self (see PA, Vol 53:Issue 3).—*L. W. Barber.*

8270. Carter, Thomas P. (Dalhousie U, Halifax, Nova Scotia, Canada) **Crossword puzzles in the foreign language classroom.** *Modern Language Journal*, 1974(Mar), Vol 58(3), 112-115.—Presents a crossword puzzle variant for classroom foreign language instruction. Only the diagram is presented; students solicit clues orally in the foreign language. Alternatively, students construct clues for known answers. Listening comprehension and speech are thus substituted for the more restricted processes of reading and single-word encoding in the conventional crossword puzzle.—*C. A. Sherrard.*

8271. DeCecco, John P. & Richards, Arlene K. (San Francisco State U) **Growing pains: Uses of school conflict.** New York, NY: Aberdeen Press, 1974. 269 p. \$8.95.—Presents an analysis of the uses and misuses of the survival vs punishment techniques of experimental psychologists in contemporary educational systems. The currently used "survival teaching" methods which increase the frustration and self-destructive behavior of students are compared with the creative uses of educational "conflict" that emphasize the student's need to

think creatively and develop his own individual skills. Data from surveys of over 8,500 students, parents, and teachers are presented to demonstrate the breakdown of communication in schools today.

8272. DeVries, David L. & Edwards, Keith J. (Johns Hopkins U, Ctr for Social Organization of Schools) **Student teams and learning games: Their effects on cross-race and cross-sex interaction.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 741-749.—Evaluated the effects of 2 teaching techniques—student teams and instructional games—on the level of cross-race and cross-sex interaction in the classroom. Placing 110 7th graders on heterogeneous 4-member student teams created significantly greater cross-race and cross-sex helping and friendship. Team success did not have the predicted positive effect on cross-race and cross-sex interaction. Playing the instructional game had a marginal effect on cross-race helping only; however, the game-team combination considerably increased the incidence of cross-race and cross-sex interaction over that of games alone. (29 ref)—*Journal abstract.*

8273. DeVries, Rheta. (U Illinois, Chicago Circle) **Theory in educational practice.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators.* New York, NY: Springer, 1974. xviii, 362 p. \$13.95.

8274. Diaz-Guerrero, Rogelio & Holtzman, Wayne H. (Ctr de Investigaciones Psicopedagogicas, Mexico City, Mexico) **Learning by televised "Plaza Sesamo" in Mexico.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 632-643.—Studied the effects of "Plaza Sesamo," a Spanish version of "Sesame Street," during its 1st telecast season in Mexico City. 173 children from 3 different lowest-class day-care centers, equally divided by ages 3, 4, and 5, and by sex, were randomly assigned to experimental and control groups. A battery of 9 tests was individually administered pre-, during, and posttelecast. Measures of attention to the program and of attendance were also taken. Highly significant differences were found for specific achievement tests dealing with general knowledge, numbers, letters, and words as taught by "Plaza Sesamo," and for 5 cognitive tests only indirectly related to "Plaza Sesamo," as well as for oral comprehension, a test completely independent of the program content. The largest differences occurred in 4 yr olds; the smallest in 3 yr olds.—*Journal abstract.*

8275. DiNubile, Linda & Wessler, Richard. (Living School, New York, NY) **Lessons from the Living School.** *Rational Living*, 1974(Spr), Vol 9(1), 29-32.—Describes an example of a lesson plan used at the Living School, which is operated by the Institute for Rational Living. The school's educational model is open, stressing acquisition of skills and emphasizing affective education. During a period called "Thoughts and Feelings," lessons deal with experiences shared by the pupils. Pivotal discussion questions help focus the students' attention on principles of rational living.

8276. Drabman, Ronald S. & Tucker, Richard D. (Florida Technological U) **Why classroom token economies fail.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 178-188.—Divides the reasons for clinical failures of classroom token economies into 3 groups: (a) problems associated with the token program itself, (b)



problems associated with the teacher, and (c) problems associated with the specific population on which the classroom economy is used. Methods of anticipating problems before they occur and ways of solving them should they occur are discussed. (20 ref)—*Journal abstract*.

8277. **Dubnoff, Belle.** *The impact of emotions on learning.* In B. C. Ring & D. R. Schrader (Eds), *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.

8278. **Fägerline, Ingemar.** (U Stockholm, Inst for the Study of International Problems in Education, Sweden) *Research on religious education in the Swedish school system. Character Potential*, 1974(Oct), Vol 7(1), 38-47. —Reports on 26 government-sponsored research studies which focus on analysis, development of methods, and educational evaluation. 3 results so far are of particular interest. (a) There was a low level of student interest in the instruction they had been receiving. (b) However, of 337 students 10-12 yrs old, who wrote story endings to stimulus pictures, about 1/2 identified loneliness as their concern, about 1/2 identified violence and suffering in the world as their concern, and several other themes indicate that questions of ethics and existence were of interest. (c) While 10-12 yr olds cannot deal with parables in an abstract sense, they can understand and even generalize parables which are adapted to concrete situations from their own life experiences.—*L. W. Barber*.

8279. **Felton, Gary S.** (Los Angeles City Coll) *Accountability in teaching.* *Education*, 1974(Fal), Vol 95(1), 25-31.—Describes an immensely successful responsibility-generating teaching format implemented in an undergraduate psychology curriculum. The format encourages and enables students to take full responsibility for their own learning experiences, to determine their own course content and process, and to be aware of and continually evaluate the process. Feedback from students was almost unanimously positive, learning was measurably maximized and internalized rather than memorized, class absenteeism was practically eliminated, and excitement about education was greatly enhanced. All of these outcomes reflect a meaningful experiential alternative to more conventional notions of role distinctions between the "expert" teacher and the "uninformed" student and possessiveness in the classroom (e.g., "my students," and "my teacher"). Stimulus is offered for extending this format to many disciplines at all levels of public education.—*Journal abstract*.

8280. **Gardner, R. C. et al.** (U Western Ontario, London, Canada) *Bicultural excursion programs: Their effects on students' stereotypes, attitudes and motivation.* *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 270-277.—Describes a bicultural excursion program designed to determine the extent to which students' (N = 434) stereotypes and attitudes were influenced by a brief 4-day excursion to another linguistic, cultural community. Results indicate that the students benefited by a greater appreciation of the other community, more favorable attitudes towards that group, and an increased interest in learning the language for integrative reasons.—*Journal abstract*.

8281. **Garzone, Tullio.** (State University Coll New York, Oswego) *Is reading for meaning a teachable skill for the beginning reader?* *Reading World*, 1974(Oct), Vol 14(1), 25-36.—Deals with the continuing debate: should beginning readers be taught only decoding skills, or should meaning be emphasized? Various levels of meaning are discussed and their place in beginning reading instruction is detailed.

8282. **Gendel, Evalyn S.** (Kansas State Dept of Health, Div of Maternal & Child Health, Topeka) *Introductory statement: Perspectives on human sexuality.* *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 356-360.—Examines current approaches to the subject of human sexuality and presents long- and short-range goals for sexuality education and counseling programs. An optimal program is described.

8283. **Golde, Roger A.** *Translation and teaching.* *Teachers College Record, Columbia U*, 1974(Sep), Vol 76(1), 101-117.—Examines that teaching method which involves active translation by the teacher of the lesson material from the teacher's personal language to that of the students. If the new facts or ways of thinking are not translated, they are less likely to get "connected up" with the rest of the learner's personal knowledge; the new material remains unavailable to the student and is forgotten. Teachers have shirked their duty to translate, traditionally leaving that to the student. Research directions are suggested for ascertaining the most appropriate (methodologically and ethically) means of translating so that this can become an active part of teaching.—*L. L. Green*.

8284. **Johns, Jerry L.** (Northern Illinois U, Reading Clinic) *Reading preferences of intermediate-grade students in urban settings.* *Reading World*, 1974(Oct), Vol 14(1), 51-63.—Explored whether or not inner-city children in the intermediate grades would prefer to read books depicting inner-city scenes rather than middle-class scenes. Ss were 597 4th, 5th, and 6th graders (199 in each grade) in 4 large midwestern cities. Ss preferred the middle-class settings. They also preferred to read stories which depicted characters with positive self-concepts and group interactions. (29 ref)—*C. K. Miller*.

8285. **Kaplan, Robert.** (Bell Lab, New Brunswick, NJ) *Effects of learning prose with parts versus whole presentations of instructional objectives.* *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 787-792.—Studied the effects of part vs whole presentations of objectives and text upon intentional and incidental prose learning. These effects were examined for 3 passage lengths with specific or general objectives and with 2 densities of objectives. Ss were 540 15-18 yr olds. Results show that presentation of objectives generally facilitated intentional learning with either increases or no reduction in incidental learning. The part presentation resulted in greater likelihood of learning intentional items than the whole presentation with no significant loss of incidental learning. Neither specificity nor density of objectives influenced performance. More inspection time was used for part presentations, longer passages, specific objectives, and larger densities.—*Journal abstract*.

8286. **Knobel, Mauricio.** (u Buenos Aires, Medical School, Argentina) *[Sexuality and sexual education in adolescence.]* (Span) *Revista de Psiquiatria y Psicología*

*Médica*, 1974(Jan-Mar), Vol 11(5), 287-293.—Adolescent sexuality often presents many conflicts for the individual and is frequently misunderstood by the educator. Sex education programs must consider their aims, methods, content, and potential pupils in relation to the process of sexual development during adolescence. (English summary)

8287. Knowles, Lyle & Timko, John. (Pepperdine U) **Evaluating educational programs in criminal justice: A technique for obtaining responses from participants.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 107-114.—Describes a participant evaluation scheme for college-level courses. Results of using the scheme for various courses, instructors, and participants are presented.

8288. Kurzman, Marc G. (U Minnesota, Drug Information & Education Program) **Drug education: Boom or bust?** *Contemporary Drug Problems*, 1974(Spring), Vol 3(1), 61-69.—Discusses the goals and methodologies of drug education programs. Successful drug education efforts must take into account the nature of the specific target populations to which they are directed. Drug education is particularly needed by individuals in 3 categories—users and potential users, interveners, and drug decision makers. It is suggested that complete prevention of drug use is an unrealistic goal for drug education programs, which should aim instead at providing factual information on which rational drug-taking decisions could be based.—J. Kelly.

8289. Lane, David A. (Starcross School, London, England) **Drugs education: Questions and answers.** *Educational Research*, 1974(Feb), Vol 16(2), 107-111.—Reviews drug education studies and programs in England and concludes that current programs confirm existing prejudices and do not prepare individuals to cope with stress. Drug education based on facts and reason is advocated as part of the overall educational policy. (28 ref)

8290. Larson, Charles C. **Effects of self-reinforcement on paranoid behaviors: A case report.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 13-21.—Describes the use of self-management techniques to eliminate the disruptive classroom behaviors of a 9-yr-old boy. 3 separate treatment phases are discussed—reducing maladaptive verbal behaviors, providing consistent self-reinforcement methods, and maintaining the effects of the self-reinforcement program.

8291. LeBow, Michael D. (Dartmouth Coll, Medical School) **Scheduling: An approach for students with difficulties in studying.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 242-247.—Discusses a behavioral modification program designed to help students whose academic workloads and lack of organized study habits result in crisis situations, sometimes leading to depression, anxiety, or apathy. Students are shown how to construct a schedule containing designated blocks of study time, usually 3-hr periods, and how to find a suitable study place, how to eliminate behavior that is incompatible with studying (daydreaming, etc). A specially tailored series of daily, weekly, and terminal goals are established with gradually increased progress. As the student completes the scheduled study

hours, he may reward himself with a favored activity. Other rewards of this program are the expectation of better grades, praise from the therapist who helped with the schedule, and — by means of careful record-keeping—actual visible signs of progress.—A. de la Haba.

8292. Lee, Patrick C. & Gropper, Nancy B. (Teachers Coll, Columbia U) **Sex-role culture and educational practice.** *Harvard Educational Review*, 1974(Aug), Vol 44(3), 369-410.—Proposes that for schools to serve the needs of both sexes during an era of changing sex-role attitudes, the construct of sex role is better conceptualized in cultural than in psychosocial terms. This allows for a more coherent analysis of the interactions of 3 cultural phenomena: formal schooling, femininity, and masculinity. Genetic differences, cultural differences and biculturalism are 3 models of cultural interaction which contribute to understanding the systematic relationship between sex-role culture and educational practice. From an educational perspective, sex-linked genetic differences are real but unstable and situational. By contrast, bicultural blendings are beneficial and increasingly prevalent. The task of the school is to provide equal access to traditionally sex-typed educational and cultural resources. Biculturalism occurs through the "hidden curriculum" of teacher-pupil role expectations, teacher modeling, and the distribution of classroom space and materials. (101 ref)—C. M. Franks.

8293. Londoner, Carroll A. (Virginia Commonwealth U) **Sources of educational funds as motivators for participating in adult secondary education.** *Adult Education*, 1974(Fal), Vol 25(1), 47-63.—Investigated (a) which, if any, attribute variables differentiated significantly between adult students who paid their own educational expenses and those whose expenses were paid by a public agency; and (b) which educational goals, when controlled by significant test variables, differentiated between the 2 groups. A questionnaire was administered to 134 urban adult students, 14% of whom had had all of their expenses paid. Analysis found that agency-paid Ss were more likely to rate the educational goals higher in importance than self-paid students. It is concluded that the Needs-Social System-Satisfaction model of adult participation may be inappropriate for explaining the high rating responses of agency-paid students compared to the expressed belief of public school administrators that these students are unmotivated to study and learn.—Journal abstract.

8294. Matheny, Kenneth B. & Edwards, C. Randall. (Georgia State U, School of Education) **Academic improvement through an experimental classroom management system.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 222-232.—Employed an experimental classroom management system involving contingency management, individualized instruction, peer assistance, and teacher adoption of the role of a manager of learning activities in 25 Appalachian classrooms. The system appeared to be responsible for raising the number of students who made 1 month's achievement in reading for 1 mo in the classroom from 27.5% to 57% over a 7-month periods. Student success was related to the degree to which teachers implemented the various aspects of the management system. The system was ineffective in influencing student attendance. Students profiting most



from the system tended to increase their sense of control over events happening to them. The study suggests that improvements in instruction may be accompanied by improvements in the academic achievement of students.—*Journal abstract.*

8295. Mayer, Richard E. (Indiana U) **Acquisition processes and resilience under varying testing conditions for structurally different problem-solving procedures.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 644-656.—Taught binomial probability problems to a total of 225 undergraduates in 2 experiments by emphasizing either calculating with a formula (Sequence F) or meanings of the variables in the formula (Sequence G). Experiments involved a multileveled transfer posttest administered after S read some of the instructional booklet and variational testing conditions (e.g., open vs closed book or speed vs power). A Treatment  $\times$  Post-test interaction (TPI) resulted in which Sequence G Ss excelled on interpretive items while Sequence F Ss excelled on near-transfer items. The TPI did not differ reliably among different points in learning or under different testing conditions. Results indicate the importance of S's initial assimilative set in acquiring new knowledge and the apparent resilience of the acquired structure.—*Journal abstract.*

8296. McClusky, Howard Y. (U Michigan) **The coming of age of lifelong learning.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 97-107.—Contends that although the practice of adult education is marginal at present, its function is becoming central due to increasing nonwork time, rising levels of formal education, the effect of rapid and pervasive change, and growing confidence that individuals can learn at all ages. This situation has important implications for the education of children and youth as well as for adult programs. It is argued that a comprehensive systems approach involving all related agencies is necessary in order to meet the demands of lifelong learning.—E. S. Goodman.

8297. Mcidinger, Thomas. **A communication model for handling classroom problems.** *School Psychologist*, 1974(Apr), Vol 28(4), 13-15.—Discusses an alternative to the medical and behavior modification models of classroom intervention. The communication model assumes that there is a problem in the relationship between the student and the teacher, usually in terms of conflicting needs. Steps in applying the model are described.

8298. Meyers, Edward M. & Fink, Ira S. **Universities and communities: Planning together for a change.** *Educational Record*, 1974(Sum), Vol 55(3), 193-199.—Analyzes 5 examples of universities seeking community cooperation in planning their future actions. The circumstances under which a community-university organization should be formed and the guidelines for this formation are presented.

8299. Miller-Tiedeman, Anna L. (DeKalb High School, IL) **Deliberate decision-making education: A self-centering approach.** *Character Potential*, 1974(Oct), Vol 7(1), 12-21.—Describes a comprehensive 9-wk program of education in decision making, known as a Sense of Future career class, for high school students. The program is based on the Miller-Tiedeman Pyramid of Decision-Making. The assumptions, goals, tools, and

procedures of the program are described. This is the second of 4 papers in a symposium on career, choice, and the self (see PA, Vol 53:Issue 3). (18 ref)—L. W. Barber.

8300. Miller, D. Merrily; Dorow, Laura & Greer, R. Douglas. (Ctr for Human Development, New York, NY) **The contingent use of music and art for improving arithmetic scores.** *Journal of Music Therapy*, 1974(Sum), Vol 11(2), 57-64.—Examined the effect of pairing a nonpreferred activity with a preferred activity as a reinforcer for improving arithmetic scores, and also examined the effect of pairing activities on activity preference. The maintained level of arithmetic achievement during the postcheck suggests that preference for mathematical activities increased as a result of treatment. The contingent procedures may have caused arithmetic itself to become reinforcing. Results do not establish whether the pairing of a preferred with a less preferred activity modified the reinforcing effect of the less preferred activity. It can only be stated that the less preferred activity was effective as a reinforcer for arithmetic achievement, as were the combined activities. The successful use of a nonpreferred activity to reinforce an academic behavior suggests many possibilities for the classroom teacher. It can be inferred that an activity could be paired with an already reinforcing activity and over a period of time become reinforcing. Thus, new secondary reinforcers might be conditioned through the systematic pairing of activities.—F. O. Triggs.

8301. Miller, Jerry W. **Credit for nontraditional education: A conceptual framework for recognition.** *Educational Record*, 1974(Sum), Vol 55(3), 188-192.—Explores current developments in formal recognition of nontraditional study. To avoid quackery and worthless credentials, existing accrediting agencies should assess such study. At present, accrediting seems to be based on several assumptions: (a) Standard educational philosophy and practice should be the touchstone for nontraditional. (b) Traditional and nontraditional education must interact with one another. (c) Credit hours will be the usual form of educational unit. (d) Most degrees will result from traditional education. (e) Higher standards should not be required for nontraditional than for traditional education. 2 developments are necessary for appropriate assessment of nontraditional education: improved procedures for assessing experiential learning, and recommendations for awarding credit for informal learning. These developments are occurring via the activities of the Educational Testing Service and the American Council on Education.—R. Gutzke.

8302. Monahan, John. (U California, Irvine) **Toward undergraduate education in the interface of mental health and criminal justice.** *Journal of Criminal Justice*, 1974(Spr), Vol 2(1), 61-65.—Describes an undergraduate course on the interface of mental health and criminal justice, and analyzes the course's contribution to the field in terms of preparing future graduate and law students for specializing in this area. (16 ref)

8303. Nias, J. (U Liverpool, England) **Less fuzziness on openness?** *Elementary School Journal*, 1974(Nov), Vol 75(2), 79-86.—Discusses the "open education" of English schools. Topics include openness in the architecture of the school buildings, the "related to life" curricula.

community involvement in the construction of an integrated curriculum, and the fact that responsibility for education rests increasingly on the learners rather than on the teachers.

8304. O'Donnell, Dennis H. (Queen Elizabeth School, Bromyard, England) **Linked courses in Herefordshire.** *Educational Research*, 1974(Feb), Vol 16(2), 133-138. —Surveyed 273 past and present pupils of a mixed 4-form entry rural comprehensive school, using an attitude scale constructed from comments by 70 teachers and other educators and from material in the literature, to determine the relative success of the school-college linked course as part of the secondary curriculum. Responses were received from 80% of those questioned, and indicate highly favorable reaction by students to the course. It is concluded that such courses can be highly effective in introducing students to vocational work during their last few years of schooling.—J. B. Francis.

8305. Parker, Ronald K. (City U New York, Cognitive Development Project) **Theory in early education curricula.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.

8306. Pine, Gerald J. (U New Hampshire) **Existential teaching and learning.** *Education*, 1974(Fal), Vol 95(1), 18-24.—Notes that existentialism has become for many people an attractive and dynamic force in education. Despite the diversity which may be found among existential writers, common existential principles can be identified which have special relevance for those who hope to arrive at a more effective teaching approach through the medium of existentialism. From these existential principles one can derive teaching and learning principles, and conditions which facilitate freedom and responsibility among teachers and students.—*Journal abstract*.

8307. Pitkanen, Lea. (U Jyväskylä, Finland) **The effect of simulation exercises on the control of aggressive behaviour in children.** *Scandinavian Journal of Psychology*, 1974, Vol 15(3), 169-177.—Conducted an experiment with 2 matched, extremely aggressive groups (experimental, EG, and control, CoG) of 12 8-yr-old males each and with 1 criterion group (CrG) of 12 extroverted, well-controlled Ss. Between pretest (T<sub>1</sub>) and posttest (T<sub>2</sub>) videotape recording of behavior, the ExG was trained in social problem solutions on the purely cognitive level and in role-playing. It was hypothesized that the combination of cognitive training and observational learning with the aim of making children realize alternatives to aggression in coping with thwarting situations and their aftereffects would influence individuals with strong aggressive habits to abandon their aggressive reactions in favor of more constructive behavior. Results support the hypothesis with respect to aggression. For constructive behavior, the ExG maintained the same level of control of social behavior in T<sub>1</sub> and T<sub>2</sub>, while a significant drop occurred in the CoG, and the strategies of problem solution improved significantly in the ExG. In T<sub>2</sub>, the behavior of the ExG resembled more closely that of the CoG than the behavior of the CrG, as hypothesized. (24 ref)—*Journal abstract*.

8308. Presland, John L. (Warwickshire County Council, England) **In search of an "early teaching grammar."** *Educational Research*, 1974(Feb), Vol 16(2), 112-120.—Writing samples from 6-10 yr old children were analyzed into sentences, then classified into a number of structural patterns that could be given labels meaningful to young children. Further analysis of the most common patterns yielded subpatterns which could be arranged in an appropriate teaching sequence. Results show that an early teaching grammar was feasible. The implications for teaching and further research are discussed. (40 ref)—J. B. Francis.

8309. Presland, John. **Dealing with disturbing behaviour in the classroom.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 28-32.—Attempts to show how disturbing classroom behavior can be effectively modified by systematic application of rewards and punishment. The account is general, summarizing behavior modification principles, and assumes that the help of a psychologist may be needed in determining how to apply these general principles to particular practical situations.—I. L. Zimmerman.

8310. Rees, Bill & Zimmerman, Steve. (U Idaho) **The effects of formal sex education on the sexual behaviors and attitudes of college students.** *Journal of the American College Health Association*, 1974(Jun), Vol 22(5), 370-371.—Gathered questionnaire data from 128 male and 102 female college students regarding sexual behavior and attitudes before and after a sex education course. Results indicate behaviors did not change but attitudes did.

8311. Samph, Thomas & Campbell, Patricia. (Syracuse U) **Open education: Students in transition.** *Elementary School Journal*, 1974(Oct), Vol 75(1), 37-41.—Compared the academic effects of open and traditional education. Group 1 Ss were 29 6th graders in a campus laboratory school (CLS). Group 2 consisted of 28 CLS pupils not in the 6th grade. Group 3 were 10 Ss who had applied for admission to the CLS but were not admitted. Group 4 were 170 Ss who did not apply. 3 hypotheses were tested: (a) Ss whose parents apply to have them admitted to the school do not differ in attitude or achievement from Ss whose parents do not apply. (b) CLS Ss have higher achievement scores than Ss in traditional schools. (c) CLS Ss have a more positive attitude toward school than Ss in traditional schools. The Stanford Achievement Test was used to measure differences among the groups, and attitudes were surveyed by bipolar adjective pairs. Results show no significant differences between Groups 1 and 2 (CLS pupils) compared with Group 3 (not in CLS) in teachers' marks or standardized test and attitude scores. No significant differences in teachers' marks were found between Groups 1, 2, and 3 compared with Group 4. The hypotheses were rejected on the level of significance.—A. J. Ter Keurst.

8312. Santeusano, Richard P. (Suffolk U) **Do college reading programs serve their purpose?** *Reading World*, 1974(May), Vol 13(4), 258-271.—Reviews research reports which measured the effectiveness of college reading programs in relation to grade point average. Most of the studies concluded that participation in a college reading program did not result in students



attaining significantly higher college grades. It is suggested that many college reading programs could be more effective if teaching were modified according to each student's needs. (43 ref)—C. K. Miller.

8313. Snow, Richard E. (Stanford U. School of Education) **Representative and quasi-representation designs for research on teaching.** *Review of Educational Research*, 1974(Sum), Vol 44(3), 265-291.—Suggests that the study of school learning requires adapting methodology to match the complexity of students and situations in schools, before the molecular mechanisms of laboratory learning can be traced in the molar behavior of school learning. It is hoped that in the future, alternative kinds of research designs will be developed and various hybrids will be invented, so that the advantages and disadvantages of each can be counterbalanced and more clearly understood. (2½ p ref)—P. D. Leedy.

8314. Strom, Robert & Johnson, Aileen. (Arizona State U) **The parent as a teacher.** *Education*, 1974(Fal), Vol 95(1), 40-43.—Describes a preschool parent involvement program which uses a parental self-assessment (Parent As A Teacher, or PAAT) accompanied by a questionnaire reflecting the child's perception of parental behavior along the same dimensions: control, creativity, frustration, play, and teaching-learning. Analysis of each dimension identifies parent child-rearing strengths and weaknesses. Results of tests with Anglo-Americans, blacks, and Mexican-Americans show significant self-concept gains by mothers ( $N = 70$ ) and their children after an 8-wk program utilizing PAAT as a premeasure, postmeasure, and diagnostic measure along with training sessions focusing on the use of toys as an instructional medium for home curriculum.—*Journal abstract*.

8315. Tobias, Sigmund & Duchastel, Phillippe C. (City Coll., City U New York) **Behavioral objectives, sequence, and anxiety in CAI.** *Instructional Science*, 1974(Oct), Vol 3(3), 231-242.—Randomly assigned a total of 117 Ss to a group either receiving or not receiving instructional objectives and to a logical or random instructional sequence. Performance measures and test and state anxiety scores were obtained. Regression analysis indicates that, as expected, objectives had no effect, whereas the logical sequence reduced program errors and increased achievement. Test anxiety was related to program errors, but not to achievement. Expected interactions among objectives, sequence, and anxiety were not significant. (30 ref)—*Journal abstract*.

8316. Ulmer, Curtis. (U Georgia, Coll of Education) **Remediation as a lifelong learning activity.** *Journal of Research & Development in Education*, 1974(Sum), Vol 7(4), 45-56.—Examines the social and philosophical setting for illiteracy programs and the present status of remedial lifelong education in the US. It is proposed that priorities in public remedial education must shift from recruitment and enrollment to establishment of a program staffed by professional adult educators, operating independently of childhood education, and having a learner-centered orientation. A critique of present programs, recommendations for improvement, and implications for public schools are discussed. (23 ref)—E. S. Goodman.

8317. Umana, Roseann F. & Schwebel, Andrew I. (Columbus Area Community Mental Health Ctr, Family

Crisis Unit, OH) **Academic and behavioral changes in tutored inner-city children.** *Community Mental Health Journal*, 1974(Fal), Vol 10(3), 309-318.—Conducted a study of 60 4th-, 5th-, and 6th-grade children to determine the effectiveness of short-term tutoring in producing improvement in tutored children's academic performance and classroom behavior; the roles of tutor support and supervision and volunteering on the part of tutored children were also examined. Ss were divided into 4 groups: Group 1 Ss were tutored by undergraduates fulfilling a psychology course requirement; Group 2 Ss were tutored by undergraduates who volunteered as part of a community project; Group 3 Ss requested but were not assigned tutors; and Group 4 Ss were those who most closely matched Ss assigned to the previous groups. The improvement by Group 1 children in the 3 academic areas assessed by the Wide Range Achievement Test (WRAT) suggests that with support undergraduates can be effective tutors for inner-city children. Improvement on the WRAT by children who requested but did not receive tutors suggests that children's motivation to seek a tutor is a significant element in bringing about academic improvement. (18 ref)—M. E. Pounsel.

8318. Warren, Jonathan R. (Educational Testing Service, Berkeley, CA) **Adapting instruction to styles of learning.** *Findings*, 1974, Vol 1(1), 1-5.—Discusses the implications of field-dependent vs field-independent cognitive styles for educational situations. Parallels between instructional style preferences (student-centered vs instructor-centered) and cognitive styles are noted. Students preferring student-centered instruction and field-dependent students both tend to prefer socially oriented studies, to be indecisive about career, and to desire a supportive educational environment. Students preferring instructor-centered instruction and field-independent students both tend to prefer scientific fields, lectures rather than discussions, and to be specific in career choices. Similar parallels for teachers' preferences are reported. It is concluded that differing styles in learning and teaching can be identified consistently and used as guides to instructional procedures.—R. Hall.

8319. Whisler, Nancy G. (Richmond Unified School District, CA) **Visual-memory training in first grade: Effects on visual discrimination and reading ability.** *Elementary School Journal*, 1974(Oct), Vol 75(1), 50-54.—Examined the value of training children in visual discrimination of letters and words in learning to read. Ss were pupils from a middle-class background in 12 1st-grade classes in 7 schools. 143 controls received only basic reading instruction. 152 experimental Ss also received, for 15 wks, 15 min of daily training in visual memory. This training included the flash-card technique that required the Ss to remember the specific words and letters they saw and to indicate on record sheets what they remembered. The program included discrimination among words and letters with similar visual images. Experimental Ss had lower initial mean reading scores. Experimental Ss had higher scores at the end of the program ( $p < .01$ ). The Stanford Achievement Test of reading measured the performance of both groups. Experimental Ss were superior to controls in performance or improvement on total reading abilities, the word reading subtest, and the paragraph meaning subtest.—A. J. Ter Keurst.

8320. White, Mary A. (Teachers Coll, Columbia U) **Is recitation reinforcing?** *Teachers College Record, Columbia U*, 1974(Sep), Vol 76(1), 135-142.—Teaching effectiveness may be determined by asking questions in class (recitation), by checking pupils' homework, and by administering teacher-made or standardized tests. Recitation offers the greatest likelihood of positive reinforcement, and is the least punishing to the teacher. This explains recitation's popularity among classroom teachers. It is suggested that one ought to probe the exigencies of the educational systems that foster (reinforce) behaviors of school personnel that are opposed to effective teaching.—L. L. Green.

8321. Wilson, John. **Foundations of research in religious education.** *Character Potential*, 1974(Oct), Vol 7(1), 48-51.—Discusses the problem of asking the right questions before accumulating empirical data which may be useless. The reader is asked to consider the priority and importance of validity and the meaning of words like religion, morality, or education. The relevant and irrelevant must be distinguished, and the problem of inference must be kept in sight.

8322. Wishard, Armin. (Colorado Coll) **Academic report: Term papers or projects?** *Modern Language Journal*, 1974(Mar), Vol 58(3), 118-119.—Describes an informal experiment in teaching method. Works of art were elicited as an alternative to papers in a college literature course. Response was rated "excellent" in extent and quality. A wide variety of projects were submitted, including sculpture, music tapes, collages, book jacket designs, paintings, poetry, and films. It is concluded that the method achieves more expanded concepts and liberated expression in students who write papers with difficulty.—C. A. Sherrard.

8323. Witz, Klaus G.; Goodwin, David R. & Easley, Jack A. (U Illinois) **A cognitive model for the evaluation of units of instruction.** *Instructional Science*, 1974(Oct), Vol 3(3), 307-326.—Describes a model that incorporates the child's preexisting systems of cognitive structures. It is suggested that the example demonstrates the relevance of these structures and illustrates the heuristic value for evaluating and designing instructional procedures of inventing structures to account for organized aspects of human behavior. (40 ref)

8324. Woods, John & Walton, Douglas. (U Victoria, British Columbia, Canada) **Informal logic and critical thinking.** *Education*, 1974(Fal), Vol 95(1), 84-86.—Attempts to clarify the role of critical thinking in education, and suggests resources for the implementation of effective critical thinking programs in curricula. 8 major resource areas are outlined, accompanied by bibliographical references. It is suggested that the area of informal fallacies, and with it the area of critical thinking, has suffered from an underdevelopment of underlying theory, despite the value of practical work in these areas. As a step towards remedying this deficiency, an underlying concept of sound argument is outlined. (19 ref)—*Journal abstract*.

8325. Woolfolk, Anita E. & Woolfolk, Robert L. (Rutgers State U, Douglass Coll, New Brunswick) **A contingency management technique for increasing student attention in a small group setting.** *Journal of School Psychology*, 1974(Fal), Vol 12(3), 204-212.—54

1st, 2nd, and 3rd-grade children previously identified as consistently inattentive participated in an extraclassroom treatment program comparing 3 conditions. In the E condition, attention was reinforced by making the earning of token points (exchangeable for rewards) contingent upon appropriate responses to a signal detection task embedded in the lessons. C1-condition Ss participated in the same lessons without the token system, while C2 Ss remained in their regular classrooms throughout the study. 4 participating classroom teachers received brief training in behavior modification techniques for maintaining student attention. Ss in the E condition were found to be significantly more attentive during the treatment lessons. Changes did not transfer to the regular classroom, however, and training for teachers did not affect in-class attention scores of Ss.—*Journal abstract*.

8326. Yawkey, Thomas D. & Aronin, Eugene L. (Wisconsin Early Childhood Ctr, Madison) **Fostering relevance with career education in the elementary school.** *Education*, 1974(Fal), Vol 95(1), 44-50.—Notes that career education and programs related to vocational development are steadily increasing in the elementary schools. 3 premises underlying career education with 5-12 yr olds are discussed: (a) There is a great need for relevancy of school experience to the world of work. (b) Career activity and maturity results from developmentally unfolding characteristics beginning with the early years. Since the elementary school has a major function in helping the child's development, it should be concerned with the vocational aspects of development. (c) Since the elementary school and career education have mutual objectives and areas of concern, the elementary school should have a major part in carrying out career development objectives. (17 ref)—*Journal abstract*.

### Academic Learning & Adjustment & Achievement

8327. Asher, Steven R. & Markell, Richard A. (U Illinois) **Sex differences in comprehension of high- and low-interest reading material.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 680-687.—Investigated whether sex differences in reading comprehension are affected by variations in the interest level of the material. 49 male and 38 female 5th graders' interests were assessed using a picture-rating technique. Each child then read material that corresponded to his or her high- and low-interest areas. The cloze procedure was used to measure comprehension. Results indicate that boys read as well as girls on high-interest material but that they were significantly poorer readers of low-interest material. (23 ref)—*Journal abstract*.

8328. Balasa, Michael A. (Washington State U) **Vocabulary conceptualization and reading.** *Reading World*, 1974(May), Vol 13(4), 272-275.—Conducted a study to determine how 298 5th graders, classified by IQ, conceptualize words. The Gates-MacGinitie Reading Tests were given for subtest scores of comprehension and vocabulary. Ss who chose function responses, which refer to use or action of a word, rather than conceptual responses scored low on reading achievement tests. Conceptualization of test words was varied, indicating that a child's understanding of words has to be



reinterpreted according to his ability to conceptualize.  
—C. K. Miller.

8329. Barton, K.; Bartsch, T. & Cattell, R. B. (U California, Davis) **Longitudinal study of achievement related to anxiety and extraversion.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 551-556.—Administered the High School Personality Questionnaire to over 300 6th- and 7th-grade children. 3 mo later the Ss completed standardized achievement tests in social studies, science, mathematics, and reading. Treating the achievement scores as dependent variables and various personality scales as independent variables, analyses of variance were performed for each achievement area. Results indicate several significant main effects and interactions, but perhaps most important was the finding that extreme scores on either end of the extraversion or anxiety dimensions were related to high achievement. Possible implications for teachers, counselors, or researchers are discussed. (15 ref)—*Journal abstract*.

8330. Brans, Marvin & Kershner, Keith. (U Delaware) **Differential gains in achievement among Wilmington, Delaware public schools.** *Journal of Instructional Psychology*, 1974(Spring), Vol 1(2), 35-39.—Made interschool comparisons of average gains in achievement in reading, language, and arithmetic for Grades 4, 6, 7, and 10 by converting test scores into grade equivalents. Results show differential gains in achievement among the schools for all grades as well as diminishing gains, especially from the 6th grade, where the average pupil performed at a 5th-grade level, to the 10th grade where he performed at a 6-grade level.—*Journal abstract*.

8331. Coslin, P. G. & Dufoyer, J-P. (U René-Descartes, Genetic Psychology Lab, Paris, France) **[Study of achievement levels in psychology and statistics during first term of students' enrollment for the master's degree in psychology.]** (Fren) *Bulletin de Psychologie*, 1973-1974, Vol 27(13-14), 675-680.—Studied the adequacy of pre-university preparation in statistics/mathematics and genetic psychology/methodology of child psychology among 41 beginning graduate students (35 females, 6 males) enrolled in a master's program in genetic psychology. The independent variables were age, university in which enrolled, and pre-university preparation in the 2 subject areas; the dependent variable was knowledge of the 2 areas. Ss responded to an orally presented 20-item questionnaire designed to measure their knowledge of the 2 general categories. Overall, Ss were significantly weaker in knowledge of statistics/mathematics. A significant loss in knowledge (material taught vs material retained) was evident in both fields. This was attributed, in part, to the structure of the curriculum which frequently did not facilitate continuing hierarchical presentations in 1 subject area throughout a program or liaison between subject areas within a program.—Z. M. Cantwell.

8332. Denney, Douglas R. (U Kansas) **Relationship of three cognitive style dimensions to elementary reading abilities.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 702-709.—Compared 80 good and poor readers in grades 2-5 on 3 cognitive style dimensions—conceptual style preferences, cognitive tempos, and attentional styles—which were assessed with the Conceptual Styles Test, Matching Familiar Figures Test, and

Fruit Distraction Test. Attentional style measures distinguished poor and good readers better than the other cognitive style measures. However, another set of scores aligned with but not identical to the attentional style measures were even more highly related to reading. These scores reflected children's skills at sequentially transposing information from visual to verbal channels. Results are considered in light of the maturational lag hypothesis. (15 ref)—*Journal abstract*.

8333. Descombes, J.-P. (U Lausanne, Inst de Psychologie Appliquée, Switzerland) **[Relations among interests, aptitudes, and academic achievement of 129 Swiss students.]** (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(3), 135-147.—Reports correlations between scales of the Kuder Preference Record (Vocational Form C), and the Flanagan Aptitude Classification Tests (FACT). Low correlations were found between the Flanagan and Kuder scales and Ss' grades in 10 academic courses. Success in philosophy, Greek, English, and chemistry were conspicuously not susceptible to prediction.—K. J. Hartman.

8334. Forslund, Morris A. & Hull, Ronald E. (U Wyoming) **Teacher sex and achievement among elementary school pupils.** *Education*, 1974(Fall), Vol 95(1), 87-89.—Tested the hypothesis that both boys and girls in the upper elementary grades achieve at a higher level under male than female teachers. 1,322 male and 1,350 female 6th graders, taught by a total of 47 male and 48 female teachers, were given the Science Research Associates Achievement Series (Form D) and the Lorge-Thorndike Intelligence Test. Analysis of covariance indicates that with IQ held constant, boys achieved at a significantly higher level in science than girls, and girls achieved at a significantly higher level in language arts, regardless of sex of teacher. No significant differences were found with respect to arithmetic, reading, or composite test scores. It is concluded that sex of teacher does not significantly affect achievement of either boys or girls at the upper elementary level.—*Journal abstract*.

8335. Goulet, L. R.; Williams, Kerry G. & Hay, Carol M. (U Illinois) **Longitudinal changes in intellectual functioning in preschool children: Schooling- and age-related effects.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 657-662.—Determined the mental age (MA) and IQ (Peabody Picture Vocabulary Test) of 3 samples of 63 nursery school children varying in chronological age (CA; mean ages at 1st testing were 46.5, 52.2, and 56.8 mo) at 2 points in the school year. The testing points were chosen to conform to a design which permitted the non-CA-related influences of schooling to be estimated. Results reveal that both CA and amount of time in school were positively related to MA. A similar relation between IQ and length of schooling was also found. The direct and indirect influences of schooling on intellectual functioning and potential sampling biases inherent in the norming procedures for available standardized tests are discussed.—*Journal abstract*.

8336. Harris, Edward E. (Indiana U, Indianapolis) **Learning and behavior patterns among high risk students.** *Journal of Instructional Psychology*, 1974(Spring), Vol 1(2), 40-45.—Investigated the relationship between learning patterns and classroom behavior patterns of 84

high risk students. Findings indicate that most students maintained poor academic records throughout the term. Variations in teaching methods had a different impact on degrees of academic success and delinquent classroom behaviors. No one teaching technique was found to be inherently superior. (16 ref)—*Journal abstract*.

8337. **Hogenson, Dennis L.** (Minnesota Public Schools, Robbinsdale) **Senior neurosis: Cause-effect—or derivative.** *School Psychologist*, 1974(Apr), Vol 28(4), 12-13.—Discusses the rare phenomenon of the high school student who has made average or better progress until his senior year and then fails. High school graduation may be symbolic of a feared developmental task and thus acquires very negative characteristics. Such problems are seen as difficult to modify.

8338. **Holmstrom, Engin I.** (American Council on Education, Office of Research, Washington, DC) **Low achievers: Do they differ from "typical" undergraduates?** *ACE Research Reports*, 1973(Sep), Vol 8(6), 44 p.—Compared the educational experience and progress of undergraduates who were low and high achievers in secondary school. Ss were 63,510 students selected from an initial freshman group of 185,848 surveyed in the Cooperative Research Program of the American Council on Education. Results indicate that the proportions of men, nonwhites, and older students were higher among low achievers in secondary schools. Low achievers were more likely than high achievers to aspire to careers in business, less likely to be motivated by the academic quality of the college they attended, more likely to fail one or more courses and to require more than 4 yrs for the baccalaureate. Results also suggest that the highly competitive academic environment of universities may discourage or frustrate low achievers and that they might better attend small, highly selective 4-yr colleges.—*J. B. Francis*.

8339. **Johns, Jerry L.** (Northern Illinois U) **Concepts of reading among good and poor readers.** *Education*, 1974(Fal), Vol 95(1), 58-60.—On the basis of their responses to the question, "What is reading?" 53 4th graders and 50 5th graders were placed in 1 of 5 categories along a continuum representing meaningful-nonmeaningful concepts of reading. Ss were also classified as good and poor readers based on scores on the Comprehension subtest of the Gates-MacGinitie Reading Tests. Results of chi-square analysis support the hypothesis that a significantly greater number of meaningful definitions of reading would be given by good readers. However, results should be interpreted with caution because of the classification methods used and the large number of uncontrolled variables. Methodological issues are discussed.—*A. Olson*.

8340. **Jones, A. D. & Seaborne, A. E.** (London School of Economics & Political Science, England) **Birth order and social class in a London college.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 467-468.—Correlations between birth order and attendance at a London college were somewhat at variance with similar American studies. Differential social-class patterns may play a part in this difference.

8341. **Jorgenson, Gerald W. & Hyde, Elizabeth M.** (Case Western Reserve U) **Auditory-visual integration and reading performance in lower-social-class children.**

*Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 718-725.—Examined the relationship of auditory-visual integration and reading performance (Gates-MacGinitie Reading Test) in 86 1st and 2nd graders from primarily lower-class backgrounds. The effects of grade level, sex, IQ, and single-modality auditory and visual functioning (measured by 2 subtests of the Illinois Test of Psycholinguistic Abilities) were examined as possible moderating variables. Results suggest that auditory-visual integration ability in this sample was developmental; however, the Ss functioned at a lower level than would be expected of middle-class Ss. Significant correlations were obtained between auditory-visual integration and reading vocabulary in the total sample and in the 2nd-grade boys. Although neither IQ nor single-modality ability was a significant contributor to this relationship, grade level, sex, and socioeconomic status did make significant contributions.—*Journal abstract*.

8342. **Leeds, Donald S.** (Kean Coll, Union, NJ) **Sociology of reading: Social and cultural factors.** *Reading World*, 1974(May), Vol 13(4), 318-333.—Reviews literature on reading as a process and an experience. Familial influences, social class, and social status have been reported as factors in the growth of a child's ability to learn to read. (42 ref)

8343. **Reed, Roseanne & Meyer, Robert G.** (U Louisville) **Reduction of test anxiety via autogenic therapy.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 649-650.—To evaluate the role of active and passive instructions to Ss given abbreviated training with J. H. Schultz and W. Luthe's (1959) 6 autogenic exercises, 18 female college students self-referred for test anxiety completed the Test Anxiety Questionnaire and the Wonderlic Personnel Test. Analyses of repeated measures showed treatment decreased test anxiety scores somewhat more for active Ss; 78% of Ss reported high relaxation was achieved and improved performance.—*Journal abstract*.

8344. **Richards, James M.** **A simulation study of the use of change measures to compare educational programs.** *Center for Social Organization of Schools Report, Johns Hopkins U*, 1974(Oct), No 183, 12 p.—Used artificial data to assess the correlation between several estimates of average student change in various schools and the "true" impact of those schools. Results indicate that all estimates involving pretest-posttest differences measured school impact with reasonable accuracy. It is considered important to measure change over the entire course of learning, however, and not just over the later stages of learning. The correlations between change scores and other school characteristics reflect with reasonable accuracy the relationships between those characteristics and impact, but will be large only when the underlying relationships are substantial. It is concluded that simple gain scores measure the true situation about as accurately as other change estimates, are easier to compute, and probably are more meaningful to nonresearchers.—*Journal abstract*.

8345. **Roberts, Nancy.** (Boston U) **A computer system simulation of student performance in the elementary classroom.** *Simulation & Games*, 1974(Sep), Vol 5(3), 265-290.—Describes a computer simulation, DYNAMO, which examines the effect of a number of variables



on student performance in an elementary classroom. In a dynamic system with an emphasis on feedback, the following variables were studied: student's goals and personality, amount of teacher help, student's learning rate and intelligence, and teacher's expectations. Detailed results of a number of computer runs looking at the interaction between variables are presented. 3 variables emerged as most important: student's goals, teacher expectancy, and the amount of extra help given by the teacher. Suggestions are made for the use of models in deepening the educational understanding of those involved in teaching.—D. E. Anderson.

8346. Robinson, Jack E. & Gray, Jerry L. (Old Dominion U) **Cognitive style as a variable in school learning.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 793-799.—Studied the relationship between cognitive style (assessed with verbal analogy items) and school learning of 258 5th graders. Findings indicate that cognitive style was differentially related to school learning for both boys and girls after variance attributed to verbal and nonverbal IQ was taken into consideration in the data analysis. Results suggest that the relationship between a particular style and a particular school-learning variable may be an important consideration prior to assigning children to differential instructional treatments or to instructing children in the use of a particular style. (19 ref)—*Journal abstract*.

8347. Rothkopf, Ernst Z. & Billington, Marjorie J. (Bell Lab, Murray Hill, NJ) **Indirect review and priming through questions.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 669-679.—Conducted 3 experiments with a total of 264 undergraduates and 108 high school seniors to determine (a) whether attempts to answer a question facilitate the retention of other topically related material that is not directly relevant to the original question (indirect review) and (b) whether performance on a test item is better if a question topically related to the test item has recently been asked (priming). Evidence for indirect review was obtained following study of a 6,000-word text using adjunct questions. No priming effects were observed. The indirect review phenomenon suggests that searching one's memory to answer a question strengthens or makes more available a system of semantically related memory features broader than the memory requirements for the initial question.—*Journal abstract*.

8348. Swartwout, J. Baxter. (Private practice, Latham, NY) **Vision and perception related to scholastic achievement.** *Journal of the American Optometric Association*, 1974(Aug), Vol 45(9), 1074-1080.—Describes vision as an information-processing system which is brought to a state of readiness for handling printed symbols through development and learning; a variety of sensory, motor, and integrative experiences are the data necessary to bring meaning to the printed page. Several visual physiological problems are described which may interfere with classroom performance. Observations of eye movement and eye teaming deviations which can be made by optometrist or teacher are discussed. It is suggested that inappropriate outward classroom behav-

iors are often only symptoms of underlying visual problems.—*Journal abstract*.

8349. U'Ren, Richard C. (U Oregon, Medical School, Psychiatry Outpatient Clinic) **The nature of change at West Point.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 185-188.—Discusses a program designed to reduce stress in the early training period of West Point cadets. Comparisons between 1970 and 1971 psychiatric casualties showed a reduction in anxiety and depression symptoms, fewer suicide gestures, and fewer gastrointestinal problems after changes were made in the 1971 program. Changes instituted included more careful selection and training of upperclassmen assigned to cadet training; less upperclass harassment, especially at meal times; providing an initial psychological acclimatization period; and adoption of a more flexible resignation policy. This shift in focus produced a marked reduction in morbidity.—A. de la Haba.

8350. Walberg, H. J. & Singh, R. (U Illinois) **Teacher quality perceptions and achievement in Rajasthan.** *Alberta Journal of Educational Research*, 1974(Sep), Vol 20(3), 226-232.—Social studies achievement test scores of 804 10th-grade Indian students were regressed on their ratings of their teachers, IQ scores, sociometric nominations, socioeconomic status, sex, and school characteristics, plus several product terms and quadratic forms of the variables. The resulting 6-term regression model was cross-subject validated on 452 science students. The analysis suggests that IQ and the teacher rating can each be divided into 2 parts, the class mean and the individual student's deviation from it, both of which were related to individual learning.—*Journal abstract*.

8351. Westbrook, Franklin D. (U Maryland, University Counseling Ctr) **Self-management: An academic approach to fostering personal adjustment.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 8-12.—Describes the use of self-management principles, which are derived from learning theory, in facilitating college students' personal and academic adjustment and skills. Self-management includes the identification of problem behaviors, assessment of the behavior, reinforcement identification, systematic change of reinforcement, and the gradual elimination of the behavior.

8352. Yawkey, Thomas D. & Jantz, Richard K. (U Wisconsin, Madison) **Differential effects of intelligence, race, SES, and sex variables on arithmetic achievement test performance.** *Journal of Instructional Psychology*, 1974(Spr), Vol 1(2), 2-10.—Investigated the effects on selected factors of (a) IQ levels, (b) race, (c) socioeconomic status, and (d) socioeconomic groups based upon performance and gains in performance using standardized arithmetic test scores for 3,536 Ss attending an urban midwestern school district between 1968 and 1971. Using analysis of covariance, statistically significant differences were found in the levels of performance on all factors. Using mean achievement scores, children with IQ levels of 101 and above significantly differed from children with IQs of 100 and below. However, statistically significant differences were not found for gains in performance on any of the factors examined. (23 ref)—*Journal abstract*.

## Special Education

8353. Azam, R. **Learning handicaps and remedial education: A comprehensive approach.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 3-12.—Discusses a comprehensive remedial education program to control and minimize the problems facing children with learning handicaps. Minimum essential for such a service is proper planning, with maximum emphasis on coordination of resources, early education, and appropriate remedy at the right time. The potential contributions of psychological services to such a program are discussed. (44 ref)—I. L. Zimmerman.

8354. Booth, Tony; Moseley, David & Robertson, John. (Inner London Education Authority, England) **A discussion of attitudes, practices and types of organisation which affect the progress of children with special problems.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spring), Vol 3(6), 37-52.—Examines the scope for improving services for children with special learning problems under the following headings: (a) teacher expectations of needs and capacities of children and their parents; (b) teaching methods in normal and special groups; (c) record keeping and educational guidance; (d) curriculum content; (e) authority structure and ethos within schools, and (f) special educational services. The 1st 5 of these concern changes within schools and the 6th involves the part played by the local authority in organizing and supporting school services for children with special needs.—*Journal summary*.

8355. Braunstein, Suzie & Biederman, Sherry. (U Maryland) **From speech pathologist to language classroom teacher: What does it take?** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 245-252.—Describes the transitional changes involved when a speech pathologist becomes teacher-clinician of a language class. The personal changes, the task planning and administration, the aide's responsibilities, the material and equipment, and reporting of children's performance are discussed.

8356. Carroll, H. C. & Hibbert, F. G. **The perceptual ability of a class of partially sighted children.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 17-21.—Surveyed the perceptual ability of 13 partially sighted school children on the following measures: Williams Intelligence Test for Children with Defective Vision, Frostig Developmental Test of Visual Perception, Bristol Social Adjustment Guides, Burt (Re-arranged) Word Reading Test, and the Staffordshire Arithmetic Test. The younger Ss were more intelligent, had better perceptual ability, and were not nearly as backward as the older pupils. Results suggest that in order to avoid deterioration, partially sighted children should be given special education from at least age 5. (18 ref)—I. L. Zimmerman.

8357. Cook, Rose. (United Cerebral Palsy of Denver, CO) **Sex education program service model for the multihandicapped adult.** *Rehabilitation Literature*, 1974(Sep), Vol 35(9), 264-267.—Describes the origin and development of a sex education program for the 120 enrollees of the United Cerebral Palsy Center in Denver. At present the program has 7 components: recognition of need, personal awareness, board support, staff

training, parental involvement, development of a variety of relevant program services, and evaluation of the program. (19 ref)

8358. Cooper, Jean; Moodley, Molly & Reynell, Joan. (U London, Wolfson Ctr, England) **Intervention programmes for preschool children with delayed language development: A preliminary report.** *British Journal of Disorders of Communication*, 1974(Oct), Vol 9(2), 81-91.—Describes 2 intervention programs for preschool children with delayed language development. Both programs are based on the same theoretical model, with the focus on the intellectual aspects of language. In the language clinic program parents and child are seen every 6 wks by a speech therapist for ongoing advice on how to help the child's language development in daily living at home. In the language classes the children attend for half days every day, under the direction of a qualified teacher. The programs and assessment procedures are described, and tentative findings after a 1-yr trial are reported. The large majority of the children in both programs ( $N = 68$ ) made accelerated progress in receptive and expressive aspects of language development.—*Journal abstract*.

8359. Crabtree, Margaret & Peterson, Elizabeth. (Baylor Coll of Medicine, Div of Audiology & Speech Pathology, Houston, TX) **The speech pathologist as a resource teacher for language/learning disabilities.** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 194-197.—Describes the way a speech pathologist functioned as a resource teacher to provide extensive remedial treatment of a child with language development problems. S was a 10-yr-old girl in the 3rd grade. Improvement was clearly observed 1 yr after her enrollment in the resource program.

8360. Dublinske, Stan. (Vermont State Dept of Education, Div of Special Education, Montpelier) **Planning for child change in language development/remediation programs carried out by teachers and parents.** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 225-237.—Describes an intervention procedure to increase communication among speech pathologists, teachers, and parents so that controlled instructional activities can be effectively applied to specific problems.

8361. England, Gene. (Behavioral Sciences Inst, Carmel, CA) **Structuring remediation regardless of setting.** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 204-211.—Describes a behavioral model for remedial treatment of pupils with learning problems. The sequence of the program to be learned is the stimulus variable. The response rate and the accuracy rate are the response variables. Positive reinforcers include tangible objects, social reinforcers, and S's verbal self-reinforcement. The program can be revised on the basis of the performance of a large number of children. It is self-paced and can be given to many pupils when assisted by trained aides. Cross-comparison of pupils' response variables may also serve as criteria of teacher's evaluation.—S. S. Liu.

8362. Fuller, Renée. **Breaking down the IQ walls: Severely retarded people can learn to read.** *Psychology Today*, 1974(Oct), Vol 8(5), 97-102.—Describes a system to teach reading to children who experience difficulty



with traditional methods. The letters are constructed using a circle ("ball"), a line ("stick"), and an angle ("bird"). Reading is begun when 2 letters are learned. The stories are science fiction and grow in complexity as the child learns. The method was used to teach retarded students with IQs of 33-72. The Ss learned to read so well that they were getting 100% on achievement tests. As they learned to communicate, their self-esteem increased.—*E. J. Posavac.*

8363. **Furfey, Paul H.** (Catholic U of America, Bureau of Social Research) **Total communication and the Baltimore Deaf Survey.** *American Annals of the Deaf*, 1974(Aug), Vol 119(4), 377-382.—Studied the responses of 137 deaf individuals regarding the relative educational effectiveness of the oral method and total communication (i.e., speech reading and finger spelling and signs). Results indicate a superiority of the total communication method. (26 ref)

8364. **Glavin, John P. (Ed.).** (Temple U) **Ferment in special education.** New York, NY: MSS Information Corp, 1974. 250 p. \$13(cloth), \$6.50(paper).—Presents a collection of 26 articles on procedures and issues involved in special education. Topics include behavioral management in special education curriculums; evaluation methods for exceptional children; cognitive, affective, and creative curriculum requirements; early education needs of disadvantaged children; controversies in the field of special education; and future research and service needs.

8365. **Hagamen, Mary B. & van Witsen, Betty.** (Sagamore Childrens Ctr, Melville, NY) **Early intervention in childhood schizophrenia: The role of special education.** In R. Cancro, N. Fox & L. E. Shapiro (Eds), *Strategic intervention in schizophrenia: Current developments in treatment*. New York, NY: Behavioral Publications, 1974. xviii, 326 p.

8366. **Jones, Reginald L.** (Haile Selassie I U, Testing Ctr. Addis Ababa, Ethiopia) **Correlates of orthopedically disabled school children's school achievement and interpersonal relationships.** *Rehabilitation Literature*, 1974(Sep), Vol 35(9), 272-274, 288.—Reports that many hypotheses about relationships among ambulation status, dependency, locus of control, and school achievement in orthopedically disabled children were not supported in a study of 102 children enrolled in a special elementary school. Although these findings may indeed represent the actual state of affairs, the great diversity among such populations makes isolation of core variables a fruitless quest, and additional studies are needed to confirm or contradict the hypothesis in question.—*S. L. Warren.*

8367. **Jones, Reginald L.** (U California, Riverside) **Special education and the minority child.** In B. C. Ring & D. R. Schrader (Eds), *Eleventh annual Distinguished Lectures Series in Special Education and Rehabilitation*. Los Angeles, CA: U Southern California, School of Education, 1973. vi, 101 p. \$3.—Discusses minority student perceptions of their special class placements. Attitudes of minority retardates toward school in general, teachers, and activities, and issues involved in educational assessments and adjustment to the school environment are discussed.

8368. **Kent, Louise R.** (Michigan Dept of Mental Health, Coldwater State Home & Training School) **Language acquisition program for the severely retarded.** Champaign, IL: Research Press, 1974. xiii, 185 p. \$5.95.—Describes the major components of the Language Acquisition Program (LAP) for severely retarded children, which is based on a reinforcement paradigm and stresses the acquisition of prerequisite attending behaviors and motor imitation and appropriate receptive and expressive language skills. Specific exercises, methods of assessment and reinforcement, and suggestions for the use of LAP with the deaf are presented.

8369. **Magne, Olof.** **Educational technology in special education.** *Didakometry*, 1974(Oct), No 43, 11 p.—With reference to data from a 1963-1970 Swedish investigation into learning difficulties in mathematics (dyscalculia), an analysis is presented of problems in educational technology in special education. In examining the usual taxonomies with findings in research on the attainment of low-achievers, a number of inconsistencies indicate that alternative taxonomies should be constructed. It is suggested that the developmental cognitive theories of Piaget and others are suitable as a starting point for a taxonomy in mathematics for low-achievers. A taxonomic model is developed from these assumptions. (20 ref)—*Journal abstract.*

8370. **Miller, Pauline.** **All children are special: Some remarks on the segregation of children for educational purposes.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 40-46.—Proposes that segregation into separate classes may not be the most appropriate way of dealing with children who have failed in the ordinary educational system. The limitations of special class placement are discussed and alternative approaches are presented. (18 ref)

8371. **Mittler, P.** (U Manchester, Hester Adrian Ctr for the Study of Learning Processes in the Mentally Handicapped, England) **[The development of language among the mentally handicapped: Educational aspects.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(1), 19-51.—Views language development and education as the meeting point between teachers and researchers. Among the aspects discussed are evaluation of verbal development (teacher's observations and developmental scales); development of comprehension (evaluation and remedial aspects); and language facilitation programs. The possible use of each of these aspects in research, the use of research results in education, and promising lines of investigation are discussed. (French & English summaries) (49 ref)—*Journal summary.*

8372. **Nigro, Giovanni.** (United Cerebral Palsy of New York City, NY) **Recreation and adult education.** *Rehabilitation Literature*, 1974(Sep), Vol 35(9), 268-271.—Recreation and adult education programs can correct many of the deficiencies observed in multiply-handicapped adults resulting from childhood deprivations and mishandling—e.g., inadequate personality development, infantilization, and emotional disturbance. Such programs can provide increased opportunities for personal relationships, compensatory activities, and community involvement. Program components include socialization, self-help, academics, physical activity, creative endeavor.

ors, helping experiences, and appropriate vacation opportunities.—S. L. Warren.

8373. Olshansky, Simon. (Community Workshops, Boston, MA) **Mental retardation: Another view.** *Journal of Applied Rehabilitation Counseling*, 1974(Fal), Vol 5(3), 131-137.—Discusses some of the problems experienced by the educable retardate in the school environment. It is suggested that professionals should stop labeling the mentally retarded, attention should be shifted from evaluation to development, and emphasis should be placed on the principle of normalization rather than abnormalization.—*Journal abstract*.

8374. Presland, J. L. **Ascertaining for E.S.N. school.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 37-40.—Gives general advice on assigning children to an educationally subnormal school from the point of view of an educational psychologist, covering such issues as who should be referred, how the referral should be made, and how placement should be proposed to parents.

8375. Robertson, Mary L. & Freeman, Gerald G. (Oakland Schools Speech & Hearing Clinic, Pontiac, MI) **Applying diagnostic information to decisions about placement and treatment.** *Language, Speech & Hearing Services in Schools*, 1974(Oct), Vol 5(4), 187-193.—Discusses the role of the speech pathologist as a member of the school team. His function includes language evaluation, information coordination, and participation in formulating a treatment and educational program.

8376. Scott, Alvin G. & Ryan, Toni M. (Glenrose Hosp, Edmonton, Alberta, Canada) **Nursery experience for physically handicapped children.** *Western Psychologist*, 1973, Vol 4(4), 89-97.—Evaluated the usefulness of several methods of assessing the effects of a nursery experience on severely physically handicapped children. Ss were 6 male and 16 female children (mean age 4 yrs 3 mo) in a hospital nursery program. All were administered the Stanford-Binet Intelligence Scale (form L-M), the Cattell Infant Intelligence Scale, the Vineland Social Maturity Scale, and the Beery Buktenika Test of Visual Motor Integration on entering the program, and 3 and 6 mo later. The change over time for intelligence data was significant, while the change in social and visual motor behavior was not. It is concluded that more appropriate and sensitive measures should be developed for use with physically handicapped children. (17 ref)—D. R. Evans.

8377. Smoll, Frank L. (U Washington) **Motor impairment and social development.** *American Corrective Therapy Journal*, 1974(Jan), Vol 28(1), 4-7.—Discusses interrelationships of physical abilities and social development and adjustment. A failure cycle is described in which poor motor skills result in reluctance to participate in physical/social activities, which further decreases motor abilities. It is suggested that motor impairment can contribute to social maladjustment and delinquent behavior. Implications for educators include provision of adequate physical facilities and careful planning stressing successes for children. Ability grouping is suggested.—C. Wright.

8378. Stansfield, R. T. (Feversham School, Newcastle-upon-Tyne, England) **Aspects of management in a residential school for maladjusted children.** *Association of Educational Psychologists' Journal & Newsletter*,

1973(Win), Vol 3(3), 63-74.—Describes some aspects of an independent residential school for maladjusted children. These include the aims and management policies, the relationships which have been developed between the school and potentially helpful external agencies, and the specific treatment programs available.

8379. Stein, Julian U. (American Assn for Health, Physical Education & Recreation, Programs for the Handicapped, Washington, DC) **What research and experience tell us about physical activity, perceptual-motor, and recreation programs for children with learning disabilities.** *American Corrective Therapy Journal*, 1974(Mar-Apr), Vol 28(2), 35-41.—Examines paradoxes and contradictions in research and application in childhood education. The need is stressed for truly individualized programs that provide successes for both normal and learning-disabled children and emphasize achievement and ability rather than disability and deficiencies.

8380. Thomas, Jerry R.; Chissom, Brad S. & Booker, Lynn. (Florida State U) **Perceptual-motor and academic relationships for disadvantaged children classified as learning disabled and normal.** *American Corrective Therapy Journal*, 1974(May-Jun), Vol 28(3), 95-99.—Investigated correlations among 2 perceptual motor and 4 academic readiness measures in 38 normal and 16 learning-disabled, socioeconomically disadvantaged preschool Ss. Perceptual motor scores correlated highly with academic readiness for the learning-disabled group but not for the normal group. The lack of correlation between the Peabody Picture Vocabulary Test and other measures suggests caution in its use in screening disadvantaged children.—C. Wright.

8381. Woods, Mike. **Caught in the act.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 33-36.—Attitudes and ideas about special education have changed in the 30 yrs since the 1944 Education Act in England was framed, but in most areas a procedure based on a misinterpretation of the Act's intentions is carried out in "ascertaining" children as educationally subnormal. This procedure should be changed (a) because it is formal and compulsory, and (b) because it lays too much stress on doctors' opinions and not nearly enough on assessment by educational psychologists and teachers, who are better qualified to recommend that a child should receive special education and to prescribe what form that education should take.—*Journal abstract*.

### Counseling & Measurement

8382. Adams, Jack & Creamer, Lyle R. (California State Coll, Dominguez Hills) **Cross-modal measurement of test-anxiety.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 471-477.—Attempted to measure test anxiety by an indirect method. 40 college students were asked to match intensities of a 1000-Hz tone to subjective levels of experienced anxiety under 2 conditions: on a day just prior to taking a routine college course examination and on a day when no course examinations were scheduled. In addition, Ss were asked to complete the Affect Adjective Check List (AACL) which permitted a self-description of the degree of anxiety felt under the 2 conditions. Results indicate that both the cross-modal



matching technique and the AACL differentiated between test and control days. These findings suggest that Ss were indeed capable of matching the relative changes in the level of experienced test anxiety with changes in the amplitude of an auditory stimulus.—*Journal abstract.*

8383. **Baird, Leonard.** (Educational Testing Service, Princeton, NJ) **The practical utility of measures of college environments.** *Review of Educational Research*, 1974(Sum), Vol 44(3), 307-329.—Describes and discusses the broad and complex role of colleges as socializing agencies. Recent research suggests that the complexity of the problems involved may soon yield to answers that are both valid and useful.

8384. **Barnett, Rosalind C.** (Harvard U) **Sex differences and age trends in occupational preference and occupational prestige.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 35-38.—Studied sex differences and age trends in the relationship of occupational preferences and aversions and occupational prestige in 1,531 male and 988 female middle- and upper-middle-class 9-17 yr old Ss to test the hypothesis that females learn early to avoid high-prestige occupations. Rank-order correlation coefficients between empirically established prestige rankings and preference and aversion rankings were calculated separately for each sex at each age. The relationships between preference and prestige were positive and stronger for the males than for the females; those between aversion and prestige were positive and stronger for females than for males. Sign tests for both relationships were significant. It is concluded that males learn to prefer prestigious occupations; females learn to avoid them.—*Journal abstract.*

8385. **Booth, Gordon & Taylor, Margaret.** **Some problems in the rating of child behaviour by teachers: A follow-up of children with high or fluctuating scores on Rutter's Children's Behaviour Questionnaire.** *Association of Educational Psychologists' Journal & Newsletter*, 1973(Win), Vol 3(3), 13-17.—393 normal children in Aberdeen, Scotland, were rated by their teachers twice, a term apart, on the Rutter Questionnaire. Two groups from the sample were then compared: the 18 (4.6%) who in both ratings scored above the maladjustment cutoff point, and the 17 (4.3%) whose 2 scores showed a significant change and who were therefore classified as maladjusted on only 1 of the 2 questionnaires. In follow-up oral interviews with current teachers, Ss who had twice scored as maladjusted were correctly identified in most cases, while none of those with different scores could be classified with assurance as possibly maladjusted. A substantial number of false positives could be attributed to teachers unacquainted with the child being rated, as well as negative or positive halo effects.—*I. L. Zimmerman.*

8386. **Bowser, Philip B. & Carrubba, Michael J.** (Western Carolina U) **Nonstandard administration of WPPSI Information subtest in a preschool screening battery.** *Bulletin of the North Carolina Psychological Association*, 1973(Spr), 22-25.—Compared 2 nonstandard administration and scoring systems for the Information subtest of the Wechsler Preschool and Primary Scale of Intelligence with the standard procedure. 9 preschool children were studied, 3 in each scoring group. The nonstandard systems resulted in significant savings

in time and both correlated significantly with the actual raw score for the subtest, suggesting the applicability of nonstandard techniques for screening purposes where time limitations are imposed.—*R. S. Albin.*

8387. **Evans, Ellis D.** (U Washington) **Measurement practices in early childhood education.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators*. New York, NY: Springer, 1974. xviii, 362 p. \$13.95.

8388. **Evans, Roy & Ferguson, Neil.** **Screening school entrants.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spr), Vol 3(6), 2-9.—Reviews the screening techniques and evaluation instruments available for preschool and early school testing of children, covering 3 main areas: (a) prereading evaluation (reading readiness); (b) academic or school readiness; and (c) early identification of learning disabilities or learning potential. The instruments are examined in terms of their relevance and utility within the context of British Infant and Primary Schools. (21 ref)—*I. L. Zimmerman.*

8389. **Fincher, Cameron.** (U Georgia, Inst of Higher Education) **Is the SAT worth its salt? An evaluation of the use of the Scholastic Aptitude Test in the university system of Georgia over a thirteen-year period.** *Review of Educational Research*, 1974(Sum), Vol 44(3), 293-305.—Contents that the genuine effectiveness and utility of the SAT may not lie either in its predictive efficiency or its cost effectiveness. Other considerations may be more relevant and should be studied more carefully. The uses of the SAT should be supplemental to the decisions and actions that facilitate transition from 1 institution to another. Such decisions and actions should not be based on predicted performance alone and may always be not susceptible to successful cost accounting. (17 ref)—*P. D. Leedy.*

8390. **Gilman, David A.** (Indiana State U) **The economics and psychology of the report card.** *Measurement & Evaluation in Guidance*, 1974(Oct), Vol 7(3), 157-162.—Describes the psychological and economic principles and theories that are used in the grading process and discusses some of the problems involved in attempting to transfer these theories and principles to the evaluation of student achievement. It is suggested that despite efforts to discredit the practice of assigning grades to students, there is empirical and theoretical evidence that grading can aid students' achievement.—*M. E. Pounsel.*

8391. **Gipps, C. & Ewen, E.** (National Foundation for Educational Research, Slough, England) **Scoring written work in English as a second language: The use of the T-unit.** *Educational Research*, 1974(Feb), Vol 16(2), 121-125.—Applied the technique of the "minimal terminable unit," or T-unit, scoring the National Foundation for Educational Research open-ended writing and speaking tests which are part of the battery of Tests of English Proficiency for Immigrant Children. During the development of this method the tests were administered to Asian children with up to 5½ yrs schooling in Britain. The average T-unit length in writing and speech increased with increasing length of stay in Britain, and much of their speaking and writing proficiency developed after 3½ yrs.—*J. B. Francis.*

8392. Goodwin, William L. (U Colorado) **Evaluation in early childhood education.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A handbook for the training of early childhood educators.* New York, NY: Springer, 1974. xviii, 362 p. \$13.95.

8393. Gottfredson, Gary D. & Holland, John L. (Johns Hopkins U) **Vocational choices of men and women: A comparison of predictors from the Self-Directed Search.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 28-34.—Examined several predictors of occupational choice derived from J. L. Holland's 1973 theory of careers. Hypotheses that a person's competencies, activities, self-estimates, interests, and vocational choices can be organized by a 6-category typology to understand and predict subsequent choice were tested. 894 men and 989 women took the Self-Directed Search at entry into 2 colleges and reported their occupational choices 1 or 3 yrs later. All hypotheses received support, although the predictive efficiency varied. Current vocational choice was the best predictor of later choice and scores based on sex-specific norms were less efficient predictors than raw scores. Findings support both the theory and the validity of the Self-Directed Search assessment for men and women. (18 ref)—*Journal abstract.*

8394. Hicks, R. E. (Dept of the Public Service Board, Papua New Guinea) **Vocational interests, values and abilities of some Australian high school students in Papua New Guinea: Cross-cultural comparisons.** *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 17-24.—Compared a group of 31 male and 23 female Australian expatriate high school students studying in Port Moresby, New Guinea, with (a) local students, (b) Australian students in Australia, and (c) norms for US students via instruments including the Pacific Vocational Interests Analysis, the Alport-Vernon-Lindzey Study of Values, and locally designed tests. Scores indicate local New Guinean students are more interested in clerical, numerical, and social activities, and expatriates place more value on economic and esthetic categories than US students. The locally developed tests are highly correlated and predictive of success for both groups of students in Papua New Guinea.—*C. Wright.*

8395. Johnson, W. Russell; Sieveking, Nicholas A. & Clanton, Earl S. (Vanderbilt U) **Effects of alternative positioning of open-ended questions in multiple-choice questionnaires.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 776-778.—Conducted 2 studies with 110 black high school and college students and 156 white college students to study the effect of the placement of open-ended questions, relative to multiple-choice questions, on the responses elicited. Both studies found that positionings at both the beginning and the end of a predominantly multiple-choice questionnaire elicited significantly more responses than did either placement alone. When the 2 positions were used singly, the one at the beginning was found to elicit more discrete ideas and response categories. This was true for black samples and white samples and for different questionnaire topics and lengths.—*Journal abstract.*

8396. Jones, Leon. (Howard U, School of Education) **A methodological approach to evaluation.** In R. W. Colvin & E. M. Zaffiro (Eds), *Preschool education: A*

*handbook for the training of early childhood educators.* New York, NY: Springer, 1974. xviii, 362 p. \$13.95.

8397. Kelly, Eugene W. (Old Dominion U) **Classroom discussions for personal growth and democratic problem-solving.** *Elementary School Journal*, 1974(Oct), Vol 75(1), 11-15.—Discusses bridging the psychosocial gap between the teacher and her pupils by the use of informal meetings of the pupils without the teacher. The school counselor presides over such meetings. Members of such a discussion group should arrange themselves in a complete circle to reduce the psychological distances among the members. These meetings should discuss problems pertinent to the school community and should never indulge in fault-finding or meting out punishment to an atypical member. Discussion of school problems could eventually include social problems, such as friendships with atypical members of the school.—*A. J. Ter Keurst.*

8398. Labon, Don. **Some effects of school-based therapy.** *AEP (Association of Educational Psychologists) Journal*, 1974(Spring), Vol 3(6), 28-34.—Describes a program in which emotionally disturbed children in English primary schools are being helped within their own schools by part-time withdrawal from their classes into small groups. The teachers engaging in this work attend monthly inservice training sessions conducted by educational psychologists. Some of the outcomes of this program are described, and potentialities and limitations of work with disturbed children in normal schools are discussed. (16 ref)—*I. L. Zimmerman.*

8399. McCarthy, Barry W.; Wasserman, Craig W. & Ferree, Elizabeth H. (American U, Counseling Ctr) **Growth and development of a university companion program.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 66-69.—Describes the development of an innovative peer counseling program in a university environment. The problems with which the peer counselors are most effective are identified, paraprofessional training is described, and the professional and paraprofessional roles are clarified. The wider effect of such a program on the university and the program participants is discussed.—*Journal abstract.*

8400. Mirante, Timothy J. & Ryckman, David B. (U Washington) **Classroom Behavior Inventory: Factor verification.** *Journal of Research in Personality*, 1974(Oct), Vol 8(3), 291-293.—3 factors of the 18-item inventory—Task-Oriented vs Distractibility, Extraversion vs Introversion, and Considerateness vs Hostility—loaded perfectly, according to the a priori structure of the instrument, on data from 2nd graders. Investigations of the reliability and objectivity of the scale are suggested.

8401. Mitchell, John & Allen, Harry. (U Miami) **Perception of a physically disabled counselor in a counseling session.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 70-73.—Conducted a counseling-analog study to determine whether an apparently physically disabled counselor compared with an able-bodied counselor would be perceived as exhibiting higher levels of 4 therapeutic ingredients. Ss were 189 undergraduates who were randomly divided into 2 groups. 1 group viewed a videotaped counseling session (role-played) with the counselor in a wheelchair. The



comparison group viewed the same counseling dyad except the counselor was seated in a chair. Both groups rated their respective counseling tape sessions on the Barrett-Leonard Relationship Inventory. The disabled counselor was rated significantly higher on all therapeutic variables compared with the same counselor when viewed as nondisabled. (21 ref)—*Journal abstract*.

8402. O'Rourke, Thomas W. & Conley, John A. (U Illinois) **Indices of evaluating course instruction.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 234-241.—Describes the Course Evaluation Questionnaire (CEQ) developed by the office of Instructional Resources at the University of Illinois. Designed as a tool for process evaluation, it is an attempt to measure such variables as instructor, textbook, homework, outside assignments, course content, method of instruction, and student interest. Extensive testing and revision produced a 50-item, later reduced to 25-item, multiple choice instrument administered to students of any given course to evaluate teacher-curriculum impact. The CEQ appears to fill the need for a test to measure relevancy, currency and justification, all topics of interest to both student and administration. It also furnishes the instructor with an aid for revision of course content, text, and methods of grading. The questionnaire is appended.—*A. de la Haba*.

8403. Ohlsen, Merle M. (U Illinois) **[Dissident students.]** (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 261-274.—Discusses present-day students and how to help them, primarily through the work of qualified counselors in group settings. (English summary) (19 ref)

8404. Palmer, Edward L. (Davidson Coll) **Frequency of tests and general subject-area mastery.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 422.—2 groups of college students who were tested on psychology-textbook material 6 or 3 times during a 10-wk course performed better on a final test of psychological knowledge than Ss who utilized the same textbook without periodic tests. Results suggest that regular assessment may be more important than the frequency of regular assessment.

8405. Pankove, Ethel. (Montgomery Township Schools, NJ) **Identification of the gifted.** *School Psychologist*, 1974(Apr), Vol 28(4), 8-11.—Argues that giftedness is multidimensional, hence, identification of gifted individuals requires the development of measures for each dimension. In addition to the use of standardized intelligence and achievement tests, direct observations are suggested: reports by peers, teachers, and parents on behavior, or samples of work done by the child (e.g., handicrafts, art work, maps). The use of standardized creativity tests is also discussed. Some of the characteristics of creative children may make them difficult for the teacher who prefers a quiet classroom. Socioeconomic status, ethnic or religious group membership, familial attitudes, and personality factors are all seen as important elements affecting the expression of giftedness. (16 ref)—*D. R. Evans*.

8406. Quattrocki, Carolyn G. **Recognizing creative potential in preschool children.** *Gifted Child Quarterly*, 1974(Sum), Vol 18(2), 74-80.—Identified "creative potential" in 1,101 preschool children using the Stark-

weather Originality Test, obtaining 60% agreement with predictions of preschool teachers.

8407. Rhoads, David J. **Student-made tests.** *UMJC: University of Maryland Counseling & Personnel Services Journal*, 1973-1974, Vol 4(1), 1-7.—Studied the effect of student participation in test construction on test scores using 2 groups of 68 graduate and undergraduate students, one of which constructed 62 multiple-choice items for a midterm examination and one group which did not. Ss who participated in constructing the test had significantly higher scores on it than Ss who did not construct it.

8408. Richards, James M. **A simulation study comparing procedures for assessing individual educational growth.** *Center for Social Organization of Schools Report, Johns Hopkins University*, 1974(Oct), No 182, 17 p.—Developed a computer simulation procedure to reproduce the overall pattern of results obtained in the Educational Testing Service growth study (1971). Simulated data for 7 sets of 10,000-15,000 cases were analyzed with several techniques for assessing growth, or change, and these techniques were compared on the basis of correlations between estimated and true growth scores. Growth was estimated most accurately by procedures that involved the difference between the pretest and the posttest, and all estimates that involve this difference had approximately equal correlations with true growth. The simple difference between pre- and posttest scores was as accurate as any other estimate, was easier to compute, and should be meaningful to nonresearchers. It is concluded that advocates of complex procedures should demonstrate practical, not just theoretical, advantages for their techniques before researchers should be expected to utilize them. (18 ref)—*Journal abstract*.

8409. Schilling, Karl. (U Florida) **The peer counseling program in the residence halls of the University of Florida.** *Journal of the American College Health Association*, 1974(Feb), Vol 22(3), 182-184.—Describes a 2-part peer counseling program consisting of paid resident assistants and student volunteers in a big-brother/big-sister system. Student resident assistants are selected from junior and senior applicants who demonstrate maturity and ability to relate to people. A 3-credit course in counseling skills, with emphasis on role playing, prepares them for the job of counselor-administrator-disciplinarian. Student volunteers are chosen by a faculty adviser and the resident assistant staff, chiefly to assist in orienting newcomers in the early weeks. The volunteer relinquishes his role of leader as student leaders emerge.—*A. de la Haba*.

8410. Sheverbush, Robert L. (U Illinois, Medical Ctr. Chicago) **An analysis of subtests performance by gifted students on the Stanford-Binet Intelligence Scale (1960 Form L-M).** *Gifted Child Quarterly*, 1974(Sum), Vol 18(2), 97-107.—Reports a cluster analysis of the Stanford-Binet (S-B) subscores (Lutwyche system), using 192 4th graders who had been found gifted compared with an equalized control group. Several tables show age level, socioeconomic status, median ceiling, etc., against S-B subscores.

8411. Stafford, Jerry. (Shippensburg State Coll) **Reading test review: Reflections on the Diagnostic**

**Reading Scales.** *Reading World*, 1974(Oct), Vol 14(1), 5-8.—Re-examines the Diagnostic Reading Scales, an individually administered battery containing tests of word recognition, oral reading, rate of reading, silent reading, reading potential, and 6 supplementary phonics tests. It is concluded that the instrument offers considerable potential in diagnosing a wide variety of reading skills and needs. A more detailed description of reliability and validity data is needed, however, as well as refined suggestions for recording oral reading behavior.—C. K. Miller.

8412. Sue, Derald W. & Kirk, Barbara A. (California State U, Hayward) **Asian-Americans: Use of counseling and psychiatric services on a college campus.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 84-86.—Studied 3,053 Asian-American and non-Asian students in the 1966 freshman class of a large state university over a 4-yr period to determine usage of mental health services. Asian-Americans underutilized the campus psychiatric service but significantly overutilized the counseling center. Possible reasons related to the Asian-Americans' subcultural values explain these findings. Nearly 50% of Chinese-American females utilized mental health services of some kind. This extremely high usage may be due to a domestic vs feminist conflict.—*Journal abstract*.

8413. Taylor, E. G. & Nuttall, D. L. **Question choice in examinations: An experiment in geography and science.** *Educational Research*, 1974(Feb), Vol 16(2), 143-150.—Investigated the difficulties experienced by examination candidates when faced with a choice of questions. 220 candidates from 12 schools were asked to continue working on examination papers in geography in a different colored ink after the examination to see how much more of the paper they could answer. 280 candidates from 15 schools taking physics examinations were asked to work on different questions, answering as many as possible, with virtually unlimited time. Results indicate that a sizable minority of candidates were unable to choose the questions where they could show to best advantage, and that candidates awarded lower grades experienced greater difficulty in selecting questions. Possible changes in the structure of examinations and in the instructions to candidates, based on these findings, are discussed.—J. B. Francis.

8414. Valine, Warren J. (Auburn U) **Focused feedback with video tape as an aid in counseling underachieving college freshmen.** *Small Group Behavior*, 1974(May), Vol 5(2), 131-143.—Studied the effects of video feedback in group counseling of underachieving college freshmen on grade point average (GPA). 3 groups received either counseling with immediate feedback (IF) via video tape, with delayed video feedback, or with no video feedback. A control group received no counseling. Groups did not significantly differ on pregroup-postgroup differences in GPA. The IF group decreased in intracception as measured by the Edwards Personal Preference Schedule. 64% of the Ss indicated that video feedback was helpful in the group discussion. (27 ref)—G. R. Breed.

8415. Voss, James F. (U Pittsburgh) **Acquisition and nonspecific transfer effects in prose learning as a function of question form.** *Journal of Educational*

*Psychology*, 1974(Oct), Vol 66(5), 736-740.—Studied acquisition and nonspecific transfer effects in prose learning by presenting a different 2,000-word prose passage to 30 undergraduates on each of 3 successive days, with each day consisting of 4 reading and testing trials. Testing employed either multiple-choice or completion questions. Performance failed to improve over passages, indicating an absence of nonspecific transfer effects. Performance on the latter trials tended to deteriorate as a function of passage in the multiple-choice condition. The percentage errors after the 1st correct response were also greater in the multiple-choice than in the completion condition. Findings provide no evidence that learning-to-learn effects exist with prose materials and suggest that repeated use of the multiple-choice test produces interference at the higher levels of learning.—*Journal abstract*.

8416. Wakefield, James A. et al. (U Houston) **The geometric relationship between Holland's personality typology and the Vocational Preference Inventory for blacks.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 58-60.—Administered Holland's Vocational Preference Inventory to 115 black undergraduates. The 1st 6 scales of the inventory were tested for correspondence to J. L. Holland's personality theory using a method recently presented by J. A. Wakefield and E. B. Doughtie (see PA, Vol 51:8049). The scales for the black Ss corresponded generally to Holland's model but not as well as they do for white Ss. 3 weaknesses in the correspondence between the scales of black students and Holland's model were identified. The Realistic and Intellectual scales were not as closely associated to Holland's model for blacks as for whites; the Social and Enterprising scales were not as closely associated; and the Conventional and Intellectual scales were not as closely associated as they are in Holland's model.—*Journal abstract*.

8417. Westbrook, Franklin D. (U Maryland) **High scales on the Strong Vocational Interest Blank and the Kuder Occupational Interest Survey using Holland's occupational codes.** *Journal of Counseling Psychology*, 1975(Jan), Vol 22(1), 24-27.—Compared the arrays of high-interest occupations produced by the Strong Vocational Interest Blank, T-399, and the Kuder Occupational Interest Survey (Form DD) when the instruments were administered to the same Ss (60 male college students). Holland-type summary codes were devised from the arrays of occupations and were analyzed by correlated  $t$  tests and Pearson  $r$  correlations. A frequency percentage count showed 85% of the pairs of summary codes had 2 identical characteristics, and some support was found for J. L. Holland's hexagon.—*Journal abstract*.

8418. Whitely, Susan E. & Dawls, René V. (U Kansas) **Effects of cognitive intervention on latent ability measured from analogy items.** *Journal of Educational Psychology*, 1974(Oct), Vol 66(5), 710-717.—Cognitive intervention may potentially be used to investigate both the cognitive processes underlying test performance and the possible incorporation of learning experiences into ability estimates. 184 inner-city high school students were randomly assigned to 1 of 5 experimental conditions or to the control group and were administered a test-intervention-retest sequence using verbal analogy



items. It was found that although latent ability estimates may be significantly increased by a short intervention, modifiability depends on the type of intervention. Furthermore, it was found that general types of relationships may effectively mediate analogy item solving. (21 ref)—*Journal abstract*.

8419. Wilson, Robert M. (U Maryland, Reading Ctr) **Comprehension diagnosis.** *Reading World*, 1974(Oct), Vol 14(1), 49-50.—Evidence suggests that a teacher's method of questioning may affect his assessment of a student's reading comprehension. There appears to be little justification for asking a child literal questions about what he has read without his having access to the passages. By reducing the memory burden, child and teacher are free to concentrate on other aspects of comprehension.

8420. Zimmerman, Robert R.; Wise, Larry & Smith, Olin W. (Central Michigan U) **Early detection of final performance in an introductory course in general psychology.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 620-622.—In a study with 164 undergraduates, it was found that final grades in an introductory psychology course correlated significantly with a test representative of course content and American College Test scores. Contrary to traditional predictions, the content specific test was not superior to the general abilities test in the prediction of final grades. Course content tests taken during the 1st 3 wks of the academic quarter correlated .85 with course content tests taken during the last 3 wks of the academic quarter. Results suggest that both general ability tests and specific content tests given early in the academic year could be used to assign students to course programs that might provide the special assistance some students require to cope with traditional large lecture college courses.—*Journal abstract*.

## APPLIED PSYCHOLOGY

8421. Blaiwes, Arthur S. (Naval Training Equipment Ctr, Orlando, FL) **Formats for presenting procedural instructions.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 683-686.—30 male undergraduates performed a mock communication controller's task under 3 different instructional formats (short sentences, logical tree, and coding). Accuracy did not differ as a function of instructional format for 3 easier types of problems. However, for 2 more difficult problem types, coding resulted in significantly more accuracy in 1 case, while coding and short sentences showed significantly greater accuracy in another. It is concluded that (a) format variations mainly influence difficult tasks, (b) logical-tree superiority appears to be related to the number of conditions at a choice point and/or retention conditions, and (c) coding can be a potent technique.—*Journal abstract*.

8422. Carroll, Stephen J. & Falthzik, Alfred M. (U Maryland) **Research note on some factors related to completion rates in surveys of employed persons.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 377-378.—80 salesmen were randomly assigned to 1 of 2 survey conditions. It was found that when the interviewer represented himself as from a local university a

significantly higher response rate was obtained than when he said he represented Marketing Facts, a fictitious firm.

8423. Cross, Stan & Renner, Edward. (Kansas State U) **An interaction analysis of police-black relations.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 54-61.—Analyzes person-to-person police-black interactions, excluding variations arising either from conflicting social roles or from the personalities of the participants. A person may or may not possess interactive skills for a situation, may or may not share a particular role definition for the situation, and the role for the individual may or may not be clear. All components are given a range of tolerable variation. The implications of an interaction model are discussed.—R. J. Albers.

8424. Donnelly, James H. & Etzel, Michael J. (U Kentucky) **Attempting to operationalize product newness: A reply to Ostlund and Tellefsen.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 761-763.—Responds to L. E. Ostlund and B. Tellefsen's (see PA, Vol 53:Issue 4) questions regarding some methodological procedures, including the operationalization of product newness, employed in a 1973 study by J. H. Donnelly et al. These questions are addressed in an attempt to clarify the procedures and conclusions of the Donnelly et al investigation.

8425. Feldman, Jack M. (U Florida) **Note on the utility of certainty weights in expectancy theory.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 727-730.—Tested the usefulness of "certainty of response" as a moderator variable in expectancy models in the context of M. Fishbein's 1967 construct of "attitude toward the act." The direct evaluation of 5 job-seeking behaviors by a racially and socioeconomically heterogeneous sample of 200 18-50 yr old men was predicted from 5 combinations of outcome evaluation, outcome expectancy, and response certainty. Contrary to the hypothesis, the simple sum of the evaluations of the outcomes of each behavior best predicted the directly measured evaluation. Results are discussed in terms of possible modifications of the expectancy model and the concept of uncertainty as reflected in subjective probability estimates.—*Journal abstract*.

8426. Gwynne, Jeffrey L. (Illinois Dept of Law Enforcement, Bureau of Identification, Joliet) **The specific concern test for the detection of deception.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 38-39.—Proposes a specific sequencing of irrelevant, relevant, and control questions in the polygraph procedure so that responses by Ss to relevant and control questions can be compared on a one-to-one basis.

8427. Harrell, Gilbert D. & Bennett, Peter D. (Michigan State U) **An evaluation of the expectancy value model of attitude measurement for physician prescribing behavior.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 269-278.—Presents data from research which used expectancy value and normative belief measures to predict physicians' drug brand preference and purchases. Group depth interviews, attitude measures, and data from a panel of prescribing physicians were employed to test M. Fishbein's beha-

vioral intentions model. Ss were internists and general practitioners whose attitudes and behavior in the treatment of diabetes mellitus were assessed. Results support the use of the Fishbein model in behavioral intention and attitude studies. The correlation between actual behavior and behavioral intention was only moderate (.40), although this can be explained by the specifics of the diabetes condition and methodological difficulties. Behavioral intention was a much stronger correlate of evaluative beliefs than it was of actual behavior. (29 ref)—*L. Gorsey.*

8428. Kuykendall, Jack L. (California State U, San Jose) **Styles of community policing.** *Criminology: An Interdisciplinary Journal*, 1974(Aug), Vol 12(2), 229-240. —Discusses 4 policing styles as they reflect the reactive-proactive emphasis given to various combinations of positive and negative methods and counselor and enforcer roles.

8429. Levin, Irwin P. (U Iowa) **Averaging processes in ratings and choices based on numerical information.** *Memory & Cognition*, 1974(Oct), Vol 2(4), 786-790. —A total of 87 university students were presented sets of numbers said to represent sample price information from grocery stores. Ss rated the relative desirability of shopping at each of a series of stores and were also asked to make paired-comparison preference choices. In Exp I some sets contained favorable information, some contained unfavorable information, and some contained neutral information added to the favorable or unfavorable information. The addition of neutral information led to a decrease in the polarity of responses. This is consistent with an averaging, but not an adding, formulation of how the information was integrated. In Exp II sets of favorable or unfavorable information varied in size, and a set-size effect was obtained. The greater the amount of favorable or unfavorable information, the more extreme the response. This is accounted for by assuming that an initial neutral expectancy was averaged with the information presented.—*Journal abstract.*

8430. Lidz, Charles W. (Yale U) **The cop-addict game: A model of police-suspect interaction.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 2-10. —Accompanied vice squad policemen, as an observer, to study their interactions with suspected criminals. These interactions are seen as a "game model" which is in contrast with the "professional model" of police as guardians of the social order. A game model assumes that competition, rules, and fairness prescribe behavioral interactions. It is concluded that the focus should be on lessening tensions between police and alleged criminals by strengthening patterns in the relationship that support peaceful and fair relations between the 2 sides.—*R. J. Albers.*

8431. Litten, Gary L. (Massachusetts Inst of Technology) **Application of a modified linear learning model of buyer behavior.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 279-285. —Examined the performance of a stochastic model of individual buyer behavior compared with data from gasoline diaries kept by 1,074 families. Statistical data are presented to illustrate use of the model for pricing decision making under a set of

assumptions about competitive behavior in a market situation.

8432. Lundman, Richard J. (U Delaware) **Domestic police-citizen encounters.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 22-27. —Conducted a 15-mo study, using 7 participant-Os, to investigate the nature, frequency, and social processes of domestic (husband-and-wife) police-citizen encounters. Os recorded and analyzed 1,978 police calls involving verbal or nonverbal interaction with citizens. Using a new definition of "domestics," noncriminal encounters of this type constituted only 77 (4%) of all encounters recorded. In these 77, communicative acts of officers and citizens were essentially polite and nonviolent. (30 ref)—*R. J. Albers.*

8433. McFarland, Barry P. **Potential uses of occupational analysis data by Air Force management engineering teams.** *US AFHRL Technical Report*, 1974(Jul), No 74-54, 11 p. —Identified and evaluated areas in which US Air Force management engineering teams (MET) might benefit from occupational research data. Occupational research data were provided as a supplemental input to the development of MET engineered manpower standards for base-level data automation. The analysis revealed that the techniques used by MET and occupational analysis yielded essentially the same information. A number of areas were identified in which occupational research data and techniques could be beneficially employed by MET.—*Journal abstract.*

8434. Mitchell, Terence R. (U Washington) **Expectancy models of job satisfaction, occupational preference and effort: A theoretical, methodological, and empirical appraisal.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1053-1077. —The development and refinement of expectancy theory is described, and empirical support for the valence and effort models is reviewed. Findings indicate more support for the former model than the latter one. A number of methodological, empirical, and theoretical issues are raised and discussed. It is stressed that conceptualizations and applications of the theory have been poorly designed. A variety of remedies are suggested. (78 ref)—*Journal abstract.*

8435. Nevin, John R. (U Wisconsin, Graduate School of Business, Madison) **Laboratory experiments for estimating consumer demand: A validation study.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 261-268. —Assessed the extent to which the simulated shopping and paired-preference laboratory experiments commonly used in marketing research generate externally valid estimates of consumer reactions to price changes in the market place, and whether the product class under study affects the external validity of laboratory-generated demand estimates. 3 experiments—a sales area experiment, a simulated shopping experiment, and a paired-preference experiment—were conducted with consumers from 2 small midwestern cities whose purchases of various drinks at different prices were assessed. Findings show that both simulated shopping and paired-preference studies generated reasonably valid estimates of consumers' reactions to real-life price changes for brands of cola, and relatively invalid estimates for coffee. There was a tendency for laboratory estimates, particularly for coffee, to overstate the actual effects of price



changes and to become less valid as the size of the price change increased. Results are discussed in terms of consumer awareness of prices of different product classes.—*L. Gorsey.*

8436. Norman, Kent L. & Louviere, Jordan J. (U Alabama) **Integration of attributes in bus transportation: Two modeling approaches.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 753-758.—Studied judged probability of riding hypothetical bus systems as a function of fare, frequency of service, and walking distance to the bus stop. The judgment process of 20 undergraduates was modeled by 2 different approaches. A policy-capturing approach using regression analysis indicated that a linear model accounted for the data adequately. However, a polynomial model incorporating both linear and multiplicative components in the judgment policy provided a better fit. A method of scaling known as functional measurement served to reject the linear model and confirmed that a multiplying model was correct. Functional measurement provided subjective scales for fare, frequency of service, and proximity to the bus stop.—*Journal abstract.*

8437. Ostlund, Lyman E. & Tellefsen, Brynulf. (U Pennsylvania) **Relationship between consumers' category width and trial of new products: A reappraisal.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 759-760.—An earlier study conducted in 1973 by J. H. Donnelly et al (see PA, Vol 51:1939) concluded that an individual's breadth of categorization was related to his purchase of new products. Questions are raised about how the products studied were selected, choice of Ss, and the measure of association used. It is argued that the original conclusion is weakly supported.—*Journal abstract.*

8438. Potter, Norman R. & Dieterly, Duncan L. (Systems Research Lab, Dayton, OH) **Methods for predicting and assessing the impact of technology on human resource parameters: Report of the literature.** *US AFHRL Technical Report*, 1974(Aug), No 74-71, 49 p.—Reviews the literature to establish the current status of the methodology for forecasting and assessing technology and for quantizing human resource parameters with respect to the impact of incoming technologies. References are included which describe current methodologies in detail and which better satisfy the objectives of the research effort. The review fails to provide solution to the problem of quantizing human resource parameters, but the use of a normative forecasting technique is strongly supported. A relevance-tree approach is the technique viewed as amenable to the problem of successive identification of increasingly finer components in an organized, structured manner. The procedure, known as a Design Option Decision Tree, is practical for detailing a system to a level permitting the identification and assessment of human resource components for impact quantification. Expanded summaries of 17 studies are included. (6 p ref)—*Journal abstract.*

8439. Rothkopf, Ernst Z. & Coatney, Richard P. (Bell Lab, Murry Hill, NJ) **Effects of readability of context passages on subsequent inspection rates.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 679-682.—In 2 experiments 92 undergraduates studied a 1,200-word (19-paragraph) passage prepared in a standard (Flesch

Reading Ease, RE = 51) and a difficult (RE = 20) version. 46 Ss switched after the 1st 19 paragraphs from the standard to the difficult version or vice versa. The remainder saw all 19 paragraphs in the same (standard or difficult) form. Inspection rates depended not only on the readability of currently inspected text but also on the readability of recently inspected text segments. The last 9 paragraphs in standard form were inspected more slowly if the 1st 10 paragraphs were difficult than if the passage had been in the standard version throughout. Smaller context effects on inspection rate were observed when Ss were switched from standard to difficult material.—*Journal abstract.*

8440. Saccuzzo, Dennis P.; Higgins, Gwendolyn & Lewandowski, Denis. (Middle Tennessee State U, Ctr for the Study of Crime, Law Enforcement & Corrections) **Program for psychological assessment of law enforcement officers: Initial evaluation.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 651-654.—For the initial evaluation of Tennessee's Law Enforcement Candidate Assessment Program, 104 metropolitan and 92 nonmetropolitan candidates for police certification were studied and compared with respect to their scores on the MMPI, Kuder Preference Record—Vocational (Form CH), and Otis-Lennon Mental Ability Test (Form J). The mean profiles for each group individually, as well as the profiles for the groups combined, were calculated. Results show that the nonmetropolitan applicants were older and had lower IQ scores than the metropolitan group. Both groups approached the MMPI in a "faking good" manner. These profiles, nevertheless, were relatively flat and hovered around the mean. In terms of interests, both groups showed peaks in the social service area with the metropolitan sample scoring somewhat higher than the nonmetropolitan group, who also showed a strong interest in outdoor activities. Their other interests appeared to be approximately equal. Although caution is suggested in interpreting the results, the data indicate that, if psychopathology is present in police officers, it will most commonly be manifest as a character disorder as described by the 4-9 or 4-3 MMPI profile code type.—*Journal abstract.*

8441. Weeks, Gerald D.; Kelly, Michael J. & Chapanis, Alphonse. (Johns Hopkins U) **Studies in interactive communication: V. Cooperative problem solving by skilled and unskilled typists in a teletypewriter mode.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 665-674.—2-person teams of 8 skilled and unskilled typists each (female high school students) cooperated to solve credible, real-world problems by communicating through interconnected typewriters or, as a control, by conversing face-to-face. Performance was assessed by (a) the time taken to solve a problem, (b) measures of behavioral activity, and (c) several measures of verbal output. All 3 criteria showed large differences between face-to-face conversation and communication via typewriter. There were, however, no differences between the 2 groups of typists on any criteria even when they communicated by typewriter, in part because  $\frac{1}{4}$  or less of the total time was spent typing, and in part because Ss composed their own messages. Findings have implications for the use of keyboard terminals in

telecommunications and interactive computer system.  
—*Journal abstract.*

### Occupational Guidance & Personnel Selection & Training

8442. Abe, J. (U Tohoku, Japan) [Urban-rural differences in counseling of adolescents in present-day Japan.] (Span) *Revista de Psicología General y Aplicada*, 1974(May-Jun), Vol 29(128), 583-591.—Presents information regarding vocational choices of about 1,000 Japanese adolescents. Choice reflects the historical social structure of the family and the community and is a way of maintaining the life space of the individual. (English summary)
8443. Akman, Allan; Nordhauser, Fred & Roach, James F. (System Automation Corp, Silver Spring, MD) A technical description of the Officer Procurement Model (TOPOPS). *US AFHRL Technical Report*, 1974(Jul), No 73-76, 50 p.—Presents a comprehensive mathematical formulation of the aggregate-level, computer-based model of the US Air Force system, TOPOPS (Total Objective Plan for the Officer Procurement System). It is designed to simulate officer accession and training and achieve optimal solutions in terms of either cost minimization or accession quality maximization over a 5-yr procurement period. The technical description specifies the objective functions and constraints in symbolic terms. A hypothetical sample problem for minimizing cost is presented, and the results are discussed. The problem is also subjected to sensitivity analysis which examines the impact of various policies on cost and accession quality. The computer-generated reports are included in an appendix.—*Journal abstract.*
8444. Asgill, M. G. & Taudevin, L. R. (Dept of the Public Service Board, Psychological Services Branch, Papua New Guinea) Vocational interests and aptitude measures as predictors of success of R105 drivers. *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 30-33.—Reports on the predictive validity of vocational interest tests in a sample of dump truck driver trainees in Papua New Guinea. Results suggest that vocational interest tests should be added to the aptitude test battery.
8445. Atwater, David C.; Alf, Edward F. & Abrahams, Norman M. (US Navy Personnel Research & Development Ctr, San Diego, CA) The unobtrusive measurement of racial bias among recruit classification specialists. *US Navy Personnel Research & Development Center Technical Report*, 1974(Oct), No 75-6, 47 p.—Investigated whether there are significant differences between black and white classification interviewers in their treatment of black and white US Navy recruits. The nature of the classification procedure resulted in the essentially random assignment of 2,413 black and 15,339 white recruits to 8 black and 38 white classifiers. This procedure obviated numerous problems inherent in racial bias studies. The major hypothesis that black and white classifiers would be differentially biased in their treatment of black and white recruits was not supported. A 2nd hypothesis that classifiers within either racial group would be differentially biased in their treatment of black and white recruits was also not supported. Sample sizes were so large that classifier bias accounting for as little as 1% of the criterion would have been detected as significant. Thus, there was neither statistically nor practically significant bias detected among classification specialists.—*Journal abstract.*
8446. Barocas, Harvey A. (Bernard M. Baruch Coll, City U New York) Iatrogenic and preventive intervention in police-family crisis situations. *International Journal of Social Psychiatry*, 1974(Spr-Sum), Vol 20(1-2), 113-121.—An iatrogenic ailment is one unintentionally caused by a physician in his attempts to heal. Similarly, police may cause iatrogenic disturbances in their attempts to bring order. Elements of crises and police roles which may aggravate crises are discussed. A police training model is presented.
8447. Bennett, M. (U Hong Kong) Interest patterns, work expectancy and occupational opportunities in two South Pacific cultures. *New Guinea Psychologist*, 1974(Apr), Vol 6(1), 25-29.—Compared scores on the Pacific Vocational Interest Analysis (PVIA) of Melanesian high school students in Fiji ( $n = 170$ ) and in New Hebrides ( $n = 119$ ). Significant differences ( $p < .01$ ) appeared on 5 of the 8 PVIA scales between the groups as a whole and in within-sex comparisons. New Hebrides students' scores indicate less occupational sophistication and lower expectations. Interests in both groups seem negatively related to existing opportunities in their respective areas. Applications for vocational counseling in developing nations are discussed.—C. Wright.
8448. Buzzotta, V. R.; Lefton, Robert E.; Karraker, Dean & Sherberg, Mannie. A pragmatic approach to sales training. *Training & Development Journal*, 1974(Nov), Vol 28(11), 34-42.—Advocates a systematic 10-step approach to sales training as a program that gets results. Abstract concepts are avoided, and role playing provides practice in actually carrying out recommended techniques. After faults are diagnosed, prescriptions for cures are given, always with attention to practical procedures that can be carried over from training to specific sales contacts. Continuous follow-up research is done to make sure the training is producing worthwhile sales results.—R. L. Sulzer.
8449. Cobb, B. B. & Nelson, P. L. (FAA Civil Aeromedical Inst, Aviation Psychology Lab, Oklahoma City, OK) Aircraft-pilot and other pre-employment experience as factors in the selection of air traffic controller trainees. *FAA Office of Aviation Medicine Report*, 1974(Sep), No 74-8, 35 p.—4,092 Federal Aviation Agency (FAA) air traffic control (ATC) trainees (1,740 hired during 1960-1963; 2,352 hired during 1969) were followed up to determine those still in ATC work as of January 1, 1973. Retention in ATC work was more closely related to entry age than to aptitude levels, educational levels, or type of aviation-related experience prior to training. Ss with previous pilot experience had lower retention rates than did Ss with no aviation-related experience. Findings suggest that only previous ATC work should receive credit points in eligibility ratings for hiring ATC trainees. For en route and terminal FAA options, previous ATC experience involving instrument flight rules was a more valid predictor of retention than previous experience involving only visual flight rules.—W. E. Collins.
8450. Eddowes, Edward E. A cognitive model of what is learned during flying training. *US AFHRL Technical*



*Report*, 1974(Jul), No 74-63, 9 p.—Presents a model which relates the growth of pilot ability to the student's increasingly refined cognitive discriminations about his flying performances made possible by his improved familiarity with the phenomena of flight gained while practicing aircraft control tasks. As the student pilot becomes familiar with his flying tasks, he anticipates his control requirements. Consequently, his performance improves. This leads to better error discriminations, increased aircraft control effectiveness, and more familiarity with the phenomena of flying, which is in turn followed by another incremental cycle. This interpretation views the acquisition of flying skill as a spiral-type expanding cognitive process rather than as a linear-type perceptual motor skill refinement process.—*Journal abstract*.

8451. Frenzel, Gunnel; Lilieblad, Bertil; Sköld, Per & Stahlberg, Berit. [Investigations concerning the enlistment of conscripts.] (Swed) *MPI B-Rapport*, 1974(Jun), No 102, 46 p.—Presents discussions of 7 experiments on the reliability of psychological judgments of Swedish enlisted personnel, the judgment of soldier eligibility and commanding officer eligibility, the activity of the unit psychologist in interviewing personnel and designing educational programs, the development of tests of mechanical and technical knowledge of military personnel and the assessment of the validity and reliability of these tests, and the development of a revised "Enlistment" test for all entering personnel.—*English abstract*.

8452. Frieling, E.; Kannheiser, W. & Lindberg, R. (U Augsburg, W Germany) **Some results with the German form of the Position Analysis Questionnaire (PAQ).** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 741-747.—Describes the development of a German form of the Position Analysis Questionnaire (PAQ) to serve as a structured job analysis procedure. In Phase 1, independent translations of the PAQ, made by 3 groups of psychologists, were incorporated into the PAQ Bd (the German edition). 30 trained graduate students analyzed 61 positions with the PAQ Bd. Average interrater reliability was .79; average reliability of the individual job elements was .65. In Phase 2, 70 industrial psychologists rated the importance of 59 attributes, modified to include better definitions, for each of the 205 job elements. Satisfactory levels of reliability were achieved. It seems possible to construct profiles of job requirements for positions on the basis of the PAQ Bd analyses of jobs in combination with the attribute profiles of the individual elements. (16 ref)—*Journal abstract*.

8453. Gottfredson, Gary D.; Holland, John L. & Gottfredson, Linda S. (Johns Hopkins U) **The relation of vocational aspirations and assessments to employment reality.** *Center for Social Organization of Schools Report*, Johns Hopkins U, 1974(Sep), No 181, 11 p.—Used a typology to organize 1970 US Census data University kinds of employment, survey data about people's aspirations, and the results of vocational assessments made with and without norms for men and women at 2 educational levels—some high school or above and some college or above. Results indicate that kinds of employment differed greatly for different educational levels and between the sexes. The distribution of people's aspira-

tions resembled the distribution of actual employment with some notable exceptions. Findings demonstrate that the use of sex-based interest inventory norms is unrealistic because they create distributions that diverge greatly from the distribution of actual employment. Implications of the congruence between kinds of people and their employment are discussed for vocational guidance, test development, and career development research and theory. (16 ref)—*Journal abstract*.

8454. Henry, Peter H. & Engelken, Edward J. **A laser-generated visual display and tracking task for a link GAT-1 flight trainer.** *USAF School of Aerospace Medicine Technical Report*, 1974(Sep), No 74-36, 28 p.—Details the electronics and hardware of a prototype test system that permits assessment of a pilot's ability to track a target which moves about 3 separate axes: vertically (altitude), laterally, and in depth (range). A low-cost laser-generated visual display and rear projection screen is used to create the visual tracking task which is crudely akin to aerial refueling or formation flying. Performance is assessed on-line in terms of integrated absolute tracking error and time on target, by using a bench-top analog computer and simple hardware. A 14-channel analog tape recorder collects the data necessary for subsequent human operator analysis.—*Journal abstract*.

8455. Jepson, David A. & Dilley, Josiah S. (U Iowa) **Vocational decision-making models: A review and comparative analysis.** *Review of Educational Research*, 1974(Sum), Vol 44(3), 331-349.—Notes that vocational decision-making (VDM) models are similar in many ways to decision theory and to each other, but are not interchangeable. These models are applicable to different types of decisions, and vary substantially in their assumptions about the decision maker and the conditions under which the decision is made. No evaluative conclusions have been reached, but research has isolated some fundamental issues which future theorists and researchers should confront. (2½ p ref)—*P. D. Leedy*.

8456. Karp, Harvey B. (Old Dominion U, School of Business Administration) **What's going on? Training & Development Journal**, 1974(Nov), Vol 28(11), 46-50.—Derives from Gestalt concepts another approach to training salespeople. Besides knowledge of the product, success depends on making and maintaining contact with the prospect, on working with resistance rather than overcoming it, and on flexibility, or constant awareness of what's going on in the sales situation.

8457. Lewis, William E. et al. (McDonnell Douglas Corp, St Louis, MO) **Precision measuring equipment (PME) individualized instruction.** *US AFHRL Technical Report*, 1974(Aug), No 74-46, 62 p.—Describes the development, administration, and evaluation of self-paced programmed and audio-visual (AV) instructional materials to assess the feasibility of individualizing the PME course as part of the US Air Force Advanced Instructional System (AIS). The materials for a 90-hr block of instruction included printed and AV media and covered complex cognitive and performance skills. The 35 trainees achieved 99% of the performance objectives on the 1st attempt. Trainee attitudes toward the materials and system as measured by an attitude scale were positive. Reduction in training time coupled with trainee achievement supports the feasibility of individu-

alizing the PME course as part of the AIS. Projected cost savings for 1,025 students argue strongly for the cost-effectiveness of individualizing the entire PME course and other similar technical training courses.—*Journal abstract*.

8458. Mandia, Richard J. (Betz Lab, Treve, PA) **Sales training: As simple as P-A-C.** *Training & Development Journal*, 1974(Nov), Vol 28(11), 15-20.—The Parent-Adult-Child concept of personality in transactional analysis provides a frame of reference for training in the skillful handling of people. A 3-5 day continuous session starting with a personality inventory questionnaire and stressing personality theory has proven to be a practical training program.

8459. Meyer, Robert P.; Laveson, Jack L.; Weissman, Neal S.; Eddowes, Edward E. (Design Plus, St Louis, MO) **Behavioral taxonomy of undergraduate pilot training tasks and skills: Surface task analysis, taxonomy structure, classification rules and validation plan.** *US AFHRL Technical Report*, 1974(Jul), No 74-33(2), 102 p.—Assimilates and directs taxonomic theory toward a practical application in flying training research. A surface task analysis is developed on the basis of a breakdown of task elements according to the cue, mental action, and motor action involved. The tasks analyzed fall into 3 categories: fundamental and composite transitions and continuous transactions. A cubic taxonomic structure is developed with cue and mental and motor action dimensions, and a set of classification rules are provided for locating any flying training task in a specific "pigeon hole" within the taxonomic structure. A procedure for evaluating the validity of the system is established for use during the 2nd phase of this ongoing study. A glossary, an appendix of surface task analyses, and an annotated bibliography of 35 studies on taxonomy development and applications related to flying tasks are included. (15 ref)—*Journal abstract*.

8460. Neumann, Idell & Abrahams, Norman M. **Identification of Naval Academy applicants with engineering and science interests.** *US Navy Personnel Research & Development Center Technical Report*, 1974(Oct), No 75-7, 20 p.—Used the Strong Vocational Interest Blank (SVIB) to identify individuals more likely to select an engineering or science program at the US Naval Academy. A dichotomous criterion based on midshipmen major selections (i.e., engineering-science vs other majors) was used to construct a scale using SVIB responses of half the 1973 graduating class ( $N = 435$ ). The scale was cross-validated on the remaining 1973 graduates, as well as the 1976 ( $N = 1,141$ ) and 1977 ( $N = 1,220$ ) classes. The 1976 class was also used to study the relationship between the scale and disenrollment at the academy. Test-retest reliability was assessed using a subgroup of the 1977 class who completed the SVIB under selection and experimental conditions. Cross-validated biserial correlations of .57, .62, and .63 were obtained for the 1973, 1976, and 1977 classes, indicating a high degree of statistical and practical significance for the scale for differentiating between Ss selecting engineering-science rather than another major. Test-retest correlations of .80 and .81 for 2 subgroups of Ss were obtained. A linear progression between scale

scores and disenrollment rates for the 1976 class was observed.—*Journal abstract*.

8461. Pina, Manel. **The assignment of airmen by solving the transportation problem.** *US AFHRL Technical Report*, 1974(Jul), No 74-58, 10 p.—Discusses 2 techniques to help US Air Force managers understand some of the many optimization methods available—one which directly optimizes payoff values and one which indirectly optimizes payoff values. The policy of fill and the policy of fit are described. It is suggested that these techniques for solving the transportation problem will give the Air Force manager insight into at least 2 assignment policies and will pose questions which must be considered in trying to optimize assignment of Basic Military Training graduates to their Air Force Specialty Code.—*Journal abstract*.

8462. Super, Donald E. (Teachers Coll, Columbia U) **[Psychic determinants of professional choice.]** (Span) *Revista de Psicología General y Aplicada*, 1974(May-Jun), Vol 29(128), 563-582.—Vocational choice is not an event but a developmental process. Determinant factors are economic, social, and psychological. Psychological determinants include intelligence, aptitudes, interests, values, and self-concept. (English summary) (32 ref)

8463. Triandis, Harry C.; Feldman, Jack M.; Weldon, David E. & Harvey, William M. (U Illinois, Urbana-Champaign) **Designing preemployment training for the hard to employ: A cross-cultural psychological approach.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 687-693.—A review of reports concerning the effects of training of the hard-to-employ suggest that the training is ineffective. One major factor responsible for the lack of success may be the neglect of cultural variables. A theoretical framework is presented which helps in the design of training programs that take cultural variables into account. (69 ref)—*Journal abstract*.

8464. Wiener, Yoash & Schneiderman, Mark L. (Case Western Reserve U) **Use of job information as a criterion in employment decisions of interviewers.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 699-704.—Conducted 2 factorially designed experiments to investigate the extent to which job information was used by interviewers as a criterion for their decisions. In Exp I 48 experienced and 48 unexperienced job interviewers received identical job information. Applicant information was either relevant or irrelevant to the job information. Ss' judgments were based on composites of relevant and irrelevant information segments. Each of the segments was either favorable or unfavorable. Exp II replicated Exp I, except that the 48 Ss did not receive job information. Findings indicate extensive use of job information. Availability of such information reduced the effect of irrelevant attributes on decisions but did not eliminate it. Use of job information was not enhanced by experience in interviewing.—*Journal abstract*.

8465. Woodruff, Robert R.; Smith, James F. & Morris, Robert A. **Use of the T-4G simulator in USAF undergraduate pilot training (UPT), Phase I.** *US AFHRL Technical Report*, 1974(Jul), No 74-61, 38 p.—Evaluated a T-37 flight training simulator with limited visual and motion capability to determine the extent to



which its technology could be used to substitute for flying hours in the UPT T-37 syllabus. A special syllabus maximizing the simulator's capabilities was used. The 1st phase in which 6 UPT students were trained in the program by 8 experienced instructors is described. The students completed contact training in 23.4 flying hrs (a savings of 3.8 hrs), and they completed instrument training in 9.7 flying hrs (a savings of 11.1 hrs).—*Journal abstract*.

### Job Performance & Satisfaction

8466. Balch, David E. (State of California Dept of Justice Commission on Peace Officer Standards & Training, Los Angeles) **Performance rating systems: Suggestions for the police.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 40-49.—Describes 7 performance rating systems and the errors that can arise in using them. Based on studies by the US Army and Navy of the effectiveness of various systems, the "paired-choice" or "forced choice" system was selected for testing in 3 police departments of different size, location, and organization. Officers were ranked both by their supervisors and their peers, and in each of the 3 departments the 2 rankings were almost identical. Results thus indicate that the paired-choice system can correctly identify the officers who are doing the best job.—R. J. Albers.

8467. Baty, D. L.; Wempe, T. E. & Huff, E. M. (NASA, Ames Research Ctr, Man-Machine Integration Branch, Moffett Field, CA) **A study on aircraft map display location and orientation.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Nov), Vol 4(6), 560-568.—6 airline pilots participated in a fixed-base simulator study to determine the effects of 2 horizontal situation display panel locations relative to the vertical situation display and of 3 map orientations on manual piloting performance. Significant performance differences were found between wind conditions and among pilots but none between map locations and orientations, illustrating the potential tracking accuracy of such a display.

8468. Blunt, Peter. (U Natal, Durban, South Africa) **Cultural and situational determinants of job satisfaction amongst management in South Africa: A research note.** *Journal of Management Studies*, 1973(May), Vol 10(2), 133-140.—Compared managerial attitudes in South Africa with those in several countries in other parts in the world. English-speaking middle managers in 13 small to medium-sized South African companies (60-3,000 employees) answered a questionnaire (response rate 71%) regarding 16 items relevant to 5 need categories. These managers were more dissatisfied in almost every need category than managers in other countries, except that in France and Italy there was more dissatisfaction with social needs. In developing countries (e.g., Argentina, Chile, and India) managers seemed to be more dissatisfied in all needs except the important category of self-actualization. Possible reasons for this difference are discussed. It is suggested that this dissatisfaction among South African managers with respect to self-actualization arises from political and social factors in South Africa.—R. S. Albin.

8469. Chernik, Doris A. & Phelan, Joseph G. (California State U, Los Angeles) **Attitudes of women in management: I. Job satisfaction: A study of perceived need satisfaction as a function of job level.** *International Journal of Social Psychiatry*, 1974(Spring-Summer), Vol 20(1-2), 94-98.—662 bank employees responded to a mail survey of job satisfaction based on A. Maslow's need hierarchy, indicating their sex, education, job level, and salary. Amount of need satisfaction was positively related to occupational level and negatively related to hierarchical level of the need. Male ratings of the importance of each need were positively related to hierarchical level of the need. Females, however, rated security as their most important need, although it is low on Maslow's hierarchy. Results confirm earlier findings and extend the generality of earlier studies by including non-managerial-level Ss.—W. R. Street.

8470. Churchill, Gilbert A.; Ford, Neil M. & Walker, Orville C. (U Wisconsin, Madison) **Measuring the job satisfaction of industrial salesmen.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 254-260.—Describes a job satisfaction measure specifically designed for industrial salesmen. Norms, a detailed description of the methodology used, and suggested techniques for evaluating the measure's factor structure, reliability, and construct validity are presented. The questionnaire assesses various job components, including the job itself, fellow workers, supervision, company policy and support, pay, promotion, and customers. Data from several samples of salesmen support the reliability of the measure, although validity measures are considered somewhat equivocal. (17 ref)—L. Gorsev.

8471. Fisher, Allan H. & Rigg, Leslie S. (Human Resources Research Organization, Alexandria, VA) **Career potential of enrollees in PLC, ROC and AVROC: A comparison of surveys conducted in May 1972 and May 1973.** Alexandria, VA: Air Force Human Resources Lab, Manpower Development Branch, MR 74-5, 1973. 60 p.—Reports that from 30 to 40% of the enrollees in the Navy Reserve Officers Candidate program, the Aviation Reserve Officers Candidate program, and The Marine Corps Platoon Leaders Class program indicated intent to pursue a military career, regardless of financial benefits. Reasons given for entering the programs were similar for both years of the survey.

8472. Garza, Andrew T. & Carpenter, James B. **Comparative job attributes of airmen and civil service personnel having similar job types.** *US AFHRL Technical Report*, 1974(May), No 74-45, 15 p.—Compared US military and civil service personnel ( $n = 998$  in each group) having similar job types and from comparable accounting and finance career ladders. Data reveal distinct differences between the 2 populations, with the magnitude of the differences being highly variable as functions of specific job types considered. Generally, civilians performed a larger number of tasks; the tasks and overall jobs they perform were more difficult; they found their jobs more interesting; and they felt that their jobs made greater use of their talents and training. In view of these differences in attributes and the potentially higher cost of military personnel, conversion of certain military positions to civilian positions to meet operational needs appears feasible. Unique attributes of

civilian and military personnel point out the necessity for further research into their causes and consequent effects in such areas as promotion, skill upgrading, center progression, worker attitudes, and retention.—*Journal abstract.*

8473. Gilson, Richard D. & Fenton, Robert E. (Ohio State U) **Kinesthetic-tactual information presentations: Inflight studies.** *IEEE Transactions on Systems, Man, & Cybernetics*, 1974(Nov), Vol 4(6), 531-535.—Compared the efficacy of a kinesthetic-tactual compensatory display with 2 types of visual displays in a highly structured approach and landing task and a less structured task involving tight turns about a point. Results show that a 55% reduction in tracking error was obtained using the tactual display along with decreased maximum altitude variations and decreased speed variations. It appears that such a display offers considerable potential for inflight use.

8474. Hamner, W. Clay; Kim, Jay S.; Baird, Lloyd & Bigoness, William J. (Michigan State U) **Race and sex as determinants of ratings by potential employers in a simulated work-sampling task.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 705-711.—Examined the way the sex and race of the rater and the sex and race of the ratee influence assessments of ratee performance on a simulated work-sampling task. 36 undergraduates assumed the role of a manager and rated all 8 combinations of male-female and black-white performers. Results indicate that sex-race stereotypes do influence assessments of behavior on a work-sampling task even when objective measures are defined. Findings are discussed in terms of potential methods of overcoming these biases to use more effectively the work samples for selection and promotion decisions are discussed. (25 ref)—*Journal abstract.*

8475. Ivancevich, John M. (U Houston) **Effects of the shorter workweek on selected satisfaction and performance measures.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 717-721.—Studied effects of the 4-day, 40-hr workweek by comparing 104 experimental and 106 control Ss (members of the steelworkers' union) on measures of job satisfaction, anxiety-stress, and performance over a 13-mo period. The analysis indicated that the workers in the 4-day, 40-hr division were more satisfied with personal worth, social affiliation, job security, and pay; experienced less anxiety-stress; and performed better with regard to productivity than their control group (5-day, 40-hr) counterparts. (15 ref)—*Journal abstract.*

8476. Kloosterhuis-Duinker, M. (Rijks Geneeskundige Dienst te 's-Gravenhage, Netherlands) **[Ability to assume tasks and the relationship to age of retirement.]** (Duth) *Mens en Onderneming*, 1974(Mar-Apr), Vol 28(2), 100-114.—Examined the opinions of 725 staff officials from 3 government departments as to their health and their desire for retirement before the age of 65. The Ss who felt sickly, overburdened by their tasks, and desirous of earlier retirement were, in decreasing order of percentages, females between 60 and 64, females between 55 and 59, and males between 60 and 64.

8477. Knowles, Lyle & DeLadurantey, Joseph C. (Pepperdine U) **Performance evaluation.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1),

28-33.—Considers the problem of assessing the performance of law enforcement agents. The objectives of evaluation are discussed. 3 basic evaluation systems are described: (a) the graphic rating scale, (b) the checklist system, and (c) the narrative or open-end form system. Several other methods are also presented. Problems and possible errors in rating systems are summarized. Police agencies tend to evaluate employees on the basis of personality and behavioral rating scales. Suggestions are made for improved evaluation of performance.—R. J. Albers.

8478. Mathews, J. J.; Collins, W. E. & Cobb, B. B. (FAA Civil Aeromedical Inst, Aviation Psychology Lab, Oklahoma City, OK) **Job-related attitudes of non-journeyman FAA air traffic controllers and former controllers: A sex comparison.** *FAA Office of Aviation Medicine Report*, 1974(Aug), No 74-7, 22 p.—Sent questionnaires to 2 groups of men and women who had all entered training with Air Traffic Control (ATC) at the same time. Group 1 (attritions) had left ATC. Group 2 (retentions) were still in ATC work 2 or more yrs later. The questionnaire return rate was 87%. A major section consisted of 107 agree-disagree items related to job attitudes. Over 93% of Ss agreed that ATC work, a predominantly (97%) male occupation, was challenging, respected, and useful. More women than men (88% vs 66%) indicated that entry-level ATC pay was better than pay for most jobs they could get. More women than men (24% vs 5%) felt that coworkers discriminated against women; as many female retentions as attritions agreed to this. Discrimination against women by management was perceived by 29% of the female and 18% of the male attritions, and discrimination by supervisors was perceived by 26% of the female and 12% of the male attritions. Among the retentions, discrimination by management was perceived by only 9% of females and of males, and by supervisors by only 3% of females and of males. More female attritions (38%) than retentions (18%) felt that shift work was not desirable. Other findings concern assignments, working conditions, promotions, perceived expectations and treatment of trainees, "best" and "worst" features of ATC work, and proposals for improving the ATC job. (35 ref)—W. E. Collins.

8479. Oliver, Richard L. (U Kentucky) **Expectancy theory predictions of salesmen's performance.** *Journal of Marketing Research*, 1974(Aug), Vol 11(3), 243-253.—Conducted a 6-mo cross-sectional study to examine the applicability of V. H. Vroom's expectancy theory to the 6-mo productivity and production goals of 80 life insurance salesmen (mean age = 38 yrs). The dependent variables were (a) 6-mo production volume and (b) a goal attainment criterion derived from actual and estimated production. Compensation, incentives, intrinsic and most desirable job outcomes, the valence of various outcomes, and instrumentality, expectancy, and ability variables were also measured by questionnaire. Results show that valence and instrumentality perceptions of the 4 incentive outcomes (e.g., membership in a production club) were strongly related to productivity and, to a lesser extent, goal attainment. No other outcomes were consistently related to the criteria. (48 ref)—L. Gorsey.



8480. **Pedalino, Ed & Gamboa, Victor U.** (Pedalino & Assoc, Ann Arbor, MI) **Behavior modification and absenteeism: Intervention in one industrial setting.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 694-698.—Used behavior modification to decrease absenteeism in 215 hourly employees at a manufacturing-distribution facility. Employees in 4 adjoining plants served as comparison groups. An ABA (baseline, intervention, return to baseline) intervention using a lottery incentive system constituted the experimental design. Absenteeism decreased significantly following the experimental group intervention but did not decrease in any of the 4 comparison groups. Further, stretching the schedule of reinforcement did not increase in rate of absenteeism.—*Journal abstract.*
8481. **Prichard, Robert D.; Leonard, Dale W.; von Bergen, Clarence W. & Kirk, Raymond J.** (Inst for Organizational Behavior Research, Lafayette, IN) **The effects of varying schedules of incentive delivery on technical training.** *US AFHRL Technical Report*, 1974(Sep), No 74-32, 98 p.—Assessed the impact of various schedules of reinforcement on performance and attitudes in US Air Force-related setting. 24 17-19 yr old males matching the characteristics of Air Force trainees were hired to work for 4 wks, 1 wk under each of 4 schedules of reinforcement: salary, fixed-ratio, variable-ratio, and variable-ratio-variable-amount. Results indicate that the salary schedule resulted in the lowest performance and attitudes. Performance was best under the variable-ratio-variable-amount schedule, while attitudes were best under the fixed-ratio schedule. It is concluded that instituting a fixed- or variable-ratio-variable-amount schedule of incentive delivery would be a highly cost-effective procedure in computer managed Air Force training. (6 p ref)—*Journal abstract.*
8482. **Riola, Peter W.** (Burlington Northern, St Paul, MN) **Measuring performance of salaried salespeople.** *Training & Development Journal*, 1974(Nov), Vol 28(11), 12-14.—Proposes that if the organization encourages the individual to plan well, particularly by setting reasonable goals and by constantly evaluating changing conditions, production will rise. Performance should be judged on the accomplishment of such planning and evaluation as well as on attainment of routine sales goals.
8483. **Rosseel, Eric.** (Lab voor Industriële Psychologie—VUB, Brussels, Belgium) **[Fatigue and boredom resulting from reduced task motivation.]** (Duth) *Psychologica Belgica*, 1974, Vol 14(1), 67-78.—Investigated the causes of fatigue and boredom in 48 assembly line workers performing a monotonous task in social and solitary situations. Personality measures were obtained with the Maudsley Personality Inventory. Fatigue was hypothesized to be dependent on a reduction of task motivation and boredom to result from an incongruity between alternative behavior tendencies and work situation. The 2 hypotheses were, in general, supported by the results. Boredom was associated with neuroticism in the social situation and with extraversion in the solitary situation. (English abstract)—*S. Slak.*
8484. **Sandler, B. E.** (Ctr for Creative Leadership, Greensboro, NC) **Eclecticism at work: Approaches to job design.** *American Psychologist*, 1974(Oct), Vol 29(10), 767-773.—Explores a particular aspect of work—job design—and emphasizes the range of alternatives available. Job enlargement and modified work weeks are briefly examined. It is suggested that the orientation of the problem solver and the issue of problem formulation are vital, but usually neglected aspects of job design. Some approaches to job design which capitalize on the existence of individual differences in the work force are considered. (32 ref)—*Author abstract.*
8485. **Wild, R. & Dawson, J. A.** (U Bradford, Management Ctr, England) **Prediction of the job attitudes and behaviours of female manual workers: A research note.** *Journal of Management Studies*, 1973(May), Vol 10(2), 113-117.—Reports briefly on lack of success in predicting, from nonpersonal data, the attitudes, performance, etc, of 315 female workers in an electronics factory. Data from questionnaires and company records were subjected to principal components and regression analyses. The only biographical item that correlated with general job satisfaction, specific job attitudes, behavior and performance, and efficiency, was age. Most of the equations developed provided indices of predictive efficiency less than 10%. Results suggest that the individual variables used do not afford a reliable practical means of making decisions regarding selection and placement of personnel.—*R. S. Albin.*
8486. **Wiley, Llewellyn N.** **Across-time prediction of the performance of airman administrators and mechanics.** *US AFHRL Technical Report*, 1974(Jul), No 74-53, 25 p.—In a follow-up study of 662 US Air Force Administration Specialists and 690 Aircraft Mechanics it was found that supervisors' ratings of Ss' job performance were predictable across time. Ss were rated on overall job performance and 65 traits. After 2 yrs for mechanics and 3 yrs for administrators, at least 16% of the performance variance was predictable from trait ratings, with multiple Rs from .40 to .47. The 1st overall performance ratings made less prediction than did the 65 trait ratings taken as a whole. Results support earlier findings, on samples which included these airmen, that the traits important for the performance of mechanics differ somewhat from the traits important for administrators and that skill levels within ladders differ in their trait requirements.—*Journal abstract.*
8487. **Yampey, Nasim.** **[Coming of age at work?]** (Span) *Acta Psiquiátrica y Psicológica de América Latina*, 1974(Jun), Vol 20(3), 187-193.—Work is a means of survival and a source of pleasure, gratification, social status, and feelings of personal worth. Thus it is essential for good mental health. 5 cases of serious working troubles are reported, emphasizing the role of leisure and the complexities of work functions.—*English summary.*
8488. **Zanders, H. L.** (Katholieke Hogeschool, Tilburg, Netherlands) **[Flexibility of labor: A case study.]** (Duth) *Mens en Onderneming*, 1974(Mar-Apr), Vol 28(2), 84-99.—Studies changes in the attitudes of relocated workers. Ss were a statistically derived sampling of 21 mine workers from a total of 600. Closing of the mine had changed their work to metal construction. Interviews with the Ss indicated that the previous employment had been more desirable than the present one for most of the Ss with respect to the opportunity for interruptions in the task, relative independence in the performance of the work, and fixed mealtimes. Employment in the new

industry was preferred by most Ss because of the tempo of the work, the fixed time of the work periods, the popular regard of the importance of the task, the quality of the abilities of the coworkers, the contacts with the foreman, the physical conditions of the work, and higher wages. The most adverse aspect of the process of relocation was the period of negotiation for the new employment.—A. J. Ter Keurst.

### Management & Leadership

8489. Austin, Charles J. (Xavier U) **A national study of educational programs in health administration.** *Administration in Mental Health*, 1973(Fal), 73-75.—Describes the work of the Commission on Education for Health Administration, which is studying administrative roles and functions in relation to present and future health delivery systems in order to recommend educational and credentialing programs.

8490. Cabell, David E. (Baldwin-Wallace Coll) **The relevance of a management game.** *Simulation & Games*, 1974(Jun), Vol 5(2), 201-211.—36 teams of 6 business administration students each participated in a management simulation game for 2 wks. 4 different interaction patterns (experimental conditions) were developed by manipulating leadership style (participative vs nonparticipative) and specialization (product vs functional) while variables relating to information systems, control systems, and delegation of authority were held constant. The specialization and leadership style variables focused on the peer group interactions and the superior-subordinate interactions, respectively. Results indicate that students perceived some degree of relevance (as measured by a 3-item questionnaire) between their duties, decisions, and relationships and the real world. Perceptions of the relationships between duties (i.e., allocation of budget funds to a set of decisions and negotiating for additional funds from the leader's slush fund) were positively related to the main effects of the specialization variable. However, neither the specialization nor the leadership style variables were related to the student's perceptions of the management game as an opportunity for gaining knowledge about the decisions and relationships which a manager would encounter in the real world.—D. E. Anderson.

8491. Etzel, Michael J. & Ivancevich, John M. (U Kentucky, Coll of Business & Economics) **Management by objectives in marketing: Philosophy, process, and problems.** *Journal of Marketing*, 1974(Oct), Vol 38(4), 47-55.—Reviews management-by-objectives tenets, successes, and failures. Implementation guidelines are presented which suggest that it can be an effective tool for marketing managers.

8492. Fry, John P. (Human Resources Research Organization, Western Div, Fort Bliss, TX) **The army officer as performance manager.** *HumRRO Professional Paper*, 1974(Aug), No 13-74, 11 p.—Describes the results of one US Army officer's experiment in applying the techniques of psychological research on the job. With a view to developing his subordinates' leadership ability and initiative and permitting them an active role in managing the battalion, he emphasized particularly the principles of contingency management, participative management, and performance counseling. Despite some

initial resistance by other officers, the experiment paid off in terms of battalion morale, responsiveness, and esprit de corps. Although emphasis was on self-motivation rather than the threat of punishment as a motivating force, there was no breakdown in discipline.—*Journal abstract*.

8493. Harmon, Shirley J. (U Colorado, Medical Ctr, Denver) **Management training and development: An interim project approach: Optimizing the transfer of training back to the work situation.** *Training & Development Journal*, 1974(Jun), Vol 28(6), 16-18.—Suggests that combining workshop learning with on-the-job follow-up application to interim projects may avoid the pitfalls of a training program based solely on classroom or work situation methods. After completing the interim projects, participants should benefit from a summary report workshop.

8494. Hegarty, W. Harvey. (Indiana U) **Using subordinate ratings to elicit behavioral changes in supervisors.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 764-766.—Determined whether feedback of subordinates' ratings of supervisors leads to positive changes in the supervisors' behavior. The employees of the 56 supervisors in the experimental and control groups completed an information-opinion survey using a modified Likert scale format. Feedback reports were given to the experimental supervisors, and a 2nd survey was conducted 10 wks later to measure change. 2 independent measures showed significant positive change for the experimental supervisors.—*Journal abstract*.

8495. Horstman, Preston. (National Association of State Directors of Law Enforcement Training, Gaithersburg, MD) **Leaderless group discussion as an assessment tool for supervisory and command promotions.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 34-37.—Recommends "leaderless group discussion" as a method for selecting policemen for supervisory roles. A group of examinees are asked to discuss a job-related topic for a given period of time, without direction or leadership from the examiners. Raters check criteria based on performances by group members. In implementing this procedure, several factors must be considered: size of groups, seating, pretest coaching, amount and kind of participation and motivation. The problem of validity is also discussed.—R. J. Albers.

8496. Hsu, Chris Ching-Yang & Newton, Richard R. (General Motors Corp, Detroit, MI) **Relation between foremen's leadership attitudes and the skill level of their work groups.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 771-772.—Studied the relation between foremen's leadership attitudes, as measured by the Leadership Opinion Questionnaire, and the skill level of their work groups. Ss were 243 foremen and 66 general foremen in a manufacturing plant. Results indicate that the skill level of the foremen's work group was significantly related ( $p < .01$ ) to his structure attitude but not to his consideration attitude toward these workers.—*Journal abstract*.

8497. Johnson, Bruce A. & Pierce, John. (First National City Bank, Money Market Div, New York, NY) **Research brings proof of value, future direction to sales training.** *Training & Development Journal*, 1974(Nov), Vol 28(11), 25-32.—Summarizes a technique



developed by McGraw-Hill to determine how salespeople are performing with prospects who are not customers. Questionnaires, tape recordings of hypothetical situations, sales statistics before and after training, and interviews with prospects produced data for the experimental evaluation program.

8498. Koverman, Robert B. (Genesee Community Coll, Batavia, NY) **Team policing: An alternative to traditional law enforcement techniques.** *Journal of Police Science & Administration*, 1974(Mar), Vol 2(1), 15-19.—Describes the experimental police decentralization program in Dayton, Ohio, which consists of neighborhood police stations, informal dress, crisis intervention training, and cooperation with social service agencies.

8499. Lacey, L. A. (US Naval Weapons Ctr, China Lake, CA) **Discriminability of the Adjective Check List among scientists and engineers: Comparison of supervisors and non-supervisors and stayers and leavers.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 401-402.—Scientists and engineers were divided into supervisory and nonsupervisory subgroups, and staying and leaving subgroups. Significant differences were found on 10 of 24 Adjective Check List scales for the supervisory-nonsupervisory comparison and on 6 of 24 scales for the staying-leaving comparison.

8500. Leidecker, Joel K. & Hall, James J. (U Santa Clara) **Motivation: Good theory—poor application: Transferring conceptual knowledge into practice.** *Training & Development Journal*, 1974(Jun), Vol 28(6), 3-7.—Attempts to apply motivational theories in practical situations often fail to achieve the desired increase in productive efforts. This poses the question, are the hypothesized interactions between needs and goals and the widely known frameworks of A. Maslow's need hierarchy and Herzberg's dual factor theory unsatisfactory as theories, or are basic errors often made in attempting to apply these concepts? Observation of managerial performance in a number of settings suggests that the answer is poor application of good motivational theory. Managers often err in identifying employee needs and in ensuring that employees perceive that desired rewards are actually available contingent upon productive work. Employee participation in setting goals, and clear evaluation of performance with adequate feedback between employee and supervisor are other areas where theory is often poorly applied. Inadequate job enrichment may also limit the success of motivation efforts.—R. L. Sulzer.

8501. Neuburger, Oswald & Roth, Bernhard. (U München, Psychologisches Inst, W Germany) **[Leadership style and group performance: A test of the contingency model and the LPC concept.]** (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(2), 133-144.—Studied F. Fiedler's contingency model of leadership effectiveness in 48 groups of the West German Army, which corresponded to his Situation-Octants I and V. Specific contingency model predictions were verified for Octant I, but not for Octant V. No relationship between leader behavior (as measured by a German version of the Leader Behavior Description Questionnaire) and Least Preferred Coworker (LPC) score was found for the total sample. LPC scores were compared with other question-

naire and rating data in order to construct and validate the score. Only partial support for Fiedler's assumptions was found. (53 ref)—*English abstract.*

8502. Quigley, William S. & Stupak, Ronald J. (Western Coll) **An experiment in managerial creativity: The Federal Executive Institute and the policy-making process.** *Training & Development Journal*, 1974(Jun), Vol 28(6), 22-28.—Suggests that decision situations where there is no agreement about causes and no preferences as to possible outcomes may be becoming more frequent and important in the federal bureaucracy. Termed inspirational decisions, these challenges to the character and creativity of the decision maker require the Federal Executive Institute to stress the development of imagination and innovation. Student executives spend much of the 8-wk session just thinking. They schedule their own work and choose their learning techniques, colleagues, and geographical locations. The theme of the sessions is generally people-centered, with social science techniques presented as aids. Seminars, simulations, and participatory devices obviate passive assimilation. The end result may be more government managers capable of going beyond standard organizational operating procedures.—R. L. Sulzer.

8503. Sashkin, Marshall; Taylor, F. Carter & Tripathi, Rama C. (Wayne State U) **An analysis of situational moderating effects on the relationships between least preferred co-worker and other psychological measures.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 731-740.—Correlations were computed between a manager's least-preferred-coworker (LPC) score and 17 psychological measures and moderated by subordinates' satisfaction with the manager in 34 offices of a nationwide brokerage firm. Results tend to support the hypothesis that correlations between LPC and the psychological measures should be opposite in direction for high- vs low-satisfaction offices. The hypothesis was directionally confirmed for 11 of 17 pairs of correlations, and the differences were statistically significant for 5 of the 17 pairs. Results also support F. E. Fiedler's interpretations of effective leader behavior and the relation between LPC and behavior. (37 ref)—*Journal abstract.*

8504. Schultz, George P. & McKersie, Robert B. **Participation—achievement—reward systems (PAR).** *Journal of Management Studies*, 1973(May), Vol 10(2), 141-161.—Presents a case study in the PAR systems approach to business management. This system is based on the concept that people participate more energetically and creatively when (a) they have a stake in the enterprise and (b) enterprises are so organized as to encourage and facilitate their participation in problem solving. This approach is illustrated by a study done for an oil company at 4 of its locations. The process of developing a wage payment plan is detailed and the advantages and disadvantages of such an approach are discussed.—R. S. Albion.

8505. Steger, Joseph A.; Woodhouse, Richard & Goocey, Robert. (Rensselaer Polytechnic Inst, School of Management) **The clinical manager: Performance and management characteristics.** *Administration in Mental Health*, 1973(Fal), 76-81.—Presents a performance-based, criterion-referenced study of the factors in

effective mental health administration. 7 mental health managers were multiply rated on 15 bipolar scales which assessed personal qualities, administrative skills, and leadership style. Performance was measured by the product of the percentage of completed projects and the percentage of active service areas. Factor analysis of ratings yielded factors of administrative skill, interpersonal skill, and energy. The ratings, weighted by their factor loadings, were correlated with the performance measures. Only the administrative factor had a significant relation to performance. Contrary to many other studies, empathy was not found to be sufficient for effective management.—*R. J. Albers.*

8506. **Sternier, Frank M.** (Purdue U, Krannert Graduate School of Industrial Administration) **The effective management development facilitator: 26 characteristics, techniques and approaches.** *Training & Development Journal*, 1974(Jun), Vol 28(6), 8-11.—Enumerates and briefly defines those properties of the individual engaged in management development that seem to have an important bearing on productivity. By describing the sort of person who can bring about the desired organizational changes, the list may provide insight into factors that affect the success of development efforts.

8507. **Szilagyi, Andrew D. & Sims, Henry P.** (U Houston) **Cross-sample stability of the Supervisory Behavior Description questionnaire.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 767-770.—Performed a factor analysis on the item intercorrelations obtained from the administration of Fleishman's Supervisory Behavior Description (SBD) to a predominantly female (79.6%) sample of 1,161 medical center employees. Factor congruence coefficients were calculated to compare the results from this sample with previous leader behavior studies. The SBD measures of consideration and initiating structure were stable across time, sex differences, type of organization, culture, and analysis technique.—*Journal abstract.*

8508. **Zeira, Yoram.** (Tel-Aviv U, Israel) **Training the top-management team for planned change: Experimental training via the system approach.** *Training & Development Journal*, 1974(Jun), Vol 28(6), 30-36.—Cites experience with a 320-hr course and a subsequent evaluation study in support of conclusions about failures to achieve planned changes. To persuade top-level executives to allow and participate in needs analysis—a precondition for defining training goals—may require a preliminary educational effort to develop this willingness to participate. Assumptions often made in organizational development theories require refinements, particularly in the diagnostic and implementation stages. Both external and internal change agents should participate in diagnosis of present and desired future situations. Trainees cannot always execute the agreed changes fully without continued help from the external experts.—*R. L. Sulzer.*

### Organizational Structure & Climate

8509. **Devito, Robert A.** (Madden Zone Ctr, Hines, IL) **The supervisory bypass: A symptom of organizational anxiety.** *Hospital & Community Psychiatry*, 1974(Nov), Vol 25(11), 724-725.—Results of a study at the Madden Zone Center in Illinois suggest that bypassing the

immediate supervisor and taking work-related problems to the top is a manifestation of anxiety within or between programs. The value of a flat, as opposed to a vertical, organizational system in fostering improved communication, initiative, and creativity is discussed.

8510. **James, Lawrence R. & Jones, Allan P.** (Texas Christian U, Inst of Behavioral Research) **Organizational climate: A review of theory and research.** *Psychological Bulletin*, 1974(Dec), Vol 81(12), 1096-1112.—Previous organizational climate research, definitions, and measurement approaches are reviewed and differentiated into 3 categories: a multiple measurement-organizational attribute approach, a perceptual measurement-organizational attribute approach, and a perceptual measurement-individual attribute approach. Similarities and differences between these approaches are discussed in an attempt to address a number of theoretical and psychometric concerns. A major focus is the extent to which organizational climate duplicates other organizational and individual domains. Recommendations for future research include a rationale for differentiating between organizational climate and psychological or individual climate, and an emphasis upon the distinction between level of measurement and level of explanation as related to future definitions of climate. (52 ref)—*Journal abstract.*

### Human Factors Engineering & Safety

8511. **de Greene, K. B.** (U Southern California, Inst of Safety & Systems Management, Los Angeles) **Models of man in systems in retrospect and prospect.** *Ergonomics*, 1974(Jul), Vol 17(4), 437-446.—Considers that none of the historical and current theoretic and working or operational models of man, by virtue of limitations to only a part of human behavior, is completely valid for systems planning and design. The need is stressed to develop general systems models capable of describing and predicting human individual and collective behavior of varied populations in a wide variety of systems and environments. Man-machine, sociotechnical, and social systems involving military, industrial, and civil applications must be considered. Criteria for model development should include quality of life and limits to growth as well as economic costs and performance effectiveness. Increasingly, the impact of the system on the environment, not just the environmental constraints on the system, must be considered. Models must further be consistent with the dynamic properties and forces within complex systems and reflect motivations, attitudes, values, complex learning and problem solving, and other aspects of higher-order hierarchical organization. These issues, with an emphasis on working models, are discussed in relationship to problems of education, research, systems effectiveness, and system-environment interactions. (French & German summaries) (16 ref)—*Journal abstract.*

8512. **Dowd, Patrick J.** (USAF School of Aerospace Medicine, Brooks Air Force Base, TX) **Sleep deprivation effects on the vestibular habituation process.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 748-752.—Studied the effects of sleep deprivation on habituation of the vestibular system in a stressful situation. 143 experienced pilots were exposed to 2 tests of Coriolis



acceleration after periods of sleep deprivation (24-30 hrs) or rest (6 hrs). Nystagmus responses to Coriolis stimulation were recorded after 4 right-to-left tilts. Sleep deprivation resulted in (a) increased sensitivity to Coriolis stimulation, (b) a decreased recovery rate, and consequently, (c) interference with the vestibular habituation process. Implications of sleep loss in increasing the hazards of flying are discussed. (15 ref)—*Journal abstract*.

8513. Drury, C. G. & Dawson, P. (State U New York, Buffalo) **Human factors limitations in fork-lift truck performance.** *Ergonomics*, 1974(Jul), Vol 17(4), 447-456.—Results of experiments conducted to evaluate the effect of spatial restrictions on speed and errors in fork-lift truck driving show that performance in terms of speed and errors improved as the spatial restrictions were eased. Theoretical models of driving performance were fitted to the data with good results. Deviations from these models are used to set practical limits on the spatial requirements for rapid, safe, fork-lift truck performance. (French & German summaries)

8514. Franke, Joachim & Hoffmann, Kristine. (Inst für Wirtschafts- und Sozialpsychologie, Nuremberg, W Germany) [Contributions to the application of psychology in city planning: III. General structural components of housing developments which affect viewers' impressions.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(2), 181-225.—Using semantic differentials, interviewers asked 30 residents and 30 passers-by to judge 29 residential areas varying from single houses to apartment complexes. A factor analysis of the results yielded 6 relatively stable components which influenced the judgments: stimulation, spaciousness, representativeness, organization, attractiveness, and efficiency. Other less stable factors depended upon intimacy with the area judged. Implications of these findings for city planning are discussed. (English & French summaries) (16 ref)—*W. J. Koppitz*.

8515. Klemmer, E. T. & Stocker, L. P. (Bell Lab, Holmdel, NJ) **Effects of grouping of printed digits on forced-paced manual entry performance.** *Journal of Applied Psychology*, 1974(Dec), Vol 59(6), 675-678.—In 2 experiments with a total of 42 engineers, clerical and shop workers, and housewives, numbers were presented to be keyed at a forced-paced rate, chosen separately for each S from his self-paced rate so as to provide moderate speed stress. Under this condition, the error rate was doubled by using a 1-5-1 grouping of 7-digit numbers as opposed to a 3-4 grouping. For 5-digit numbers, which cannot be grouped by 3s and 4s, no significant difference in performance was found between 3-2 grouping and ungrouped presentation.—*Journal abstract*.

8516. Leplat, Jacques. (Ecole Pratique des Hautes Études, Lab de Psychologie del Trabajo, Paris, France) [Criteria in the ergonomic studies of highway security.] (Span) *Revista de Psicología General y Aplicada*, 1974(Mar-Apr), Vol 29(127), 241-259.—Presents methods of categorizing accidents and near accidents in terms of driver-vehicle systems. (French summary)

8517. Mortimer, R. G. (U Michigan, Highway Safety Research Inst) **Foot brake pedal force capability of drivers.** *Ergonomics*, 1974(Jul), Vol 17(4), 509-513.—Conducted an experiment to derive guidelines for the

maximum force requirement for actuation of an automobile service brake by US drivers. Since the 5th-percentile female maximum brake pedal force was about 400 newtons, it is recommended that no more than this force be required to attain near maximum braking capability from a passenger car. (French & German summaries)

8518. Ross, Don H.; Sanneman, Richard A.; Levison, William H. & Berliner, Jeffrey E. (Sanders Associates, Nashua, NH) **Tactual display for aircraft control.** Nashua, NH: Sanders Associates, 1974. 98 p.—Describes the 2nd phase of a study on tactual displays for aircraft control which presents a description of an improved tactile display system and its evaluation as a 1 and 2 axis error display instrument during a series of manual tracking experiments. Tracking errors for the new display were better than the initial system, and of 4 Ss, 2 preferred the electrotactor array because of its clearer haptic display.

8519. Routledge, D. A.; Repetto-Wright, R. & Howarth, C. I. (U Nottingham, England) **The exposure of young children to accident risk as pedestrians.** *Ergonomics*, 1974(Jul), Vol 17(4), 457-480.—A study by C. I. Howarth et al (1974) described a framework in which measures of exposure were defined and related to the accident statistics to obtain estimates of absolute levels of risk for different categories of pedestrian in different traffic situations. The present survey of children's exposure was carried out to provide suitable data for this quantitative analysis. A representative sample of 288 5-11 yr old schoolchildren were interviewed about their journeys in the previous 24 hrs, and the number of roads crossed and the traffic densities of these roads were recorded. Measures of exposure were related to the accompaniment of children on their journeys, the type of area in which they lived, time of day, and national and local accident statistics. Results provide estimates of risk to children of different ages and sex in their normal pattern of road crossing and in crossing roads of different traffic density, and indicate that the accident statistics alone considerably underestimate the degree of risk to children under the age of 8 yrs. Interviews with a sample of the parents of the children suggest that children may provide a more accurate measure of their exposure than do their parents. (French & German summaries)—*Journal abstract*.

8520. Rumar, K. (U Uppsala, Traffic Safety Research Group, Sweden) **Dirty headlights: Frequency and visibility effects.** *Ergonomics*, 1974(Jul), Vol 17(4), 529-533.—In Exp I dirt layers were systematically collected under various road conditions. The wetness of the road was found markedly to influence the amount of dirt deposited. In Exp II light reduction caused by dirt on cars in traffic was measured. It was found that even in dry weather on seemingly clean roads light reduction due to headlamp dirt was normally 10-20%. In bad (slushy) road conditions few cars had light reduction below 50%. Drivers normally did not react to light reduction below 60%. In Exp III reduction in visibility during night driving was measured as a function of light reduction. Light reduction of 60% caused a 20% reduction of high-beam visibility and a 15% reduction of low-beam visibility. (French & German summaries)—*Journal abstract*.

8521. **Schultetus, Von W.** (Siemens Aktiengesellschaft, Bad Neustadt a. d. Saale, W Germany) [**Ergonomics as an aid in the design of products for industrial application.**] (Germ) *Ergonomics*, 1974(Jul), Vol 17(4), 515-527. —Argues that the design of work systems requires adaptation of the work to the person and vice versa. To attain this objective all those who have a hand in this design process must be convinced of the necessity of applying the knowledge of ergonomics. The manner in which knowledge of ergonomics can be applied to the industrial workplace is demonstrated by examples of design of industrial products which take into account anthropometric and physiological factors and technical information. A method of calculating permitted muscle strain is described. (German & French summaries) —*English summary.*

8522. **Sheridan, Thomas B. & Ferrell, William R.** (Massachusetts Inst of Technology) **Man-machine systems; information, control, and decision models of human performance.** Cambridge, MA: MIT Press, 1974. ix, 452 p.—Presents a series of man-machine models, based on information theory, control theory, and decision theory, intended to provide methods for the quantitative description of inanimate physical systems. Certain ones of these methods have been extended to the description and modeling of human performance. The 3 sections of the book cover probability estimation and Bayesian probability updating, system identification and modeling, and riskless and risky decision making and signal detection theories.

8523. **Tormes, Felix R. & Guedry, Fred E.** (Naval Aerospace Medical Research Lab, Pensacola, FL) **Disorientation phenomena in naval helicopter pilots.** *USN AMRL Technical Report*, 1974(Jul), No 1205, 17 p.—Investigated the special orientation problems of US Navy helicopter pilots engaged in operations at sea and landing on moving platforms. A questionnaire concerning disorientation was answered anonymously and individually by 104 pilots. 56% indicated one or more episodes of severe disorientation and 8.6% indicated having experienced severe disorientation 5 or more times while piloting helicopters. A number of factors condu-

cive to disorientation were identified. Some precipitating factors appeared to be specific to operations over water or over a moving deck, although some of these may well have their counterparts in special operations over land. Other factors were common to land- and sea-based operations, and some were common to fixed-wing as well as rotary-wing aircraft. Potential countermeasures for various precipitating factors are discussed.—*Journal abstract.*

8524. **Weiss, Steven L.** (U Oklahoma, Health Sciences Ctr) **Similarity of judge and violator in professional decision making.** *Psychological Reports*, 1974(Aug), Vol 35(1, Pt 2), 523-529.—Investigated how decision-making processes are affected by social class considerations in situations which involve concrete violations of law. 2 groups of 12 27-61 yr old accident prevention specialists (former pilots) were presented with varying descriptions of an hypothetical air-traffic violation. For 1 group of Ss, the "violatee's" life style was highly similar to that of the Ss, while for the 2nd group it was discrepant. After reading the accident report, Ss indicated the extent to which they agreed or disagreed with 17 alternative courses of action. Results indicate a significant tendency for Ss to be authoritative and punitive when dealing with a younger "violatee" whose background was at variance with their own, especially in the preponderance of psychiatric recommendations for the "violatee." It is concluded that a judgmental decision-making process may involve the de-identification of the judge and that many factors other than raw data may interact to influence the judge's attitudinal state or decision. —*Journal abstract.*

8525. **Wulfeck, Joseph W.; Queen, John E. & Kitz, William M.** **The effect of lighted deck shape on night carrier landing.** Inglewood, CA: Dunlap & Associates, Western Division, 1974. 57 p.—Studied the effect of parallel vs tunnel runway lighting, scaled to aircraft carrier lighted deck size, on male engineering and science students' accuracy in judging the plane of the runway to be horizontal. The tunnel lighted deck showed less error at all ranges than the parallel lighted deck.



# BRIEF SUBJECT INDEX

Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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# P PA PAS PASA PASAR

is an innovative service designed to benefit the individual users of psychology-related information. It provides a comprehensive literature search capability at a level of complexity achievable only through automated retrieval techniques. The intellectual burden for conducting an effective search is shared by the requester and APA information specialists who formulate specific retrieval strategies, augmenting vocabulary and other search parameters supplied by the requester. Experience has provided APA information specialists with the skills to efficiently interact with the automated data base which contains records published in **PSYCHOLOGICAL ABSTRACTS** from 1967 through the present.

Charges for processing **PASAR** requests are based on the amount of computer time required to perform a search. Typically these charges range from \$40 to \$60 and will not exceed \$100 unless the requester is contacted first. The total charge for a search is based on its complexity and is in most cases unrelated to the number of references retrieved. For example, a complex search strategy involving many variables or limiting factors may require more computer time and may result in fewer references retrieved than a broad search with few limiting factors.



## PASAR Search Request Guidelines

The **PASAR** Request Form has been designed to assist you in constructing a comprehensive statement of your requirements. However, it should not restrict your input. Provide whatever other information you feel will augment the information specialist's understanding of your requirements. These guidelines should help to clarify items on the Request Form.

**ITEM 1. Narrative statement of search topic.** Provide a detailed description of the subject matter you wish to be retrieved. Please avoid submitting multiple, discrete requests on a single **PASAR** Request Form, since such cannot be processed for a single fee. However, multiple aspects of a primary subject may be requested. The distinction is illustrated in the following examples:

*Acceptable:* "the effects of socioeconomic status, education level, or birth order on career motivation in women."

"Career motivation" is the primary element of this request, while the other elements serve merely to qualify or narrow the scope of this rather broad subject area.

*Unacceptable:* "the measurement of employee attitudes concerning wages and benefits. Also desire references dealing with the factors that influence management decision-making with respect to personnel policies and procedures."

Although these two topics are closely related to the design and administration of personnel policies and procedures, two separate search strategies would have to be executed to retrieve the specific information requested, and a separate charge for each would have to be made.

**ITEM 2. Descriptor(s) relevant to dependent variable(s).** Provide a list of words or phrases that indicate the subject matter of prime interest. Descriptors for the "acceptable" example (see Item #1) might include: career motivation, career preference, and career aspirations.

**ITEM 3. Descriptor(s) relevant to independent variable(s).** Provide a list of words or phrases that will qualify or narrow the scope of the dependent variable. Descriptors for the "acceptable" example (see Item #1) might include: socioeconomic status, social class, educational level, birth order, and women.

**ITEM 4. Search qualifications.** Once the subject matter of the search has been defined, you may wish to refine it with specific requirements such as population or time frame. These qualifications are often essential to the actual information need; however, they can unnecessarily limit the search, causing retrieval of few of the relevant records. Therefore, consider your requirements carefully.

**ITEM 5. Sorting requirements.** Please indicate whether you would prefer to have references sorted alphabetically by author or chronologically by year.

**ITEM 6. Intended use of search results.** Provide a description of how the references resulting from your search will be used (e.g., definition of a research project, preparation of an article, proposal preparation, dissertation, etc.).

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# PASAR Search Request Guidelines

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The PASAR Request Form has been designed to assist you in constructing a comprehensive statement of your requirements. However, it should not restrict your input. Provide whatever other information you feel will augment the information specialist's understanding of your requirements. These guidelines should help to clarify items on the Request Form.

**ITEM 1. Narrative statement of search topic.** Provide a detailed description of the subject matter you wish to be retrieved. Please avoid submitting multiple, discrete requests on a single PASAR Request Form, since such cannot be processed for a single fee. However, multiple aspects of a primary subject may be requested. The distinction is illustrated in the following examples:

*Acceptable:* "the effects of socioeconomic status, education level, or birth order on career motivation in women."

"Career motivation" is the primary element of this request, while the other elements serve merely to qualify or narrow the scope of this rather broad subject area.

*Unacceptable:* "the measurement of employee attitudes concerning wages and benefits. Also desire references dealing with the factors that influence management decision-making with respect to personnel policies and procedures."

Although these two topics are closely related to the design and administration of personnel policies and procedures, two separate search strategies would have to be executed to retrieve the specific information requested, and a separate charge for each would have to be made.

**ITEM 2. Descriptor(s) relevant to dependent variable(s).** Provide a list of words or phrases that indicate the subject matter of prime interest. Descriptors for the "acceptable" example (see Item #1) might include: career motivation, career preference, and career aspirations.

**ITEM 3. Descriptor(s) relevant to independent variable(s).** Provide a list of words or phrases that will qualify or narrow the scope of the dependent variable. Descriptors for the "acceptable" example (see Item #1) might include: socioeconomic status, social class, educational level, birth order, and women.

**ITEM 4. Search qualifications.** Once the subject matter of the search has been defined, you may wish to refine it with specific requirements such as population or time frame. These qualifications are often essential to the actual information need; however, they can unnecessarily limit the search, causing retrieval of few of the relevant records. Therefore, consider your requirements carefully.

**ITEM 5. Sorting requirements.** Please indicate whether you would prefer to have references sorted alphabetically by author or chronologically by year.

**ITEM 6. Intended use of search results.** Provide a description of how the references resulting from your search will be used (e.g., definition of a research project, preparation of an article, proposal preparation, dissertation, etc.).

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4. Search qualifications: (Caution should be exercised in order not to limit unnecessarily the range of references to be retrieved. We may not always be able to meet your precise needs, but will attempt to avoid types of literature that are of no interest to you.)

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6. Intended use of search results:

# PSYCHOLOGICAL ABSTRACTS

Volume 53

May 1975

Number 5

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## KEY TO THE TEXT

The examples of different types of *Psychological Abstracts* records presented here are number coded to provide definition of their elements.

### JOURNAL ARTICLE ABSTRACT

<sup>1</sup> 8327. <sup>2</sup> Howard, R. Lee.; Glendenning, Robert L. & Meyer, Donald R. <sup>3</sup> (Ohio State U) <sup>4</sup> Motivational control of retrograde amnesia: Further explorations and effects. <sup>5</sup> *Journal of Comparative & Physiological Psychology*, 1974 (Feb). Vol. 86(2), 187-192. <sup>6</sup> Reports 5 investigations of variables related to the motivational control of retrograde amnesia for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer<sup>7</sup> (see PA Vol 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. (<sup>8</sup>) <sup>9</sup> (15 ref) <sup>10</sup> *Journal abstract*.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
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- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
- 5 - Primary publication title and bibliographic data.
- 6 - Text of abstract.
- 7 - Reference to a previous entry in *Psychological Abstracts*. If an abstract number is unavailable at time of publication, the issue number is given. Consult the Author Index of the PA issue noted in order to determine the record number for the article.
- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

### BOOK ANNOTATION

<sup>1</sup> 8328. <sup>2</sup> Chase, William G. <sup>3</sup> (Ed). <sup>4</sup> (Carnegie-Mellon U) <sup>5</sup> *Visual information processing*. New York, NY; <sup>6</sup> Academic, <sup>7</sup> 1973. <sup>8</sup> xiv, <sup>9</sup> 555 p. <sup>10</sup> \$17.50. <sup>11</sup> Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models.

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed; if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Designation of editor.
- 4 - Affiliation of first-named author/editor only.
- 5 - Book title: If the book is in a foreign language, the original title is given followed by a translated title and the language of the book is indicated in parentheses.
- 6 - Place of publication.
- 7 - Publisher.
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

### BOOK CHAPTER CITATION

<sup>1</sup> 8329. <sup>2</sup> Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. <sup>3</sup> (Stanford U) <sup>4</sup> On the meeting of semantics and perception. <sup>5</sup> In W.G. Chase (Ed), *Visual information processing*. New York, NY: Academic, 1973. xiv, 555 p. \$17.50.

- 1 - Record number.
- 2 - Author(s) of cited chapter. As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr, II, III, etc) are not given.
- 3 - Affiliation of first-named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

### ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH	= adrenocorticotrophic hormone	NREM	= nonrapid eye movement
DNA	= deoxyribonucleic acid	REM	= rapid eye movement
E	= experimenter	RNA	= ribonucleic acid
EEG	= electroencephalogram or -graph	S	= subject
ESP	= extrasensory perception	TV	= television
Exp	= experiment	US	= United States
IQ	= intelligence quotient	USSR	= Union of Soviet Socialist Republics
LSD	= lysergic acid diethylamide	WAIS	= Wechsler Adult Intelligence Scale
MMPI	= Minnesota Multiphasic Personality Inventory	WISC	= Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., ALGOL, COBOL, FORTRAN, IBM 360.

Language abbreviations used after translated titles are:

Afri	= Afrikaans	Geor	= Georgian	Port	= Portuguese
Alba	= Albanian	Germ	= German	Romn	= Romanian
Arab	= Arabic	Grek	= Greek	Russ	= Russian
Bulg	= Bulgarian	Hebr	= Hebrew	Slov	= Slovene
Chin	= Chinese	Hung	= Hungarian	Slov	= Slovak
Czec	= Czech	Iran	= Iranian	Span	= Spanish
Dan	= Danish	Ital	= Italian	Srcr	= Serbo-Croatian
Duth	= Dutch	Japn	= Japanese	Swed	= Swedish
Finn	= Finnish	Lith	= Lithuanian	Turk	= Turkish
Flem	= Flemish	Norg	= Norwegian	Ukrn	= Ukrainian
Fren	= French	Polh	= Polish	Yugo	= Yugoslavian

\*Consult Webster's New Collegiate Dictionary

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Volume 53

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Number 5

## GENERAL

8526. Abplanalp, Paul & Hanners, Richard. (Pennsylvania State U) A stereotaxic adapter compatible with auditory evoked potential. *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 578.—Describes 2 simple adaptors which modify the Kopf stereotaxic instrument through specially designed hollow or nonrupture ear bars. These bars alleviate total occlusion of the ear canal and rupture of the tympanum, respectively, which sometimes hamper the recording of auditory evoked potentials in acute, chronic, or freely moving preparations.

8527. Andreeva, G. M. (Moscow State U, USSR) [Methodological problems in the contemporary development of American social psychology.] (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 124-131.—Discusses criticism and dissatisfaction expressed by American and European social psychologists concerning the present state of social psychology in the US, specifically in relation to its status among the sciences, the fate of the social-psychological experiment, and the effectiveness of social-psychological research. (29 ref)

8528. Arcaya, Jose. Two languages of man. *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 315-329.—Contrasts theories of language developed by analytic philosophy and by phenomenology. Linguistic analysis and logical positivism are based on correspondence theories of truth and insist on independent criteria for the verification of meanings. These strict interpretations of the nature of language lead analytic philosophy to regard linguistic phenomena such as metaphor, poetry, and equivocal expressions as insignificant or inferior forms of language. Phenomenology interprets truth as the totality of man's relations with the world and frees the study of ordinary language from artificial categories. It is suggested that modern philosophy treats analytic-operational language and poetic-metaphorical language as 2 separate systems and that disciplines like psychology, history, and medicine represent indeterminate areas which draw from both types of language.—J. Kelly.

8529. Bandura, Albert. (Stanford U) Behavior theory and the models of man. *American Psychologist*, 1974(Dec), Vol 29(12), 859-869.—Explores several interpretations of behavior theory and traces the evolution of psychological thought from simple external reinforcement to a current concept of reciprocal interaction of external circumstances with personal determinants. Learning by observing and evaluating the actions of others, informed reinforcement where the S is aware of the desired outcome, the extent to which restraints of conscience are operative, and recent developments in the

analyses of memory and cognition also are discussed. Growing public concern over manipulation and control by psychological methods, and the possible misuse of improved means of influence, frequently articulated by popular writers and by theorists themselves, is refuted by the empirical facts of human behavior. (17 ref)—A. de la Haba.

8530. Bart, William M. & Wiener, Willa K. (U Minnesota) Transformational closure for the concept clock. *Journal of Structural Learning*, 1972, Vol 3(3), 99-107.—Studied the transformations under which the concept "clock" survives. 20 undergraduates were asked whether the clock remained a clock with various parts removed (transformations). Some parts were necessary for the survival of the concept and when they were removed (when relevant transformations took place) a clock no longer existed. After other removals (irrelevant transformations) the clock remained a clock. The implications of these results are discussed in terms of the idea that the concepts used by people can be examined and articulated in terms of the algebraic properties of their corresponding irrelevant transformation sets.—R. S. Albin.

8531. Bass, Bernard M. (U Rochester) The substance and the shadow. *American Psychologist*, 1974(Dec), Vol 29(12), 870-886.—Discusses the relationship between advancing technology (the substance) and good scientific theory (the shadow) in industrial/organizational psychology. Solutions presented for bridging the gap between social science and social technology include utilization of a teamwork approach to understanding problems of human abilities, motivations, and interpersonal behavior. Avoiding being prematurely "locked into" a concept before all alternatives are considered, and the incorporation of real-world data into controlled experimental settings, are advocated. Other methods include construction of models and theories that can be revised and updated as new data are supplied, and the strengthening of informational links between the 2 disciplines. (74 ref)—A. de la Haba.

8532. Brisson, Guy R. et al. (U Québec, Ctr de Recherches des Sciences de la Santé, Trois Rivières, Canada) Training effect in the design of a longitudinal study. *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 693-694.—Studied possible effects of familiarization (training effect) in the interpretation of data collected repeatedly on children during a longitudinal study on child growth. Data show that work capacity tests were occasionally subjected to interferences from familiarization. It is concluded that a proper interpretation of repeated measurements must take into account possible biases originating from training effect.



8533. Cheney, Carl & Snyder, Ron L. (Utah State U, Inst of Animal Behavior) **A chamber for separating visual and physical prey access from predators.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 553-555.—Describes a chamber suitable for medium-sized predators, such as foxes and coyotes, which provides automated separation of various phases of depredation dynamics. 2 solenoid actuated doors control visual and physical access to prey items, and a lever operandum is programable to require differential response outputs by the predator.
8534. Cherry, Christopher & Eleftheriou, Basil E. (Jackson Lab, Bar Harbor, ME) **An ejectable electrode in a syringe holder for lesioning mice.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 543-544.—Describes a holder for long, fine electrodes which is easily constructed from a disposable syringe by simply adapting the plunger for grasping the electrode and for connecting to a lesion maker.
8535. Combs, Arthur W. (U Florida) **Why the humanistic movement needs a perceptual psychology.** *Journal of the Association for the Study of Perception*, 1974(Fal), Vol 9(2), 1-13.—Specifies 7 criteria which a system must satisfy in order to be capable of unifying humanistic psychology and giving direction to its research. The criteria are explained, the adequacy of a perceptual psychology dealing phenomenologically with the personal meanings of events is considered for each of the 7 criteria, and some implications are derived. It is concluded that the specified criteria are, in fact, satisfied by the perceptual psychology in question. Several possible objections to this conclusion are answered.—B. Lindsey.
8536. Corcoran, Paul E. (U Adelaide, South Australia) **COCOA: A FORTRAN program for concordance and word-count processing of natural language texts.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 566.
8537. Crosa, Giuseppe. (Sezione Psicosomatica della Casa di Cura Psichiatrica, Genoa, Italy) **[The concept of para-psychosomatics.]** (Ital) *Medicina Psicosomatica*, 1972(Jul), Vol 17(3), 223-227.—Formulates the hypothesis that types of energy may exist other than those considered today by science. These would account for both pathogenic and healing dynamics of psychic and somatic syndromes. Beyond psychology today lies parapsychology; similarly, perhaps behind psychosomatics lies the field of parapsychosomatics, awaiting study. (English & French summaries)—D. Araoz.
8538. Dambrot, F. & Reighard, E. M. (U Akron) **Behavioral research via closed circuit television.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 779-783.—Reviews 4 studies which used closed circuit television as a part of the experimental methodology to illustrate the application of TV to behavioral research. The main advantage of TV in data collection in comparison with the "live" experiment or the use of test booklets appears to be the opportunity for a greater standardization of procedures and conditions especially when using a human E. Economic advantages are also cited.—L. Gorsey.
8539. de Wolf, Michel. (Ctr de Psychologie Différentielle et Clinique, Kessel-Lo, Belgium) **[The "birth trauma" of Otto Rank: Freud's first reactions to a dissidence symptom.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 131-161.—Discusses the work of O. Rank in terms of the same principle that guided Freud in his examination of the dissensions between Jung and Adler. Rank's theoretical dissent takes the form of a psychical symptom, insofar as it becomes a system whose deep function is to prevent the anxious return of what has been repressed.
8540. Dooling, Robert J. & Walsh, James K. (St Louis U) **A technique for EEG recording in the awake parakeet.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 545-546.
8541. Eibl-Eibesfeldt, Irenäus. **Love and hate: The natural history of behavior patterns.** (Trans G. Strachan). New York, NY: Schocken, 1974. 276 p. \$4.50.—Traces the development of behavior patterns (e.g., weapon making, child rearing, and hand shaking) among the higher vertebrates and man to demonstrate that many such patterns are part of a genetic inheritance. Also discussed are phylogeny and ritualization, the biological basis for ethical norms, and the development of the personal bond and basic trust. (224 ref)
8542. Fahrmeier, Edward D. (U Maryland, Baltimore County) **The validity of the transactionalist's assumed world: A critical reinterpretation of an experiment in size constancy.** *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 261-270.—Examines transactionalist size constancy experiments from the viewpoint of M. Merleau-Ponty's concepts of perception. The transactionalist interpretation of errors in distance perception is based on an illusory assumed world of experiences and memories adhering to present perceptions. Merleau-Ponty rejects the notion of an assumed world and instead regards perception as an immediate interaction between the living body in space and its surroundings. It is suggested that the perceptual errors which occurred in transactionalist size constancy experiments were a result of artificial constraints placed by the experimental situation on the natural perceptual abilities of the Ss.—J. Kelly.
8543. Fischer, William F. **On the phenomenological mode of researching "being anxious."** *Journal of Phenomenological Psychology*, 1974(Spr), Vol 4(2), 405-423.—Discusses the presuppositions of the phenomenological approach to psychological research, and describes various modes of being anxious and of experiencing the anxiety of others discovered during the research.
8544. Giurgea, Corneliu. (U Louvain, Brussels, Belgium) **The creative world of P. S. Kupalov.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 192-207.—Offers a eulogy of P. S. Kupalov, a former student of I. Pavlov's. Kupalov's contributions to the classical Pavlovian views of higher nervous activity are considered, and his own concepts and research interests are described. (35 ref)
8545. Gocka, Edward F.; Rostami, Hojat J. & Grossman, Loren R. (VA Hosp, Predictive & Evaluative Models Research Lab, Sepulveda, CA) **Subroutine for multiple logistic discriminant function analysis.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 568.

8546. Hannush, Mufid J. (Duquesne U) **Adorno and Sartre: A convergence of two methodological approaches.** *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 297-313.—Explores the underlying reasons for similarity in the findings of T. W. Adorno and J. P. Sartre. Phenomenological psychology attempts to explain concrete experiential examples of behavior (e.g., anti-Semitism) in terms of man's interactions with his world. It is suggested that Adorno and Sartre arrived at similar conclusions in their investigations because they both were guided by everyday experiences, observations, and common-sense information, and because both studied the authoritarian personality as a comprehensive phenomenon. It is concluded that Adorno's primary achievement was a basically phenomenological analysis of authoritarianism as a total trend of consciousness and that his quantitative investigations were relatively unimportant.—J. Kelly.

8547. Horkheimer, Max. **Critique of instrumental reason: Lectures and essays since the end of World War II.** (Trans M. J. O'Connell et al). New York, NY: Seabury Press, 1974. x, 163 p. \$7.95.—Presents a collection of 9 essays, written between 1949 and 1967, on the 20th century phenomenon of the state-bureaucratic apparatus, the triumph of "instrumental reason," and the dissolution of the basic social institutions and relationships associated with the concept of the individual.

8548. Kent, Ronald N.; O'Leary, K. Daniel; Diamant, Charles & Dietz, Allen. (State U New York, Stony Brook) **Expectation biases in observational evaluation of therapeutic change.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 774-780.—Investigated systematic biases of observational recordings of behavior as a function of experimental hypotheses. Predictions of decrease and of no change in level of recorded behavior as a function of "treatment" were given, respectively, to 2 groups of 5 pairs of Os (high school students). Both groups viewed the same videotapes, selected to show no change from "baseline" to "treatment." Global evaluations of treatment effects were significantly affected by predicted results, but behavioral recordings were not. Observational recordings were increased by knowledge by Os that reliability was being assessed, computation of reliability within (vs between) O pairs, and computation of reliability by the Os (vs the E). (25 ref)—*Journal abstract*.

8549. King, Nancy W.; Hunt, Edward L.; Castro, Richard D. & Phillips, Richard D. (Pacific Northwest Lab, Richland, WA) **An automated swim alley for small animals: I. Instrumentation.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 531-534.—Describes a technique for testing the long-term performance capacity of rats, in which Ss swim back and forth in an alley, in temperature-controlled water, between platforms that are alternately and automatically raised and lowered. Continuous measurement is made of speed of movement between platforms. (19 ref)

8550. King, Nancy W.; Hunt, Edward L.; Castro, Richard D. & Phillips, Richard D. (Pacific Northwest Lab, Richland, WA) **An automated swim alley for small animals: II. Training and procedures.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 535-540.—Conducted experiments to establish condi-

tions that produce uniform and reliable swimming performance of rats in a swim alley described previously by the authors (see PA, Vol 53:Issue 5). In this system, rats swam intermittently for as long as 24 hrs for a distance of more than 7 km.

8551. Klein, Barry T. (Ed.). **Reference encyclopedia of American psychology and psychiatry.** (1st ed). Rye, NY: Todd, 1975. iv, 459 p.—Presents alphabetical and geographical listings of associations and societies, research centers, periodicals, foundations, audiovisual aids, psychiatric hospitals, graduate schools and training programs, and organizations related to the major subject-categories in the fields of psychology and psychiatry.

8552. Lambert, Robert H.; Monty, Richard A. & Hall, Robert J. (US Army Human Engineering Lab, Aberdeen Proving Ground, MD) **High-speed data processing and unobtrusive monitoring of eye movements.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 525-530.—Describes a system which monitors eye movements without imposing any unnatural constraints or mechanical attachments on the S. The system features high-speed on-line data processing.

8553. Lansley, Peter R. & Webb, Terry D. (Ashridge Management Research Unit, Berkhamsted, England) **ORGAN and ORGY: Programs for the analysis of organization structures.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 567-568.

8554. León, Verna A. (U Peruana Cayetano Heredia, Lima, Peru) **[Child psychiatry in Peru: A historical review.]** (Span) *Revista de Neuro-psiquiatria*, 1973(Sep), Vol 36(3), 169-184.—Traces historical developments of child psychiatric care in Peru, beginning with the 1920s. The main events in this process and their meaning and relationship to Peruvian professionals and institutions are examined by decades. (French & German summaries) (46 ref)

8555. Lewis, Robert T. & Petersen, Hugh M. (California State U, Los Angeles) **Human behavior: An introduction to psychology.** New York, NY: Ronald Press, 1974. vii, 459 p. \$6.50.—Presents an introductory text on psychology as both a social and a biological science. Topics include psychology's relation to philosophy, education, religion, business, physiology, and medicine, and the nature of psychological theory and measurement. A programmed student guide is also included (see PA, Vol 53:Issue 5). (4 p ref)

8556. Lewis, Robert T. & Petersen, Hugh M. (California State U, Los Angeles) **Human behavior: An introduction to psychology: Student guide.** New York, NY: Ronald Press, 1974. v, 111 p. \$1.95.—Presents a programmed guide on psychological concepts which accompanies the authors' text *Human Behavior: An Introduction to Psychology* (see PA, Vol 53:Issue 5).

8557. Martens, Francis. **[Echoing the uncanny.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 203-208.—Proposes that the conclusions which Freud draws in his article "The Uncanny" ("Das Unheimlich," 1919) considerably understate the implications developed in the rest of the article. His analysis classically adopts the concepts of castration, repression, anxiety, and repetition. This level of explanation weakens the very examples he chose to illustrate his analysis,



particularly the use made of the specifically visual order implied by the double and vision in Hoffman's tale "The Sandman". That tale offers a remarkable presentation of the "mirror world" (as it is formulated by Lacan in "The Stage of the Mirror"). In Freud—who was concerned with history rather than with structure—the double is hardly seen; it is merely the messenger from a disquieting past. The space of identification is replaced by the history of identification. The perturbing nature of the double stems not so much from the danger in the repressed elements which it contains as from its mode of intervention—which is to upset the spatial order of things, thus menacing the limits of the individual body and the fragile conquest of identity. Viewed from this angle, "the uncanny" arises from the always imminent threat of chaos—the disappearance of boundaries, the abolition of limits—and displays the precarious basis of the symbolic order. (English summary)—*S. S. Marzolf.*

8558. **Martindale, Colin.** (U Maine, Orono) **LEXSTAT: A PL/I program for computation of lexical statistics.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 571.

8559. **McVaugh, Michael R. & Mauskopf, Seymour H.** (U North Carolina, Chapel Hill) **Historical perspective and parapsychology.** *Journal of Parapsychology*, 1974(Sep), Vol 38(3), 312-323.—Discusses the work of 2 science historians whose investigations of the history of parapsychology focus on the field as an integral part of the general scientific culture of its period. Particular emphasis is placed on the background of J. Rhine in an attempt to determine the continuity of his work with early attempts at experimentation, the discontinuities and how they arose, and how his work was received. Specific examples of differences in perspectives among parapsychologists are provided.—*Journal abstract.*

8560. **Mecacci, Luciano.** (Consiglio Nazionale delle Ricerche, Istituto di Psicologia, Rome, Italy) **Western literature on Soviet psychology and physiology of behavior: A selected bibliography.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 233-245.—Lists over 260 entries, including writings which have appeared in Western countries about Soviet psychology, and the translations into English, French, German, Spanish, and Italian of monographs and anthologies by Soviet psychologists.—*Journal abstract.*

8561. **Moise, Samuel L.; Olsen, David E. & Huston, Steve W.** (U California, Brain Research Inst, Space Biology Lab, Los Angeles) **An automated system for prime instruction for behavioral neurophysiology.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 557-564.—Describes a flexible hardware-software system developed for use with a PDP-81 computer for conducting research in behavioral neurophysiology. A real-time monitor facilitates development, debugging, and modification of programs to run experiments. The system relieves the programmer of the burden of dealing with hardware-dependent functions such as interrupt handling and input-output. In addition, it provides the user with a large library of callable routines to perform functions commonly needed for conducting experiments.—*Journal abstract.*

8562. **Nikolskaya, A. A.** (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General &

Pedagogical Psychology, Moscow) **[On the psychological views of P. P. Blonskii.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 3-20.—Discusses P. P. Blonskii's (1884-1941) views on psychological problems. Blonskii was instrumental in shaping and developing Soviet psychology and had a wide range of psychological interests. Among the aspects of his thought that are considered are his views on the scientific method in psychological research, on the developmental aspect of behavior, and on the holistic approach to the study of man; his attempts to work out the interrelationships among the various aspects and levels of mental activity and between mental and physical processes, the effect of behavior on mental development, and the principles governing mental development. (English summary) (39 ref)—*L. Zusne.*

8563. **Ohtani, Akira; Kuchinomachi, Yasuo & Yagi, Akihiro.** (Industrial Products Research Inst, Tokyo, Japan) **A simple device for detecting saccades and judging their intervals.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 547-549.—Describes an apparatus with which the occurrence of saccades can be detected and their intervals classified by reference intervals determined by experimental requirements. The device reliably detects saccades of greater than 2°.

8564. **Parsons, Arthur S.** (Smith Coll) **Constitutive phenomenology: Schutz's theory of the We-relation.** *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 331-361.—Discusses the impact of A. Schutz's theory of the We-relation on his analysis of the constitution of a world of intersubjective meaning. Schutz holds that individuals are capable of We-relations in which the self is experienced through interaction with another person and by which an intersubjective world is mutually constructed. Mundane We-relations allow cooperative participation in the routine projects of society, while transcendent We-relations reconstitute and modify the intersubjective world. It is suggested that Western societies and families maintain a dialectical balance between these 2 types of We-relations.—*J. Kelly.*

8565. **Prabhu, G. G.** (India Inst of Medical Sciences, New Delhi) **Clinical psychology in India: In retrospect & prospect.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 3-7.—Describes the development of clinical psychology, as an independent scientific discipline, in India. The Indian Association of Clinical Psychology (IACP), established in 1968, was the first professional body formed to deal solely with issues in the field of clinical psychology. Although the IACP has achieved moderate success in responding to these issues, it is suggested that the association can increase its effectiveness in solving the problems facing Indian society by accepting additional responsibilities, i.e., for official registration of clinical psychologists, more advanced research activities, educating the public, working with other professional groups, continued education for professionals, and evaluation and revision of training programs in terms of society's needs and scientific advances.—*F. S. Beyer.*

8566. **Ryan, Joseph B.** (Family Life Apostolate of the Archdiocese of Newark, NJ) **Sixteenth century Skinner.** *Clinical Social Work Journal*, 1974(Sum), Vol 2(2),

105-112.—Presents similarities between a 16th century theological debate of Thomists vs Molinists, and the works of B. F. Skinner vs R. May and C. Rogers.

8567. Schandler, Steven L. & Grings, William W. (U Southern California) **A system for providing tactile EMG biofeedback.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 541-542.—Describes an inexpensive system for providing discrete pulses against the skin surface at a frequency proportional to the level of activity from selected muscle groups. System capabilities include the production of digital information for recording devices and the providing of pulsed auditory electromyogram biofeedback. The system may be particularly applicable for the experimental reduction of psychological and muscle tension.

8568. Smith, F. J. **Musical sound as a model for Husserlian intuition and time-consciousness.** *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 271-296.—Discusses the relationships between the experience of music and E. Husserl's phenomenological theories of perception. It is suggested that traditional musicology has overemphasized the mathematical and cognitive aspects of musical structure and underemphasized the study of sound perception. Musical metaphors and analogies were frequently used by Husserl to illustrate the psychological processes of intuition and time-consciousness. It is concluded that the attempts of 20th century musicology to explain auditory perception can benefit from both psychological empiricism and phenomenology.—J. Kelly.

8569. Sterner, Ray T.; Rawson, Ricky L. & Schulz, John W. (Denver Wildlife Research Ctr, Section of Supporting Sciences, CO) **Single-channel data sampling: Note on fabrication of an inexpensive, periodic scanner.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 743-746.—Observed classic sinusoidal circadian temperature patterns for 7 albino rats maintained under standard laboratory conditions using an inexpensive periodic scanner. Data validate use of both the device and the sequential sampling approach in certain biological-behavioral research applications.

8570. Sterner, Ray T.; Wheeler, James T. & Krabill, Lavern F. (Letterman Army Inst of Research, San Francisco, CA) **POSTHOC: A FORTRAN IV program for computing one-way analysis of variance and post hoc Dunnett, Newman-Keuls, or Scheffé mean comparisons.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 569.

8571. Thompson, Glenn C.; Heffner, Henry E. & Masterton, Bruce. (Florida State U) **An automated sound-localization chamber.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 550-552.—Describes a free-field apparatus and a behavioral technique with which the ability to localize the source of a sound has been successfully tested in a wide variety of mammals including cats, rats, squirrel monkeys, hedgehogs, and tree shrews.

8572. Tomlinson, Wallace K. & Perret, J. John. (Tulane U, Medical School) **Mesmerism in New Orleans, 1845-1861.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1402-1404.—Mesmerism was generally rejected by the medical establishment in Europe and the United States until J. M. Martin Charcot introduced it at

the Salpêtrière in the 1870s. Nonetheless, a well-organized and active mesmer society flourished in New Orleans from 1845 to 1861. The origins of the society, composition of the membership, its activities, and its relationship with the established medical community are presented. (18 ref)—*Journal abstract*.

8573. Toremalm, N. G. & Lagerholm, S. (U Lund, General Hosp, Malmö, Sweden) **The noise dosimeter.** *Scandinavian Audiology*, 1973, Vol 3(1), 3-9.—Describes a pocket-sized individual noise dosimeter which enables the user to measure the intensity, frequency, and duration of exposure to local noise sources as a prophylaxis against noise-induced hearing loss. Basic function tests of the apparatus are detailed.

8574. Urken, Arnold B. & Van der Veen-Huijsman, Antje. (Stevens Inst of Technology) **VOTEORD: A revision of VOTEPOW which includes an algorithm for analyzing sets of power orderings.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 571.

8575. Van Duyne, H. John. (Northern Illinois U) **A changing conceptualization of man in psychology.** *Journal of the Association for the Study of Perception*, 1974(Fal), Vol 9(2), 36-40.—Points out a shift from the behavioristic paradigm of observable bodily behavior to the cognitive paradigm of mental information processing which has been, since 1960, occupying scientific inquiry concerned with learning and performance. 3 recent historical developments contributing to this paradigm shift are noted. One such development has involved philosophical attacks which decreased the persuasiveness of the assumptions of British empiricism and logical positivism. Another development has consisted in exposure to psychological paradigms other than the behavioristic one, primarily those inherent in the philosophical traditions of Piaget's genetic epistemology and the materialistic monism of the USSR. The 3rd historical development has been the availability of new theoretical formulations and methodologies for dealing with cognitive processes that resulted from advances in disciplines such as finite mathematics, information theory, and linguistics. (37 ref)—B. Lindsey.

8576. Walsh, Robert R. & Roach, Eric T. (U Wisconsin, Madison) **A note on Pellegrino's (1972) program for analyzing higher order subjective organization units in free recall.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 565.

8577. Wassermann, Gerhard D. (U Newcastle upon Tyne, England) **Brains and reasoning: Brain science as a basis of applied and pure philosophy.** Hamden, CT: The Shoe String Press, 1974. xi, 169 p. \$15.—Develops the thesis that a neuropsychology-philosophy feedback cycle can be established, which by successive approximations may provide gradually improving simultaneous answers to major problems of neuropsychology and many branches of philosophy.

8578. Webb, Wilse B. (U Florida) **Progress in psychology: 1903-1907.** *American Psychologist*, 1974(Dec), Vol 29(12), 897-902.—Summarizes 5 annual reviews of psychological thought published between 1903 and 1907 by E. T. Buchner, editor of the *Psychological Bulletin*.

8579. Weinland, James D. **Consciousness, freedom, and dignity.** Philadelphia, PA: Dorrance, 1974. 99 p.



\$4.95.—Examines some of the controversy surrounding the view of consciousness as the humanizing aspect of man and behaviorism, which holds that all human actions are determined by past physical contingencies.

8580. Wicks, Jerry W. (Bowling Green State U) **Age-standardized death rates by the indirect method: A program for use on a computer terminal.** *Behavior Research Methods & Instrumentation*, 1974(Nov), Vol 6(6), 570.

8581. Wilson, Emmett. (Cornell U, Medical Coll, New York) **The structural hypothesis and psychoanalytic metatheory: An essay on psychoanalysis and contemporary philosophy of science.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 304-328.—Presents some problems stemming from functional interpretations of psychic structures (e.g., ego, id, superego). It is suggested that psychological theorists who object to the terms of the structural hypothesis because they are abstract entities do not understand the basically analogical nature of scientific theories. (3 p ref)

8582. Winett, Richard A.; Fuchs, William L. & Moffatt, Sarah A. (U Kentucky) **Personal and impersonal methods of recruitment for social research.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 376-379.—Investigated the effectiveness of both personal and impersonal methods of recruiting families for a study on the effects of day care. The personal approach included talks to groups of parents, tests, detailed handouts, and interviews. The impersonal method consisted of newspaper stories noting that participant families would be paid \$5. Generally, both methods resulted in an adequate sample size (personal  $n = 97$ ; impersonal  $n = 107$ ) and a low dropout rate. Neither approach, however, successfully recruited lower socioeconomic status or black families. For each method ethical safeguards were taken to assure participant's full knowledge of the procedures and objectives of the project. Because the impersonal method required much less time and effort (about 40 hrs), it is suggested that researchers first use the impersonal method, followed if necessary by a focused personal approach.—*Journal summary*.

## PSYCHOMETRICS AND STATISTICS

8583. Murrell, Hywel. (U Wales, Inst of Science & Technology, Cardiff) **Performance rating as a subjective judgement.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 201-208.—Argues that there appears to be no reason for subjective judgments of rating to differ from other forms of human judgment. For a rating scale to be linear, the subjective assessment and the actual performance should both be expressed in logarithmic form. The present investigation uses data from previously published research to explore the possibilities of this concept. It is concluded that, provided proper scales are used and proper safeguards taken, subjective assessment as a method of measurement can be highly efficient.—*Journal abstract*.

8584. Osborn, William C. **Process versus product measures in performance testing.** *HumRRO Professional Paper*, 1974(Oct), No 16-74, 4 p.—Perform-

ance tests are used in training evaluation to certify student achievement and to diagnose weaknesses in the instructional system. Proficiency measures that focus on task outcomes (product) normally provide data relevant to the 1st purpose, whereas measures of how the tasks are carried out (process) pertain to the 2nd. Time or cost factors sometimes preclude the use of product measures, leaving measures of task process as the only available criteria for evaluating training outcomes. Instances in which process measures are typically substituted for product measures are described, with reference to the types of tasks for which the substitution is valid and those for which it is invalid. Theoretical and practical issues pertaining to the use and misuse of process measures are discussed.—*Journal abstract*.

8585. Phillips, Beeman N. (Ed.). **Assessing minority group children: A special issue of Journal of School Psychology.** New York, NY: Behavioral Publications, 1973. 291-413.—Includes 11 chapters which discuss psychological testing and its underlying assumptions, criterion-referenced and norm-referenced assessment of minority group children, strategies for assessing intellectual patterns in minority group children, and language characteristics of black and Mexican-American children. Some psychological materials are also reviewed.

8586. Popplestone, John A. & McPherson, Marion W. (U Akron, Archives of the History of American Psychology) **The prolonged avoidance of intellectual behavior.** *Psychological Record*, 1974(Fal), Vol 24(4), 549-557.—The 1960 Stanford-Binet Intelligence Scale demonstrates an extensive amount of historic content in that 8% of it is 63-69 yrs of age, nearly 50% is 56 yrs old, and 100% is 37 yrs of age. Such longevity is typical of various contemporary tests, and the use of aged material promotes freedom from recent research results. Items have been retained because they yield results congruent with the hypothesized constancy of "intelligence" and because they are practical, easy to administer, and score. The continued reliance on such material syntonetic with outmoded theory prolongs the avoidance of observations of intellectual behavior. (27 ref)—*Journal abstract*.

8587. Wig, N. N.; Pershad, D. & Verma, S. K. (Postgraduate Inst of Medical Education & Research, Chandigarh, India) **The use of psychometric tools in Indian psychiatric research: A reappraisal.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 8-14.—Describes several areas of psychometric testing in India to which future efforts must be directed. Results of the recent increase in the administration of translations and adaptations of Western tests have indicated that test validity is severely limited by culture-bound concepts and interpretations, in addition to inducing patient distress. This situation is also evidenced with the use of "culture-free" tests. Another potential source of invalidity is test difficulty. Only 4 out of 17 Hindi tests were found to have acceptable test difficulty levels. Other areas requiring attention are the suitability of statistical procedures commonly employed and the need for psychometric testing in additional areas. A recommended procedure for test construction is presented. (20 ref) —F. S. Beyer.

## Test Construction &amp; Validation

8588. Anwar Yousuf, S. F. (A.N.S. Inst of Social Studies, Patna, India) **An investigation into the construct validity of the Nationalization Scale.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 48-53. —Related scores on Mohsin's Nationalization Scale (NS) to scores on Sinha's Dependence Proneness Scale (DPS) and Rotter's Internal-External Control Scale (IECS) in a study of the construct validity of the NS. 200 18-27 yr old college students were tested. Contrary to hypothesis, the scores on DPS and IECS did not correlate significantly either with each other or with the scores on NS. Differences in the scores of Arts students and Science students, and the relationship between biographical factors and attitudes toward nationalization, are discussed.—*B. Lindsey.*

8589. Baumann, Urs. (U Zurich, Psychiatric Clinic, Switzerland) **[Examination of the equivalence of FPI results.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(2), 85-104.—Investigated the equivalence of data obtained from 7 different samples given the primary and derived scales of the Freiburg Personality Inventory (FPI). The numerous aspects which were studied are specified and discussed. Analysis of results of the study indicates the following: (a) Mean values are influenced significantly by age, sex, nationality, and experimental situation and can be compared only in parallel groups. (b) Covariation of variables is largely independent of the samples, and data obtained from factor analyses with FPI scales and other variables are valid. (c) Statistical models which assume linear regression are adequate with FPI scales because curvilinear regression is infrequent. (d) The derived scales E, N, and M (extraversion, emotional lability, and masculinity) are well defined by the 9 primary scales. (e) 5 of the 12 scales—FPI 1, 2, 4, 9, and N—deviate either in quantity or in direction from the normal distribution. It is suggested that a short version of the extraversion, neuroticism, and openness scales would be useful and should be considered and studied. (English summary) (15 ref)—*T. Fisher.*

8590. Brandtstädter, Jochen & Becker, Peter. (U Trier-Kaiserslautern, W Germany) **[The possibility of integrating factor-analytical and clinical research: A study of the Minnesota Multiphasic Personality Inventory.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(2), 105-125.—Discusses the possibility and potential research value of integrating clinical and factor-analytical findings and demonstrates related problems and methodological approaches with the Saarbrücken MMPI as an example. MMPI profiles of different clinical groups were coordinated with the factors obtained in a factor analysis of MMPI data from a sample of 281 military persons by estimating factor scores of the clinical profiles and comparing them with profiles of ideal types derived from the obtained MMPI factors. Data of the study are said to confirm the heuristic value of the integration of clinical and factor-analytical findings. (English summary) (34 ref)—*T. Fisher.*

8591. Burns, Edward & Schaaf, Sally. (Ohio U) **The validity of ITPA composite psycholinguistic age and psycholinguistic quotient scores.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 308-309.—Reports on the

validity between the Illinois Test of Psycholinguistic Abilities and the Stanford-Binet, with children 3-5 yrs old.

8592. Cherlin, Andrew & Bourque, Linda B. (U California, Los Angeles) **Dimensionality and reliability of the Rotter I-E Scale.** *Sociometry*, 1974(Dec), Vol 37(4), 565-582.—In an attempt to develop suggestions for more effective use of Rotter's Internal-External Control Scale (I-E), an analysis was made of the dimensionality and reliability of the scale in both 161 undergraduates and 100 randomly selected adults. Results imply that (a) the I-E Scale should not be considered as unidimensional, (b) the characteristics of the population sampled may affect the structure of the factors obtained and also the strength of the reliabilities of the various factor scales, and (c) other items used with the I-E Scale in the same survey instrument may affect the structure and reliability of the resultant scales. Data analysis procedures are suggested which may prove useful in studies employing other attitude measurement scales. (15 ref)—*Journal abstract.*

8593. Cohler, Bertram J.; Weiss, Justin L. & Grunebaum, Henry U. (U Chicago, Committee on Human Development) **"Short-form" content scales for the MMPI.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 563-572.—Using an abbreviated version of content scales derived by a rational-theoretical approach to the MMPI item pool rather than the traditional criterion group approach, this report demonstrates both satisfactory long-short-form correlations and promising internal consistency for these short-form scales. Comparing 40 women discharged from a psychiatric hospital and 41 nonpsychiatric controls, these content scales differentiated the 2 groups both at the beginning of an aftercare and intervention study and approximately 20 mo later. Mood scales were somewhat less stable over time, especially among patients. While not correlated with age or verbal intelligence, several scales were correlated with measures of social status. (21 ref)—*Journal abstract.*

8594. Curran, J. D. & Gibson, H. B. (Hatfield Polytechnic, England) **Critique of the Stanford Hypnotic Susceptibility Scale: British usage and factorial structure.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 695-704.—Criticized the Stanford Hypnotic Susceptibility Scale with regard to a number of procedural and technical details. It is suggested that it cannot be administered and scored with complete efficiency by 1 E working on his own. The administration and content of the scale were modified in a number of specified ways and 43 undergraduates were tested, E and O being present at each individual session. Results were analyzed with respect to the percentage of Ss passing each item, with item-scale correlations, interitem correlations, and factorial structure. Data suggest there is need for technical improvements in the administration of the scale and for the development of additional items which would be "purer" measures of the behaviors being measured. (21 ref)—*Journal abstract.*

8595. Duke, Marshall P. & Kiebach, Carol. (Emory U) **A brief note on the validity of the Comfortable Interpersonal Distance Scale.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 297-298.—Conducted a study of 20 Ss to test the validity of the Comfortable



Interpersonal Distance Scale (CID) by examining the relationship between CID scores and real life distancing preferences. Results support the validity of the CID.

8596. Gendre, F. [Evaluation of the personality by the California Psychological Inventory (CPI) by H. Gough.] (Fren) *Revue de Psychologie Appliquée*, 1974, Vol 24(3), 159-179.—Reports on a study of the factorial composition, reliability, and validity of the CPI. Multiple regression equations are provided for predicting academic achievement and delinquency from CPI scales. The relation of the CPI to the MMPI in a clinical setting is reported, and its application in selecting secretaries and mechanics is described.

8597. Klemmack, David L.; Carlson, John R. & Edwards, John N. (U Alabama) Measures of well-being: An empirical and critical assessment. *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 267-270.—An analysis of 3 commonly used measures of well being—the Life Satisfaction scale, the Social Isolation scale, and the Willingness to Live scale—shows that the internal consistency of the social isolation items does not exceed the cross-correlation between the social isolation and life satisfaction items.

8598. Larsson, Bernt. Frequency words and frequencies: A pilot study on relations between differently anchored scales. *Didaktometry*, 1974(Nov), No 44, 13 p.—Required 44 20-70 yr old adults to answer 6 questions, partly with a frequency response and partly by marking a verbally anchored scale with 5 categories. Univariate and multivariate analyses were performed to elucidate the relationships between variables resulting from the 2 different modes of response. Although there were similarities in results for the 2 types of variables they could be regarded as interchangeable. The frequency spread for a given category was often far from negligible.—*Journal abstract*.

8599. Moore, Robert J. (U Saskatchewan, Regina, Canada) Detectability of items and self-rating validation of the Eysenck Personality Inventory. *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 573-577.—Asked 31 male and 36 female 18-67 yr old Ss to identify which items of the Eysenck Personality Inventory (EPI) were measuring extraversion (E), neuroticism (N), and lying. In contradiction of previous findings employing university students, the present sample was neither cognizant of the EPI's specific objectives, nor were they capable of detecting accurately individual items with any degree of consistency. In addition, Ss were requested to rate themselves on E and N. Self-rating and EPI means and standard deviations were essentially equivalent. Correlations between self-rating and EPI measures of E and N were .57 and .41, respectively.—*Journal abstract*.

8600. Mueller, Daniel J. (Indiana U, School of Education) A test of the validity of two scales on Rokeach's Value Survey. *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 289-290.—Constructed additional scales to measure the validity of the "Equality" and "Freedom" constructs of the Rokeach Value Survey. Results show low correlations between the developed scales and the Rokeach scale.

8601. Newcomer, Phyllis & Hammill, Donald. (U Texas, Austin) A short form of the Revised Illinois Test of Psycholinguistic Abilities. *Journal of Learning Disabil-*

*ities*, 1974(Nov), Vol 7(9), 570-572.—Describes a short form of the Illinois Test of Psycholinguistic Abilities (ITPA) developed for use in research projects. Sample items were selected from each subtest so that all the psycholinguistic functions measured by the original test were included in the abbreviated version. Both the long and shortened tests were administered to 83 "normal" children aged 5-10 yrs. *T* tests of differences between subtests mean scores on both versions were computed and were not statistically significant at the 5% level of confidence. Correlation coefficients between the long and shortened version of each subtest were also computed. In all but 1 instance (the Auditory Closure Subtest, correlated at .78), coefficients reached or exceeded the .80 lower level set as acceptable for alternate test reliability. Although these results indicate that the short form ITPA had sufficient reliability to be used for research or screening, it is recommended that the study be replicated on children of uniform chronological age before it is used in clinical settings.—*Journal abstract*.

8602. Patel, K. Scientific Aptitude Test. *Journal of Psychological Researches*, 1972(May), Vol 16(2), 74-79.—Developed an aptitude test to measure the scientific potential of Indian students. The relevance of skills and abilities was determined on the basis of rankings, taken from J. P. Guilford's 1963 study, by scientists of 28 intellectual factors in order of importance for their work. 48 questions in each of 8 broad areas of science were prepared by specialists to meet the test objectives. Parametric data were collected by administration of the test to 1st-yr science students who had achieved a certain level of competence in scientific subjects. Tables of average difficulty values, Davis Discrimination Indices, and intercorrelations are presented.—*B. Lindsey*.

8603. Sakuntala, Velpuri. (Indian Statistical Inst, Calcutta) Simulation studies on determination of test length. *Journal of Psychological Researches*, 1972(May), Vol 16(2), 60-61.—Used an IBM computer to transform samples of random normal deviates to sample observations from a normal distribution with specified mean and variance. Samples were drawn without replacement from the Rand Corporation's 1955 study, *Million Random Digits with 100,000 Normal Deviates*. Results establish that (a) the required (*n* req) as well as the estimated (*n* est) test lengths are large for all lengths of the sample test, with high variation over different tests of the same length, when the true score variance (*S*<sup>2</sup>) is high; (b) *n* req and *n* est are small for all sample tests of different lengths, with lesser variation than in the previous case over different tests of the sample length, when *S*<sup>2</sup> is low; and (c) due to random fluctuations obtained from the sample tests of the same length there are quite large differences in the estimated test lengths.—*B. Lindsey*.

8604. Serpell, Robert. (U Zambia, Lusaka) Aspects of intelligence in a developing country. *African Social Research*, 1974(Jun), No 17, 578-596.—Examines various theories of the psychometric approach to intelligence and their validity in a cross-cultural perspective, such as the emerging African nations. These include the linguistic relativity theory which argues that language restricts perception or, alternately, that it molds abstract concepts. The field dependency theory sees as critical the

style of parental discipline with the children's analytic perception requiring parental enlightenment in Western concepts. Perceptual learning theory permits 2 approaches: modification of the tests or modification of the people. Almost all intelligence tests are Western-oriented, and attempts to construct tests for a different cultural group using nonverbal, non-Western criteria have so far not met with much success. (29 ref)—*A. de la Haba.*

8605. **Tousignant, Michel; Denis, Guy & Lachapelle, Rejean.** (U Sherbrooke, Quebec, Canada) **Some considerations concerning the validity and use of the Health Opinion Survey.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 241-252.—Considers that there are still many problems related to the validity of the Health Opinion Survey (HOS) and to the interpretation of its results, despite the wide application of this instrument devised to screen mental disorders in a general population. Data from a validity evaluation of the HOS using 1,158 25-64 yr old Canadian adults are reported. It is argued that this questionnaire possesses some psychometric qualities (stability over time, internal consistency, criterion validity), but there are also many questions related to its validity. The lack of face validity, the absence of a good correlation with the judgment of clinicians, and the influence of 2 biases—physical health and social desirability—militate against the further use of the HOS. It is suggested that 3 categories of problems are screened by high scores—chronic mental disorder, transition stress situations, and bad physical health—and that the HOS not be used in epidemiological surveys of mental disorders because of the numerous methodological questions that remain unsolved. (19 ref)—*Journal abstract.*

8606. **Walsh, James A.** (U Montana) **Comment on Rodewald and Carroll.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 853-854.—H. K. Rodewald and J. L. Carroll (see PA, Vol 52:1952) reported surprise at discovering intransitivities among responses to items used to evaluate attitudes toward faculty members' overall teaching performance. Literature is cited to support the contention that the items were multidimensional and that intransitivity should have been expected.

### Mathematical Models & Statistics

8607. **Buss, Allan R. & Royce, Joseph R.** (U Alberta, Ctr for Advanced Study in Theoretical Psychology, Edmonton, Canada) **Detecting cross-cultural commonalities and differences: Intergroup factor analysis.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 128-136.—Discusses the usefulness of factor analysis in making cross-cultural comparisons. After noting the limitations of previous efforts to arrive at factors common across cultural groups, a more direct strategy is outlined which involves modifying L. Tucker's (see PA, Vol 33:7322) interbattery factor technique to yield intergroup factor analysis. Intergroup factor analysis permits the direct solution of "type" factors common across cultural groups and those unique within cultural groups. It is argued that the potential value of intergroup factor analysis for cross-cultural research lies in the new questions which this technique may address. (42 ref)—*Journal abstract.*

8608. **Corbin, Ruth & Marley, A. A.** (McGill U, Montreal, Quebec, Canada) **Random utility models with equality: An apparent, but not actual, generalization of random utility models.** *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 274-293.—Introduces a probabilistic model for choice and preference that includes A. Tversky's (1972a, b) elimination by aspects model, and the random utility model, as special cases. The present model is based on a covert sequential elimination process, the element that is finally chosen in a simple choice experiment being the eventual lone survivor of the elimination process. The model leads one (a) to question the usual form of simple choice experiments, in which an S must (eventually) choose one of the currently available alternatives, and (b) to suggest that a much more realistic experimental design would allow the S the no-choice option (i.e., he may refuse to accept any of the currently available alternatives).—*Journal abstract.*

8609. **Corcoran, John.** (State U New York, Buffalo) **Discourse grammars and the structure of mathematical reasoning: III. Two theories of proof.** *Journal of Structural Learning*, 1972, Vol 3(3), 1-24.—Contrasts an older theory of proof—the linear theory—with a newer theory—the suppositional—which takes into account important characteristics of mathematical reasoning. Some main ideas needed in constructing a comprehensive theory of proof are developed. The older theory holds that mathematical reasoning proceeds from axioms step-by-step to conclusions in a strictly linear fashion. This theory does not agree with mathematical practice, and the newer theory is seen as resolving this deficit. Examples of rules and proofs are provided. (22 ref)—*R. S. Albin.*

8610. **Davis, James A. & Schooler, Susan R.** (U Chicago, National Opinion Research Ctr) **Nonparametric path analysis: The multivariate structure of dichotomous data when using the odds ratio or Yule's Q.** *Social Science Research*, 1974(Dec), Vol 3(4), 267-297.—Presents a statistical model using odds ratios to evaluate the set of intuitive rules for path analysis of dichotomous variables which is presented in J. A. Davis's text, *Elementary Survey Analysis* (1971). Results support the conclusions that (a) with nonrecursive systems and no higher order interaction effects, the rules are quite valid and can even be simplified; (b) in the presence of interactions and strong skewness on the variables, the rules are not appropriate and (c) the rules are not valid for recursive systems.—*Journal abstract.*

8611. **Fishburn, Peter C. & Keeney, Ralph L.** (Pennsylvania State U) **Seven independence concepts and continuous multiattribute utility functions.** *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 294-327.—Examines concepts based on a preference relation on the set of simple probability measures defined on a set of simple probability consequences. 3 of the independence relations involve gambles, and the other 4 are based on riskless preferences over the  $n$ -tuples in the consequence set. The main theorems state conditions under which 1 or more of the risky independence relations can be derived from a riskless independence relation in conjunction with other conditions. The other conditions include a riskless independence condition which differs from the



one(s) to be derived, the assumption that the consequence set is a convex subset of a finite-dimensional Euclidean space, and the assumption that the individual's von Neumann-Morgenstern utility function on the consequence set is continuous. (29 ref)—*Journal abstract*.

8612. **Greenwald, Anthony G.** (Ohio State U) **Consequences of prejudice against the null hypothesis.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 1-20.—Examined the consequences of prejudice against accepting the null hypothesis through (a) a mathematical model intended to stimulate the research-publication process and (b) case studies of apparent erroneous rejections of the null hypothesis in published psychological research. The input parameters for the model characterize investigators' probabilities of selecting a problem for which the null hypothesis is true, of reporting, following up on, or abandoning research when data do or do not reject the null hypothesis, and they characterize editors' probabilities of publishing manuscripts concluding in favor of or against the null hypothesis. With estimates of the input parameters based on a questionnaire survey of 75 social psychologists, the model output indicates a dysfunctional research-publication system. Particularly, the model indicates that there may be relatively few publications on problems for which the null hypothesis is (at least to a reasonable approximation) true, and of these, a high proportion will erroneously reject the null hypothesis. The case studies provide additional support for this conclusion. It is concluded that research traditions and customs of discrimination against accepting the null hypothesis may be very detrimental to research progress. (44 ref)—*Journal abstract*.

8613. **Haight, Frank A. & Jones, Robert B.** (Pennsylvania State U) **A probabilistic treatment of qualitative data with special reference to word association tests.** *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 237-244.—Uses psychological terminology and notation to develop a theory of qualitative random variables, considering an infinite population of Ss who are presented sequentially with a qualitative stimulus, and supposing that each S replies with a well-defined qualitative response. The postulates of the Yule-Simon (1924, 1955) theorem are proven systematically, and 2 modifications of the Yule-Simon model are proposed in which (a) the probability of a neologism is considered to be dependent on the state of the system and (b) the assumption of equilibrium is not made. The theory is briefly applied to G. K. Zipf's (1949) model.—*B. McLean*.

8614. **Hartmann, Donald P.** (U Utah) **Forcing square pegs into round holes: Some comments on "An analysis-of-variance model for the intrasubject replication design."** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 635-638.—Critically examines the application of fixed-effect 2-way analysis-of-variance procedures to learning data from a single S. Procedures more appropriate for data obtained from intra-S replication designs are briefly described.

8615. **Keselman, H. J. & Leventhal, L.** (U Manitoba, Winnipeg, Canada) **Concerning the statistical procedures enumerated by Gentile et al: Another perspective.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 643-645.—Brings to the attention of operant researchers

statistical procedures that are appropriate for correlated data. The suggestion to use analysis of variance procedures for single-S designs by J. R. Gentile et al (see PA, Vol 49:1519) is discussed. In addition to specifying these statistical procedures, consideration is given to the question of using individual comparison statistics rather than omnibus *F* tests. Specifically, it is recommended that a more powerful test of the experimental hypotheses can be obtained by performing Bonferroni *t* statistics rather than analysis of variance *F* tests.—*Journal abstract*.

8616. **Kratochwill, T. et al.** (U Wisconsin, Madison) **A further consideration in the application of an analysis-of-variance model for the intrasubject replication design.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 629-633.—Argues that the analysis-of-variance model is inappropriate for assessing treatment effects in single-S designs. In particular, such designs are shown to violate the crucial assumption concerning the statistical independence of observations. Alternative methods of data analysis are suggested.—*Journal abstract*.

8617. **Lachin, John M. & Schachter, Joseph.** (George Washington U) **On stepwise discriminant analyses applied to physiologic data.** *Psychophysiology*, 1974(Nov), Vol 11(6), 703-709.—Discusses how stepwise discriminant function techniques with evoked physiologic data can be misused and misinterpreted, pointing out specific pitfalls to be avoided. The various statistical tests of hypotheses used with stepwise discriminant functions, predominantly in the BMD07M computer program, are discussed in relationship to the law of the iterated logarithm. This law clearly shows how highly significant differences will almost always be found when a stepwise procedure is used even though there may be no real differences between groups. As an empirical illustration, a series of physiologic data (EKG and EEG) was collected under stimulus and no stimulus conditions. Stepwise analyses consistently produced significant differences under no stimulus conditions whereas non-stepwise procedures did not. Under stimulus conditions, stepwise analyses consistently exaggerated the extent of differences detected by nonstepwise analyses. (21 ref)—*Journal abstract*.

8618. **Lienert, G. A. & Krauth, J.** (U Düsseldorf, Psychologisches Inst, W Germany) **[Configuration frequency analysis.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 108-121.—Discusses the use of interaction structure analysis as a multivariate nonparametric tool in evaluating designs with repeated measurements. With 1 repetition, the difference method is employed. For *M*-point measurement curves, polynomials are used and their coefficients are treated as pseudo-observables.—*S. D. Babcock*.

8619. **Michael, Jack.** (Western Michigan U) **Statistical inference for individual organism research: Mixed blessing or curse?** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 647-653.—Describes descriptive and inferential statistics as judgmental aids, stimuli to which the scientist can more easily react than to his raw experimental results. The increasing emphasis on the significance test as the main judgmental aid utilized in experimental psychology is credited with several harmful

effects on experimental practice. The area known as "the experimental analysis of behavior" has so far escaped most of these harmful effects, but now we see an increased interest in the development of appropriate significance tests for individual organism research. This interest is based on the view that it is not possible to effect adequate levels of experimental control with much human applied research, and that in such cases a significance test would be quite valuable as a judgmental aid, both of which points are considered to be essentially incorrect, and if accepted, potentially harmful.—*Journal abstract*.

8620. Michael, Jack. (Western Michigan U) **Statistical inference for individual organism research: Some reactions to a suggestion by Gentile, Riden, and Klein.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 627-628.—Presents comments on the suggestion of J. R. Gentile et al (see PA, Vol 49:1519) that analysis of variance models be used for data obtained with reversal designs from a single S. The role of statistical methods in psychology and the implications of this analysis for psychology and behavioral analysis in general are also examined.

8621. Mitroff, Ian I. & Featheringham, Tom R. (U Pittsburgh) **On systemic problem solving and the error of the third kind.** *Behavioral Science*, 1974(Nov), Vol 19(6), 383-393.—Attempts to formulate the error of the 3rd kind—Em, the probability of having solved the wrong problem when one should have solved the right problem. Em is basic to the notion of systemic problem conceptualization. It is shown that Em can be given a precise treatment by considering how the value of a problem state changes as its conceptualization is varied across a set of basic systemic problem representations. Em can itself be represented as a constrained maximization decision problem. (20 ref)—*Journal abstract*.

8622. Molenaar, W. (Rijksuniversiteit Groningen, Netherlands) **[Logistic and normal curves.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 415-419.—Discusses the resemblance between logistic and normal curves. The choice of the best logistic scale factor  $D$  depends on the further specification of the concept of resemblance. R. F. van Naerssen (1950) found that when the factor  $D$  is 1.732 or  $\sqrt{3}$ , it leads to an equal biserial  $r$  in a bivariate distribution. When  $D$  is 1.6 or 1.603, it leads to the smallest possible maximum distance between the logistic and normal densities. For close agreement of density and cumulative curve in the middle region, one should take  $D = 1.5958$ .—A. J. Ter Keurst.

8623. Overall, John E. & Woodward, J. Arthur. (U Texas, Medical Branch, Galveston) **Unreliability of difference scores: A paradox for measurement of change.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 85-86.—Argues that the use of difference scores to measure change in experimental research has often been faulted on the grounds that errors of measurement are additive. It is suggested that in research concerned with differences between experimental treatment groups, the loss in reliability due to calculation of difference scores is not a valid concern because the power of tests of significance is maximum when the reliability of the difference scores is zero.—*Journal abstract*.

8624. Pellegrino, James W. (U Pittsburgh) **A reply to Frender and Doubilet on the measurement of clustering.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 66-67.—Examined the conclusion of R. Frender and P. Doubilet (see PA, Vol 51:10440) that W. Bousfield's (1953) ratio of repetition measure is the best index of clustering. Their conclusions were based upon evidence that the expected value of the measure was independent of amount recalled, but it is shown that measures which involve corrections for chance also have this same independence. It is suggested that selection of a best clustering measure must therefore rest upon other criteria.—*Journal abstract*.

8625. Pinneau, Samuel R. & Ault, John T. (California State U, Northridge) **Univariate and multivariate component analysis.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 955-985.— $F$  values for a large number of different univariate experimental designs with any number of treatment or classification variables can be obtained using the analysis of component variance. These relatively simple procedures are extended to multiple dependent variables, yielding an alternative statistical method to a number of standard regression procedures and to multivariate analysis of variance. As part of this analysis of linear relationships, the variance-covariance matrix, based on standardized dependent variables and then freed of treatment effects, is decomposed. The resulting components, unrotated or rotated, may be evaluated for their psychological meaningfulness as in any factor analytic study. Measures of the effects of the treatments on these components are presented. (23 ref)—*Journal abstract*.

8626. Thoresen, Carl E. & Elashoff, Janet D. (Stanford U) **"An analysis-of-variance model for intrasubject replication design": Some additional comments.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 639-641.—Argues that the fixed-effects analysis of variance (ANOVA) used by J. R. Gentile et al (see PA, Vol 49:1519) for single Ss is inappropriate. D. P. Hartmann's (see PA, Vol 53:Issue 5) proposal of a 1-way fixed-effect ANOVA model is also considered. Time series analysis that takes serial correlation effects into account is recommended.—*Journal abstract*.

8627. van der Ven, H. G. (U Nijmegen, Psychological Lab, Netherlands) **A Bayesian formula score for the simple knowledge or random guessing model.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 409-413.—Suggests a new formula for the correction-for-guessing process. The usual formula is based on the regression of the number of items right on the number of items known. The new formula, based on Bayesian statistics, uses the regression of the number of items known on the number of items of the number of items known. The Bayesian condition for the number of items known. The Bayesian formula score assumes that the S either knows the answer or does not, that the probability of choosing the correct alternative is unity whether or not he knows the answer. All alternatives are equally likely. Thus each S is treated in the same way, as one's prior belief about the S being tested is the same for all Ss.—A. J. Ter Keurst.

8628. Van Leeuwe, Jan F. (Katholieke U, Researchtechnische Dienstverlening, Nijmegen, Netherlands)



**Item tree analysis.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 475-483.—Compares the problem of the goodness of fit and the interpretation of the outcome of procedures to branches in a tree. The items are branching points and the relationships between pairs of items are branches. An exploratory method of analyzing the order relations in a set of bivalued items is to avoid intransivities. 2 goodness-of-fit measures are presented: (a) Determining the percentage of Ss whose pattern does not contradict the weak partial order. (A weak partial order contains only 1 type of relationship and is directed; i.e., the connecting lines indicate the direction and contain no circuits. No circuits exist when it is impossible to return to the starting point.) (b) Calculating the agreement of the correlations of the items. A 4-stage algorithm is developed: (a) determination of the equivalent items in the matrix, (b) dividing the set of items into a number of subsets that are not connected by any relation, (c) permuting the items remaining from step (b) to construct a reachability matrix (Z) and (d) removing from Z the relations that are induced by other relations.—A. J. Ter Keurst.

8629. Van Leeuwe, Jan F.; Mommers, Martin J. & Smits, Bep W. (Katholieke U, Nijmegen, Netherlands) [Smallest space analysis of some Dutch intelligence and achievement tests.] (*Duth*) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 459-474.—Analyzed the relationships among a number of intelligence and achievement tests in terms of L. Guttman's smallest space analysis (see PA, Vol 43:7555), which judges the comparability of the investigated factors. Ss were 620 6th-grade pupils from 25 Dutch schools. The reference examination was the Interest, School Progress and Intelligence Test. 5 factors were identified: Numerical Abilities, Language Performance, Verbal Intelligence, Space Perception, and Concept Formation. These were determined by factor analysis to be in the figural, verbal, and numerical sectors. The distinction between Rule-Infering, Rule-Appling, and School Achievement factors could not be established. It was possible to identify the tests which were more or less specific in their areas of measurement.—A. J. Ter Keurst.

8630. Van Naerssen, Robert F. (U Amsterdam, Netherlands) **A mathematical model for the optimal use of criterion referenced tests.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 431-445.—Develops a mathematical model for a situation in which the learning process of a student is tested under the best conditions, as presented by J. H. Block. These conditions are described by the pattern of testing which requires the student to pass a certain mastery test after a number of attempts with fixed time periods between the tests. The formula is presented.—A. J. Ter Keurst.

8631. Van Naerssen, Robert F. (U Amsterdam, Psychologisch Lab, Netherlands) [Psychometric aspects of the core item method.] (*Duth*) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 421-429.—Proposes a method of developing grading standards that can be used with core items in an

objective teacher-constructed test. Such core items represent the borderline between success and failure and correlate relatively high with total score. F. M. Lord and M. R. Novick (1968) presented several formulas in which the selection ratio,  $s$ , can be a function of 2 item parameters: the corrected  $p$  value and the biserial  $r$ s with ability or total score. It is recommended for teachers of small samplings of students to use the biserial  $r$  method when the biserial  $r$  is in the neighborhood of .5. The formula for  $s$  in such a case is given, as well as the formula for use when the sample is not too small.—A. J. Ter Keurst.

8632. Woodward, J. Arthur & Overall, John E. (U Texas, Medical Branch, Galveston) **Multivariate analysis of variance by multiple regression methods.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 21-32.—Discusses multivariate analysis of variance as a general case of familiar multiple regression analysis. A consequence of this approach is a unified treatment of multivariate analysis of variance which can be used by psychologists who are generally familiar with multiple regression approaches to univariate analysis of variance. It is suggested that the generality of the approach permits solutions consistent with any of the several available strategies for dealing with problems of unequal and disproportionate cell frequencies. Inherent in the multiple regression formulation is the otherwise not so obvious fact that univariate analysis of variance results are an integral part of the multivariate solution and that both are important for understanding complex data. Methods of interpreting multivariate analysis of variance results in complex factorial experimental designs are discussed. (32 ref)—*Journal abstract.*

8633. Wyer, Robert S. (U Illinois) **Functional measurement methodology applied to a subjective probability model of cognitive functioning.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 94-100.—Used functional measurement procedures to test R. S. Wyer and L. Goldberg's (see PA, Vol 44:6638) subjective probability model of cognitive organization. 54 undergraduates estimated the likelihood that a hypothetical person had an attribute ( $P_a$ ) on the basis of information that directly affected their beliefs that persons in general have a particular gene ( $P_a$ ) and that persons who do not have this gene possess the attribute ( $P_{b/a}$  and  $P_{b/a'}$ ).  $P_a$  interacted significantly with both  $P_{b/a}$  and  $P_{b/a'}$ ; each of these interactions was concentrated in the bilinear component, supporting the assumption that each pair of beliefs has multiplicative effects upon  $P_b$ . A small but significant interaction of  $P_{b/a}$  and  $P_{b/a'}$  was also detected, contrary to implications of the model. Although the model provided a good quantitative description of the relations among the beliefs involved without the necessity of introducing ad hoc curve-fitting parameters, small but significant discrepancies from prediction were detected. These discrepancies suggested that  $P_a$  and  $P_{b/a}$  were weighted appropriately, but that  $P_{b/a'}$  should receive a weight inversely proportional to its magnitude. In sum, results support the general formulation proposed.—*Journal abstract.*

## PERCEPTION AND MOTOR PERFORMANCE

8634. Drury, C. G.; Cardwell, M. C. & Easterby, R. S. (State U New York, Buffalo) **Effects of depth perception on performance of simulated materials handling tasks.** *Ergonomics*, 1974(Sep), Vol 17(5), 677-690.—Conducted 4 experiments using a laboratory simulation of a fork-lift truck setting task with a total of 46 male Ss. In general, the same effects were observed as found in an earlier study using fork-lift trucks except that the direction of errors was reversed, showing a reversal of movement relationships in the simulator. The visual angle between the Ss' direction of motion and their line of sight to the target had a large effect on performance times and error rates. When this angle was less than  $12^\circ$ , both times and errors increased sharply. Performance times at different movement amplitudes and target widths were a linear function of an index of difficulty, except for target widths of less than 2% of the amplitude. S age and experience of fork-lift truck driving had a significant effect on performance. Augmentation of vision using a closed-circuit TV display was beneficial to performance, reducing times by 14% and errors by 52%. (French & German summaries)—*Journal abstract*.

8635. Koulack, David & Schultz, Katherine J. (U Manitoba, Winnipeg, Canada) **Task performance after awakenings from different stages of sleep.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 792-794.—In 2 experiments with a total of 16 male undergraduates, performance on both the Trail Making test and a vigilance task did not differ as a function of the sleep stage from which S was aroused. However, performance on the vigilance task was poorer after awakenings from REM periods with higher eye-movement density than after awakenings from REM periods with lower eye-movement density.—*Journal abstract*.

## Perceptual Processes

8636. Birnbaum, Michael H. & Veit, Clairice T. (Kansas State U) **Scale-free tests of an additive model for the size-weight illusion.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 276-282.—In 2 experiments, a total of 36 undergraduates rated the difference in heaviness between 2 objects varying in both size and weight. Assumption of the subtractive model and the use of factorial designs allowed for separation of judgmental effects from psychophysical processes. Difference ratings were rescaled by monotone transformation to fit the subtractive model, yielding scale-free values for the size-weight combinations. The subtractive model provided a good description of the difference ratings, but critical violations of the additive model for the size-weight illusion were obtained. The experiments illustrate how ordinal information can be used to differentiate additive from multiplicative processes. (19 ref)—*Journal abstract*.

8637. Colavita, Francis B. (U Pittsburgh) **Human sensory dominance.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 409-412.—Conducted 4 experiments in which a total of 52 undergraduate psychology students matched an auditory and a visual stimulus for subjective magnitude. Each stimulus was then used as a cue in a reaction-time task. On occasions when both

stimuli were presented simultaneously, Ss' responding was dominated by the visual stimulus. It was also found that on some occasions of simultaneous light-tone presentation Ss were unaware that the tone had been presented. This apparent prepotency of the visual over the auditory stimulus persisted across a variety of experimental conditions, which included giving Ss verbal instructions to respond to the tone when both stimuli were presented simultaneously.—*Journal abstract*.

8638. Cowan, Thaddeus M. (Kansas State U) **The theory of braids and the analysis of impossible figures.** *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 190-212.—Considers impossible figures neither as new perceptual phenomena, nor as examples of known phenomena such as illusions, but regards them as geometric anomalies, not psychological ones, which serve an heuristic function in the study of perception. With this in mind, a topological analysis is undertaken anticipating the following goals: (a) A systematic way (algorithm) of generating these figures should be evident, and (b) simple properties of impossible figures which may not have been previously understood should be discovered. Both of these conditions are met. (19 ref)—*Journal abstract*.

8639. Dixon, N. F. & Henley, S. H. (University Coll, London, England) **Laterality effects in perceptual matching: A preliminary note.** *Perception*, 1974, Vol 3(1), 99-100.—Experimental results of a pilot study support the hypothesis that the solution of spatio-verbal problems which depend on perceptual matching is facilitated when the spatial aspects of the problem are presented to the right hemisphere and the verbal aspects to the left.

8640. Harris, Errol E. **Perceptual assurance and the reality of the world.** Worcester, MA: Clark University Press, 1974. 70 p. \$5.95.—Discusses perception in the light of the phenomenological theories of E. Husserl, M. Heidegger, and M. Merleau-Ponty, and attempts to synthesize a new solution to the problem of transcendence. Also discussed are perception, science, and the developmental view of the world; the activity of self-organization and products; and the concept of veridicality.

8641. Hogan, H. Wayne. (Tennessee Technological U) **Time perception and stimulus preference as a function of stimulus complexity.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 32-35.—Considers time as a socially existential variable that can most meaningfully be measured by comparing 2 or more subjectively experienced durations, each with the other(s). Combining this view of time judgment with the adaptation level-optimal arousal principle, 2 hypotheses were tested: (a) that test stimuli differing in degree of complexity elicit from the individual differential degrees of affect, and (b) that intervals during which the individual is exposed to either overly simple or overly complex stimuli are judged as comparatively longer than objectively equal durations filled with moderately complex stimuli. Data from 137 undergraduates support the hypotheses.—*Journal abstract*.

8642. Kanthamani, H. & Rao, H. Hanumanth. (Inst for Parapsychology, Durham, NC) **A study of memory-ESP relationships using linguistic forms.** *Journal of Parapsychology*, 1974(Sep), Vol 38(3), 286-300.—Conducted a



study with a total of 62 Ss (predominantly high school students) to investigate the interaction between ESP and recall. Ss learned a list of word-pairs and later recalled them, attempting ESP guesses by choosing which of the 2 words was the ESP target. 4 series were conducted—a preliminary, a pilot, and 2 confirmatory series. Results of the pilot and confirmatory series show that correctly recalled trials yielded significant ESP scores. This was not true in the case of the recall-wrong trials. The combined evidence of the 2 confirmatory series was highly significant for the recall-correct trials, while it was insignificant for the recall-wrong trials. The difference between the 2 categories of recall trials was significant in the combined evidence, the correctly recalled trials contributing largely to the difference. It is suggested that under given experimental conditions, successful recall tends to be associated with ESP success.—*Journal abstract.*

8643. Kreidler, Hans & Kreidler, Shulamith. (Tel-Aviv U, Israel) **ESP and cognition.** *Journal of Parapsychology*, 1974(Sep), Vol 38(3), 267-285.—Attempts to develop hypotheses about the life-supporting function of ESP. Examining theories about the phylogensis of ESP shows that 2 of them—the theory of ESP decrease due to bombardment by sensory inputs and the theory of ESP increase due to progressive mental development—lack cogency and factual support. The 3rd theory holds that in spite of its potential survival values, ESP as a means of communication was as rare and weak in the past as it is in the present. This theory leads to the conclusion that the information-transmitting aspects of ESP are only secondary manifestations of a capability employed primarily for performing another and even more vital task. It is hypothesized that this primary task consists in promoting memory retrieval, productive thinking, and other cognitive functions by finding and connecting meaning-related and meaning-complementing cognitive contents. The internal ESP function is probably antagonistic to the external use of ESP for information transmission, thus implying that phylogenetically the communicative function of ESP had to be renounced in favor of thinking and in order to prevent leakage of decisions and plans. Different implications of this hypothesis for psi research and theory are also discussed. (15 ref)—*Journal abstract.*

8644. Lechelt, Eugene C. (U Alberta, Edmonton, Canada) **Pulse number discrimination in tactile spatio-temporal patterns.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 815-822.—Studied spatio-temporal patterning effects on tactile temporal numerosity discrimination. Trains of 4-17 mechanical "taps" were delivered successively at rates of 6, 9, or 12/sec to the finger tips of each hand (thumbs excluded) according to 8 different spatial pattern types. 4 highly trained male Ss were instructed to report only the number of signals counted in each train. Pattern type exerted a significant affect on signal number judgments at rates of 9/sec and 12/sec but not at 6/sec. The number of signals in a train was assessed most accurately when presented in patterns with a predictable spatial ordering. Results indicate that absolute judgments of the number of successive tactile signals delivered to several spatially discrete loci are dependent on the total spatio-temporal pattern and that

tactile temporal numerosity discrimination must be specified in terms of the successive and configurational aspects of a patterned array of inputs.—*Journal abstract.*

8645. Lederman, Susan J. (Queen's U, Kingston, Ontario, Canada) **Tactile roughness of grooved surfaces: The touching process and effects of macro- and microsurface structure.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 385-395.—Conducted 4 experiments in which a total of 22 16-51 yr old Ss made magnitude estimates of the perceived roughness of grooved aluminum plates. 2 aspects of the touching process were altered, and their effects upon roughness examined. Results show that roughness increased with increasing finger force, regardless of whether the S or the E chose the values. Rate of hand motion had a negligible effect on perceived roughness, indicating a roughness constancy and providing further evidence of the relative unimportance of vibratory frequency. The effects of these components of the touching process are discussed in terms of an active-passive continuum rather than a dichotomy. Perceived roughness declined with increasing land width (with narrow grooves), although only over the widest half of the land range; there was no land effect when the grooves were wide. In addition to these macrostructural parameters, the effects of 2 stimulus production techniques were compared. The discrepancies between the 2 sets of data are interpreted in terms of the microscopic irregularities of the plate surfaces. Findings are related to an analysis of perceived roughness of grooved surfaces in terms of static deformation of the skin.—*Journal abstract.*

8646. Loomis, Jack M. (U California, Santa Barbara) **Tactile letter recognition under different modes of stimulus presentation.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 401-408.—Conducted 2 experiments of a total of 7 Ss in which 5 modes of stimulus presentation, 3 of them employing a linear scanning slit, were studied. Results show that the poorest method, stationary flashing of the letter, allowed performance that was well above chance, implying that a purely spatial presentation does convey information. The best performance was achieved when the amount of simultaneous stimulation was limited by using a linear scanning slit. The results of the 5 display modes indicate that Ss used whichever representation, spatial or temporal, was available, although patternings which most closely approximate sequential tracing by a single moving point led to the highest recognition accuracy. Results are interpreted in terms of the limited spatial resolution of the cutaneous sense. While the perception of a letter presented in either full-field condition was limited by the spatial resolution, the perception of a letter traced sequentially was limited by the localization acuity of the cutaneous sense, the best measure being the "error of localization," which is known to be considerably smaller than the 2-point limen. Inasmuch as the slit methods of presentation are a compromise between simultaneous and sequential display, it is suggested that letter-recognition accuracy is better with slit presentation than with the corresponding full-field mode of display. (23 ref)—*Journal abstract.*

8647. Luchins, Abraham S. & Luchins, Edith H. (State U New York, Albany) **Wertheimer's seminars revisited:**

**Problems in perception:** V. Albany, NY: State U New York, Psychology Dept Reports, 1974. 350 p.—Presents discussions and demonstrations that were conducted in Wertheimer's Gestalt Problems Seminars of 1936-1938. Topics include expressiveness of lines, figures, and colors; differentiating between appearance and reality; dreams and reality; Titanism and paranoia; and player vs role player. A discussion of recent replications of aspects of the original projects is also presented.

8648. Lundberg, Ulf; von Wright, Johan M.; Frankenhaeuser, Marianne & Olson, Ulf-Johan. (U Stockholm, Psychological Lab, Sweden) **Note on involvement in future events as a function of temporal distance.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 841-842.—Obtained estimates of the intensity of emotional involvement in 4 potential future events from 29 undergraduates, assuming that the events were to occur at 5 alternative points in time. The overall intensity of involvement varied between events. However, the relation between involvement and time was similar for the 4 events; involvement decreased exponentially with increasing temporal distance.—*Journal abstract*.

8649. Marks, Lawrence F. (Yale U) **On scales of sensation: Prolegomena to any future psychophysics that will be able to come forth as science.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 358-376.—Discusses, using data from the literature, the theory that there exist, for any given sensory attribute, 2 basic underlying scales—one a scale of magnitude, the other a scale of dissimilarity. The psychophysical functions that relate Type I and Type II scales to their corresponding physical scales are in both cases power functions, but the exponents that govern Type I functions are typically about twice as large. Both Type I scales of sensory intensity and Type II scales of sensory dissimilarity are meaningful measures of perceptual experience, but they are measures of different aspects of perception. The duality of sensory scales helps to explain some apparent contradictions among divergent attempts to validate scales of sensation. (126 ref)—*Journal abstract*.

8650. Mazziotti, Alexander. (Barnard Coll, Columbia U) **Intermolecular basis of odour.** *Nature*, 1974(Aug), Vol 250(5468), 645-646.—Examined odor classification and thresholds within the context of the relationship between depth of the pairwise intermolecular potential energy well and the normal boiling point of the molecule. Implications concerning receptor site are noted.

8651. McAuliffe, Wayne K. & Meiselman, Herbert L. (US Army Natick Labs, Pioneering Research Lab, MA) **The roles of practice and correction in the categorization of sour and bitter taste qualities.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 242-244.—Studied 10 adult Ss to investigate the misnaming of stimuli usually called sour (hydrochloric and citric acid) and bitter (quinine sulfate). Ss were given 16 trials in which they were asked to match the stimuli to standards, with or without verbal feedback for each stimulus. This was followed by 16 trials without feedback for all Ss and, several days later, by a 16-trial posttest. Final improved performance of the Ss was not affected by having received the feedback. It is concluded that experience with the stimuli led to a reduction in the degree of

mislaming, implying a nonphysiological basis for sour-bitter confusions.—*Journal abstract*.

8652. McCloskey, D. I. (U New South Wales, School of Physiology & Pharmacology, Sydney, Australia) **Muscular and cutaneous mechanisms in the estimation of the weights of grasped objects.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 513-520.—Conducted a series of experiments in which 28 normal young adults matched the weights of beakers supported in a grasp between fingers and thumb of each hand. Wide beakers felt light, and narrow beakers felt heavy. When increased inward force was used to close the grasping digits upon the beakers, as when elastic bands opposed closure of the grasp or when the grasped object was slippery, the beakers felt light. These illusions occurred whether or not muscular forces along the line of action of the weight were employed in the grasp. It is argued that muscular and cutaneous mechanisms are involved in estimations of the weights of grasped objects. (French & German summaries)—*Journal abstract*.

8653. Rollman, Gary B. (U Western Ontario, London, Canada) **Detection of tactile pulses.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 291-294.—Obtained receiver-operating-characteristic curves for 3 male undergraduates by the rating-scale method for the detection of brief mechanical pulses presented to the finger and dorsal forearm to study differences in detection processes at the 2 sites. An adaptive psychophysical procedure was successful in equating detectability at the 2 sites when data were averaged across sessions. Criteria adopted by the Ss appeared to depend on locus of stimulation, since fewer false alarms were given at the arm than at the finger. (22 ref)—*Journal abstract*.

8654. Stevens, Joseph C.; Marks, Lawrence E. & Simonson, Donald C. (John B. Pierce Foundation Lab, New Haven, CT) **Regional sensitivity and spatial summation in the warmth sense.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 825-836.—Conducted 3 experiments with a total of 98 human males in which results show that the magnitude of warmth sensation aroused by heat irradiation and assessed by the method of magnitude estimation depended on the level of the irradiation, its areal extent, and the particular region of the body stimulated. Within a given body region, area and irradiation level both contributed to the magnitude of the warmth sensation (signifying generous spatial summation of neural signals), except that the proportional contribution of area diminished gradually with increasing level of warmth and finally became negligible as the pain threshold was approached. Some regions of the body were far more responsive than others to low-level heating, but all regions responded more or less uniformly when the level of heating was high enough. (16 ref)—*Journal abstract*.

8655. Svensson, Lelf T. & Lindvall, Thomas. (U Stockholm, Sweden) **On the consistency of intramodal intensity matching in olfaction.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 264-270.—Obtained magnitude matchings of odor intensity for 3 chemical compounds (hydrogen sulfide, pyridine, and dimethyl disulfide) in 4 experiments with 4 student Ss. Results validate the equal-sensation function and indicate that intensity matchings between different intramodal continua are



approximately transitive and symmetric with respect to odor.—*Journal abstract.*

8656. Van Hemert, N. A. (U Amsterdam, Netherlands) **Critique of Bergman and Engelbrektson: An examination of factor structure of Rod-and-Frame test and Embedded-Figures Test.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 827-830.—Critiques the study by H. Bergman and K. Engelbrektson (see PA, Vol 52:2062) which assessed the factor structure of the rod-and-frame test and the Embedded-Figures Test (EFT) mainly because they allow their criterion variables to play a role in the construction of the factors from which the variance of the criteria has to be explained. Further main objections are that in the test battery each of the hypothesized factors is represented by 3 tests only and that the EFT is a modification of 1 of the market tests for the factor which should account for the EFT variance.—*Journal abstract.*

8657. Verrillo, Ronald T. & Schmiedt, Richard A. (Syracuse U, Inst for Sensory Research) **Vibrotactile poststimulatory threshold shift.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 484-486.—Vibrotactile thresholds of detectability were determined at 2 frequencies (40 and 150 Hz) and for 2 contactor sizes (.005 and 2.9 cm<sup>2</sup>) before and after a 5-min period of steady gaussian noise of several bandwidths delivered at an intensity level of approximately 20 db sound level. A duplex system of cutaneous mechanoreceptors may be distinguished, based upon the differential poststimulatory threshold shifts resulting from combinations of adapting stimuli, signal frequency, and contactor size.—*Journal abstract.*

8658. Williams, James E. (Gregg-Harrison Mental Health & Retardation Ctr, Longview, TX) **Stimulation of breast growth by hypnosis.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 316-326.—Attempted to determine whether hypnotic procedures could influence the physiological mechanism associated with breast growth to produce a significant increase in breast size of females. The 1st phase compared hypnosis with and without suggestion in 6 Ss. The 2nd phase attempted to determine the effectiveness of hypnotic suggestions in breast enlargement in 13 Ss acting as their own controls. It was found that hypnosis with suggestion was effective in stimulating growth. (26 ref)—*E. B. Jaffe.*

### Auditory Preception

8659. Bienvenue, G. R. & Siegenthaler, B. M. (Pennsylvania State U) **A clinical procedure for evaluating auditory localization.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 469-477.—In an attempt to develop a clinical procedure for measuring auditory localization, 32 normal-hearing adults were seated in the center of an array of 7 loudspeakers and were required to identify which loudspeaker was the source of a recorded speech signal for each of 21 test items. Ss were tested once with both ear canals open and with one ear canal occluded. The occlusion of the ear canal induced a sufficient interaural threshold difference in Ss that a reduction in auditory localization ability could be expected. The procedure discriminated well between unoccluded and occluded conditions. (25 ref)—*Journal abstract.*

8660. Cooper, William E. (Massachusetts Inst of Technology) **Perceptuomotor adaptation to a speech feature.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 229-234.—Conducted a selective adaptation study, to test for the presence of a mechanism that mediates an aspect of both speech perception and speech production. 16 university students were instructed to utter /pi/ or /bi/ after listening to repetitions of either of these syllables or to repetitions of the vowel /i/. Analysis of the utterances showed that a timing relation which distinguishes /pi/ from /bi/, namely the latency in onset of voicing relative to the release burst of the consonant, varied systematically for the /pi/ utterances but not for the /bi/ utterances, as a function of the speech input. The effect for the /pi/ utterances was not attributable to factors such as compensation for distorted perception of the /pi/ adapting stimulus or voluntary mimicry of this stimulus. (20 ref)—*Journal abstract.*

8661. Cooper, William E. (Massachusetts Inst of Technology) **Contingent feature analysis in speech perception.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 201-204.—Conducted a study of 14 undergraduates to test the effects of an alternating sequence of 2 adapting syllables, [da] and [t'i], on the perception of 2 series of synthetic speech syllables, [ba]-[p'a] and [bi]-[p'i]. Each of the test series consisted of 11 stimuli varying in voice onset time, a cue which distinguishes voiced from voiceless stop consonants in word-initial position. Results show that the [da]-[t'i] adapting sequence produced opposite shifts in the loci of the phonetic boundaries for the 2 test series. For the [ba]-[p'a] series, Ss made fewer identification responses to the [b] category after adaptation, while for the [bi]-[p'i] series, Ss made more responses to the [b] category. The opposing shifts suggest that the perceptual analysis of voicing in stop consonants is carried out with respect to vowel environment. (16 ref)—*Journal abstract.*

8662. Fitch, James L. (U Southern Mississippi) **Effects of auditory masking on oral sensory perception.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 999-1001.—Administered the Florida Oral Recognition Measure (FORM) to 40 undergraduates in quiet and white noise conditions of 90 and 100 db. There were no significant differences in performance on the FORM during noise or quiet.

8663. Flaherty, Eugene W. & Coren, Stanley. (Swarthmore Coll) **Reaction time as a measure of the effect of selective attention.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 755-761.—In a dichotic-listening paradigm, reaction time was used to monitor the effect of selective attention for 8 volunteer Ss with normal hearing. Reaction times were longer for targets in the nonattended channel, but there was no difference between the performance in the attended channel and a divided attention condition, which may be interpreted as evidence for attenuation of the unattended channel. For all conditions the reaction time for semantic stimuli was longer than that for tonal stimuli, and there was an Attentional Manipulation × Stimulus interaction which may indicate a stimulus-processing component in selective attention. (17 ref)—*Journal abstract.*

8664. Frank, Tom & Karlovich, Raymond S. (Pennsylvania State U, Speech & Hearing Clinic) **Effect of**

**contralateral noise on speech detection and speech reception thresholds.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 34-43.—Speech detection thresholds (SDT) and speech reception thresholds (SRT) for spondee words were obtained on 20 normal-hearing young adults while white or speech noise masking was presented to the contralateral ear. Each masker was presented continuously or pulsed simultaneously with the onset of each spondee word. Several masker sensation levels (SL) were employed, and the amount of masking (threshold shift) was determined for each condition. Small but consistent SDT and SRT shifts were apparent at low masker SLs (30 db). The shifts increased approximately 1 db for each 10-db increase in masker SL between 30 and 60 db. For 60-80 db masker SLs, the shifts were about 3.5 db for each 10-db increase in the masker. The greater threshold shifts at the higher masker SLs may have resulted from transcranial conduction and/or activation of the acoustic reflex. SDT shifts were consistently larger for each masker SL when the masker was pulsed compared to continuous presentation. Data suggest that central masking is operating for masker SLs below 60 db; for higher masker SLs, the increased threshold shifts probably result from a combination of central masking, transcranial conduction, and acoustic stapedius reflex action. Clinical implications of central masking are discussed. (French summary) (24 ref)—*Journal abstract*.

8665. **Gabrielsson, A. et al.** (Karolinska Inst, Stockholm, Sweden) **Frequency discrimination for bands of noise.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 1-20.—Frequency transposition of voiceless consonants has been tried as a method of recoding speech to improve discrimination for profoundly deaf people. The present study investigated the possibility of establishing the minimum hearing capacity a listener must show for a successful use of frequency transposition. Thresholds as minimum midfrequency shift ( $\Delta f$ ) were measured by varying the levels and using noise bands with different  $Q$  factors. Great individual differences were found in 8 selected and 36 unselected normal-hearing young adult Ss. There was a significant difference between (a) threshold values at different  $Q$  factors, (b) threshold values at different frequencies, and (c) threshold values for increasing and decreasing frequency (position of  $\Delta f$ ). There were significant interactions between frequency and position of  $\Delta f$ ,  $Q$  factor and position of  $\Delta f$ , and  $Q$  factor and frequency, as well as a significant triple interaction between  $Q$  factor, frequency, and position of  $\Delta f$ . (French summary)—*Journal abstract*.

8666. **Hicks, Ronald G.** (U St Andrews, Fife, Scotland) **Processing of nonsymbolic auditory information.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 228-233.—Cross-modality matching was performed by 8 normal Ss using an electrodermal stimulus as the independent variable and a simultaneous weak adjustable Gaussian noise as the dependent variable. The O's loudness adjustment of the noise was analyzed according to signal detection theory. In a 1969 experiment by R. G. Hicks (see PA, Vol 45:9191) the Os had one or both of 2 difficulties in processing auditory information: (a) O incorrectly perceived the diagnostic value of the auditory signals. (b) O had difficulty integrating correctly perceived auditory information. The present experiment

demonstrates that Os have difficulty with diagnosis of auditory signals, perhaps due to the decay of nonsymbolic auditory information retained in memory.—*Journal summary*.

8667. **Hochberg, Irving.** (Brooklyn Coll, Speech & Hearing Ctr, City U New York) **Most comfortable listening for the loudness and intelligibility of speech.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 27-33.—The effect of instructional set upon most comfortable listening (MCL) was investigated in 14 male and 16 female 18-26 yr old Ss with normal hearing. MCL level and range were determined in relation to listening for comfortable speech loudness vs comfortable speech intelligibility. Results indicate that instructional set did influence listener performance: (a) The mean MCL level for comfortable speech intelligibility was significantly higher (4.96 db) than the mean level for comfortable speech loudness. (b) The mean MCL range for comfortable speech intelligibility was higher by 7.33 db and wider by 7.10 db than the mean range for speech loudness. Ascending stimulus presentation obtained comparable MCL levels for both listening conditions, whereas descending presentation obtained a mean MCL level almost 10 db higher for comfortable speech intelligibility than for comfortable speech loudness. Males achieved slightly higher MCL levels than did females for both loudness and intelligibility criteria. It is concluded that the nature of the instructional set should be taken into account when interpreting comfortable listening measures. (French summary)—*Journal abstract*.

8668. **Holding, Dennis; Loeb, Michel & Yoder, Delmar.** (U Louisville) **"Masking" versus interference in pitch perception.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 247-254.—Employed 16 normal-hearing adults as Ss in 2 experiments on pitch discrimination in which noise and pure tone "masks" bore varying temporal relations to 2 stimulus tones presented for comparison. Relatively coarse discrimination (50 cps) and fine discrimination (25 cps) were explored separately. Discrimination was most impaired for short tones, though impairment was minimal with delayed masks. Impairment by pure tone masks was greater than by noise, with immediate masks, and greater for the fine than for the coarse discrimination with postcomparison. One interpretation is that "masking" consists of 2 kinds of disruption, one associated with storage and one with pitch comparison. The data provide no support for the theory that "preperceptual auditory images" are the storage medium.—*Journal summary*.

8669. **Kubovy, Michael; Cutting, James E. & McGuire, Roderick Mcl.** (Yale U) **Hearing with the third ear: Dichotic perception of a melody without monaural familiarity cues.** *Science*, 1974(Oct), Vol 186(4160), 272-274.—B. Julesz (see PA, Vol 50:6089) has shown that cross-correlations between 2 patterns that appear random to either eye alone can give rise to the perception of form and depth when viewed stereoscopically. In a main experiment with 24 Ss and a confirmatory experiment with 12 Ss, auditory analogs were produced by presenting 8 simultaneous and continuous sine waves to both ears and by either phase-shifting or frequency-shifting one of them relative to its counterpart in the opposite ear. Particular tones were shifted in sequence



such that a melody was heard which was undetectable by either ear alone.—*Journal abstract.*

8670. Langford, Cheryl; Bench, John & Wilson, Ian. Some effects of prestimulus activity and length of prestimulus observation on judgments of newborns' responses to sounds. *Audiology*, 1975 (Jan-Feb), Vol 14(1), 44-52.—Examined subjectively assessed responses of 9 normal newborns made by 5 female speech-therapist-audiologist Os. Responses were studied as a function of prestimulus activity level and duration of prestimulus observation period. Response assessment was significantly affected by the former but not by the latter. For sounds which elicited a high proportion of responses, the prestimulus activity level had relatively little effect on judgment of response, whereas for sounds (and no-sound control trials) to which few responses were ascribed, prestimulus activity tended to be associated with positive ratings of response. (French summary) (15 ref)—*Journal abstract.*

8671. Mills, Carol B. & Martin, James G. (U Maryland) Articulatory organization in the prefix effect. *Perception & Psychophysics*, 1974 (Oct), Vol 16(2), 309-314.—Investigated U. Neisser, Y. Hoenig, and E. Goldstein's study (see PA, Vol 43:15246) in which the "stimulus prefix effect" (diminished recall of 7 digits preceded by a redundant prefix) was reduced when the redundant prefix and the recall digits were produced by different speakers. Similar results were obtained using 1 speaker only, but with the prefix and recall digits spoken separately in different utterances and combined by tape splicing. Results support an hypothesis concerning the perception of intact, wholistically organized articulatory units.—*Journal abstract.*

8672. Molino, John A. (National Bureau of Standards, Washington, DC) Measuring human aversion to sound without verbal descriptors. *Perception & Psychophysics*, 1974 (Oct), Vol 16(2), 303-308.—Conducted 3 experiments to investigate the feasibility of making a rudimentary psychophysical determination of human auditory aversion levels for sounds without the use of verbal descriptors. High school students ( $N = 31$ ) tapped rapidly on a telegraph key to reduce the intensity of a continuous acoustic stimulus presented through earphones. Failure to respond resulted in an intensity increase of 1 db every 4 sec. In Exp I Ss responded to 3 pure tones (125, 1,000, and 8,000 Hz) and a white noise. The different asymptotic levels observed after 4 min were taken as a measure of equal-aversion levels for the stimuli. In Exp II the effect of the starting intensity level (45, 70, and 90 db) was determined for a 1,000-Hz tone. Differences in the asymptotic intensity levels observed after 6 min were not significant. In Exp III no significant effect was found upon varying the number of responses required to produce a 1-db intensity decrement in a 1,000-Hz tone. It is suggested that the experiments demonstrated the feasibility of determining equal-aversion levels for sounds. (23 ref)—*Journal abstract.*

8673. Pederson, Olen T. & Studebaker, Gerald A. (Phillips U) A new minimal-contrasts closed-response-set speech test. *Journal of Auditory Research*, 1972 (Jul), Vol 12(3), 187-195.—Presents a new closed-response-set, monosyllabic-word, speech-discrimination test consisting of 3 independent subtests, called the University of

Oklahoma Closed Response Speech Test (OUCRT). In addition to producing overall quantitative results, each subtest is designed to allow phoneme identification analysis in either initial-consonant, final-consonant, or medial-vowel position of the consonant-vowel-consonant, monosyllabic-word test sets. 3 of the 4 items in each consonant test set differ only in the place of articulation of the phoneme in the test position. The phoneme is absent from the test position in one of the words in each consonant test set. The slopes of the articulation-signal/noise function obtained on 10 female and 10 male Ss were 2.3 and 2.4%/db for the 2 consonant subtests and 6.4%/db for the vowel subtest. Error matrix analysis revealed substantial agreement with similar analyses by others.—*Journal summary.*

8674. Roeser, Ross J.; Johns, Donnell F. & Price, Lloyd L. (Callier Ctr for Communications Disorders, Dallas, TX) Effects of intensity on dichotically presented digits. *Journal of Auditory Research*, 1972 (Jul), Vol 12(3), 184-186.—Investigated the role of stimulus intensity in the tendency of Ss to respond more accurately to speech stimuli presented to the right ear than to the left ear. 32 normal hearing Ss, all right handed, were tested by presenting different digits to the 2 ears simultaneously. Sensation levels (SLs) of 10, 30, 50, and 70 db were used for 18 trials each. Right-ear digits were identified correctly more often than left-ear digits, and the 10 db SL produced significantly lower test scores. There were no differences, however, in right-ear laterality as a function of intensity.—*M. B. Meikle.*

8675. Rubin, Martha & Ventry, Ira. (Lexington School for the Deaf, New York, NY) The use of Bekésy audiometry in the measurement of the threshold of intelligibility for connected discourse. *Journal of Auditory Research*, 1972 (Jul), Vol 12(3), 255-260.—64 normal-hearing men and women used Bekésy audiometry to track their Threshold of Intelligibility for Connected Discourse (TICD). The overall TICD was 17.1 db sound pressure level (SPL). The threshold did not seem to be influenced by sex of the listener, attenuation rate (1.25 db/sec vs 2.5 db/sec), or prior knowledge of the speech material. Test-retest reliability was high. A rather precise relationship existed between TICD and Bekésy pure-tone thresholds at 1 kc/sec: TICD was 9 db higher than the pure-tone threshold. The TICD data were compared to other studies of TICD and the implications for the clinical use of Bekésy TICD were discussed.—*Journal summary.*

8676. Schneider, Bruce; Parker, Scott & Stein, David. (U Toronto, Ontario, Canada) The measurement of loudness using direct comparisons of sensory intervals. *Journal of Mathematical Psychology*, 1974 (Aug), Vol 11(3), 259-273.—5 graduate and undergraduate students and the 3 authors were Ss in an experiment which required them in each trial to compare directly 2 pairs of tones and indicate which pair of tones had the greater loudness difference. 10 1200-Hz tones differing only in intensity were employed. Ss made binary comparisons among the 45 tone pairs which can be formed from the set of ten tones. The Ss' binary comparisons of the tone pairs satisfied the transitivity and monotonicity requirements of a positive difference structure. These comparisons of loudness intervals were used to construct a rank

order of loudness difference. A loudness scale was constructed from a nonmetric analysis of the rank order of loudness difference for the 45 tone pairs. Results indicate that loudness is a power function of sound pressure with an exponent of .26. (20 ref)—*Journal abstract*.

8677. Terhune, J. M. (Aarhus U, Zoology Inst, Denmark) **Sound localization abilities of untrained humans using complex and sinusoidal sounds.** *Scandinavian Audiology*, 1974, Vol 3(3), 115-120.—Measured abilities of untrained adults to aim a pointer at a hidden sound source. Ss were 9 males and 11 females (mean age = 29 yrs), all of whom believed their hearing was normal. 2 types of test sounds were used: sine waves and noise bands. The localization errors were  $16^\circ \pm 13^\circ$  and  $13^\circ \pm 10^\circ$  for 1- and 8-kHz sine waves. Females had a significantly larger localization error than males, which might have been caused by a nonauditory factor such as a difference in guessing behavior when faced with a difficult task. The noise band localization ability was significantly more acute than that for sine waves. This difference was attributed to prior experience with the acoustic clues. It is noted that noise bands provide time clues and are common in nature. Sine waves below about 1.4 kHz provide interaural phase clues and those above about 1.4 kHz provide interaural intensity clues. Sine waves are not common in nature, so the Ss had not had the opportunity to develop localizational abilities using these clues.—*Journal abstract*.

8678. Weiler, Ernest M. (U Cincinnati) **Further consideration of adaptation and loudness decrement.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 212-215.—Re-examined the use of the Modified Simultaneous Dichotic Loudness Balance (MSDLB) test. Previous results obtained by J. W. Petty, W. D. Fraser, and D. N. Elliott in 1970, showing no difference in loudness adaptation after 7-min exposure vs 15-sec exposure may have been due to the use of 4-sec rest periods for the adapting ear following the 7-min exposure. The present study examined the effect of omitting the 4-sec rest periods, using 10 normal Ss and a 1-kHz tone. Mean adaptation after 15 sec was 10.2 db and after 7 min was 24.6 db, in contrast to the results of Petty et al. The 4-sec rest period therefore appears to have been a crucial variable in the earlier results.—*M. B. Meikle*.

8679. Woodford, C.; Henderson, D.; Hamernik, R. & Feldman, A. (State U New York, Upstate Medical Ctr, Syracuse) **Threshold-duration function of the acoustic reflex in man.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 53-62.—Conducted a study with 5 male and 5 female adult, normal-hearing humans and 3 adult male Ss with hearing loss of cochlear etiology. Reflex threshold was obtained at stimulus durations of 10, 20, 50, 100, 200, and 500 msec and at frequencies of 500, 1,000, 2,000, 3,000, and 4,000 Hz. 3 commercially available acoustic bridges were employed, and a probe-tone frequency of 220 Hz was used. The reflex threshold-duration function for normal-hearing Ss encompassed a much greater range of intensity than the psychophysically assessed auditory threshold temporal integration function. A sex difference was found which may be explained by subclinical noise-induced cochlear pathology in the male

Ss with subsequent truncation of the reflex threshold-duration function. The function was also truncated in the 3 Ss with hearing loss diagnosed to be of cochlear etiology. Implications of these findings for control of stimulus duration in clinical reflex measurement are discussed. (French summary) (33 ref)—*Journal abstract*.

8680. Zakrzewski, A.; Jassem, W.; Prusiewicz, A. & Obrebski, A. (Medical Academy, Poznań, Poland) **Identification and discrimination of speech sounds in monosyllabic meaningful words and nonsense words by children.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 21-26.—Used speech audiometry to examine 297 9-14 yr old Polish children with normal hearing and intelligence level. 10 lists with monosyllabic meaningful and nonsense words were used. All the lists were phonemically and structurally balanced in the same way and were applied with an intensity level varying between 26 and 61 db. Identification and discrimination scores for Polish speech sounds were calculated from written-response sheets. The identification scores were generally significantly lower for nonsense words, and up to a certain extent, increased with age. Examination of the scores showed that confusions were related to the distinctive features of the phonemes. Results represent the 1st stage of a project on speech-sound identification in children and may have practical implications for the rehabilitation of children with hearing loss. (French summary)—*Journal abstract*.

### Visual Perception

8681. Attneave, Fred & Block, Gene. (U Oregon) **Absence of masking in the path of apparent movement.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 205-207.—Conducted a study of 2 graduate students who attempted to detect the movement of a weak probe light that either was or was not located in the path of the apparent movement. Alternation of diagonal pairs of lights produced apparent movement which Ss could organize in either of the 2 ways, as instructed. Results show no evidence of path-specific masking.—*Journal abstract*.

8682. Bernstein, Ira H.; Proctor, Robert W.; Belcher, Joseph & Schurman, Donald L. (U Texas, Arlington) **An analysis of U-shaped metacontrast.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 329-336.—Conducted 2 experiments with a total of 7 university students and faculty in which masking functions were obtained using a brightness-discrimination task similar to that employed by I. Bernstein, R. Proctor, J. Proctor, and D. Schurman (see PA, Vol 51:10239). In Exp I test stimulus (TS) and mask stimulus (MS) energies were held constant, but luminance and duration were varied reciprocally. The obtained masking functions, plotted as a function of stimulus onset asynchrony (SOA), were of an essentially identical U-shape. It is suggested that (a) SOA is a more suitable measure of delay than interstimulus interval and (b) Bloch's law holds for the requisite discrimination. In Exp II TS luminance and MS luminance were varied independently to determine whether the MS served as a frame of reference at short SOA. Results indicate that this was, in fact, the case and that the transition from comparative to absolute judgment strategies as SOA



increases is a major contributor to U-shaped masking functions.—*Journal abstract.*

8683. **Bhatia, Balraj.** (Ministry of Defence, Defence Research & Development Organization, New Delhi, India) **Minimum separable as a function of speed of a moving object.** *Vision Research*, 1975(Jan), Vol 15(1), 23-33.—Values of critical separation at which 2 white bars on a black background appear as fused were determined at distances of 2 and 5 m at speeds ranging from 20 to 210 cm/sec, and for central as well as peripheral vision, with the eyes fixed. Results demonstrate the superiority of peripheral over central vision for the perception of object movement. (French, German, & Russian summaries) (16 ref)

8684. **Blakemore, C. & Over, R.** (U Cambridge, England) **Curvature detectors in human vision?** *Perception*, 1974, Vol 3(1), 3-7.—Required 8 Os to judge apparent straightness following exposure to curved lines. A curvature aftereffect was found when Os had maintained steady fixation or made continuous eye movements at right angles to the chord of the arc during inspection, but no aftereffect was obtained when eye movements had been made in the direction of the chord. It is proposed that curved contours are processed in the visual system by reference to the orientation of local straight-line approximations within an arc, rather than through global analysis of the extent and direction of curvature. The loss in aftereffect with eye movements in the direction of the chord is attributed to nonselective adaptation of orientation detectors. (15 ref)—*Journal abstract.*

8685. **Bodis-Wollner, I.** (Mt Sinai Medical School, City U New York) **A distractive effect of peripheral attention on foveal trigram recognition.** *Perception*, 1973, Vol 2(4), 407-413.—Investigated the recognizability of tachistoscopically presented foveal trigrams as a function of paying attention, or not paying attention, to simultaneously exposed parafoveal trigrams. The same set of stimuli was presented in both conditions to 6 20-30 yr old college graduates with normal vision. 4 other Os served in the pilot study. All 6 Os made a significant number of errors at 50-msec stimulus duration in the attentive condition. Performance reached 95% correct at 200-msec stimulus duration, just when parafoveal trigrams were occasionally identified. At 50-msec stimulus duration in the attentive condition, errors were more marked for non-wordlike center trigrams. When the parafoveal trigram was non-wordlike, its distractive effect was greater than when it was wordlike. The distractive effect of peripheral attention on recognition of letter stimuli suggests that information from parafoveal stimuli is available through attention. Results do not suggest that during a short exposure parafoveal information triggers attention; rather they indicate that conscious attention determines the processing of parafoveal stimuli (17 ref) *Journal abstract.*

8686. **Breitmeyer, Bruno; Love, Rhonda & Wepman, Barry.** (U Houston) **Contour suppression during stroboscopic motion and metacontrast.** *Vision Research*, 1974(Dec), Vol 14(12), 1451-1456.—Conducted a study, using 2 graduate students with normal vision, of visual contour masking obtained when 2 stationary and spatially separated stimuli were presented briefly and

successively in time. Findings indicate that the contour masking typically observed while viewing a stimulus in real movement also occurred while viewing a stimulus in stroboscopic movement. Additional results indicate that the loss of detailed contour information attending stroboscopic movement may contribute to, though not constitute, the contour suppression effects observed in metacontrast. (French, German, & Russian summaries) (25 ref)—*Journal abstract.*

8687. **Cavonius, C. R.** (U Cambridge, Psychological Lab, England) **The relationship between visual acuity and the spatial duty cycle of periodic stimuli.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 295-298.—Measured human visual acuity in 3 experienced Os, using rectangular-wave gratings that had duty cycles (the proportion of each grating period that is light) that varied from .020 to .975. Results indicate that when adaptation level was held constant, the findings support the hypothesis that only the amplitude of the fundamental Fourier component is detected at threshold.—*Journal abstract.*

8688. **Collins, James F. & Blackwell, Loren K.** (U Missouri, Kansas City) **Effects of eye dominance and retinal distance on binocular rivalry.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 747-754.—Tested 6 right- and 6 left-eye-dominant undergraduates for the effects of this dominance on the percent of time that suppression of conflicting line stimuli in the 2 eyes occurred. The amount of suppression depended on whether the suppressed stimulus was a vertical or horizontal line and the distance between the suppressing lines. Results are discussed in terms of rivalry phenomena.—*Journal abstract.*

8689. **Coren, Stanley & Miller, Joel.** (U British Columbia, Vancouver, Canada) **Size contrast as a function of figural similarity.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 355-357.—Conducted a study in which size contrast occurred in numerous configurations where a test figure appeared apparently larger when surrounded by small elements and apparently smaller when surrounded by large elements. Using the Ebbinghaus illusion presented to each of 12 volunteer Os, the magnitude of this effect was shown to vary as a function of apparent similarity between test and inducing element.—*Journal abstract.*

8690. **Coren, Stanley; Bradley, Drake R.; Hoenig, Paul & Girus, Joan S.** (U British Columbia, Vancouver, Canada) **The effect of smooth tracking and saccadic eye movements on the perception of size: The shrinking circle illusion.** *Vision Research*, 1975(Jan), Vol 15(1), 49-55.—Describes an illusory distortion in which the apparent diameter of the path of a target moving in a circle appears contracted at intermediate speeds. In 2 experiments with a total of 36 normally seeing Os, the apparent reduction of path diameter was highly correlated with smooth pursuit behavior of the eye, and the distortion disappeared with the emergence of saccadic movements at higher speeds. In the absence of tracking eye movement the magnitude of the distortion was greatly reduced. Data are discussed in terms of a possible interaction between smooth pursuit and saccadic eye movements in the perception of size, and possible differences in the utilization of information from the 2

eye-movement systems. (French, German, & Russian summaries) (32 ref)—*Journal abstract*.

8691. Cormack, Elizabeth O. & Cormack, Robert H. (New Mexico Inst of Mining & Technology, Socorro) **Stimulus configuration and line orientation in the horizontal-vertical illusion.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 208-212.—Used the method of average error with a mixed design to measure the horizontal-vertical illusion (HVI) for 40 adult Ss. 6 stimulus configurations were combined with 7 angular orientations of the upright standard, and on each trial the variable horizontal was adjusted to appear equal to the standard in length. Results show that for no stimulus configuration did the vertical orientation of the standard yield the greatest illusion. The magnitude of the HVI was dependent upon the stimulus configuration, upon the orientation of the standard, and upon an interaction between these variables. For 2 of the configurations, equal inclinations of the standard to either side of the vertical yielded equal effects; for the other figures, asymmetrical effects were produced. (20 ref)—*Journal abstract*.

8692. Davidoff, J. B. (University Coll Swansea, Wales) **An observation concerning the preferred perception of the visual horizontal and vertical.** *Perception*, 1974, Vol 3(1), 47-48.—Notes perceptual preference for horizontal and vertical lines in a drawing of many equally dark lines. With head tilt, it is lines on the horizontal and vertical with respect to the head tilt that are now preferred. A physiological correlate of this perceptual preference is tentatively hypothesized.

8693. Davies, Peter. (U Bradford, England) **Conditioned after-images: II.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 377-393.—Conducted 2 experiments in which a total of 25 Ss reported conditioned visual after-images. Exp I examined visual after-images evoked in response to an auditory stimulus and the effects of manipulating the conditioned stimulus-unconditioned stimulus dynamic stereotype. Certain aspects of the data are compared with data obtained in similar experiments in the USSR by I. Bzhalava (1958) and N. and C. Popov (1953) with which there is seen to be a considerable measure of agreement. Results suggest that a light flash (the primary source of unconditioned after-images) may, through repetition, come to acquire the status of a conditioned stimulus. Exp II investigated this latter phenomenon, and evidence is presented which seems to support the view that after-images may be conditioned to a repeated visual stimulus. Other possible interpretations of the observed results are discussed, but these are rejected in favor of the conditioning hypothesis. (30 ref)—*Journal abstract*.

8694. Decker, Larry R. (U Arizona) **The effect of method of presentation, set, and stimulus dimensions on "same," "different" reaction times.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 271-275.—Same-different reaction times (RTs) of 4 paid students to random shapes varying independently in either brightness, size, or form were studied in an investigation of visual encoding and comparison processes. The comparison process was investigated by having the varying dimension either cued in advance (set) or not cued (no set). The encoding process was investigated by varying

stimulus onset asynchronies. No significant difference was found for the set-no-set variables, providing some evidence for an integrality interpretation. It is suggested, however, that the serial and parallel models would still hold if the set variable did not affect either dimensional processing rate or order. The significant difference found between the various stimulus onset asynchronies is interpreted as evidence for a limited-capacity encoding mechanism. Results are also consistent with a 2-process model of comparison processes. (21 ref)—*Journal abstract*.

8695. Deegener, Günther. (Universitäts-Nervenklinik, Abteilung für Kinder und Jugendliche, Homburg Saar, W Germany) **[Dominance of a hemisphere and optical perception with tachistoscope examinations.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Apr), Vol 26(4), 193-201.—Reviews research on tachistoscopic word recognition, and the relationships among monocular vision, eye dominance, and preferred handedness. Temporal lobe dominance can be determined reliably in well controlled experiments. The left hemisphere seems to dominate in perception of familiar optical stimuli and the right in perception of unfamiliar stimuli. (52 ref)—*K. J. Harman*.

8696. Epstein, William & Morgan-Paap, Cynthia L. (U Wisconsin, Madison) **Aftereffect of inspection of a perspectival stimulus for slant depth: A new normalization effect.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 299-302.—36 experimental and 6 control Ss, all undergraduates, made judgments of the frontoparallel plane monocularly and binocularly by adjusting the position of a rotatable thin luminous line viewed in darkness. The judgments were made before and after a 10-min period of monocular inspection of a luminous outline frontoparallel trapezoid which was the projection of a rectangle rotated in depth. Verbal reports indicate normalization of perspectival slant depth (i.e., the inspection figure appeared less rotated), and the line settings exhibited an aftereffect of normalization. It is suggested that the findings may contribute toward an account of certain previously unexplained observations reported in an earlier study by W. Epstein and C. Morgan-Paap (see PA, Vol 52-6612) on adaptation to unocular image magnification.—*Journal abstract*.

8697. Flexman, Jerry E.; Demaree, Robert G. & Simpson, D. Dwayne. (Boston VA Hosp, MA) **Respiratory phase and visual signal detection.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 337-339.—Obtained pneumographic respiration records on 22 female undergraduates during a visual signal detection task. Analysis of signal detection with respect to respiration phase showed that signals presented during exhalation were detected more frequently than those presented during inhalation. It is suggested that the intra-S variation in signal detection performance may be partially accounted for by respiratory behavior at the moment of signal presentation.—*Journal abstract*.

8698. Frisby, J. P. & Clatworthy, J. L. (U Sheffield, England) **Evidence for separate movement and form channels in the human visual system.** *Perception*, 1974, Vol 3(1), 87-96.—Investigated the possibility that the directional and form aspects of a moving stimulus are coded in separate neural locations. 8 psychology students



and staff were Os in Exp I, and 4 practiced male researchers served in Exp II. An adaptation paradigm was used in which sensitivities to grids in optimal apparent movement were measured following an adaptation exposure to a grid in real movement. The postadaptation grids possessed varying degrees of similarity to the adaptation stimulus: they could either have a similar orientation and a similar movement direction, or they could differ on just one of these dimensions, or they could differ on both of these dimensions. Selective adaptation effects were observed which support the hypothesis that different form and movement channels exist in the human visual system. (15 ref)—*Journal abstract*.

8699. **Haimson, Barry R.** (Southeastern Massachusetts U) **The response criterion, the stimulus configuration, and the relationship between brightness contrast and brightness constancy.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 347-354.—Conducted 4 experiments to investigate the nature of the relationship between brightness contrast and brightness constancy while controlling the response criterion, the area of the surround, the stimulus configuration, and the mode of appearance of the modulus target. 10 naive, adult Os in each of the 4 experiments estimated the apparent whiteness or brightness of targets with different contrast ratios. All targets were viewed at several illumination levels. Most constancy (whiteness and brightness) functions displayed shallow slopes that reflected a good approximation to constancy. The functions within Exp I, III, and IV were vertically displaced and parallel; those in Exp II were vertically displaced and increased in slope. It is suggested that decreasing the contrast ratio had no effect on the tendency towards constancy when the area of the surround was greater than that of the target but resulted in a decrease in constancy when the area of the surround was equal to that of the target. (22 ref)—*Journal abstract*.

8700. **Hambrouck, M.** (U Louvain, Ctr de Psychologie Expérimentale et Comparée, Belgium) **[Psychophysical study of simultaneous color contrasts.]** (Fren) *Vision Research*, 1975(Jan), Vol 15(1), 9-21.—Used a visual colorimeter (chromatoscope) to measure 250 contrast colors with a total of 21 Os. Results indicate that, compared with the physical complementarity of the inducing color, the contrast color showed a departure which varied with the inducing hue and also with the luminous level of both inducing and induced tests. This variation of the contrast hue with luminance recalls the classical change of hue. A distinct relationship appeared between induced and inducing color vivacities. Their ratio varied with the inducing hue between a very small value and more than unity. For short wavelength inducing colors (blue), the contrast vivacity was higher than the inducing one. This highly peculiar effectiveness of blue colors, which occurred also in contrast latency, has until now been unexplained. (German & Russian summaries) (22 ref)—*English summary*.

8701. **Harris, Victor A.; Hayes, William & Gleason, James M.** (State U New York, Buffalo) **The horizontal-vertical illusion: Binocular and dichoptic investigations of bisection and verticality components.** *Vision Research*, 1974(Dec), Vol 14(12), 1323-1326.—Conducted 2

experiments with a total of 21 male psychology faculty and graduate students to examine the relative contributions of bisection and verticality to the inverted T variant of the horizontal-vertical illusion. Exp I which utilized binocular presentation of stimuli supported the hypothesis that the magnitude of the horizontal-vertical illusion could be accounted for by simple additive combination of the magnitude of the vertical and bisection subillusions. Exp II replicated the findings using dichoptic presentation (horizontal line to one eye, vertical to the other). Results of both studies taken together indicate that the amount of the horizontal-vertical illusion is due to the separate factors of bisection and verticality and that these processes are central (cortical) rather than peripheral in origin. (French, German, & Russian summaries)—*Journal abstract*.

8702. **Harth, E. & Tzanakou, E.** (Syracuse U) **ALOPEX: A stochastic method for determining visual receptive fields.** *Vision Research*, 1974(Dec), Vol 14(12), 1475-1482.—Develops an algorithm, ALOPEX (Algorithmic Logic of Pattern Extracting Crosscorrelations), which avoids the difficulties concomitant with recording cell responses by intra- or extra-cellular microelectrodes, and which uses a computer to compare responses to different trial patterns and to generate a new trial pattern. Computer simulations and necessary instrumentation are detailed. (17 ref)

8703. **Hendry, Derek P.** (U California, School of Optometry, Berkeley) **Saccadic velocities determined by a new perceptual method.** *Vision Research*, 1975(Jan), Vol 15(1), 149-151.—Describes a method capable of giving a subjective measure of magnitude and velocity of eye movement, with the use of only an oscilloscope and a function generator. The method can be used in perceptual studies in such a way that it is practically impossible for an S to produce spurious "positive" results.

8704. **Herman, John H.; Tauber, Edward S. & Roffwarg, Howard P.** (Montefiore Hosp, Bronx, NY) **Monocular occlusion impairs stereoscopic acuity, but total visual deprivation does not.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 225-228.—Designed an apparatus for testing stereoscopic accuracy which eliminated all cues to depth save binocular disparity. The relative effect of 8 hrs of monocular—as opposed to binocular—occlusion on subsequent stereoscopic performance was tested in 6 Ss. Monocular patching led to significant increases in mean standard deviation and in mean absolute error as compared to baseline testing. Binocular patching led to no such impairment. Thus, true disuse (such as occurs during binocular deprivation) did not impair stereopsis, whereas monocular occlusion, which may involve temporary misuse of the stereoscopic system, did.—*Journal abstract*.

8705. **Hilz, R. & Cavonius, C. R.** (U Munich, Inst for Medical Optics, W Germany) **Functional organization of the peripheral retina: Sensitivity to periodic stimuli.** *Vision Research*, 1974(Dec), Vol 14(12), 1333-1337.—Modulation sensitivity of the peripheral retina in 2 human Os was measured for photopic vision with an interference-fringe method that bypassed the optics of the eye. For all spatial frequencies, sensitivity decreased with eccentricity, but the manner in which sensitivity varied with eccentricity depended on the spatial frequen-

cy of the test object. At 20 c/deg and higher, sensitivity decreased linearly as eccentricity was increased, but when measured with low-frequency test objects, sensitivity remained rather constant until a certain eccentricity (which depends on the spatial frequency) was reached, after which it decreased at the same rate as for high-frequency test objects. (French, German, & Russian summaries)—*Journal abstract*.

8706. Holmgren, John E. (U Maryland) **Visual search in a forced-choice paradigm.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 253-258.—Investigated the processing of visual information in the context of 2 visual search tasks; Ss were 5 right-handed female undergraduates. The 1st task was a forced-choice one in which 1 of 2 alternative letters appeared in a visual display of from 1 to 5 letters. The 2nd task included trials on which neither of the 2 alternatives was present in the display. Search rates were estimated from the slopes of best linear fits to response latencies plotted as a function of the number of items in the visual display. These rates were found to be much slower than those estimated in yes-no search tasks. It is suggested that the processes underlying visual search in yes-no and forced-choice tasks are not the same.—*Journal abstract*.

8707. Holt-Hansen, Kristian. (U Copenhagen, Psychological Lab, Denmark) **Duration of experienced lengthening and shortening of straight lines.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 987-996.—In 2 experiments with a total of 46 18-40 yr old Ss, a vertical straight red line was projected for 60 msec on a gray screen 2 m from S. In Exp I the line was 8.5 cm long and 2 mm wide; in Exp II the line was 17 cm long and 2 mm wide. When fixating on the farthest point of the long and short lines, Ss reported experiencing the line as lengthening from the point of fixation to full length and then shortening to the point of fixation. The durations of the lengthening-shortening phenomenon for both lines were identical. The velocity of this movement was greater for the long than for the short line. A follow-up 6-8 mo later showed that the perceived durations remained constant. Barbiturate (.5 g of hexobarbital) increased durations of the lengthening-shortening. Results are consistent with the suggestion that the source of the lengthening-shortening phenomenon is in cortical brain processes.—*Journal abstract*.

8708. Holt, Gary L. & Matson, Johnny L. (Eastern Illinois U) **Necker cube reversals as a function of age and IQ.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 519-521.—25 high IQ children (above 125) and 25 low IQ children (about 100) ages 7, 8, 9, 10, and 11 yrs were asked to reverse the Necker cube under 3 different instructional sets. The 2nd and 3rd sets of instructions involved the training of 4 different visual perspectives of the Necker cube. Results show that IQ and age both significantly affect the number of reversals of the Necker cube. Except for 11-yr-olds, low IQ children perceived fewer reversals than high IQ children. (17 ref)—*Journal abstract*.

8709. Jones, Robert M. & Tulunay-Keesey, U. (U Wisconsin, Medical Ctr, Madison) **Accuracy of image stabilization by an optical-electronic feedback system.** *Vision Research*, 1975(Jan), Vol 15(1), 57-61.—Describes the performance of an optical-electronic image stabilization

system which uses the contact lens-mirror method for eye-movement tracking in connection with a feedback principle for image stabilization. Results of tests show that the maximum residual image movement was .2' for one S and .6' for another. (French, German, & Russian summaries)

8710. Julesz, B.; Gilbert, E. N.; Shepp, L. A. & Frisch, H. L. (Bell Lab, Murray Hill, NJ) **Inability of humans to discriminate between visual textures that agree in second-order statistics: Revisited.** *Perception*, 1973, Vol 2(4), 391-405.—Introduces 3 new methods that generate 2-dimensional non-Markovian textures with different 3rd-order but identical 1st- and 2nd-order statistics. All 3 methods generate texture pairs that cannot be discriminated from each other. The lack of texture discrimination is the more astonishing since individual elements that form the texture pair are clearly perceived as being very different. However, a counterexample was found that yields discrimination, although the texture pair has approximately identical 2nd-order statistics. This case can be explained by assuming that early feature extractors do some preprocessing. These new demonstrations give support to a model of texture discrimination in which the stimulus is first analyzed by local feature extractors that can detect only simple features such as dots and edges of given sizes and orientations. The outputs of these simple extractors are evaluated by a global processor that can compute only 2nd- or 1st-order statistics (i.e., it can compare at most 2 such outputs).—*Journal abstract*.

8711. Juola, James F.; Leavitt, David D. & Choe, Chong S. (U Kansas) **Letter identification in word, nonword, and single-letter displays.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 278-280.—Conducted a study of 8 undergraduates to test letter identification in 4-letter words, 4-letter nonwords, and single-letter displays, using a 2-alternative, forced-choice procedure. The nonwords were constructed to be pronounceable and orthographically regular. All displays were tachistoscopically presented without pre- or postexposure masking fields. The mean proportions of correct choices were .749 for letters, .735 for words, and .671 for nonwords, with the latter proportion being significantly smaller than those for the other conditions. The relatively high performance for letters was attributed to the absence of masking fields in the present study, since masks have been shown to interfere more with letter processing than word processing in similar studies. The superiority of words over regular nonwords was used as evidence to support the hypothesis that the perceptual unit in reading can be at least as large as a 4-letter word. (15 ref)—*Journal abstract*.

8712. Kelly, D. H. (Stanford Research Inst, Menlo Park, CA) **Effects of the cone-cell distribution on pattern-detection experiments.** *Journal of the Optical Society of America*, 1974(Nov), Vol 64(11), 1523-1525.—Notes that at photopic luminance levels, the cone-cell variation of packing density across the retina provides a natural limit to the effective size of wide-field stimulus patterns. In some experiments, this eliminates the need for small test spots, which produce band-broadening effects in the spatial-frequency domain. Calculations of



these effects are given, to aid in the design of such experiments. (15 ref)

8713. Kennedy, J. M. (U Toronto, Ontario, Canada) **Is gradual recognition of pictures by Ethiopian subjects a differentiation process or a pattern construction process?** *Perception*, 1974, Vol 3(1), 29-31.—Reanalyzes protocols from a report by J. B. Deregowski et al (see PA, Vol 51:8365) of the Me'en tribe who have minimal contact with pictorial materials. It is hypothesized that nonpictorial peoples viewing pictorial test materials may initially recognize details and gradually build up a composite structure, rather than—as Deregowski et al proposed—engage in a process of differentiation from a global mass towards finer discriminations.—*Journal abstract*.

8714. Kintz, B. L. (Western Washington State Coll) **Perception of stimulus location during interocular stimulation.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 515-516.—Flashes of white light were presented separately and randomly to the nasal or temporal hemispheres of each retina. Os responded verbally their decisions as to which eye and which hemisphere had been stimulated. The number of correct responses and latencies at each stimulus position were recorded. The left nasal stimuli produced the shortest and left temporal stimuli the longest latencies, respectively. Nasal positions were perceived the most accurately and the temporal positions the least accurately. Results suggest that Os can inhibit the amount of information that transfers from one hemisphere to the other by either the ascending pathways or through the cerebral commissures.—*Journal abstract*.

8715. Klein, S.; Stromeyer, C. F. & Ganz, L. (Claremont Coll) **The simultaneous spatial frequency shift: A dissociation between the detection and perception of gratings.** *Vision Research*, 1974(Dec), Vol 14(12), 1421-1432.—Results of studying threshold rise and frequency shift under successive and simultaneous conditions indicate that the threshold rise and frequency shift are dissociated. A 1-stage neural model was examined to see whether the frequency shift could be quantitatively predicted from the threshold rise. The predictions were poor. A 2-stage model is thus proposed to account for the results. (French, German, & Russian summaries) (32 ref)

8716. Koenderink, J. J. & Van Doorn, A. J. (U Groningen, Inst voor Experimentele Psychologie, Haren, Netherlands) **Visibility of unpredictably flickering lights.** *Journal of the Optical Society of America*, 1974(Nov), Vol 64(11), 1517-1522.—Measured the sensitivity of the visual system to temporal modulation with unpredictable, aperiodic signals. 3 kinds of stimulation were used: (a) a band-limited gaussian random signal, (b) a passband-limited gaussian random signal, and (c) a periodically quenched random signal. The sensitivity of 2 experienced Os to random signals with narrow frequency bands at high frequencies was governed by the pseudo-flash phenomenon. If the bandwidth was such that the signal contained less than 2 independent samples per second, the psychometric curve followed from the amplitude distribution of the random signal. If the signal contained a larger number of independent samples per second, the psychometric curves were as steep as they are

for sine-wave stimulation. If the De Lange characteristic is the envelope of the sensitivity characteristics of independent channels, sensitive to specific frequency bands, then these experiments permit the estimation of the bandwidth of the most sensitive channel.—*Journal abstract*.

8717. Loomis, J. M. & Nakayama, K. (Smith-Kettlewell Inst, San Francisco, CA) **A velocity analogue of brightness contrast.** *Perception*, 1973, Vol 2(4), 425-428.—Describes an illusion in which, when 2 targets move with the same velocity against a background of smaller moving dots which have a velocity gradient, the target which is moving faster than its immediate surround appears to move faster than the target which is moving slower than its immediate surround. Apparent velocity of a target therefore depends strongly on its velocity in relation to its immediate surround. This illusion is interpreted in terms of motion-sensitive cells which have center-surround antagonisms analogous to the physiological interpretation of brightness contrast.—*Journal abstract*.

8718. Mack, Arien; Fendrich, R. & Fisher, Celia B. (New School for Social Research, New York, NY) **A new illusion of movement dependent on eye movement during head rotations.** *Perception*, 1974, Vol 3(1), 53-62.—Conducted 2 experiments with a total of 24 Os which examined a previously undocumented illusion of movement. The illusion occurred when an O, in an otherwise dark room, attempted to maintain fixation on a stationary light point located straight ahead of him while rotating his head from left to right. The light appeared essentially stationary during head rotations up to about 25°, but with more extreme rotations the point suddenly appeared to sail off in the direction opposite to the head turn. Data indicate that the illusion is a result of unmonitored movements of the eye (i.e., eye movements which are not efferently controlled and about which there is no proprioceptive information), in the direction of the head turn, which occur when the eye is no longer able to maintain fixation by counterrotating.—*Journal abstract*.

8719. Macmillan, Neil A.; Moschetto, Charles F.; Bialostozky, Franklin M. & Engel, Lenore. (Brooklyn Coll, City U New York) **Size judgment: The presence of a standard increases the exponent of the power law.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 340-346.—Conducted 2 experiments in which a total of 80 undergraduate Ss judged the size of circles by the methods of magnitude estimation and magnitude production, with or without a standard figure present. Results indicate that the presence of the standard raised the exponent of the power law. The effect was largely independent of the position of the standard in the range of stimuli. It is argued that the standard's effect was not mediated by a difference in apparent size between perceived and remembered standards, a change in Ss' response strategies, a decrease in sequential dependencies, or other previously identified bias effects. (32 ref) —*Journal abstract*.

8720. Mallenby, Terry W. (Simon Fraser U, Burnaby, British Columbia, Canada) **Effect of discussion on reduction of magnitude of Poggendorff illusion.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 787-791.—In

an experiment with 60 male 6th graders, Ss who were permitted to discuss their responses to the Poggendorff illusion exhibited significantly fewer errors than 2 other groups of Ss who were not allowed to discuss responses. It is suggested that verbalization may play an important role in the processing of perceptual information.

8721. Meyer, Glenn E. (State U New York, Buffalo) **Pressure blindness and the interocular transfer of size aftereffects.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 222-224.—Observed the behavior of 12 female graduate and undergraduate students following a stimulus composed of a top grating with large bar-widths (low spatial frequency) and a bottom grating of narrow lines (high spatial frequency). Results indicate that a subsequently presented test grating of medium bar-width appeared to have a higher spatial frequency on the top half than on the bottom. It is suggested that while this size aftereffect can be obtained dichoptically, this does not imply a central locus, since retinal input from the adapted eye could produce the effect. Ss were tested for the aftereffect in the adapted eye and for interocular transfer with and without pressure blinding the adapted eye. In this last condition, input from the adapted eye could not reach the cortex. However, the aftereffect was equally present under all 3 conditions. This result suggests that size and frequency adaptation have a central locus. (15 ref)—*Journal abstract*.

8722. Nakayama, K. & Loomis, J. M. (Pacific Medical Ctr, San Francisco, CA) **Optical velocity patterns, velocity-sensitive neurons, and space perception: A hypothesis.** *Perception*, 1974, Vol 3(1), 63-80.—Hypothesizes the existence of motion-sensitive cells in the visual system which operate on the optical flow over the retina, and, in so doing, structure the visual field in terms of distinct surfaces that move and/or lie at varying distances from the observer. Concepts of static and dynamic perspective relative to a sphere centered about the eye are developed. It is pointed out that the velocity flow pattern has a very simple form making it amenable to analysis by relatively low-level mechanisms. A higher-order variable of optical flow, the convexity, is defined; assuming a rigid environment, convexity is shown to be related to relative depth. It is then postulated that velocity-sensitive cells having center-surround organization could be linked in such a way as to define a higher-order cell, the convexity cell, having functional properties that make it sensitive to the convexity function. The response profile of a layer of such cells would provide an efficient structuring of the visual field in terms of distinct optical surfaces. It is shown that the convexity cell is insensitive to observer rotations and responds in an invariant fashion to aspects of the optical flow which are related to the surrounding environment. (40 ref)—*Journal abstract*.

8723. O'Callaghan, J. F. (CSIRO, Div of Computing Research, Canberra City, ACT, Australia) **Human perception of homogeneous dot patterns.** *Perception*, 1974, Vol 3(1), 33-45.—Conducted 4 experiments with 8 computer researchers as Ss to ascertain human performance at clustering relatively homogeneous dot patterns. 2 methods for clustering a rectangular array of dots into 2 halves were studied: one increased the separation between the left and right halves, and the other increased

the density of one of the halves. Significant effects were found for array height on the perception of separation patterns and for overall dot density on the density patterns. Results indicate that global properties of dot patterns affected the immediate perception of clusters; consequently, attempts to simulate human perception must incorporate the processing of such global properties. Results also indicate that different perceptual processes operated on dot proximity in perceiving the 2 kinds of pattern. It is suggested that these processes are in fact complementary: one detects perceptual edges, while the other groups areas of similar dot density. (27 ref)—*Journal abstract*.

8724. Oshanin, D. A.; Kremen, M. A. & Pyslar, V. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Some characteristics of the dynamic working image during tracking and "blind" extrapolation.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 132-136.—Studied the tracking of a moving oscilloscope dot after the disappearance of the dot.

8725. Owens, Donald A. & Wist, Eugene R. (Pennsylvania State U) **The temporal course of the relationship between retinal disparity and the equidistance tendency in the determination of perceived depth.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 245-252.—Changes in perceived depth as a function of exposure duration were compared for 2 stimulus conditions; Ss were 24 students. In 1 condition, a depth interval between 2 points of light was produced by the retinal disparity cue, and in the other condition, otherwise identical to the 1st, the light points were connected by a thin luminous line. Results show that the perceived depth interval between the light points increased as a function of exposure durations greater than 1 sec, while no change in the perceived depth interval between the end points of the line occurred. Results are interpreted in terms of a greater equidistance tendency (ET) operating for the line than for the point condition. It is concluded that both the ET and the retinal disparity cue increased in strength as a function of exposure duration. (18 ref)—*Journal abstract*.

8726. Parker, Denis M. (U Aberdeen, King's Coll, Scotland) **Evidence for the inhibition hypothesis in expanded angle illusion.** *Nature*, 1974(Jul), Vol 250(5463), 265-266.—Investigated the perceived orientation distortion of one of a line-pair forming an angle when the 2 lines are unequally illuminated, as compared to the condition when both are equally illuminated. Line-pairs forming acute angles over which luminance was varied independently or in unison were viewed by 15 Ss making 7 settings each. They adjusted a comparison line of constant luminance, positioned 2° from one of the test-figure lines until it appeared equal in tilt to the test line. Results show that the size of the effect varied systematically as a function of the relative—but not the absolute—luminance of the 2 lines. The differences of the magnitude of the perceived distortion as a function of differential luminances was significant ( $p < .01$ ). The effect is interpreted as being due to lateral inhibition involving neighboring orientation-specific cortical units. —A. Cerf-Bearé.



8727. **Ramachandran, V. S.; Rao, V. Madhusudhan & Vidyasagar, T. R.** (Madras Biomedical Assn, India) **Sharpness constancy during movement perception: Short note.** *Perception*, 1974, Vol 3(1), 97-98.—Reports results of an experiment designed to show that the brain has mechanisms for "deblurring" images, at least in the perception of apparent movement. It is suggested that this mechanism of the brain—attributing the absence of sharpness of an object entirely to its movement—be termed "sharpness constancy."

8728. **Rentschler, Ingo & Fiorentini, Adriana.** (U München, Inst für medizinische Optik, W Germany) **Meridional anisotropy of psychophysical spatial interactions.** *Vision Research*, 1974(Dec), Vol 14(12), 1467-1473.—Conducted experiments with the authors as Os in which 2 parallel lines separated by several minutes of arc inhibited each other more strongly when they were oriented vertically or horizontally as compared with oblique orientations. This stronger inhibition from surrounding light partly compensated for the greater contrast sensitivity of vertical and horizontal orientations. Results give some indication that the mechanisms underlying the spatial interactions between 2 lines, in spite of being orientational, are located before the site of convergence of the neural messages from the 2 eyes. (French, German, & Russian summaries) (26 ref) —*Journal abstract.*

8729. **Richards, Whitman & Kaye, Martin G.** (Massachusetts Inst of Technology) **Local versus global stereopsis: Two mechanisms?** *Vision Research*, 1974(Dec), Vol 14(12), 1345-1347.—Data from the measurement of depth sensations in 3 human Os for a range of disparities and bar widths show no evidence that stereopsis involves separate local and global modes of processing. (French, German, & Russian summaries)

8730. **Rosenberg, B. & Langridge, D. J.** (CSIRO, Div of Computer Research, Canberra, ACT, Australia) **A computational view of perception.** *Perception*, 1973, Vol 2(4), 415-424.—Investigates the problems involved in visually perceiving the shape and the edges of dot figures. In determining edges it is not possible to delimit arbitrarily the region on which each point computes. A global computation is defined which leads to a novel way of investigating clustering. When the edges of a figure have been sequenced to yield the boundary it is then possible to determine its shape. The study of shape is confined to convex figures, and an attempt is made to extract global units which correspond to cornerlike regions. It is suggested that a theory which evolves in the manner described has a more unitary aspect than other approaches.—*Journal abstract.*

8731. **Rosinski, Richard R.** (U Pittsburgh) **On the ambiguity of visual stimulation: A reply to Eriksson.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 259-263.—Discusses E. Eriksson's theory (see PA, Vol 51:8236) that visual perception of distance is not solely a function of optical stimulation. It is shown that the optic array does specify distance and that the limitations of visual information are precisely defined in the theory. Visual information alone is insufficient when judgments in arbitrary metric units are required. The limitation of the theory is not in the specification of potential and

effective information, but in the description of the Os' response to that information. (22 ref)—*Journal abstract.*

8732. **Ross, John.** (U Western Australia, Nedlands) **Stereopsis by binocular delay.** *Nature*, 1974(Mar), Vol 248(5446), 363-364.—Studied binocular stereopsis under conditions which controlled for monocular and binocular disparity. Observations were made with an oscilloscope which presented the target figure, an outline square, in repeated 10-msec bursts, at a rate above critical flicker fusion, to each eye simultaneously. The target was centered in a display area which provided a background consisting of a continuously changing random distribution of single dots. Each dot in the distribution was shown to both eyes at the same rate but at different times. When the delay between the eyes was below about 50 msec, the binocular view was observed to reveal a target roughly in the same plane as the noise field. When it was above about 70 msec, the noise field was observed to recede well behind the target. Between 50 and 70 msec, the situation was ambiguous, the background being observed alternately in the plane of the target or behind it. It is concluded that under conditions in which the span for disparity is exceeded, delay alone can determine the relative depth.—*B. Lindsey.*

8733. **Schiffman, H. R. & Thompson, J.** (Rutgers State U) **The role of eye movements in the perception of the horizontal-vertical illusion.** *Perception*, 1974, Vol 3(1), 49-52.—Conducted an experiment with 50 normally seeing undergraduate volunteers to examine eye movements in the determination of magnitude of the horizontal-vertical illusion (HVI). The stimulus figures were presented in conditions where eye movements or tendencies to eye movements were eliminated (i.e., presenting small figures tachistoscopically). The major result indicates that the illusion occurred within these conditions, showing that eye movements do not play a major role in the production of the HVI. However, the finding that the magnitude of the HVI was positively affected in the conditions where tendencies to make eye movements were possible suggests that they exert a secondary role.—*Journal abstract.*

8734. **Shapley, Robert.** (Rockefeller U, New York, NY) **Gaussian bars and rectangular bars: The influence of width and gradient on visibility.** *Vision Research*, 1974(Dec), Vol 14(12), 1457-1462.—Measurements in 2 Os show that narrow gaussian bars were approximately as easy to detect as narrow rectangular bars, but wide gaussian bars were much harder to detect than the corresponding rectangular bars. It is concluded that more than 1 mechanism is required to account for the dependence of bar sensitivity on width. (French, German, & Russian summaries) (20 ref)

8735. **Sigman, E. & Rock, I.** (Rutgers State U) **Stroboscopic movement based on perceptual intelligence.** *Perception*, 1974, Vol 3(1), 9-28.—Conducted a series of 8 experiments with a total of 193 undergraduate Ss which demonstrated that when an object alternately covered and uncovered 2 dots, movement was not perceived provided (a) the object was in the location in front of where a dot had just appeared rather than to the side of this location and (b) the object appeared to be solid or opaque rather than outline. Under such

conditions the dots appeared to be permanently present entities undergoing covering and uncovering. This effect did not require that a physical object with edges progressively occlude and disocclude the dots, since a moving phenomenal square based on subjective contours only and a stroboscopically moving square also eliminated or minimized perceived movement of the dots. Control experiments employing the same spatial and temporal intervals showed that, without the information supporting the covering-uncovering solution, movement typically was perceived. Findings are interpreted as supporting the theory that perception results from a process analogous to intelligent problem-solving. (36 ref) —*Journal abstract.*

8736. **Smithline, Leonard M.** (Cornell U) **Accommodative response to blur.** *Journal of the Optical Society of America*, 1974(Nov), Vol 64(11), 1512-1516.—By use of a blur-pseudostimulus technique and high-speed infrared optometric measurements, the singularity of blur as a stimulus to human accommodation was studied in 4 young adult Ss. Blur was not the sole stimulus; it was a necessary cue, but not a sufficient one. The accommodative system made use of one or more available odd-error (error sign) cues, which, it is believed, supplemented blur with requisite focusing information. —*Journal abstract.*

8737. **Stabell, Bjorn & Stabell, Ulf.** (U Oslo, Norway) **Chromatic rod-cone interaction.** *Vision Research*, 1974(Dec), Vol 14(12), 1389-1392.—The effect of rod intrusion on color-matching functions was investigated, with the authors serving as Os. When a scotopic stimulus was superimposed upon a photopic test beam, the color of their mixture showed gross failures of chromatic additivity. Results are explained on the assumption that the chromatic response of rods may be altered under the influence of cone activity. (French, German, & Russian summaries) —*Journal abstract.*

8738. **Starker, Steven.** (West Haven VA Hosp, CT) **Effects of hypnotic induction upon visual imagery.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 433-437.—Assessed the effects of hypnotic induction vs task motivation and control conditions with regard to reported vividness of visual imagery. Measures of imagery included the Gordon Scale of Imaginal Control and the Imaginal Processes Inventory. Data from 36 female undergraduates agree with a growing body of related literature in failing to confirm the contribution of hypnotic induction to the enhancement of imagery. The importance of distinguishing between hypnotic imagery and hallucination is stressed, along with the need to integrate this research with more general investigations regarding the nature of mental imagery. (27 ref) —*Journal abstract.*

8739. **Stelmack, Robert M. & Leckett, Walter J.** (U Ottawa, Ontario, Canada) **Effect of artificial pupil size on recognition threshold.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 739-742.—Recognition thresholds for neutral and taboo words increased with a decrease in artificial pupil size for 3 male graduate student Ss. Under a fully dilated condition without artificial pupils, there was a slight increase in recognition threshold. No differences were observed between neutral and taboo conditions. Results suggest that pupil size may be a

plausible mechanism in perceptual defense. —*Journal abstract.*

8740. **Strelow, E. R. & Day, R. H.** (Monash U, Clayton, Vic, Australia) **Visual movement aftereffect: Evidence for independent adaptation to moving target and stationary surround.** *Vision Research*, 1975(Jan), Vol 15(1), 117-121.—Conducted 3 experiments with a total of 60 paid volunteer Ss on the visual motion aftereffect resulting from fixation of horizontally moving vertical bars; the temporal parameters of the stationary surround, also composed of vertical bars, were varied. Results of Exp I show that with small central target and large surround always visible the maximum aftereffect occurred when both were exposed for about 60 sec. Results of Exp II show that with moving target present for 60 sec the maximum was achieved with a surround exposure of about 30 sec, indicating separate and faster adaptation to stationary elements. In Exp III the maximum was constant regardless of the temporal location of this period in the 60-sec exposure of the moving bars, suggesting prolongation or "storage" of the adapted state induced by stationary elements. Data are interpreted as indicating that 2 adaptive processes are involved in the aftereffect and are discussed in terms of relative movement and units specifically responsive to this class of movement. (French, German, & Russian summaries) (22 ref) —*Journal abstract.*

8741. **Stromeyer, C. F. & Klein, S.** (Stanford U) **Spatial frequency channels in human vision as asymmetric (edge) mechanisms.** *Vision Research*, 1974(Dec), Vol 14(12), 1409-1420.—Results of measurements made with the authors as Ss suggest that the channels used in the detection of gratings have a bandwidth similar to the channels revealed by adaptation and masking studies. Analysis of phase sensitivity suggests that the mechanisms have an asymmetric receptive field (edge mechanisms). (French, German, & Russian summaries) (31 ref)

8742. **Stromeyer, Charles F.** (Stanford U) **Form-specific colour after effects in scotopic illumination.** *Nature*, 1974(Jul), Vol 250(5463), 266-268.—Investigated the McCullough effect with luminances stimulating rods but not cones. Dark adaptation curves were obtained from 2 experienced Os. These and 1 inexperienced S were then exposed to the alternation of a horizontal magenta, and a vertical green grating at photopic luminance. The achromatic test pattern of horizontal and vertical gratings was then exposed after Ss were dark adapted and under scotopic luminances obtained during earlier dark adaptation. The color tinge of the McCullough effect was obtained at even the lowest luminance level and increased in saturation with increased scotopic levels. The scotopic colors were later matched with Munsell chips. Repeating the procedure with varying spatial frequencies of adapting patterns showed that the effect remains tied to the adapting spatial frequency even at the lowest scotopic levels of test pattern illumination. Data are interpreted as supporting previous evidence that rod signals influence color mechanisms. (24 ref) —*A. Cerf-Beare.*

8743. **Sullivan, Mark J. & Kertesz, Andrew E.** (Northwestern U, Technological Inst) **The nature of fusional effort in diplopic regions.** *Vision Research*, 1975(Jan), Vol 15(1), 79-83.—2 experiments, employing



2 Ss, carried out psychophysical measures of the magnitude and time course of human fusional effort in diplopic regions. It was found that a fusional effort persisted in diplopia and that its actual magnitude was a function of time. Through careful control of the size and rate of change of stimulus disparities, it was possible to measure the gradual decay of fusional effort in diplopia. Fusional effort was detected in response to stimulus disparities until these disparities were nearly twice as large as the disparity threshold for diplopia. (French, German, & Russian summaries)—*Journal abstract*.

8744. Teller, David A.; Morse, Ralph; Borton, Richard & Regal, David. (U Washington) **Visual acuity for vertical and diagonal gratings in human infants.** *Vision Research*, 1974(Dec), Vol 14(12), 1433-1439.—Describes the development of a 2-alternative forced-choice psychophysical method for use with human infants. An adult O must, on each trial, state in which of 2 possible positions an acuity target is presented, by observing only the infant's eye and head movements. The percent correct responses of the O, for each of several acuity targets, are plotted to yield psychometric functions. The technique was used to test the performance of 1-6 mo old infants toward vertical and diagonal acuity gratings. 20 psychometric functions, accumulated from a total of 8 Ss at 2 illumination levels, and a longitudinal series on 1 S, are presented. No differences were found between psychometric functions generated in the presence of gratings in the 2 different orientations. Results are compared to earlier data in which orientational differences in acuity were shown to exist in human adults. Results are discussed in relation to the development of orientational acuity differences. (French, German, & Russian summaries) (15 ref)—*Journal abstract*.

8745. Thompson, Jack & Schiffman, H. R. (Rutgers State U) **The effect on the magnitude of the horizontal-vertical illusion of horizontal retinal eccentricity.** *Vision Research*, 1974(Dec), Vol 14(12), 1463-1465.—Experimental results indicate that the magnitude of the horizontal-vertical illusion increased from foveal to near peripheral locus of stimulation. Findings are discussed in relation to 2 structural explanations of the illusion, one involving dioptics and the other the neuroanatomy of the eye. (French, German, & Russian summaries)

8746. Trezona, P. W. (City U, London, England) **Additivity in the tetrachromatic colour matching system.** *Vision Research*, 1974(Dec), Vol 14(12), 1291-1303.—The trichromatic system of measurement, although suitable for fields subtending around 2°, does not give a linear metric with larger fields because of the presence of rod receptors. Their presence is allowed for the tetrachromatic color match and so one might expect the tetrachromatic system to be more linear. The present study tested this by comparing tetrachromatic and trichromatic additivity for a variety of test stimuli presented to 3 male Os with normal color vision. Results show that a special case of the additivity principle—luminance metamerism—presented a much more severe test than the general case. No departure from tetrachromatic additivity was detected, although trichromatic nonadditivity was pronounced. Trichromatic additivity failures examined were always in a direction consistent with the hypothesis that "rod color" is blue. An

indication is given of the way in which the additive property of the tetrachromatic color match can be utilized to develop general systems of colorimetry and photometry, applicable at all luminance levels. (French, German, & Russian summaries) (31 ref)—*Journal abstract*.

8747. Tyler, C. W. (U Bristol, England) **Observations on spatial-frequency doubling.** *Perception*, 1974, Vol 3(1), 81-86.—The involvement of disparity detectors in the perception of spatial-frequency doubling in a flickering grating was tested with 4 Os who viewed the grating horizontally. Frequency doubling was unimpaired and must therefore occur independently of disparity detection. A distortion model of frequency doubling was compared with a flicker-detection model, in predicting the appearance of nonsinusoidal gratings. Results support the flicker-detection model but not the distortion model. Physiological considerations suggest that spatial-frequency doubling may be mediated by the transient response of the amacrine cells in the retina.—*Journal abstract*.

8748. Tyler, C. William. (U Bristol, England) **Depth perception in disparity gratings.** *Nature*, 1974(Sep), Vol 251(5471), 140-142.—Describes a method which combines the advantages of random-dot stereograms and of sinusoidal modulation techniques in studying spatial limitations of cyclopean depth perception. High spatial frequency sensitivity may be measured by removing high or low spatial frequency information from one matrix of a stereogram. In this case, stereopsis becomes difficult, if not impossible. This phenomena was examined in 5 human Ss. Stereogratings (continuous variations of both amplitude of disparity and spatial frequency) were viewed through a stereoscope. The limits of such high spatial frequency sensitivity were plotted for 2 of these Ss, so that a disparity-scaling equation was developed. (17 ref)—*R. S. Albin*.

8749. Valberg, Arne. (U Oslo, Norway) **Color induction: Dependence on luminance, purity, and dominant or complementary wavelength of inducing stimuli.** *Journal of the Optical Society of America*, 1974(Nov), Vol 64(11), 1531-1540.—Demonstrates that it is possible to predict the equivalent color-matching coordinates of an induced color for any combination of dominant wavelength and purity of the inducing color stimulus. A quantitative formulation of color induction is suggested that incorporates the dependence on (a) the photopic light adaptation level, (b) the angular size of the annular inducing stimulus, and (c) the time of fixation of the test field. (24 ref)

8750. Walker, B. S. (U New South Wales, Sydney, Australia) **Vividness of imagery and spelling errors.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 823-825.—After an analysis of the spelling errors in a 108-word spelling test, words were categorized as P words or V words. P words were those for which all errors could be attributed to mispronunciation or inapplicable phonetic generalization, and for V words the errors had no such basis. Ss were 63 undergraduates. It was predicted and confirmed that the superiority of 33 good visualizers over 30 poor visualizers (assessed by P. W. Sheehan's version of Betts' Questionnaire Upon Mental Imagery) in spelling performance would be more pronounced for V

words than for P words. Females made significantly fewer errors than males.—*Journal abstract.*

8751. Walraven, P. L. (Inst for Perception TNO, Soesterberg, Netherlands) **A closer look at the tritanopic convergence point.** *Vision Research*, 1974(Dec), Vol 14(12), 1339-1343.—Redetermination of the convergence center for tritanopia showed that the blue system is more sensitive than was concluded from L. C. Thomson and W. D. Wright's (1953) study. The spectral sensitivities of the 3 color mediating systems were derived. The ratio of the number of red, green, and blue receptors in normal trichromatic eyes was derived to be 32:16:1. (French, German, & Russian summaries) (19 ref)

8752. Weintraub, Daniel J. & Tong, Lillian. (U Michigan, Human Performance Ctr) **Assessing Poggendorff effects via collinearity, perpendicularity, parallelism, and Oppel (distance) experiments.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 213-221.—Conducted 3 experiments with a total of 161 paid adult Ss to investigate L. Tong and D. Weintraub's (1974) parallelism-attract hypothesis which was applied to the Poggendorff effect. By adjusting the orientation of, and separation between, 2 free-standing dots, Ss indicated directions and distances associated with the Poggendorff display (a transversal interrupted by parallel lines). Results indicate that judged distance between parallels (with transversal absent) increased slightly when additional interior parallels were added; this Oppel effect is interpreted as contour repulsion. Errors in judging the orientation of an actual transversal segment were too small to account for the Poggendorff effect. The usual large errors occurred for estimates of the orientation of the missing transversal segment between the parallel lines. Cognitive mistracking adequately describes the Poggendorff effect. It is suggested that mistracking is a function of the angle subtended between transversal and parallels, and of the orientation of the entire display. (25 ref)—*Journal abstract.*

8753. White, K. D. & Riggs, L. A. (Brown U) **Angle-contingent color aftereffects.** *Vision Research*, 1974(Nov), Vol 14(11), 1147-1154.—Results of 5 experiments with a total of 38 Ss, indicate that visual aftereffects of color, contingent on the stimulus pattern, provide evidence that angle-contingent aftereffects may be mediated by broadly tuned mechanisms different from those which mediate line orientation. Angle-contingent aftereffects generalized to test patterns made up of curves, and curvature-contingent aftereffects generalized to angles. Some characteristics of angle-contingent aftereffects can be explained by a neural substrate with characteristics like those that have been reported for higher-order hypercomplex cells in the visual cortex. (French, German, & Russian summaries) (17 ref)—*Journal abstract.*

8754. Williams, R. (U Bristol, Brain & Perception Lab, England) **Investigation of temporal integration by video sampling.** *Perception*, 1973, Vol 2(4), 441-490.—Conducted 8 preliminary experiments with a new video sampling apparatus to measure the maximum visual temporal integration time (critical duration) at various background intensities. The aim was to determine to what extent this phenomenon is attributable to

either central or peripheral events. The extended integration period found for the number recognition task is interpreted as evidence of a central process. An attempt was made to demonstrate information integration using a rotating form in a similar identification-discrimination situation. Monocular, binocular, and dichoptic arrangements were employed, and the amount of dichoptic summation of form information, achieved by both normal and strabismic Ss without stereoscopic depth perception, was used to test 2 theoretical models of binocular fusion. In addition, stereoscopic depth was generated with uncorrelated sampling of the left and right images, which may be due to the action of a "fusion hierarchy." Signal detection theory is suggested as a possible solution to the problem of expectation effects in identification-threshold experiments. (5 p ref)—*Journal abstract.*

8755. Wolford, George & Hollingsworth, Samuel. (Dartmouth Coll) **Lateral masking in visual information processing.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 315-320.—Conducted a study of 20 undergraduates to examine the space effect with retinal locus and processing order unconfounded. Conditions were also included to distinguish between various explanations of asymmetry. Letter strings were presented at a variety of retinal locations, and spaces were inserted into different positions in the instructed left-right processing order. Results show that the space effect was unrelated to processing order, but it was dependent on retinal location. To account for the various asymmetries, it was necessary to postulate that letters tend to interact with adjacent letters and that the interaction was not spatially symmetric. It was also found that spaces had greater effects on "right-hand" letters than on symmetric letters. It is concluded that letters interact at the feature level. (24 ref)—*Journal abstract.*

### Motor Processes & Performance

8756. Annett, Marian; Hudson, P. T. & Turner, Ann. (Open U, Bletchley, England) **The reliability of differences between the hands in motor skill.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 527-531.—In Exp I measures of manual speed on a peg-moving task were repeated after intervals ranging from 7 wks to 18 mo with 53 undergraduates and 20 11-45 yr old other Ss. Significant test-retest correlations were found for each hand and for the difference between hands. In the same task in Exp II with 3 right-handed postgraduate researchers, practice improved the speed of each hand but did not eliminate the difference between them. This measure of manual asymmetry can be regarded as moderately reliable. (French & German summaries)—*Journal abstract.*

8757. Arstila, M.; Wendelin, H.; Vuori, I. & Välimäki, I. (Turku U Hosp, Finland) **Comparison of two rating scales in the estimation of perceived exertion in a pulse-conducted exercise test.** *Ergonomics*, 1974(Sep), Vol 17(5), 577-584.—With the aid of a feedback system, linear accelerations of heart rate of 4, 5, or 8 beats/min were obtained in 90 bicycle-ergometer tests on 30 29-47 yr old healthy policemen, and the linearity of 2 rating scales for the perception of exertion was studied. The new scale described by G. Borg (1962) and the modification described by the authors both gave highly



linear, repeatable, and mutually comparable results. The 1st scale gave the best performance in many respects and is the more preferable. At the same time the reproducibility of the pulse-conducted test results was studied and found to be very high for work load and exercise blood pressure readings, and also with the new acceleration of 8 beats/min<sup>2</sup> which was studied for the 1st time. The virtues of linear acceleration of heart rate in ergometric testing and of the pulse-conducted test method are discussed. (French & German summaries)—*Journal abstract*.

8758. Catalano, John F. (State University Coll New York, Cortland) **End-spurt following simple repetitive muscular movement.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 763-766.—Studied the nature of end-spurt in a task requiring pure muscular activity (tapping a telegraph key) using 170 undergraduates. Significant end-spurt occurred when Ss believed the task was 90% completed. However, in contrast to other tasks, performance improved on the critical trial for all conditions. This was interpreted as being due to arousal resulting from onset of a signal light rather than to any significance the light might have had. It is suggested that a variable influencing end-spurt might be the length of time spent at a task. In this type of task, the amount of recovery from decrement which occurs through end-spurt is only a small portion of the total decrement which has previously occurred. Optimization of performance level could probably best be achieved through distributed work periods where rest would be introduced prior to the occurrence of decrement.—*Journal abstract*.

8759. Filippovich, V. I. & Petrosian, E. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of Child & Juvenile Physiology, Moscow) **[Motor skill development as a function of the timing of knowledge of results.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 65-76.—Studied the improvement in performance of simple motor skills as a function of (a) the time between the end of a series of learning trials and the presentation of knowledge of results (KR) and (b) the time between KR and the beginning of a new trial series. The skills consisted of jumps to a predetermined height, knee bends of a predetermined depth, and similar tasks performed under easy and difficult conditions. KR was presented concurrently with performance or after intervals of 10-90 sec after the completion of a number of trials. Additional trials were given immediately following the presentation of KR or after varying intervals of delay. Ss were boys 8-12 yrs old. Greatest improvement in performance was achieved when KR was delayed about 20 sec, and the effect was greater for the more difficult task conditions. Results are discussed in terms of the inhibitory effect of the orienting response upon information processing. (English summary) (17 ref)—*L. Zusne*.

8760. Kennedy, Crawford; Van Huss, Wayne D. & Heusner, William W. (Michigan State U) **Reversal of the energy metabolism responses to endurance training by weight loading.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 847-852.—6 university distance runners were randomly placed into experimental and control groups to determine the effect of progressive overloading with weights on selected training responses. Both groups

received identical training for 8 wks with the exception that 3 days/wk the experimental Ss wore weighted wristlets, anklets, and belts. Pre- and posttest energy metabolism measures were taken during and following both a low-intensity 15-min run (9.7 km/hr, 0% grade) and a high-intensity run to exhaustion (16.1 km/hr, 9% grade). The energy metabolism responses to endurance training were significantly reversed by the progressive overloading with weights. The energy cost of the low-intensity run was increased, and an unexpected shift toward greater anaerobic metabolism was observed. (17 ref)—*Journal abstract*.

8761. Lepikhova, L. A. (Scientific Research Inst of Psychology, Kiev, Ukrainian SSR) **[The physiological basis of "mental tempo."]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 137-140.—Studied the relationship between individual differences in the rate of movement (self-determining tapping rate) and physiological measures of the Pavlovian properties of the nervous system. (21 ref)

8762. Rondal, Jean A. (U Liège, Lab de Psychologie Expérimentale, Belgium) **[Intervention of interior language in the regulation of motor behavior and its electromyographic control.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 491-501.—Studied the regulatory role of inner speech in voluntary motor behavior. In Exp I, 8 adult Ss were instructed to perform several motor tasks. At the end of each task they were interviewed as to their inner verbalizations during performance. Verbalizations often occurred if the task was difficult enough. In Exp II, electromyographical records of labial movements, associated with inner speech, confirmed the frequent occurrence of specific verbomotor phenomena during the tasks. (French & English summaries)—*Journal summary*.

8763. Sovik, Nils. (U Trondheim, Norway) **Developmental trends of visual feedback control in copying and handwriting performances of children aged 7 through 11 years.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 919-930.—According to neurogeometric motion theory, S would experience changes in normal feedback information as perturbations in executing copying and handwriting activities. Sensory feedback mechanisms in such psychomotor skill performances seem to depend on perceptual-motor abilities, and thus play an important role in such behavior. Hence, a parallel developmental trend regarding feedback control in copying-handwriting behavior was predicted. A study organized as a 2-way design with 48 7-11 yr olds showed that different forms of displaced feedback had different negative effects on accuracy and speed in copying-handwriting performances, whereas an improved feedback control in the same functions could be observed from Ss at the ages tested. No interaction effects were found. (27 ref)—*Journal abstract*.

8764. Werner, Peter. (Miami U) **Education of selected movement patterns of preschool children.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 795-798.—Determined the effects of a program of guided instruction in locomotor, stability, and manipulative movement patterns on the physical performance patterns of nursery school children. 36 Ss took a test, then took part in a learning program for 8 wks. The children learned

physical education experiences as part of the regular nursery school program. All Ss were given a final test on the criterion variables. Principal conclusions from an analysis of covariance were that (a) a program of guided instruction in locomotor, stability, and manipulative movements at the nursery school level led to significant improvement in motor patterns, and (b) there were no significant differences in performances of the boys and girls in these motor patterns.—*Journal abstract.*

## COGNITIVE PROCESSES AND MOTIVATION

8765. Das, J. P.; Kirby, J. & Jarman, R. F. (U Alberta, Edmonton, Canada) **Simultaneous and successive synthesis: An alternative model for cognitive abilities.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 87-103.—Current theories of the structure of cognitive abilities are critically examined and are found to lack adequate description of the processes underlying the abilities. An alternative model, A. Luria's (1966) theory of simultaneous and successive syntheses, is presented and discussed. This model of information processing is supported by factor analytic studies of cognitive abilities and then related to data from studies of memory, imagery, and language. A model of abilities in terms of a structure-process distinction is proposed. (64 ref)—*Journal abstract.*

8766. Foulkes, David & Fleisher, Stephan. (U Wyoming) **Mental activity in relaxed wakefulness.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 66-75.—Attached electrodes to 20 young adults for EEG and electrooculogram (EOG) recording. Each S then lay down in a moderately illuminated room, isolated from Es, under instructions to "relax, but stay awake." At 6 randomly selected times, an E gave a signal. The S then reported his very last presignal mental experience and answered a series of questions about it. On most trials, Ss reported endogenous sensory imagery. Of all reports, 19% were described by Ss as hallucinatory, and 25% were reliably judged as regressive. Hallucination and regression were relatively independent report characteristics, rarely occurring together. By both subjective and EEG-EOG criteria, Ss were awake when experiencing this hallucinatory and/or regressive mentation. Results suggest that (a) sleep-mentation retrieval and analysis techniques can be applied fruitfully to waking-thought samples; (b) relaxed waking thought is fairly susceptible to momentary intrusions of bizarre content or hallucination; (c) such qualities emerge in a variety of psychophysiological conditions and without any extraordinary induction techniques; and (d) the paradigm opens interesting new possibilities for studying similarities and differences between waking and sleeping thought. (28 ref)—*Journal abstract.*

8767. Kantowitz, Barry H. (Ed.). (Purdue U) **Human information processing: Tutorials in performance and cognition.** Hillsdale, NJ: Lawrence Erlbaum, 1974. x, 365 p. \$18.—Presents 7 technical papers on methodologies and models in the study of human information processing. Topics include the interpretation of reaction time in information processing research, double stimula-

tion, the mechanics of thought, and theoretical perspectives on the perception of printed English.

## Learning & Thinking & Conditioning

8768. Allen, Mary J. (California State Coll, Bakersfield) **Sex differences in spatial problem-solving styles.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 843-846.—47 female and 46 male undergraduates completed a battery of spatial tests taken from the Kit of Reference Tests for Cognitive Factors (e.g., Card Rotations Test, Cube Comparisons Test, and Map Planning Test) and list containing 14-20 possible strategies to be checked if they had been used on specific problems. Significant sex differences were observed on reported strategies for 3 of the tests (Card Rotations, Choosing A Path, and Map Planning). Most of the strategies showing significant sex differences were general, rather than test-specific, in nature. Women more often marked strategies like "no particular strategy" or "guessing." Results indicate that while most men and women reported using the same set of problem-solving strategies, women are less efficient in using these methods.—*L. Gorsey.*

8769. Ball, Portia M. & Cantor, Gordon N. (U Iowa) **White boys' ratings of pictures of whites and blacks as related to amount of familiarization.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 883-890.—120 4th- and 5th-grade white boys were shown photographs of 4 white and 4 black boys, which were presented 1, 5, 10, or 20 times. Ss then rated these photographs, plus 2 (1 white, 1 black) not previously exposed, on a scale indicating the extent to which they "would like to bring the boy home to spend some time with them and their families." The black pictures were rated more favorably than were the white pictures and increasing familiarization was associated with an increase in favorability for black pictures but a decrease for white pictures. The attitudinal effects of stimulus familiarization are discussed.—*Journal abstract.*

8770. Blanchard, Edward B.; Young, Larry D.; Haynes, Mary R. & Kallman, Mary D. (U Mississippi, Medical Ctr, Jackson) **A simple feedback system for self-control of blood pressure.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 891-898.—Describes a simple, open-loop, feedback system, based on closed-circuit TV, which can be used to teach Ss to control their blood pressure, along with 2 experiments which demonstrate its efficacy. Results show a consistent advantage for blood pressure lowering of the new feedback system over binary feedback or no feedback, which did not differ from each other.

8771. Brunette, Stephen A. & Battig, William F. (U Colorado) **Recognition of pictorial as compared with verbal descriptions.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 524-526.—After being presented with either photographs and/or sentential descriptions thereof, 64 undergraduates were tested both for pictorial and verbal recognition both immediately and after 48 hrs. Superior recognition was found for the type of material presented during study, primarily due to very poor pictorial recognition by Ss who had studied sentences. No decrement was found over the delay interval, which actually produced facilitation for the nonpresented modality.—*Journal abstract.*



8772. **Calvano, Michael A.** (Kansas State U, Coll of Education) **Predicting the use of imagery as a mediation strategy.** *AV Communication Review*, 1974(Fal), Vol 22(3), 269-277.—Gave 100 college students a paired-associate task and asked them to use imagery to form an association between the pairs. The stimulus item was a line drawing. Ss were asked what associations were used for each stimulus-response pair, and were given 5 cognitive factor tests. The tests and their associated factors were the Object Naming Test, spontaneous flexibility; the Hidden Figures Test, field dependence; Sheehan's short form of the Bett's Vividness of Mental Imagery test, vividness of imagery; the Form Board Test, visualization; and the Card Rotation Test, spatial organization. A self-report mediation survey for use of imagery as a mediator also was used. Only the Hidden Figures Test was a significant predictor and only for 1st-trial scores. Of the associative mediators reported by the students, 38% were of a concrete imagery type.—*D. E. Anderson.*

8773. **Dornič, Stanislav & Stone, LeRoy A.** (U Stockholm, Inst of Applied Psychology, Sweden) **Performance and perceived difficulty in paced and self-paced tasks.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 46, 6 p.—Studied the effect of time stress on the relation between objective (performance) and perceived difficulty. 3 serial tasks of increasing complexity were used, all of them involving high information load, with 28 18-20 yr old students. The tasks consisted of successively presented complex items which required differentiated responses according to a given code, each task performed with and without time pressure. In the time pressure condition the presentation of items was presented at fixed intervals while in the other condition the presentation was self-paced. Results show that with increasing complexity, performance deteriorated; perceived difficulty increased considerably more in the paced condition. It could be demonstrated that in cases where performance in the 2 conditions was the same, paced tasks were experienced as more difficult than self-paced tasks. This is interpreted as due to different "subjective costs" responsible for identical performance.—*Journal abstract.*

8774. **Durding, Bruce M.; Becker, Curtis A. & Gould, John D.** **Data organization.** Yorktown Heights, NY: IBM Thomas J. Watson Research Center, 1974, 40 p.—Reports 3 experiments with undergraduate Ss that investigated how people organize data (word lists) when they do not have to perform any subsequent tasks with the data. Results are discussed relative to the use of computer-based information retrieval systems. (17 ref)

8775. **Eisler, Richard M.; Hersen, Michel & Miller, Peter M.** (VA Ctr, Jackson, MS) **Shaping components of assertive behavior with instructions and feedback.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1344-1347.—Describes the use of instructions and immediate feedback in sequentially shaping target assertive behaviors. Deficiencies in assertive behavior were assessed in 2 male Ss by means of ratings of videotaped interactions. Training involved rehearsals of standard assertive situations unrelated to the Ss' real-life problems. There was relatively rapid acquisition of

component assertive behaviors during training. These improvements also generalized to untreated rehearsals of the Ss' real-life problems. The clinical implications of the training procedures are discussed.—*Journal abstract.*

8776. **Fromme, Donald K.; Whisenant, William F.; Susky, Helen H. & Tedesco, John F.** (Oklahoma State U) **Group modification of affective verbalizations.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 866-871.—Data from 48 17-45 yr old college students demonstrate that complex "here-and-now" affective verbalizations, basic to most experiential or therapeutic groups, can be reliably induced in a group by techniques, reinforcement techniques. Further, reinforcement produced levels of performance equivalent to that induced by therapists. Post-hoc analysis of therapist behavior suggested that therapist effectiveness was enhanced by greater task orientation, more frequent modeling of desired behavior, and by fewer overall interventions by the therapist. The feedback/reinforcement procedures were generally viewed as slightly less positive than unled or therapist-only conditions. This may have been due to the novelty of the feedback apparatus and to greater pressure to perform under feedback conditions. (18 ref)—*Journal abstract.*

8777. **Gardner, Rick M.; Mo, Suchoon S. & Krinsky, Richard.** (Southern Colorado State Coll) **Inhibition of pupillary orienting reflex by heteromodal novelty.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 510-512.—Data from a total of 8 undergraduates who participated in 2 experiments show that when recognition memory was well formed, pupillary orienting reflex to novel auditory stimulus items was inhibited. Instead, pupillary dilation occurred to familiar stimulus items provided the task was relatively difficult. The relation between orienting reflex and recognition memory is interpreted in terms of negative induction arising from the direction of the reflex in the context of Pavlov's theory.—*Journal abstract.*

8778. **Gaziev, E.** (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Transfer of methods of generalization in school children.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 116-123.—Compared the relative advantages of 3 methods of reasoning that were learned with one type of task and transferred to the performance of other similar tasks. Ss were 3 experimental groups and a control group of 20 6th graders each. The methods were (a) deduction, (b) induction, and (c) reasoning from a single case to general cases to other single cases. All 3 methods were effective. Methods (b) and (c) did not differ in the transfer of learning, but both methods were superior to Method (a), deduction. Neither insight nor a gradual way of arriving at generalizations were specific to any of the 3 methods but depended more on the difficulty of the task and on individual differences among learners. (English summary)—*L. Zusne.*

8779. **Greer, G. B.** (Queen's U, Belfast, Northern Ireland) **Sets, logic and concepts: I. Structural links.** *Journal of Structural Learning*, 1973, Vol 4(1), 61-83.—Describes a procedure which can be used to show that certain types of set operations, relations, concepts, and patterns and logical connectives all have the same underlying structure. The relationships of these processes

to studies of concept formation and logical thinking are also examined.

8780. Grigorian, K. K. & Nikiforova, O. I. [Individual differences in the solution of some creative problems.] (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 141-144.—Established 3 personality types on the basis of the nature of drawings done by 464 Ss in 9 cells on a sheet of paper following instructions to draw that differed in the degree to which drawings were to follow a prescribed theme.

8781. Gurova, L. L.; Miroshkina, E. A. & Polivanova, N. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) [The study of intuitive processes in problem solving.] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 41-53.—Describes and discusses the results of a number of experiments on the use of intuition in problem solving. Verbal and visual tasks that required the filling in of missing information were used. It is concluded that the intuitive aspect of thinking is a function of the objective information structure of the problem. Intuition manipulates hypotheses that compensate for the lack of subjective information and the inability to pull all of the elements of the problem together in a logical fashion. In intuition both semantic and formal informational items are used simultaneously. This allows the problem-solver to identify those points that carry the most information in terms of determining the direction of search and its selectivity. Semantic relationships and generalizations are significant landmarks that are utilized in the intuitive problem-solving process, but even information of little significance and isolated semantic elements may trigger the correct solution of the problem. (English summary) (22 ref)—L. Zusne.

8782. Halpern, Joseph & Lantz, Alma E. (U Denver) Learning to utilize information presented over two sensory channels. *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 321-328.—Conducted 3 experiments with a total of 300 undergraduate volunteers in which Ss were provided with auditory, visual, or simultaneous auditory and visual information in a classification task. Difficulty of classification was manipulated by varying the stimulus exposure duration. Consistent bisensory facilitation effects were noted for later trials, with interference evident on earlier trials. Exposure duration influenced rate and not amount of learning, with bisensory performance being most affected by duration. A transfer paradigm was used in Exp III, and little if any transfer was noted between unisensory and bisensory stimulus conditions. It is concluded that Ss were extracting the most salient bisensory stimulus components from the auditory and visual modes of information into a unidimensional information configuration.—*Journal abstract*.

8783. Johnson, Richard K. & Meyer, Robert G. (U Louisville) The locus of control construct in EEG alpha rhythm feedback. *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 913.—Investigated locus of control and performance in a biofeedback situation where the goal was to increase EEG alpha rhythms using 24 female Ss. Ss with an internal locus of control were better able to use feedback to increase

alpha activity than external Ss. Data indicate that definitions of environment should not stop at a person's skin but should also include internal processes and functioning.

8784. Jones, James M. (U Northern Iowa) Effects of ego-involvement and information level on own-categories responses. *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 293-294.—Results from college-student Ss support the prediction that increases in information would result in increases in the number of categories used in judging a stimulus domain; the prediction that increases in ego-involvement would result in decreases in the number of categories was not supported.

8785. Latham, Gary P. & Beach, H. D. (Weyerhaeuser Co, Human Resource Research, Tacoma, WA) Awareness in the conditioning and extinction of the galvanic skin response. *Psychological Record*, 1974(Fal), Vol 24(4), 497-505.—Studied the effects of awareness-una-wareness of stimulus relationships in a conditioned discrimination task using 2 tones as the stimuli (conditioned stimulus—CS), electric shock as the unconditioned stimulus (UCS), and galvanic skin response as the unconditioned response. 10 male undergraduates were given an attention-demanding masking task, and 10 others were given the same masking task but were told that the UCS followed only 1 of 2 tones. Both groups could verbalize the CS-UCS relationship, but discrimination learning occurred much more rapidly in the informed than in the uninformed group. Contrary to the hypothesis, discrimination learning extinguished more rapidly in the uninformed group.—*Journal abstract*.

8786. Leva, Richard A. (State University Coll New York, Fredonia) Modification of hypnotic susceptibility through audio-tape relaxation training: Preliminary report. *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 872-874.—Suggests that audio-taped deep-muscle relaxation training may be a useful device for improving hypnotic performance. 12 moderately susceptible undergraduates improved significantly on the Harvard Group Scale on Hypnotic Susceptibility after 3 training sessions. The technique may improve hypnotic performance of Ss low in susceptibility.

8787. Levine, Michael V. (U Pennsylvania) The generalization function is determined by one subject's probability learning data. *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 245-258.—In his review of probability learning, W. K. Estes (1972) notes that "the chief limitation on effective application" of the models for learning with a continuum of responses to have emerged from the linear and pattern learning models is the failure to specify the smearing or generalization function. He notes that "a useful technique has been developed by Levine for estimating this function from individual data." The present paper describes, gives the rationale for, and proves the validity of the previously unpublished technique.—*Journal abstract*.

8788. Majeres, Raymond L. (Western Illinois U) Cognitive styles and learning strategies in paired-associate learning. *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 861-862.—Studied paired-associate learning strategy and performance of 96 undergraduates with high and low Stroop Color-Word Test color-word ratios



under different motivation and learning conditions. There was a significant relationship between task, strategy (e.g., repetition, mnemonic device, or general systematic schemes), and cognitive style ( $p < .01$ ), though no relationships with performance were found. Results indicate that strategy may be less dependent on specific task demands than performance.—*Journal abstract.*

8789. McFarland, Carl E.; Kellas, George; Klueger, Kurt & Juola, James F. (U Kansas) **Category similarity, instance dominance, and categorization time.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 698-708.—Conducted an experiment requiring Ss to indicate whether or not a probe word belonged to 1 of a variable number of categories which were held in memory. Ss were 21 right-handed female undergraduates. The semantic similarity among the categories was varied, as was the instance dominance of the probe word. Comanipulation of these factors was expected to determine whether category similarity affects between-category shift or within-category search. However, the data suggest that category similarity and instance dominance are additive factors. Instance dominance apparently affected the time to encode the stimulus word and possibly influenced a decision stage; whereas, category similarity ostensibly affected operations involved in the search stage of processing. Semantically similar categories required less search time than semantically dissimilar categories. It is suggested that while dissimilar categories had to be accessed successively prior to search, Ss were able to consolidate similar categories so that categories were simultaneously accessed and searched in parallel. (17 ref)—*Journal abstract.*

8790. Owens, Jerry M.; Werder, Pamela R. & Marshall, Philip H. (US Naval Aerospace Medical Research Lab, Pensacola, FL) **A component analysis of natural language mediators obtained in paired-associate learning.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 512-514.—Analyzed the structural relationships between paired-associate components and natural language mediators (NLMs) by using forward and backward recall paradigms. 86 undergraduates were required to give the NLM and the appropriate to-be-recalled component for pairs learned by natural language mediation. An insignificant difference was found in the ability of stimulus and response components to elicit NLMs, but a significant difference was obtained in the ability to decode the NLM into the correct response, with the forward recall procedure resulting in more efficient response recall. Results are discussed in terms of differential elaboration of stimulus and response components.—*Journal abstract.*

8791. Parish, Thomas S. (Oklahoma State U) **Conditioning of racial attitudes and color concepts in children.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 707-714.—Determined whether attitudes of kindergarten children could be modified through classical conditioning procedures. 105 Ss in Exp I were asked to evaluate Negroes following exposure to the conditioning procedures, while 60 Ss in Exps II and III were asked to evaluate the color black and black animals, respectively, following exposure to the conditioning procedures.

Attitudes were measured with the T. Parish revision (1962) of the Preschool Racial Attitude Measure II. Only the experimental Ss in the latter 2 experiments adopted significantly more favorable attitudes toward the objects in question than their control counterparts. It appears that, while there were a sufficient number of conditioning trials to change attitudes of kindergarten children toward the color black and black animals, there were not enough conditioning trials to change their attitudes toward Negroes. (34 ref)—*Journal abstract.*

8792. Pishkin, Vladimir; Bourne, Lyle E. & Fishkin, Steven M. (VA Hosp, Oklahoma City, OK) **Task structure variables affecting concept identification.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 493-495.—In an experiment with 252 female undergraduates, a mismatch between the number of values of the relevant and the irrelevant dimensions (when there was more than 1 irrelevant dimension) in a stimulus population enhanced concept identification, probably because of a stimulus isolation effect. A mismatch between the number of values of the relevant dimension and the number of response categories, producing a form of stimulus-response incompatibility, inhibited performance. Attentional and hypothesis testing processes appear to underlie both of these effects.—*Journal abstract.*

8793. Richman, Charles L. & Lorenc, Leon. (Wake Forest U) **Effects of overtraining on reversal and half-reversal shift performance employing aural stimuli.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 503-504.—Investigated the relationship between extent of preshift training and type of shift using nonsense sounds as stimuli. 40 undergraduates listened to 4 runs of 5 notes each in a  $2 \times 2$  experimental design with 2 types of shift (reversal or half-reversal) and 2 levels of training (criterion—1 perfect trial, and overtraining—3 consecutive perfect trials). Overtraining facilitated reversal but not half-reversal shift performance. Results confirm previous findings using visual stimuli.—*L. Gorsey.*

8794. Schaeffer, Robert W. & Nolan, Robert J. (Auburn U) **Verbal learning and reinforcement: A reexamination of the Premack hypothesis.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 431-433.—Replicated R. McIntire's study (see PA, Vol 38:1991) which purportedly tested and confirmed the applicability of the Premack principle to verbal learning. 90 undergraduate Ss learned paired associate (PA) lists (comprised of words of intermediate response probabilities) in which the response words were reinforced (i.e., immediately followed) by words of high, intermediate, or low probabilities. Word probabilities were obtained from 2 standard word count sources (the Thorndike-Lorge and the Kucera and Francis). As was anticipated, no differential effects of the probability of the "reinforcement" words were obtained, as measured by trials to criterion for learning the PA lists. The failure of this experiment to support this application of the Premack principle was attributed to inappropriate methodologies used in identifying word probabilities. An appropriate method for testing the Premack principle in a PA learning task is described.—*Journal abstract.*

8795. Singh, R. N. & Krishna, K. P. (Magadh U. Gaya Coll, India) **A comparative study of some personal variables and verbal reasoning.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 56-59.—Compared intragroup differences in the scores of 210 male and 90 female 10-20 yr old students on Singh's Verbal Reasoning Test (VRT) across the variables of sex, age, grade, faculty, inhabitation, socioeconomic status, and parental professions. High and low groups, constituted respectively by the upper 50% and the lower 50% of scores on VRT, were compared by chi-square analysis. VRT scores were significantly higher for higher grades than lower ones, for Science students than Arts students, and for urban environments than rural ones ( $P < .01$ ).—*B. Lindsey*.

8796. Slovic, Paul & Tversky, Amos. (Oregon Research Inst, Eugene) **Who accepts Savage's axiom?** *Behavioral Science*, 1974(Nov), Vol 19(6), 368-373.—Conducted 2 experiments of a total of 78 male college students to investigate the acceptability of a key axiom underlying expected utility theory—L. Savage's (1954) independence principle. Persistent violations of this axiom were observed, even after it was presented to Ss in a clear and presumably compelling fashion. The problem of distinguishing between rejection of a decision principle and failure to understand it is discussed.—*Journal abstract*.

8797. Stang, David J. (Queens Coll, City U New York) **Effects of "mere exposure" on learning and affect.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 7-12.—The mediating role of learning in the relationship between repeated exposure and affect was explored and supported in 3 experiments involving a total of 229 undergraduates. Both learning and affect measures behaved in essentially the same way as a function of exposure duration (Exps I and III), serial position (Exps I and II), rating delay (Exp I), and stimulus properties (Exp I). Results suggest learning may be intrinsically rewarding and clarify one of the mechanisms involved in the relationship between exposure frequency and affect, extending D. E. Berlyne's 2-factor theory of the effects of stimulus familiarity. (21 ref)—*Journal abstract*.

8798. Swenson, Richard G. & Thomas, R. Emerson. (Harvard U, Medical School, Boston) **Fixed and optional stopping models for two-choice discrimination times.** *Journal of Mathematical Psychology*, 1974(Aug), Vol 11(3), 213-236.—Several current models for choice- or discrimination-time experiments represent the stimulus as a sequence of independent and identically distributed observations. The present study develops and compares models based on 2 different stopping rules that an S might use to terminate his sampling process and convert his perceptual evidence into an observable response. The fixed and optional stopping rules yield different predicted forms for the speed-accuracy tradeoff function and for the relation between mean and variance of response times. These predictions are developed in the general case and then specialized for certain conditions of symmetry, so that the expressions are easier to apply and to compare between models. A later section considers how changes in stopping criteria affect predictions about mean response times for correct responses and errors, and

then uses these ideas to relate the optional stopping rule for the random-walk models to those of the accumulator models. Specialized models are considered for stimulus detection and intensity discrimination that assume Poisson-distributed sensory input. (36 ref)—*Journal abstract*.

8799. Taplin, John E. & Jeeves, Malcolm A. (Claremont Graduate School) **The effects of extended practice on concept identification.** *Journal of Structural Learning*, 1973, Vol 4(1), 85-102.—Examined the effects of extended practice on attribute identification problems involving the following conceptual rules: conjunction, inclusive disjunction, conditional, or biconditional. 48 undergraduates were each given a series of 25 problems on 1 of the rules (randomly determined) and then asked how they would approach another problem of the same type. Stimuli were 81 cards of geometric figures which represented combinations of 4 attributes and 3 values. Significant differences were found between performance on the 4 rules, with an order of difficulty consistent with predictions derived from ideal focusing strategies. It is noted that the principal factor determining success seemed to be the nature of the first positive instance.—*C. Wright*.

8800. Taub, Susan I. & Whitman, Thomas L. (Devereaux Foundation, Devon, PA) **Transfer of training after fading and standard discrimination training.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 799-806.—Used standard discrimination and fading techniques to teach 28 preschool children a 2-choice discrimination task in which their nondominant dimension (color or form) was relevant for solution. The fading group performed better than the standard discrimination group on both an initial and a later generalization-discrimination task. On the generalization task, the superiority of the fading technique was limited to form-dominant Ss. When retested for dimensional dominance after 1 wk, fading significantly decreased Ss' choices of their previously dominant dimensions, while the standard discrimination trained Ss showed no change in preference.—*Journal abstract*.

8801. Vernik, E. Yu. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[The formulation of formal and semantic models of a problem in the process of problem-solving.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 54-64.—Studied the relationship between the formal and the semantic aspects of the problem-solving process, using 66 Ss in 4 series of experiments. An analysis of the Ss' written reports led to the conclusion that in solving physics problems Ss formulate mental models that serve different functions from the viewpoint of the relationship between the formal and the semantic components of thinking. These models reflect the content of the problem on different levels. They are also related to different degrees of formality in the solution obtained. The different approaches to the solution of the same problem show different relationships between the formal and the semantic components of thinking and result in qualitatively different solutions. In less-than-optimum solutions the dividing line between these components is quite clear. In better solutions of the same problems the



dividing line between formal and semantic components disappears. (19 ref)—*L. Zusne.*

8802. **Winnikamen, Fajda.** (U René Descartes, Paris, France) [Modalities of the activity of subjects during the acquisition of knowledge.] (Fren) *Monographies Françaises de Psychologie*, 1973, No 26, 118 p.—Investigated modalities of intellectual activity in the process of acquiring knowledge. In the 1st series of experiments, 89 male and 103 female 4th-grade secondary school students responded to questions while learning improved conceptual generalization and utilization of facts in new problem situations. Reorganization of concepts facilitated generalization of knowledge and solution of related new problems. Some of the results were replicated and further examined in another study using 98 male and 88 female students. Additional aspects of modalities of knowledge acquisition were investigated in 27 male and 31 female college students and 295 2nd-yr psychology students. Previous results were, in general, verified in the context of more complex mental activities. (90 ref)—*S. Slak.*

8803. **Wolfe, Mary L.** (U Delaware) **Subjective comparisons of objectively equal intervals between integers.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 915-918.—44 undergraduates made subjective comparisons of pairs of contiguous, arithmetically equal intervals between numbers using a modification of the method of triads. Multiples of 10 from 10 to 100, inclusive, were used to construct the triads. For every triad but one, the interval between the larger integers was more frequently judged smaller. Results are in accord with those of earlier studies suggesting that subjective number is a negatively accelerating function of its arithmetic counterpart.—*Journal abstract.*

8804. **Yaremko, R. M. & Werner, Mara.** (San Diego State U) **Cognitive conditioning: Imagined stimulus contiguity and the third interval conditional GSR.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 215-221.—Studied the effect of repeatedly imagining paired or unpaired conditioned stimuli (CS) and unconditioned stimuli (UCS) on the frequency of post-CS responses during real extinction. 4 groups of 10 Ss each received a model tone and shock. For 2 groups the stimuli were paired (delayed conditioning paradigm). For the others the stimuli were arranged in a long trace paradigm. Ss were then required to imagine receiving paired CS and UCS, or to imagine the events singly. 10 real tone extinction trials were then given. Groups which received delayed conditioning model stimuli were more responsive than trace groups, and groups which had imagined paired stimuli were more responsive than their unpaired controls. Cognitively oriented explanations of these findings are discussed. (15 ref)—*Journal abstract.*

#### Attention & Memory

8805. **Anderson, John R. & Reder, Lynne M.** (U Michigan) **Negative judgments in and about semantic memory.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 664-681.—Conducted 3 experiments to determine how Ss falsify statements like, "A collie is a cat." A total of 67 college students and other adults served as Ss. A multiple regression analysis was performed which used 23 variables to try to predict the

negative judgment times. It was found that the predictive variables were time to generate the superordinate of the instance (e.g., "dog"), time to falsify that the superordinate is the predicate (e.g., "A dog is a cat"), and time to encode the instance. This finding and others indicate that a prominent negation strategy is one in which the S generates the superset of an instance and falsifies that the superset is the predicate. Auxiliary regression analyses are also reported for other reaction time measures gathered in the experiments. It is argued that large-scale regression experiments are critical to the inferential logic of a semantic memory experiment. (22 ref)—*Journal abstract.*

8806. **Brée, David S.** (Graduate School of Management, Delft, Netherlands) **Understanding of structured problem solutions.** *Instructional Science*, 1975(Jan), Vol 3(4), 327-350.—Investigated how much structured material (e.g., sample solutions to problems) is understood, what is earmarked for storage, what remains stored, and how useful this is for recreating the problem's solution. Based on the assumption that "understanding" is the result of a cognitive process in which information about the material is stored in memory, 12 university students were required to think aloud as they were given 3 problem solutions—the solution of the "missionaries and cannibals" problem, a geometry proof, and a plan for another geometry proof. Each solution was presented step-by-step; immediately after understanding the solution, Ss were asked to recall the major points in the solution. One week later, Ss were asked to repeat these steps and reproduce the solution. Results suggest that the understanding process has some consistency across different tasks and that the kinds of points best retained were the context of the problem and subproblems within the solution. The importance of Ss' method for deciding when he understands is discussed. (20 ref)—*Journal abstract.*

8807. **Crovitz, Herbert F. & Schiffman, Harold.** (VA Hosp, Durham, NC) **Frequency of episodic memories as a function of their age.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 517-518.—Gave 98 undergraduates a list of 20 common English nouns. Ss were told to inspect each word until a specific episodic memory associated with it came to mind, and to write a few words to identify that memory. After finishing the list, they were asked to go back and to date the episodic memories as accurately as they could. The frequency of memories as a function of their age was log log linear, with the frequency inversely related to the age of memory.—*Journal abstract.*

8808. **Dornić, Stanislav & Stelmach, George E.** (U Stockholm, Inst of Applied Psychology, Sweden) **Arousal and recall in a simple motor task.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 47, 6 p.—Investigated whether arousal induced by white noise would affect short-term motor memory. 2 groups of 10 17-18 yr old students each were tested under either control or arousal conditions on a linear slide task. Each group participated in 2 sessions with 12 target locations presented within each session. There was a 10-min interval between sessions. Examination of recall errors for Session 1 revealed no differences between groups. For Session 2, constant error revealed

that performance in the arousal condition was significantly better than in the control condition. Results are discussed in terms of the role arousal plays in motor memory. (17 ref)—*Journal abstract.*

8809. Dornič, Stanislav; Sarnecki, Mikael M.; Larsson, Tore J. & Svensson, Jan C. (U Stockholm, Inst of Applied Psychology, Sweden) **Performance and perceived difficulty: The effect of noise and distraction.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 51, 7 p.—40 17-18 yr old high school students performed 4 attention tasks involving high information load under 3 conditions: (a) in quiet; (b) in irregular, high intensity nonverbal noise; and (c) under the distraction of a conversation. Ss were able to compensate for the disturbing influences in Conditions (b) and (c) so that there was virtually no difference in performance between the 3 conditions. However, the "subjective costs," as measured by perceived difficulty, showed considerable differences in effort necessary for the compensation. Perceived difficulty was much higher in noise than in quiet and still higher in the distraction condition. Clear-cut interindividual differences were found in perceived difficulty, indicating differences in stress tolerance.—*Journal abstract.*

8810. Dornič, Stanislav; Svensson, Jan Ch. & Sarnecki, Mikael M. (U Stockholm, Inst of Applied Psychology, Sweden) **Memory trace and expectancy in a recognition task.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 50, 7 p.—Conducted 2 experiments in which a total of 84 17-18 yr olds Ss were required to recognize a visual signal in a series of nonsignals. Signals were presented only in the 1st, shorter part of the session. In the 2nd part only nonsignals were presented, although Ss were instructed to report signals throughout the whole session. A high number of false alarms during the signal-free period was found, inversely related to the number of hits in the 1st part of the session. There was no significant decline in subjective confidence throughout the session. Results are interpreted as due to expectancy and to decreasing strength of the memory trace of the signal.—*Journal abstract.*

8811. Durham, Robert L. & Sestokas, Doris. (U Colorado, Colorado Springs) **Some problems with reaction time as a measure of memory search.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 489-492.—Previous studies of memory search, utilizing reaction time (RT) as an index of processing time, have indicated faster RTs for a probe stimulus which is present in memory set than for one which is absent. T. Dodson (1972) reported a crossover interaction involving RTs when Ss responded with dominant or nondominant hand to stimulus presence or absence, thus confounding the above mentioned main effect. The present study with 20 right- and 20 left-handed undergraduates replicated the interaction reported by Dodson utilizing a different RT measure on a task not involved with immediate memory search. One of 3 colors (red, green, or blue) was randomly designated the positive color in the experiment for each S. Since all 3 colors are assumed equally available in memory, differences in RTs may not be accounted for in terms of encoding strategies. Rather, they must be due to differences in response selection.

Results indicate that left-handed females' RTs accounted for the variance associated with this interaction. Results are discussed in terms of a response selection bias for left-handed Ss.—*Journal abstract.*

8812. Gale, Anthony; Jones, Dylan M. & Smallbone, Adrian. (U Wales Inst of Science & Technology, Cardiff) **Short term memory and the EEG.** *Nature*, 1974(Mar), Vol 248(5447), 439-440.—Studied the relationship between low levels of arousal as measured by the EEG and efficient short-term memory. EEGs of 32 Ss were monitored during the acquisition and immediate recall of 9-digit strings presented in the auditory mode. After an initial 2-min rest period, Ss each underwent 24 trials, for which instruction was minimal. The EEG was recorded, stored, and averaged, using low frequency analysis. Thus, the systematic changes which occur in the human central nervous system during acquisition of material to be-recalled, and the relationship between such changes to subsequent recall, were plotted. It was found that poor performance was consistently associated with increased EEG arousal, even to the extent of enabling prediction of recall error rate before the task proper. Possible interpretations of these results are suggested.—R. S. Albin.

8813. Gormly, John & Lalka, Joseph. (Rutgers State U, Rutgers Coll, New Brunswick) **Arousal and memory.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 486-488.—Attempted to determine whether the relationship between arousal and recall interval is sufficient to account for data on differential recall of arousing and nonarousing events. Similar studies allegedly support a Freudian model of unconsciously motivated repression. Skin conductance was continuously recorded while 96 undergraduates attempted tasks similar to those which appear in tests of intelligence. Ss attempted the tasks under 1 of 8 experimentally induced conditions designed to produce various levels of arousal. The experimental manipulations, which were intended to create arousal through varying amounts of threat to a person's self-esteem, were not successful in producing differential arousal in high and low threat conditions; all conditions were highly arousing to the Ss. Therefore, the design was not suitable for its intended purpose. There was, however, a significant and replicated relationship between the number of sessions of testing S agreed to attend and arousal across the temporal duration of the 1st session ( $p < .05$  for males and  $p < .01$  for females).—*Journal abstract.*

8814. Harris, Richard J. (Kansas State U) **Memory and comprehension of implications and inferences of complex sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 626-637.—Examined the comprehension and memory of truth-value information about sentential complements of 8 classes of subject-complement verbs. 152 undergraduates heard a list of complex sentences, all containing complement sentences as objects of the main verbs (e.g., "Miss America said that she played the tuba"). They were asked, either at the end of the entire list (memory group) or after each complement sentence (comprehension group), to judge the complement sentence ("Miss American played the tuba") as true, false, or of indeterminate truth value. On sentences where the complement had no logically necessary truth



value, comprehension Ss typically judged the truth value indeterminate, while memory Ss typically judged it according to its invited inference. Results are interpreted in the context of an interactionist view of the higher mental processes, where distinctions between different types of stored semantic information are obscured in memory. (33 ref)—*Journal abstract*.

8815. Healy, Alice F. (Yale U) **Separating item from order information in short-term memory.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 644-655.—Conducted 2 experiments, with 48 young adults as Ss, to separate experimentally the processing of item and order information. Findings provide support for the notion that order and item errors are caused by 2 different processes. Bowed serial-position curves were found when only order information had to be learned, but not when only item information had to be learned. The extent to which Ss are limited to phonemic coding in short-term memory was also investigated, and evidence was found that Ss employed phonemic coding in the present situations even though it was an inefficient strategy.—*Journal abstract*.

8816. Kintz, B. L. (Western Washington State Coll) **Attention, short-term memory, and academic performance.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 459-461.—To evaluate the relationship between attention and academic performance, 132 novel Russian-letter trigrams were used as stimuli. Each was presented to 71 college students for 2 sec, then 1 of 132 response-recognition quadrigae of trigrams, containing the previously shown stimulus trigram and 3 foils, was shown for 2 sec. S's task was to choose the correct response trigram from among the quadriga. Large differences in performance occurred, depending upon which element of the trigram was varied in the response quadrigae. An interaction between the varying element in the trigram and the position of the particular trigram within the overall list also occurred. Correlations between performance on this task and the academic performance of the Ss were all essentially zero.—*Journal abstract*.

8817. Kolers, Paul A. & Ostry, David J. (U Toronto, Ontario, Canada) **Time course of loss of information regarding pattern analyzing operations.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 599-612.—Varied the time between initial reading and the subsequent test for recognition and assessed memory for different aspects of sentences as a function of that interval. Ss were 42 undergraduates. Intervals ranged from a few minutes to 32 days between 2 readings of sentences. On the 2nd reading the S classified the sentences (half of which were "new") according to whether he thought he had seen them before or not, and if they were "old," whether he thought they reappeared in the original typography or an alternate one. Results show that information about typography can be recovered for at least 32 days after initial reading. The argument is made that memory for sentences can occur in terms of the pattern analyzing activities used in their encoding. (19 ref)—*Journal abstract*.

8818. Krishna, K. P. & Ansari, Mahfooz A. (Jaggiwan Coll, Gaya, India) **A study of relation between immediate recall and perceptual speed.** *Journal of Psychological*

*Researches*, 1972(May), Vol 16(2), 62-63.—Sought a positive relationship between immediate recall and perceptual speed on the basis of the presumed speed orientation of both tasks. 100 unselected pre-university male college students were given the Perceptual Speed Test, and 25 Ss with high and 25 with low perceptual speed were chosen. Ss were exposed to an unfamiliar picture for 1 min, then tested on immediate reproduction. While the Ss with high perceptual speed had a higher mean reproduction than those with low perceptual speed, the difference was not significant. Hence the null hypothesis cannot be rejected.—*B. Lindsey*.

8819. Lachman, Roy; Shaffer, Juliet P. & Hennrikus, Deborah. (U Houston) **Language and cognition: Effects of stimulus codability, name-word frequency, and age of acquisition on lexical reaction time.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 613-625.—Notes that inter-S agreement on names (uncertainty) for pictures indexes codability of visual reality in a language community. The time it takes to access permanent memory and retrieve name-words for visual objects was measured by picture naming reaction time (RT), using 16 undergraduates as Ss. RT was influenced by 4 fundamental variables: the uncertainty-codability of the display, the frequency and age of acquisition of the lexical response, and the interval between occasions of picture naming; uncertainty, frequency, and acquisition age covary. An 8-variable regression model mapped the main processes in lexical retrieval. Effects of major variables were independent. RT increased with uncertainty in 2 nonlinear segments, with apparent algorithmic processing at low uncertainty and heuristic at high. It is concluded that individual differences reside primarily in RT level (intercepts) and minimally in functional relationships with independent variables. (18 ref)—*Journal abstract*.

8820. Lauer, Patricia A. (U Colorado) **Encoding specificity in the cued and free recall of categorically and alphabetically organized words.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 496-498.—60 undergraduates learned a 40-word list comprised of 5 words from each of 8 taxonomic categories and beginning with each of 8 initial letters. Words were presented for study either cued and blocked by initial letter or by taxonomic category or randomly presented without cues. Output was cued by initial letters, taxonomic categories, or neither, followed by a 2nd uncued recall test for all groups. Consistency of input organization and output cue facilitated both cued and uncued recall but produced a decrement in cued relative to uncued recall. With output cues inconsistent with input organization, however, uncued recall was higher than cued recall. Clustering on the uncued free recall was dependent on input organization and was positively correlated with recall if categoric, but negatively correlated if alphabetic. Results support an encoding specificity hypothesis.—*Journal abstract*.

8821. Moeser, Shannon D. (Memorial U Newfoundland, St John's, Canada) **Memory for meaning and wording in concrete and abstract sentences.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 682-697.—235 undergraduates were presented with sets of concrete and abstract sentences in a series of 5

experiments. It was found that in nearly all cases Ss were better at identifying both meaning and wording changes in concrete sentences, and Ss took significantly longer to encode and decode the abstract sentences. The results could not be explained in terms of either rated comprehension or lexical complexity. It is suggested that neither a dual-coding interpretation nor a semantic propositional coding model could adequately explain the results; thus an analogue semantic coding model is proposed. (24 ref)—*Journal abstract*.

8822. Parkinson, Stanley R.; Knight, Mark V.; DeMaio, Joseph C. & Connors, James F. (Arizona State U) **Channels and order of report in dichotic memory.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 235-241.—Conducted 3 experiments with a total of 80 undergraduates in which Ss received to-be-remembered sequences of 2, 3, or 4 simultaneous pairs of digits. Both digits of each pair were recorded by the same male speaker and both were presented binaurally, thus eliminating cues of spatial location and voice by which Ss could "channel" their reports. Results show that even in the absence of these stimulus channels, Ss reported the digits sequentially. High bias ratings in Exp I suggested the possibility that sequential reports were induced by uncontrolled stimulus characteristics (e.g., temporal synchrony, intensity, and pitch). Pulse-coded speech stimuli, which provided greater control over nonlinguistic stimulus features, were used in Exp III. Bias ratings were reduced, but the majority of Ss continued to report sequentially. These results suggest that the presence of stimulus channels is not a necessary condition for the occurrence of sequential reporting.—*Journal abstract*.

8823. Penney, Catherine G. (Memorial U Newfoundland, St John's, Canada) **Modality effects in short-term verbal memory.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 68-84.—Argues that for short-term memory, auditory presentation is consistently superior to visual presentation, with the difference restricted to recently presented items. A review of the literature indicates that recall increases with fast presentation rates when auditory presentation is used in a serial recall task; otherwise, recall decreases as presentation rate increases. Some puzzling findings on dichotic and bisensory split-span memory are shown to be related to aspects of the modality difference, notably the strong sequential associations in auditory memory. (116 ref)—*Journal abstract*.

8824. Phillips, W. A. (Stirling U, Scotland) **On the distinction between sensory storage and short-term visual memory.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 283-290.—Conducted 3 experiments with a total of 16 university staff and students to study the effects of pattern complexity, pattern movement, and effects of pattern masking over a range of interstimulus intervals. A pattern made by randomly filling cells in a square matrix was presented for 1 sec and followed, after various intervals, by an identical or similar pattern. Ss responded "same" or "different." Performance was fast and accurate if the interval was short and there was no movement or masking of the pattern during the interval. Performance was slower, less accurate, and highly dependent on pattern complexity if the interval exceeded 100 msec, or if there was movement or masking. Results

are interpreted as evidence for 2 distinct classes of visual memory—high-capacity sensory storage which is tied to spatial position and is maskable and brief; and schematic short-term visual memory which is not tied to spatial position, which is protected against masking, and which becomes less effective over the 1st few seconds but not over the 1st 600 msec. (30 ref)—*Journal abstract*.

8825. Rowe, Edward J. (Memorial U Newfoundland, St John's, Canada) **Depth of processing in a frequency judgment task.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 638-643.—Examined, in 2 experiments, the effect of depth of processing on frequency judgments. In Exp I, using 28 undergraduates as Ss, situational frequency judgments were obtained for words presented in either the same or a different type of print on each repetition. In contrast with previous findings showing a large effect on frequency judgments of variation in word meaning, orthographic variation produced no effect, suggesting that the representation of situational frequency involves semantic encoding but is relatively insensitive to changes in nonsemantic attributes. Exp II, with 28 undergraduates as Ss, used an incidental learning paradigm to compare frequency judgments as a function of semantic vs nonsemantic levels of processing. Results suggest that frequency judgments are dependent on the level of processing activated by the presented words. (17 ref)—*Journal abstract*.

8826. Rundus, Dewey. (U South Florida) **Output order and rehearsal in multi-trial free recall.** *Journal of Verbal Learning & Verbal Behavior*, 1974(Dec), Vol 13(6), 656-663.—Collected overt rehearsal protocols in a multitrial free recall task. Ss were 19 college-age females. The relationships between rehearsal and serial position showed only minor changes over trials. The probability of recalling an item was observed to be positively correlated with the amount of rehearsal of the item on all trials. The PRNI (priority in recall of newly recalled items) effect was observed and explained as resulting from a subject-strategy of giving additional rehearsal emphasis to some of those items which had not been recalled on the preceding test. Thus, the PRNI effect was seen as consistent with a general tendency for Ss to recall items in order of strength from strongest to weakest. (17 ref)—*Journal abstract*.

8827. Steimach, George E. & Dornič, Stanislav. (U Wisconsin, School of Education, Madison) **Retention of passive movement as a function of attention and recall delay.** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 48, 4 p.—Used a simple immediate-memory paradigm with 20 17-18 yr old students whose task was to recall a passive horizontal movement of varying amplitude after 0-, 3-, and 7-sec intervals. The task was carried out under 2 conditions. In 1 condition, movements to be reproduced were presented while the Ss performed an attention task with high information load. In the 2nd condition, Ss were asked to fully concentrate on the motor task. Inspection of the absolute error revealed that in the 1st condition, performance was markedly worse and, in addition, there was a significant interval effect. Results support the view that attention plays a major role in short-term motor memory.—*Journal abstract*.



8828. Storandt, Martha. (Washington U) **Recognition across visual fields with mirror-image stimuli.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 762.—26 Ss' recognition of mirror-image reversals of complex, novel stimuli was significantly poorer when the presentation was to the hemisphere contralateral to that in which the stimuli were originally viewed. The suggestion that transfer across the corpus callosum is achieved in humans by point-for-point connections was not supported.

8829. Thackray, Richard L.; Jones, Karen N. & Touchstone, Robert M. (FAA Civil Aeromedical Inst, Aviation Psychology Lab, Oklahoma City, OK) **Personality and physiological correlates of performance decrement on a monotonous task requiring sustained attention.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 351-358.—Used a serial-reaction task to study personality, as well as physiological, correlates of individual differences in performance decrement under low task-load conditions. 60 male college students performed the task continuously for 40 min. Extraverted Ss (as determined by scores on the Eysenck Personality Inventory) showed increasing lapses of attention, while introverted Ss failed to show any evidence of a decline in attention. Of the 2 extraversion components (impulsivity and sociability), impulsivity was the component responsible for the obtained decrement. Heart-rate variability showed significant relationships with personality and with performance decrement, while mean heart rate did not. (18 ref)—*Journal abstract*.

8830. Warm, Joel S.; Epps, Billy D. & Ferguson, Robert P. (U Cincinnati) **Effects of knowledge of results and signal regularity on vigilance performance.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 272-274.—Conducted a study of 72 undergraduates to examine the effects of true and false (noncontingent) knowledge of results (KR) within the context of temporally regular and irregular signal schedules. Ss listened for increments in the duration of recurrent white-noise pulses during a 1-hr vigil. Response times (RTs) to signal detections were faster and less variable when signals were presented on a regular as compared to an irregular basis. RTs were also faster and less variable for Ss receiving true or false KR relative to controls who experienced no feedback. However, the facilitative effects of true KR did not exceed those of false KR even when signal presentations were regular in time and apparently predictable. Results are considered as contrary to an expectancy interpretation of the role of KR in the vigilance task.—*Journal abstract*.

8831. Woods, Robert T. & Piercy, Malcolm. (U Cambridge, England) **A similarity between amnesic memory and normal forgetting.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 437-445.—E. K. Warrington and L. Weiskrantz (see PA, Vol 46:3574) reported a significant interaction between method of testing and S group when amnesics' and controls' memory was tested after a 1-min retention interval. A successful attempt was made to duplicate this finding without using amnesic Ss but substituting for them a group of normal college students with a presumably weak memory trace and comparing them with a group of normal Ss with a presumably strong memory trace. Each S learned a list of 100 words

and was then tested on half the words after 1 min and on the other half after 1 wk. A separate group of 6 Ss was used for each of the following methods of testing: yes-no recognition, cuing with initial letters, and cuing with a fragmented form of the words. The interaction between method of testing and retention interval was significant. Normal performance on yes-no recognition at 1 wk was (like amnesic performance) significantly inferior to normal performance at 1 min, and normal performance on each of the methods of partial information at 1 wk (like amnesic performance) did not differ significantly from normal performance at 1 min. It is concluded that Warrington and Weiskrantz's experiment can no longer be regarded as providing support for the theory that the amnesic syndrome is limited to a defect of retrieval. (French & German summaries)—*Journal abstract*.

### Motivation & Emotion

8832. Aminov, N. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Functional states during monotonous work and the balance of the basic nervous processes.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 77-83.—Studied the effect of monotony on work performance. 40 Ss 17-28 yrs old were given the task of measuring the areas of a large number of circles, and their EEG, galvanic skin response (GSR), and number of errors were recorded. Ss could be divided into 2 groups on the basis of their alpha frequencies and alpha-wave energy: those with a predominance of nervous excitation and those with predominant inhibitory processes. Changes in the GSR level as a function of time spent at the task were of 4 types: increasing, decreasing, U-shaped, and fluctuating. Ss in whom skin resistance increased or followed a U-shaped function showed the largest number of errors. Ss showing a moderate level of arousal demonstrated little decrement in performance; Ss with a low level of arousal and a predominance of inhibition showed impaired performance as the task continued, as did Ss with a high level of arousal and the predominance of excitatory processes. (English summary) (18 ref)—*L. Zusne*.

8833. Basarov, B. (USSR Academy of Sciences, Inst of Psychology, Moscow) **[Experimental determination of the predominant motives in students.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 150-151.—Describes a method whereby the S's perception of the length of parallel lines in different versions of the Müller-Lyer illusion is related to his motivation to obtain a prize for himself or for the group of which he is a member.

8834. Calder, Bobby J. & Staw, Barry M. (U Illinois, Organizational Behavior Program) **Interaction of intrinsic and extrinsic motivation: Some methodological notes.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 76-80.—R. deCharms (1968) has hypothesized that increasing extrinsic rewards may lead individuals to perceive their behavior as under the control of the rewards and that this, in turn, may reduce their intrinsic motivation. Recently, E. L. Deci has reported several studies dealing with this interaction between intrinsic and extrinsic motivation (e.g., see PA, Vol 46:2190). A number of methodological problems with Deci's experiments are discussed. Support for

deCharms's hypothesis is critically reviewed in order to direct future research.—*Journal abstract.*

8835. Deci, Edward L.; Cascio, Wayne F. & Krusell, Judith. (U Rochester) **Cognitive evaluation theory and some comments on the Calder and Staw critique.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 81-85.—In criticizing the authors' work about the effects of extrinsic rewards on intrinsic motivation, B. J. Calder and B. M. Staw (see PA, Vol 53:Issue 5) point out that additional data are necessary to substantiate several assertions. Those data are presented here, and they are seen to be consistent with earlier findings. Other criticisms are considered within the context of cognitive evaluation theory, and areas are pointed out where additional research is necessary.—*Journal abstract.*

8836. Galbraith, Gary G. & Sturke, Robert W. (Washington State U) **Effects of stimulus sexuality, order of presentation, and sex guilt on free associative latencies.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 828-832.—Studied the free associative latencies of 56 high- and low-sex-guilt male undergraduates (classified by scores on the Mosher Forced-Choice Guilt Inventory) on a set of stimulus words graded along a dimension of sexuality that were presented in either a descending or ascending order. The descending order of presentation began with high-sexuality words, progressed through moderately sexual words, and ended with asexual words. The ascending order began with low-sexuality words and ended with highly sexual words. High- and low-sex-guilt Ss differed significantly on highly sexual stimulus words, with low-guilt Ss exhibiting longer latencies. The sexuality of the stimulus words had a strong effect upon latencies, with the longest latencies occurring on highly sexual words. There was also a significant Stimulus Sexuality  $\times$  Order of Presentation interaction.—*Journal abstract.*

8837. Gorman, Bernard S. & Crain, William C. (City Coll, City U New York) **Decoding of "sentograms."** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 784-786.—Studied the ability of 43 undergraduates to decode "sentograms," a form of graphic expression of emotions discussed by M. Clynes (1972). Ss could decode sentograms at better than chance levels. However, accuracy in matching sentograms to labels of specific emotions was considerably worse than in matching sentograms to broader categories of affects.—*Journal abstract.*

8838. Harvey, John H. & Harris, Ben. (Vanderbilt U) **Determinants of perceived choice and the relationship between perceived choice and expectancy about feelings of internal control.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 101-106.—Tested the hypotheses that both perceived choice and expectancy about feelings of internal control over own behavior in a future situation will be greater (a) when a decision involves positive options than when it involves negative options and (b) that perceived choice will be greater when there is a small difference in attractiveness of the outcomes of the options than when there is a large difference. 80 undergraduates were asked to make a selection from 2 types of visual stimulation. Ss were led to believe that they would be exposed at a later time in the experiment to the type of stimulation they had

selected. Information about the types of stimulation was varied to manipulate valence of the outcomes of the options and difference in attractiveness of the outcomes of the options. Results support the hypothesis that both perceived choice and expectancy about feelings of internal control are greater when a decision involves positive options than when it involves negative options, and the predicted effect of difference in attractiveness on perceived choice when the decision involved positive options but not when it involved negative options. (15 ref)—*Journal abstract.*

8839. Hirschman, Richard. (Kent State U) **Cross-modal effects of anticipatory bogus heart rate feedback in a negative emotional context.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 13-19.—Studied the effect of altering the perceptions of one's own physiological arousal on the elicitation of emotional behavior as defined by galvanic skin response (GSR), the nonspecific GSR, and verbal report measures of discomfort and unpleasantness. After an initial 3-min rest period, 48 undergraduates were exposed to 10 successive slides of people who died violently, and to continuous auditory tones. The groups simultaneously exposed to the noxious slides and tones labeled as bogus heart-rate feedback responded to the slides with increased electrodermal activity as compared to Ss exposed to the identical auditory feedback labeled as extraneous noise. An increase in bogus heart rate tended to elicit the most pronounced electrodermal responses. As expected, bogus heart-rate conditions resulted in greater self-reports of discomfort and slide unpleasantness as compared to the noise conditions. Findings are explained as a function of a cyclic cognitive-visceral link. (16 ref)—*Journal abstract.*

8840. Klinger, Eric. (U Minnesota, Morris) **Consequences of commitment to and disengagement from incentives.** *Psychological Review*, 1975(Jan), Vol 82(1), 1-25.—Proposes an integrative theoretical framework for studying psychological aspects of incentive relationships. During the time that an incentive is behaviorally salient, an organism is especially responsive to incentive-related cues. This sustained sensitivity requires postulating a continuing state (denoted by a construct, current concern) with a definite onset (commitment) and offset (consummation or disengagement). Disengagement follows frustration, accompanies the behavioral process of extinction, and involves an incentive-disengagement cycle of invigoration, aggression, depression, and recovery. Depression is thus a normal part of disengagement that may be either adaptive or maladaptive for the individual but is probably adaptive for the species. Implications for motivation; etiology, symptomatology, and treatment of depression; drug use; and other social problem areas are discussed. (4½ p ref)—*Journal abstract.*

8841. Kruglova, N. F. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[The influence of the subjective hierarchy of activity elements on their preservation during a monotonous task.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 75-84.—Measured the performance of 8 Ss in a number of monotonous, prolonged tasks. 3 measures of the primary elements of activity (e.g., errors) and 5 measures of secondary elements (e.g.,



the subjective estimation of fatigue) were taken. As the overall performance of the Ss deteriorated in the course of the task, the secondary elements of activity suffered most while the primary ones showed practically no deterioration. The deterioration of the secondary elements was a function of their importance to the S, of the degree to which he could effectively use feedback to monitor his own performance, and of his capacity for self-control and self-organization. (English summary)—*L. Zusne*.

8842. Luginbuhl, James E.; Crowe, Donald H. & Kahan, James P. (North Carolina State U, Raleigh) **Causal attributions for success and failure.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 36-93.—In 2 separate experiments with a total of 128 undergraduate Ss, attributions of success and failure experiences to the 4 factors of effort, ability, luck, and task difficulty were investigated. Results of both experiments confirm (a) a tendency to attribute success more than failure to internal factors and to unstable factors; (b) a strong interactive tendency to attribute success to effort as opposed to ability, but to attribute failure to lack of ability as opposed to lack of effort; and (c) no effect for a manipulation of expected difficulty of task.—*Journal abstract*.

8843. Machr, Martin L. (U Illinois) **Culture and achievement motivation.** *American Psychologist*, 1974(Dec), Vol 29(12), 887-896.—Analyzes 3 strategies for determining when and under what conditions persistence, choice, and variation in performance occur in the study of motivation. The 1st strategy relates to the role of personality in motivation. The 2nd strategy suggests that situational variables play a major role in achievement motivation, and the 3rd strategy specifically identifies both personality and situation as simultaneously critical variables in the analysis of achievement motivation. The study of cross-cultural motivation is discussed and an ethnographic approach is suggested, particularly in work with varied cultural groups. It is concluded that achievement and achievement motivation should be understood in terms of the sociocultural context in which they are found. (73 ref)—*A. de la Haba*.

8844. Manning, Sidney A. & Taylor, Dalmis A. (U Maryland) **Effects of viewed violence and aggression: Stimulation and catharsis.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 180-188.—Compared 2 types of response measures—aggressive and hostile responses—under conditions of instigation vs no instigation and aggressive vs neutral film. It was hypothesized that viewing an aggressive film would lead to a decrease in hostile responses (catharsis) and an increase in aggressive responses (stimulation) when compared with a neutral film condition. It was also hypothesized that both stimulation and catharsis effects would be enhanced under instigation conditions. Data from 80 male undergraduates show that Ss in the instigation condition had higher scores than those in the noninstigated condition. Ss in the aggressive film condition had lower scores than Ss in the neutral film condition. A significant Film  $\times$  Response Outlet interaction was found which offered support for the predicted catharsis effect on the hostility measure. There was no

support for the predicted stimulation effect on the aggression measure. (23 ref)—*Journal abstract*.

8845. Manning, Susan K. & Melchiori, Maria P. (Hunter Coll, City U New York) **Words that upset urban college students: Measured with GSRs and rating scales.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 305-306.—A study of college students indicates that while taboo words led to greater galvanic skin responses (GSRs) than violence, social and political, and illness words, these last also elicited GSRs.

8846. Ol'shannikova, A. E. & Rabinovich, L. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **A study of some individual characteristics of emotionality.** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 65-74.—Studied the constellations and relative predominance of joy, fear, and anger. Ss' replies to questionnaires were scaled by the E. Their behavior in everyday situations was judged by personal acquaintances of the Ss who had been selected by them. The judges pair-compared all Ss on the presence of the 3 emotions. 8 qualitative modal structures of emotionality were identified in terms of the typical relative predominance of the 3 emotions. It is hypothesized that the stability of an individual's emotional characteristics is indicated to a significant degree by the balance among the different emotions that is typical for this individual. (English summary) (35 ref)—*L. Zusne*.

8847. Peretti, Peter O. (Kennedy-King Coll, Chicago, IL) **Color-mood associations in young adults.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 715-718.—200 undergraduates from psychology classes and 200 from English classes read excerpts from either a Shakespearean comedy or tragedy. Ss then recorded 1 of 3 colors (blue, yellow, or gray) which best reflected their mood after reading the excerpt. Significant sex and discipline differences were found, with males from both disciplines selecting yellow more frequently than would be expected when reading the tragedy. Females reading the tragedy, from both disciplines, selected blue more often than males, and females from English classes had fewer yellow choices than females from psychology classes. Results show that color-mood associations do exist in young adults of college age.—*L. Gorsev*.

8848. Pollio, Howard R. & Mers, Rodney W. (U Tennessee) **Predictability and the appreciation of comedy.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 229-232.—Conducted a study of 44 undergraduates to investigate the role of joke predictability in humor appreciation. Ss were asked to provide punch lines for in-concert routines performed by 2 comedians. Predictability scores derived from each of these routines were then related to various measures of audience laughter produced in response to these routines. Results show no difference in predictability of punch lines and non-punch lines, and strong positive correlations between predictability and the various indices of audience responsivity.—*Journal abstract*.

8849. Rosenthal, Bernard G. (Illinois Inst of Technology) **The psychology of compassion.** *Human Context*, 1972(Fal), Vol 4(3), 600-607.—Derives from phenomenological analysis the categories of compassionate experience, describes the subjective emotional and

cognitive concomitants, and points out the influence of the sociocultural context.

8850. Rudashevskii, V. D. (USSR Academy of Sciences, Scientific Research Inst of Sociological Research, Moscow) [Risk, conflict and uncertainty in the process of decision-making, and their modelling.] (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 84-94. —Reviews decision-making theory, with emphasis on the role of risk, conflict, and uncertainty. Risk is defined as the likelihood of error in making a choice among alternative courses of action, conflict as the incompatibility of the alternatives of choice, and uncertainty as the absence of decisive information. It is suggested that uncertainty has 2 components, one associated with risk, the other with conflict. A small-scale pilot study of a simulated game is described in which risk, conflict, and uncertainty were measured using mathematical models. The predicted nonlinear relationship among these 3 variables was confirmed. (English summary) (25 ref)—*L. Zusne*.

8851. Siegel, Larry J.; Sullivan, Dennis C. & Greene, Jack R. (Northeastern U, Coll of Criminal Justice) Decision games applied to police decision making: An exploratory study of information usage. *Journal of Criminal Justice*, 1974(Sum), Vol 2(2), 131-146. —Analyzed police decision-making processes using L. T. Wilkins's 1965 decision board technique. This method assumes that decision-making can be measured by observing S's response to stimuli presented in the form of pieces of information. A board was created and employed with 50 municipal police officers. Findings suggest that police demonstrate individualized preferences for varying amounts and kinds of information. The nature of the offense was considered most frequently. The attitude of the offender was also an important determinant of the decision outcome; the offender's attitude then influenced the amount and type of information subsequently used. (22 ref)—*Journal abstract*.

8852. Smith, Gene F. & Dorfman, Donald D. (Western Illinois U) The effect of stimulus uncertainty on the relationship between frequency of exposure and liking. *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 150-155. —Determined whether the relationship between frequency of stimulus exposure and affective ratings depends on the uncertainty of the stimuli involved. It was assumed that Ss prefer stimuli of an intermediate uncertainty (or complexity) level and that increasing the frequency of exposure of a stimulus reduces the uncertainty elicited by the stimulus. These assumptions led to the prediction of an Exposure Frequency  $\times$  Stimulus Uncertainty interaction which was supported by data from 300 male undergraduates. For low-uncertainty stimuli, liking decreased as frequency increased. For high-uncertainty stimuli, liking increased as frequency increased. For stimuli of an intermediate uncertainty level, liking first increased and then decreased as a function of exposure. Results are interpreted in information-theoretic terms. (23 ref)—*Journal abstract*.

8853. Terry, Roger L. & Lindsay, Diane. (Hanover Coll) Expectancy confirmation and affectivity: A role playing variation. *Psychological Record*, 1974(Fal), Vol

24(4), 469-475. —Measured the affective reactions of persons to the confirmation and disconfirmation of their expectancies varying in strength and value. 25 female undergraduates role played in 8 situations created by the orthogonal arrangement of dichotomized variables of expectancy outcome, strength, and value. Results confirm earlier findings obtained by laboratory experimental manipulations involving deception. Thus transmethodological generality is given to the conclusion that the affect generated by confirmation (disconfirmation) is directly (inversely) related to the strength and/or value of the held expectancy. (20 ref)—*Journal abstract*.

8854. Terry, Roger L. (Hanover Coll) Role playing and the effects of expectancy confirmation. *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 291-292. —Results of a test of 25 undergraduate females indicate that (a) greater positive effect was generated by confirmation than by disconfirmation and (b) the positive affect generated by confirmation or disconfirmation was directly or inversely related to expectancy strength and value.

8855. Weintraub, Marcy; Segal, Richard M. & Beck, Aaron T. (U Michigan) An investigation of cognition and affect in the depressive experiences of normal men. *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 911. —Administered the Depression Adjective Check List and a projective story completion test as measures of depression to 30 male undergraduates 5 times over a 2-mo period. Data demonstrate the existence of a unified, negative content that is associated with depressed mood among normal Ss and suggest a similarity in the depressive processes of pathological depression and depressed mood.

## NEUROLOGY AND PHYSIOLOGY

8856. Ferchmin, P. A.; Bennett, Edward L. & Rosenzweig, Mark R. (U California, Berkeley) Direct contact with enriched environment is required to alter cerebral weights in rats. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 360-367. —To test the relative effectiveness of direct vs indirect interaction with an enriched environment, 2 experiments were conducted with Berkeley Ss, rats. Some Ss were housed in groups of 12 in large enriched condition (EC) cages while littermate "observer" (OC) Ss were placed singly in small wire-mesh cages within EC. A 3rd group was housed singly in an impoverished condition (IC) where stimulation was minimal. After 30 days, Ss were killed and the brains dissected. In both experiments the usual pattern of EC-IC differences in brain weights appeared, whereas OC showed no significant differences from IC. On measures of exploratory behavior taken during the last 2 days of Exp II, IC fell significantly below EC, and OC was somewhat below IC. Thus EC differed from both IC and OC in brain and in behavior. Active contact with an enriched environment appears necessary for development of EC effects. (35 ref)—*Journal abstract*.

8857. Hirsh, Richard. (California Inst of Technology) The hippocampus and contextual retrieval of information from memory: A theory. *Behavioral Biology*,



1974(Dec), Vol 12(4), 421-444.—Advances a theory which holds that information is normally stored within a specialized memory rather than the system immediately responsible for the performance of behavior. The transfer of information from storage to the system immediately responsible for performance, according to the theory, can occur independently of the occurrence of external stimuli. Usually such information transfer would be prompted by motivational cues and always result in anticipation of stimuli. The hippocampus is regarded as part of a system responsible for determining which information is to be transferred from storage to the performance system. The effects of hippocampal ablation are explained in terms of the elimination of such transfer. A subsidiary system relying upon habit formation is held to be responsible for the learning of which hippocampally ablated animals are capable. (4 p ref) —*Journal abstract.*

8858. Suzdaleva, V. A. & Chuprikova, N. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) [Speed parameters of associative responses and the typological properties of the human nervous system.] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 137-144.—Studied the relationship between associative response times (RTs) in 17 tasks and several measures of the strength, lability, and mobility of the nervous system in 35 university students. Factor analysis of the RTs yielded a single factor. The intercorrelations among all measures yielded 2 factors. It is concluded that for each individual there is a characteristic associative RT that is a function of the lability of the nervous system. The mobility aspect of the functioning of the nervous system influences the RT of those associations that involve additional information processing and decision making. (29 ref)—*L. Zusne.*

8859. Vogt, Brent A. (Harvard Neurological Unit, Boston City Hosp, MA) A reduced silver stain for normal axons in the central nervous system. *Physiology & Behavior*, 1974(Dec), Vol 13(6), 837-840.—Describes a staining technique which impregnates nerve fibers with silver and then differentiates with a hematoxylin differentiator. The result is a simple and efficient stain which can be used to study normal fiber plexes with great clarity and to evaluate lesions in cortical fiber plexes and fiber tracts.

#### Neuroanatomy & Electrophysiology

8860. Barr, Murray L. (U Western Ontario, London, Canada) *The human nervous system: An anatomical viewpoint.* (2nd ed). New York, NY: Harper & Row, 1974. x, 408 p. \$12.95.—Focuses discussions of the anatomy of the central nervous system (CNS) on (a) neurohistology; (b) the regional anatomy of the CNS, beginning with the spinal cord and progressing to the highest levels of the brain; (c) the sensory and motor systems; and (d) the blood supply of the CNS, its meningeal coverings, and the cerebrospinal fluid.

8861. Ben-Ari, Yehezkel & Le Gal La Salle, Gildas. (CNRS, Lab de Physiologie nerveuse, Gif-sur-Yvette, France) Lateral amygdala unit activity: II. Habituating and non-habituating neurons. *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 463-472.

—Recorded unit activity from the lateral amygdala in 60 adult immobilized cats for prolonged periods during which habituation procedures were applied (somatic, auditory, and visual stimuli were used). A mean intertrial interval of 13 sec  $\pm$  7 sec was used. Changes induced by the procedure were consistently similar for a large number of units: either the response parameters, particularly the duration, decreased progressively (habituating—H units) or were unchanged (nonhabituating—NH units). The relationship between spontaneous and evoked activity described by Y. Ben-Ari et al (see PA, Vol 53:Issue 4) was used to differentiate H from NH units—H units had inhibitory responses most often, an initial long duration response and a low spontaneous frequency. NH units had excitatory short duration responses and a high spontaneous frequency. The spontaneous frequency which was initially low in H units progressively increased while it was stable for NH units. Differences between somatic and auditory response decrements are discussed in relation to dishabituation and transfer of habituation phenomena. (French summary) (17 ref)—*Journal summary.*

8862. Ben-Ari, Yehezkel; Le Gal La Salle, Gildas & Champagnat, Jean-Claude. (CNRS, Lab de Physiologie nerveuse, Gif-sur-Yvette, France) Lateral amygdala unit activity: I. Relationship between spontaneous and evoked activity. *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 449-461.—Recorded unit activity from the lateral amygdala in 60 locally anesthetized adult cats. Units were recorded from between .5 to 8 hrs, and both spontaneous and evoked discharges were recorded, along with EEG, hippocampal activity, and arterial blood pressure. Results show that (a) there was a high percentage of low firing rates, particularly in the central core of the nucleus; (b) somatic stimuli were more effective in evoking a response than were auditory or visual stimuli; (c) inhibitory responses were more frequent than excitatory or complex ones (i.e., excitation followed by inhibition or the reverse); (d) spontaneous rate of responsive units was higher than the nonresponsive ones; and (e) spontaneous rates were inversely proportional to response duration. The type of response was not changed although the firing rate may have been modified in relation to sleep-waking changes; however, the relation between firing and response duration was maintained. (French summary) (20 ref)—*Journal summary.*

8863. Bigler, Erin D. & Fleming, Donovan E. (Brigham Young U) Habituation and the occurrence of photically evoked afterdischarges in the albino rat. *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 275-277.—Examined photically evoked afterdischarge (AD) parameters in 13 Holtzman albino rats during the time course of 1 hr of iterative photic stimulation (515 light flashes). It was observed that percentage of AD elicitation, duration of AD activity, and number of spindle waves per AD increased and then subsequently decreased over time. The amplitude of the largest peak-to-peak wave per AD was unaffected by time. Greatest AD elicitation took place during the 5- to 15-min time segment following the initiation of iterative photic stimulation. Likewise, the last 5 min of iterative stimulation yielded the lowest AD elicitation scores. It

was also observed that spontaneous AD-like waves occurred in the visual cortex at irregular intervals that were not specifically correlated with the light flashes. Data suggest the operation of an arousal continuum in the process of AD elicitation.—*Journal abstract.*

8864. Branchey, M.; Brebbia, D. R.; Kohn, M. & Litchfield, D. (Rockland State Hosp, Research Ctr, Orangeburg, NY) **Results of studies using an on-line automatic analyzer of sleep stages in the rat.** *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 501-506.—Reports results of studies using an on-line automatic analysis of polygraphic records in male Sprague-Dawley rats which distinguishes between waking (W), and REM and NREM sleep. 3 basic parameters, similar to those used in visual scoring of polygraphic records were used: a bifrontal electrocorticogram, a fronto-occipital electrocorticogram (which shows theta activity during REM), and nuchal electromyogram. The correspondence between visual and automatic scoring, based on 24-hr recordings of 5 different Ss, was as good as that obtained between different human scorers. The method described here appears to be particularly applicable for use in long-term sleep studies in the rat. (French summary)—*Journal summary.*

8865. Brown, H. R.; Andrianov, G. N. & Ilyinsky, O. B. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) **Magnetic field perception by electroreceptors in Black Sea skates.** *Nature*, 1974(May), Vol 249(5453), 178-179.—Describes the method and results of assessing the magnetic perception of Black Sea skates who have electroreceptor apparatus. The experiments showed that the changing magnetic field penetrating the fish evoked the response of neurons in the area acoustico-lateralic, whereas the constant magnetic field failed to influence the electroreceptor system. Results are discussed in terms of the magnetic field of the earth and the fish movements that occur naturally.

8866. Buchsbaum, Monte; Coppola, Richard & Bittker, Thomas E. (NIMH Public Health Service, Bethesda, MD) **Differential effects of "congruence," stimulus meaning, and information on early and late components of the average evoked response.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 533-544.—Visual average evoked responses (AERs) were studied in situations where Ss expected after training that a different stimulus intensity would occur, or misperceived the actual intensity of the stimulus. In Exp I 15 paid female young adults were taught a simple temporal pattern of light intensities. After repeated presentation of a simple pattern of lights, Ss tended to view more complex patterns as if they were a continuation of the preceding simpler pattern. In Exp II with 36 young adult volunteers, when Ss erred in an absolute intensity judgment task, their AERs to the misperceived stimulus had an amplitude either larger or smaller depending on the direction of the S's error. This tendency to produce AERs consistent with what the S expected was reflected significantly in the early but not late components of the S's AER. Termed the "congruence illusion," the effect is hypothesized to be a means of protection against stimulus overload. The congruence illusion was eliminated by providing Ss with sufficient details of a complex pattern. Stimulus meaning effects

were reflected principally in early components, while information value and contrast effects were confined to later components. (French & German summaries) (22 ref)—*Journal abstract.*

8867. Carmeliet, J.; Debecker, J. & Demaret, P. (U Brussels, Brain Research Unit, Belgium) **A convenient stimulus and situation coding system for the tape recording of event-related potentials.** *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 516-517.—Describes a low-cost versatile electronic coding apparatus for tape-recorded psychophysiological experiments. The 1st circuit serves to encode, to record in AM mode on tape and to retrieve the occurrence in time of 4 independent sensory stimuli, using only 1 tape track. The 2nd circuit is used to write in FM mode on another tape track any figure from 1 to 9 characterizing as many experimental situations. (French summary)

8868. Christie, Margaret J. & Venables, P. H. **Change in palmar skin potential level during relaxation after stress.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 301-306.—A noise-avoidance task was used as a laboratory stressor, and rate of reduction in the negativity of palmar skin potential level (SPL) was used as an index of speed of relaxation. SPL was monitored from 12 male Ss during relaxation periods before and after the task, and compared with similar records from 12 control Ss who were not exposed to this stressor. The rate of reduction in negativity of poststressor SPL was significantly slower than in the prestressor condition; there was no such difference in the data from control Ss. Emotionally unstable introverts relaxed the slowest. (26 ref)—*W. G. Shipman.*

8869. Debecker, J. & Carmeliet, J. (U Brussels, Brain Research Unit, Belgium) **Automatic suppression of eye movement and muscle artifacts when averaging tape recorded cerebral evoked potentials.** *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 513-515.—Describes a method which allows the elimination of eye blinks and other artifacts from the evoked potentials averaged from tape-stored EEG data. Circuit diagrams and technical specifications for the method are presented. (French summary)

8870. Denisova, I. M. & Kosilov, S. A. (USSR Academy of Pedagogical Sciences, Inst of Child & Juvenile Physiology, Moscow) **[Bioelectrical processes in the cerebral cortex and antagonist muscles in dogs in the formation of precision movements.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 16-25.—Measured the bioelectrical activity of the cerebral cortex and the antagonist muscles of 3 dogs trained on a special stand to evoke precision movements. Bioelectrical activity reflected the periods of formation of the integral image of precision movement, corresponding to changes in mechanogram parameters in the process of movement elaboration. When the intensity of search increased, a diffused excitation process was observed in the cerebral cortex, and eventually an excitation irradiation in the motoneurons of the working muscles. At the end of search, the motoneurons and the cerebral cortex displayed a concentration of excitation. The integral image of precision movement corrects precision by 1 kinesthetic channel of information, but the change in one of the parameters of the effort of



movement requires an additional, visual channel of information.—*English abstract.*

8871. Džoljić, M. R.; Bonta, I. L. & Holten, C. V. Erasmus U, School of Medicine, Rotterdam, Netherlands) A method and its pharmacological application to determine the duration of arousal pattern based on amplitude changes of EEG signals in rats. *Experientia*, 1974, Vol 30(1), 117-119.

8872. Evarts, Edward V. (NIMH, Lab of Neurophysiology, Bethesda, MD) Brain mechanisms in motor control. *Life Sciences*, 1974(Oct), Vol 15(8), 1393-1399.—Discusses observations which have emerged as the result of techniques developed to allow individual neuron activity to be recorded in the course of normal movement in the monkey. Data thus obtained have been applied to study of the way information flows between the 3 major subsystems of the brain's motor control system: the cerebral motor cortex, the basal ganglia, and the cerebellum. The mechanism of action of each of these subsystems and their interrelationships in movement control are detailed from the literature. Implications for future research in psychology and psychiatry are suggested. (17 ref)—*B. McLean.*

8873. Fleming, Donovan E. & Bigler, Erin D. (Brigham Young U) Relationship between photically evoked after-discharge occurrence and hippocampal EEG rhythms in restrained and unrestrained albino rats. *Physiology & Behavior*, 1974(Dec), Vol 13(6), 757-761.—The relationship between photically evoked after-discharge (PhAD) occurrence and dorsal hippocampal EEG patterns was examined in 10 restrained and 10 unrestrained Holtzman albino rats during the presentation of 25 photic stimuli. Although the restrained and unrestrained conditions yielded significant differences in PhAD occurrence and type of hippocampal EEG pattern exhibited, it was determined that if the hippocampus displayed a rhythmic slow-wave activity (RSA or theta) PhADs were not elicited. These hippocampal RSA periods were highly correlated with grid activity in the unrestrained condition. PhADs were elicited only during hippocampal EEG episodes that could be characterized as either large- or small-amplitude irregular slow waves. (32 ref)—*Journal abstract.*

8874. Hill, R. M. & Ritchie, G. D. (Ohio State U, Coll of Optometry, Physiology Lab) Directional discrimination: Tolerance of visual cortical cells to severe stimulus degradation. *Experientia*, 1974, Vol 30(6), 628-629.—Investigated the vulnerability of the cortical cell's directionally selective response to severe forms of stimulus degradation. Nearly 300 observations were made of pigmented hybrid rabbits' responses to projected stimuli while under light urethane anesthesia. Microelectrodes were used to record data from the photically responsive cells of the contralateral visual cortex. Results indicate that the production of the maximum spike numbers was dependent on optimum focal conditioning, while preservation of the directionally selective property was independent of focal conditions. (German summary)—*R. Tomasko.*

8875. Kohn, M.; Litchfield, D.; Branchey, M. & Brebbia, D. R. (Rockland State Hosp, Research Ctr, Orangeburg, NY) An automatic hybrid analyzer of sleep

stages in the rat. *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 518-520.

8876. Malmö, Robert B. & Mundl, William J. (McGill U, Allan Memorial Inst, Montreal, Quebec, Canada) Osmosensitive neurons in the rat's preoptic area: Medial-lateral comparison. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 161-175.—Conducted an experiment with 17 Charles River Long-Evans hooded rats in which, for the 1st time, brain-recording data were brought to bear directly on the question of a critical osmosensitive zone in the lateral preoptic area as specifically delimited in the rat by E. M. Blass and A. N. Epstein (see PA, Vol 47:2252) and in the rabbit by J. W. Peck and D. Novin (see PA, Vol 45:7490). The present data clearly show that this critical zone in the lateral preoptic area of the rat contains cells that are osmosensitive. Simultaneous recording from cell populations (a) inside the critical zone and (b) in a zone medial to it showed that the net acceleratory response to challenge for the former was much greater than it was for the latter. Findings constitute new evidence for the critical importance of the lateral preoptic area in cellular dehydration thirst. (47 ref)—*Journal abstract.*

8877. McFarland, Willard L.; Teitelbaum, Herman & Hedges, Elizabeth K. (NIH, Div of Research Grants, Bethesda, MD) Relationship between hippocampal theta activity and running speed in the rat. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 324-328.—The frequency of occurrence and amplitude of hippocampal theta waves induced by forced locomotion was proportional to speed of movement on a treadmill of 6 implanted male Sprague-Dawley rats. Although induction of hippocampal theta waves was related to the initiation of movement, it was not dependent upon proprioceptive feedback because it persisted in the resting S after a bout of running. It was possible to obtain cortical theta waves in the absence of hippocampal theta activity.—*Journal abstract.*

8878. Moneta, M. Eugenia; Lolas, Fernando & Pinto-Hamuy, Teresa. (U Chile, Santiago) Response variables and motor slow cortical potentials (SCP) during performance of learned movements in the squirrel monkey (*Saimiri sciureus*). *Neuropsychologia*, 1974(Oct), Vol 12(4), 477-485.—Studied the influence of response-dependent variables on SCP morphology to corroborate motor cortex contribution to SCP genesis. Electrical responses were recorded using nonpolarizable electrodes from motor cortex of 5 monkeys during performance of a learned appetitive instrumental upper-limb response under 2 different force ranges which were signaled by colored lights. SCP and force values were sampled and processed by means of a LINC computer. Data indicate that SCP recorded bilaterally from specific motor cortex were influenced by response-dependent variables: force exerted and duration of movement. This effect was especially clear over the hemisphere contralateral to the limb used. A possible relationship between response variables explored and SCP components is suggested. (French & German summaries) (33 ref)—*Journal abstract.*

8879. Mulroy, M. J.; Altmann, D. W.; Weiss, T. F. & Peake, W. T. (Massachusetts Eye & Ear Infirmary, Boston) Intracellular electric responses to sound in a

**vertebrate cochlea.** *Nature*, 1974(May), Vol 249(5456), 482-485.—Reports intracellular responses from single hair cells and supporting cells in the cochlea of the alligator lizard *Gerrhonotus multicarinatus*. Electric responses to sounds were of nearly the same magnitude in both hair cells and supporting cells, but the waveforms of the responses to clicks differed in these 2 types of cells. (27 ref)

(27 ref)  
8880. Nash, Allan & Singer, Jay J. (Florida Atlantic U) The late positive component of the auditory evoked potential in a shared reading and counting task. *Neuropsychologia*, 1974(Oct), Vol 12(4), 521-526.—Presented 8 male university student volunteers with a series of low and high tones. When they were instructed to ignore the tones and perform a reading task, the late positive component (LPC) of the evoked EEG was absent. Both tones, however, produced LPCs when S counted the higher tone, with the counted tone showing greater LPC amplitude. Under a shared reading and counting task, LPC amplitudes were reduced and comparable to those observed in the read-only condition. Results are interpreted as most consistent with a selective attention hypothesis of the LPC (French & German summaries)—*Journal abstract*.

8881. Oatman, Lynn C. & Marvel, Kenneth D. (US Army Human Engineering Lab, Aberdeen Proving Ground, MD) **Effect of click intensity on round-window potentials in cat.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 208-211.—Re-examined cochlear microphonic (CM) and N<sub>1</sub> intensity functions for click stimuli. Ss were 4 anesthetized cats and 7 chronically-implanted, waking cats, all with middle ear muscles cut. Mean peak-to-peak amplitudes of the N<sub>1</sub> response indicated that the intensity function is not monotonic, but clearly shows a 2-stage growth. The 2 stages are separated by a plateau in the 75-95 db intensity range, although at these levels the CM intensity function is growing monotonically. Anesthetized Ss showed lower maximum outputs of both CM and N<sub>1</sub>.—*M. B. Meikle.*

and N<sub>1</sub>.—M. B. Meikle.

8882. Petsche, H. et al. (U Vienna, Neurophysiologisches Inst, Austria) **Cortical seizure patterns in multidimensional view: The information content of equipotential maps.** *Epilepsia*, 1974(Dec), Vol 15(4), 439-463. —Recorded seizure patterns elicited by penicillin, pentylenetetrazol, or electrical stimulation in curarized rabbits from 16 electrodes at 1- and 2-mm distances in a square grid. The potential fields were calculated and printed as equipotential maps every 2, 4, or 8 msec, and the paths of the positive and negative maxima of the fields were drawn. The positive potential fields usually moved in a preferred direction whereas the negative fields were stationary. The paths were seldom straight lines. Regularity of the EEG pattern appeared to be caused by potential fields that maintained their path of propagation. Potential gradients were steeper on the leading than on the trailing edges of the fields. At cytoarchitectonic borders the fields were often distorted or disappeared. Traveling waves were frequent and the equipotential lines usually elliptical in the direction of propagation. Since potential fields tend to follow the same path, they must leave a trail of facilitation, thus aiding the formation of "engrams." (French, Spanish, & German summaries) (23 ref)—*Journal summary.*

8883. Šušić, V.; Kovačević, R. & Knežević, S. (U Belgrade, Medical Faculty, Yugoslavia) **Restricted sleep regime: Effects on the occurrence of different sleep phases and spiking activity in the lateral geniculate nucleus.** *Experientia*, 1974, Vol 30(1), 42-43.—Examined the effects of reduced sleep time on the occurrence of ponto-geniculate-occipital spikes during and shortly preceding REM sleep. A treadmill was used to restrict the sleep periods of 4 adult cats to 8, 4, and 2 hrs. EEG, electromyogram, and electroculogram readings were continuously made. Results indicate that the reorganization of the sleep-waking profile, with reduced sleep, is in favor of REM sleep. The proportional increase of REM sleep was higher as sleep deprivation increased. Restricted sleep increased the spike density in slow-wave and REM sleep, with REM spike density showing little increase and slow-wave spike density showing considerable increase. (French summary)—*R. Tomasko.*

8884. Schweitzer, Paul K. & Tepas, Donald I. (St Louis U) **Intensity effects of the auditory evoked brain response to stimulus onset and cessation.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 396-400.—Average evoked brain responses (EBR) to the onset (ON) and cessation (OFF) of 1-kHz pure-tone stimuli were computed from 3 normally hearing, adult male human scalp recordings. Stimuli of 2,000-msec duration were presented binaurally at 10 intensity levels. Results show that the waveform of the OFF EBR was similar to the ON EBR. The ON response was in general larger than the OFF response. Comparable ON and OFF amplitude response measures were both sensitive to changes in stimulus intensity which were fitted by a linear function. Significant differences in slope between ON and OFF amplitude intensity functions were demonstrated, which suggests different physiological systems for these responses.—*Journal abstract.*

8885. Siddle, David A. (U Southampton, England) **Overextinction of the evoked skin conductance response: An EEG study.** *Psychophysiology*, 1974(Nov), Vol 11(6), 630-638.—Investigated Y. N. Sokolov's (1963) proposal that overextinction of the orienting response (OR) is related to sleep onset. 80 auditory stimuli were presented to 22 male and female undergraduates. Although re-evocation of the skin conductance response (SCR) component of the OR occurred, in the majority of Ss, after 40-50 stimulus presentations, this was not accompanied by any change in cortical alertness as measured by integrated EEG output in 3 frequency bands. However, results indicate that Ss displaying SCR return required more stimulus presentations before initial SCR habituation and displayed more spontaneous fluctuations in skin conductance during the prestimulus period than did nonreturn Ss. Within the return group, latency of SCR return was negatively related to both spontaneous activity during the prestimulus period and number of stimuli to initial habituation. (21 ref)—*Journal abstract.*

8886. Squires, Kenneth C.; Squires, Nancy K. Hillyard, Steven A. (U Illinois) Vertex evoked potentials in a rating-scale detection task: Relation to signal probability. *Behavioral Biology*, 1975(Jan), Vol 13(1), 21-34.—Recorded vertex-evoked potentials from 4 experienced young adults with normal hearing performing



a auditory detection task with rating-scale responses. 3 values of an a priori probability of signal presentation were tested. The amplitudes of the N1 and P3 components of the vertex potential associated with correct detections of the signal were systematically related to the strictness of the response criterion and independent of variations in a priori signal probability. No similar evoked potential components were found associated with signal-absent judgments (misses and correct rejections) regardless of the confidence level of the judgment or signal probability. Results strongly support the contention that the form of the vertex-evoked response was closely correlated with the S's psychophysical decision regarding the presence or absence of a threshold-level signal. Implications for a general hypothesis for describing the sensitivity of the P3 component to psychological variables are discussed. (26 ref)—*Journal abstract*.

8887. Terkildsen, K.; Osterhammel, P. & Huis in't Veld, F. (Rigshospitalet, ENT Clinic F, Copenhagen, Denmark) **Far field electrocochleography, electrode positions.** *Scandinavian Audiology*, 1974, Vol 3(3), 123-129.—Proved, by means of 2 experiments using a total of 15 normal-hearing humans, that activity belonging to the far field electrocochleogram can be detected all over the head, including the tip of the nose. Findings of greatest interest were the tracings from the vertex and the mastoid. The cochlear microphonic response (CM) was present at both sites, but largest at the mastoid and with a phase difference of less than 90°, while the action potential (AP) showed complete phase reversal. From 2.6-5.6 msec the vertex exhibited 3 peaks. At the mastoid the counterpart of the 1st 2 was a single wave, while the 3rd peak was distinct and homophasic. Around 7 msec there was a characteristic potential at the vertex, which could be traced close to the subjective threshold. Optimum recording configurations were (a) for the CM, mastoid vs contralateral side of the neck; (b) for the AP, vertex vs mastoid; (c) for the 7 msec potential, vertex vs homolateral side of the neck.—*Journal abstract*.

8888. Travis, T. A.; Kondo, C. Y. & Knott, J. R. (Southern Illinois U, Medical School) **Parameters of eyes-closed alpha enhancement.** *Psychophysiology*, 1974(Nov), Vol 11(6), 674-681.—In an experiment with 56 undergraduates and university employees, the performance of Ss receiving contingent feedback in an eyes-closed alpha enhancement setting was compared with changes in alpha of Ss receiving random feedback and no feedback. In addition, comparisons were made between (a) binary and continuous feedback signals, (b) integrated and criterion alpha as dependent variables, and (c) eyes-open and eyes-closed alpha enhancement tasks. Results show that (a) increases in emitted occipital alpha under eyes-closed conditions were related to contingent reinforcement; (b) proportional feedback was most efficient in the rapid development of eyes-closed training; (c) larger changes in alpha were seen during eyes-open than during eyes-closed training; (d) binary feedback appeared to be more efficient in increasing eyes-open alpha response; and (e) no relationships between the ability to perform the eyes-open and eyes-closed alpha enhancement tasks were found within Ss. (16 ref)—*Journal abstract*.

8889. Trimble, J. L.; Zuber, B. L. & Trimble, S. N. (U Chicago, Eye Research Lab) **Enhancement of single motor unit activity in the human extraocular electromyogram.** *Vision Research*, 1974(Dec), Vol 14(12), 1327-1332.—Compared the frequency spectra of the single motor unit potential and interference electromyogram from extraocular muscles of 6 adult volunteers with normal oculomotor systems. Results allowed the construction of a filter to enhance these potentials in the presence of interference background activity. The relationships between horizontal eye position and single motor unit activity obtained from filtered data compare favorably with brain-stem single unit recordings. (French, German, & Russian summaries)—*Journal abstract*.

8890. Vanderwolf, C. H. & Cooley, R. K. (U Western Ontario, London, Canada) **Hippocampal electrical activity during long-continued avoidance performance: Effects of fatigue.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 819-823.—Implanted 4 male hooded rats in the dorsal hippocampus and trained them to avoid electric shock by jumping out of a box to a height of 35.5 or 48 cm. Hippocampal slow-wave activity was then recorded continuously during a single session in which avoidance testing was continued to the point of extreme fatigue. Rhythmical slow activity (RSA) always appeared prior to a successful avoidance response and rose in frequency as the instant of jump initiation approached. As the Ss became fatigued and failed to avoid, this anticipatory upward shift in frequency failed to occur. (21 ref)—*Journal abstract*.

### Physiological Processes

8891. Alvarez-Buylla, Ramon & Rocas de Alvarez-Buylla, Elena. (Inst Politecnico Nacional, Mexico City, Mexico) **Hypoglycemic conditioned reflex in rats: Preliminary study of its mechanism.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 155-160.—Conducted an experiment with female Wistar rats implanted in the left carotid artery. A conditioned reflex was established after a series of reinforcements in which an insulin injection (unconditioned stimulus) was associated with the sound of a bell (conditioned stimulus). The hypoglycemic conditioned response was statistically similar to that of insulin. The latency of the beginning of the hypoglycemic response to insulin was between 4 and 6 min. The latency of the conditioned hypoglycemic response to the conditioning stimulus was about 1 min. Blood extracted from a conditioned S during the test of conditioning produced a hypoglycemic effect when injected into a nonconditioned receptor S. It is concluded that a nervous mechanism was involved in eliciting the hypoglycemic response.—*Journal abstract*.

8892. Astic, L. & Royet, J. P. (U Claude Bernard, Villeurbanne, France) **[Sleep in the kangaroo-rat (*Potorous apicalis*): A study in the adult and the young, one month before final leaving of the pouch: Effects of weaning.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol 37(5), 483-489.—Studied states of sleep by polygraphic methods in the adult kangaroo-rat and in the young, 1 mo before it finally left the pouch. In the adult, 2 stages of sleep were identified whose behavioral and polygraphic characteristics were

similar to those of higher mammals. The percent time of paradoxical sleep (PS) was 5.8% and the ratio of PS to total sleep was 13%. A clear rhythm in the states of sleep was observed in relation to a 12 hr light-dark cycle. About 1 mo before weaning, the young displayed an electrocorticogram pattern of sleep very similar to that of the adult, but with some characteristics of immaturity: a low percentage of wakefulness (32%) and, particularly, a high percentage of PS (25%). At the beginning of weaning, coinciding with the final emergence of the young from the pouch, there was a 20% increase in wakefulness of slow-wave sleep and PS decreased. The progressive organization of a nycthemeral rhythm of the states of alertness was observed while the animal was still in the pouch.—*English summary.*

8893. Bardwick, Judith M. (U Michigan) **The sex hormones, the central nervous system and affect variability in humans.** In V. Franks & V. Burt (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

8894. Barlow, David H.; Abel, Gene G.; Blanchard, Edward B. & Mavissakalian, Matig. (U Mississippi, Medical Ctr, Jackson) **Plasma testosterone levels in male homosexuality: A failure to replicate.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 571-575.—Compared the plasma testosterone values for 15 15-35 yr old male homosexuals of Kinsey rating 5 or 6 with the values reported by R. C. Kolodny et al (see PA, Vol 47:11202), who had found male homosexuals to have lower testosterone values than heterosexuals. The values for the present Ss were significantly higher than those reported by Kolodny et al. In fact, the mean values for the current sample did not differ from the mean value reported by Kolodny et al for heterosexual (Kinsey rating 0 or 1) controls. The present findings thus fail to confirm the relation between degree of homosexuality and plasma testosterone level.—*Journal abstract.*

8895. Baxter, Sam. (Medical Coll of St Bartholomew's Hosp, Hackney Hosp, London, England) **Orgasm and labour in primiparae.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 357-360.—A randomly selected group of 54 married primiparous women were interviewed on a large variety of data relating to their pregnancy and sexual behavior including their ability to achieve orgasm during intercourse. It was found that women who had not achieved coital orgasm before pregnancy (20.4%) had a significantly longer 2nd stage of labor and were significantly more likely to have had their labor induced. Nonorgasmic women also tended to have had a longer first stage of labor, were more likely to have had a labor lasting more than 24 hrs, and had a greater blood loss.—*W. G. Shipman.*

8896. Bondy, Stephen C.; Lehman, Ralph A. & Purdy, Janet L. (U Colorado, Medical Ctr, Denver) **Visual attention affects brain blood flow.** *Nature*, 1974(Mar), Vol 284(5447), 440-441.—Explored the hypothesis that intellectual activity increases the rate of blood flow through the brain. 2 small cardboard blinkers were glued to the heads of 3-day-old chicks that had been fasted for the preceding day. The blinkers were positioned adjacent to each eye so that one eye could see only forward and the other only backward. Ss were then

placed in a smooth white circular bowl containing grains of chicken food which they could thus only peck with straight forward pecks. After 10 min brain blood flow was determined and the chicks were sacrificed after 10 sessions. It was found that the regions innervated by the forward-looking eye had a significantly greater rate of blood flow than regions associated with the backward-looking eye. A control group of chicks treated similarly except for the absence of grain in the white bowl in which they were placed, showed no such differences. Explanations for these results are discussed.—R. S. Albin.

8897. Borbély, Alexander A. & Huston, Joseph P. (U Zürich, Inst of Pharmacology, Switzerland) **Effects of two-hour light-dark cycles on feeding, drinking and motor activity of the rat.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 795-802.—Compared the behavior of 7 male CFN COBS albino rats under 2-hr and 12/12 hr cycles. The 2-hr cycles consisted of 60/60 min, 80/40 min and 40/80 min light-dark schedules which were maintained each for 7 days. Water intake, frequency of feeding, and motor activity were still significantly higher during dark than during light, although their occurrence during dark was reduced as compared to the 12/12 hr control schedule. A free-running circadian rhythm of consummatory behavior with a period length exceeding 24 hrs was present throughout the experimental period. The amplitude of the circadian feeding rhythm gradually decreased over time, whereas the percentage of feeding during dark increased. During the circadian phase of minimal food intake, illumination changes affected feeding behavior more strongly than during the phase of maximal food intake. After restoration of the original 12/12 hr cycle, the amplitude of the nocturnal feeding rhythm increased gradually over several days, whereas the amplitude of the drinking rhythm showed a more rapid recovery. Results show that even short cycles of illumination may exert control over the rat's consummatory and motor activity. Short light-dark schedules provide a way for studying separately effects of illumination and of circadian rhythms. (19 ref)—*Journal abstract.*

8898. Brener, Jasper & Jones, J. Michael. (U Hull, England) **Interceptive discrimination in intact humans: Detection of cardiac activity.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 763-767.—Conducted an experiment which demonstrated that individuals could be trained to discriminate between vibratory stimuli that were contingent on their heart beats and vibratory stimuli that displayed the same temporal and physical properties as the contingent stimuli, but that were independent of their heart beats. Data derived from 1 experimental and 2 control groups each comprised of 10 male undergraduate volunteers suggest that the procedure employed may provide a useful means of assessing the ability of intact humans to detect normal variations in visceral activity. (18 ref)—*Journal abstract.*

8899. Brooksbank, B. W.; Brown, R. & Gustafsson, J.-A. (MRC Neuropsychiatry Unit, Carshalton, England) **The detection of 5 $\alpha$ -androst-16-en-3 $\alpha$ -ol in human male axillary sweat.** *Experientia*, 1974, Vol 30(8), 864-865.—Describes research to determine if axillary sweat from human males contains sufficient quantities of 16-dehydro C<sub>19</sub> steroids to be detectable by gas chromatography



and spectrometry. It was found that both androstenol and androstenone occur in axillary sweat from adult men. Implications of these results, in light of the sex-releasing function of androstenol in other mammals, are discussed. (French summary)

8900. Burdick, J. Alan; Stewart, D. Y. & Adamson, J. D. (U Manitoba, Winnipeg, Canada) **Cardiac activity and verbal report of homosexuals and heterosexuals.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 377-385.—20 homosexual and 21 heterosexual males were shown slide stimuli of sexual content. Tonic heart rate (HR) and 4 measures of tonic heart rate variability (HRV) were measured during the slide viewing and these data were compared with an evaluation during the period following the viewing. The evaluations were more uniform and extreme in the heterosexual group. HR increases were higher in both groups for slides of homosexual content. (21 ref)—W. G. Shipman.

8901. Chen, C. S.; Bock, G. R. & Gates, G. R. (Monash U, Clayton, Vic, Australia) **Effect of priming and testing for audiogenic seizures in BALB/c mice as a function of stimulus intensity.** *Experientia*, 1974, Vol 30(2), 153.—Investigated susceptibility to induced audiogenic seizures in 126 BALB/c mice in a 3 (priming intensity)  $\times$  3 (testing intensity) factorial design. Mice were exposed at 21 days to tones of 85, 98, or 114 db and were tested at 28 days for seizures at 1 of these intensities. Priming stimulus intensity was more important than the testing stimulus: mice primed at 85 and 98 db exhibited low test seizures at all testing intensities, whereas all mice primed at 114 db exhibited seizure activity. It is suggested that priming at 114 db increases the auditory system's reactivity to loud sounds. Results are consistent with a sensory deprivation hypothesis of acoustic priming in mice. (German summary)—C. Wright.

8902. Dallaire, A. & Ruckebusch, Y. (Ecole Nationale Vétérinaire, Lab de Physiologie, Toulouse, France) **Rest-activity cycle and sleep patterns in captive foxes (*Vulpes vulpes*).** *Experientia*, 1974, Vol 30(1), 59-60.—Studied the sleep-activity cycle adaptation of the fox to a restricted laboratory environment. The 24-hr activity cycle of 3 foxes (2 male, 1 female), captured at the age of 2 mo, was recorded when they were 1 yr old. Measurements were made with an electrocardiogram, electrocorticogram, and electromyogram. 2 phases of activity were indicated: between 20.00 hrs and 1.00 hrs, and between 7.00 hrs and 8.00 hrs. Food ingestion was restricted to the evening period. Results indicate that captivity does not greatly modify the natural rest-activity cycle of the foxes. (French summary)—R. Tomasko.

8903. Damon, Albert & Bajema, Carl J. **Age at menarche: Accuracy of recall after thirty-nine years.** *Human Biology*, 1974(Sep), Vol 46(3), 381-384.—Among 143 women whose menarcheal age was documented during a longitudinal growth study, recall 39 yrs after the event gave the following results: menarche was recalled as .2 yrs earlier than the actual date ( $p = .05$ ), the standard deviation of recalled age was .3 yrs larger ( $p = .01$ ), and the coefficient of correlation,  $r$ , between actual and recalled age was .6.—S. L. Warren.

8904. Davis, Harry N.; Gray, Gary D.; Zerylnick, Matthew & Dewsbury, Donald A. (U Florida) **Ovulation**

**and implantation in montane voles (*Microtus montanus*) as a function of varying amounts of copulatory stimulation.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 383-388.—A total of 46 estrous female voles received (a) no copulation, (b) 1 ejaculatory series, (c) 2 ejaculatory series, or (d) more than 2 series. 18 sexually experienced males served as mating partners. Copulation was essential for ovulation, and increasing amounts of copulatory stimulation increased the probability of ovulation. Only 25% of females receiving 1 ejaculatory series ovulated, whereas 100% of those receiving more than 2 series ovulated. Thus, multiple ejaculations play an important role in successful reproduction in this species. (26 ref)—*Journal abstract*.

8905. Fröberg, Jan E. **Circadian rhythms in catecholamine excretion, performance and self-ratings.** *Reports from the Laboratory for Clinical Stress Research*, 1974(Apr), No 36, 22 p.—Circadian rhythms in urinary catecholamine excretion, performance on an electronic rifle range, and self-ratings were studied with 29 servicemen deprived of sleep for 72 hrs. Adrenaline excretion and fatigue ratings showed the most consistent diurnal variations; noradrenaline and shooting performance rhythms were more irregular. The average phase for adrenaline excretion was about 14 hrs, for noradrenaline about 8 hrs, for shooting range performance 17 hrs, and fatigue 5 hrs. 24-hr performance scores and subjective ratings of arousal decreased over the 3 days, while adrenaline excretion levels increased. Even with regularly spaced meals and other activities in the artificially lighted environment, adrenaline excretion, performance, and arousal were low during the night and higher during the day. A phase difference of a few hours between the physiological and psychological circadian rhythms is suggested. (28 ref)—*Journal summary*.

8906. Geer, James H.; Morokoff, Patricia & Greenwood, Pamela. (State U New York, Stony Brook) **Sexual arousal in women: The development of a measurement device for vaginal blood volume.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 559-564.—Showed erotic and nonerotic films to 20 undergraduate women. A vaginal photoplethysmograph was developed to measure pressure pulse and vaginal blood volume during film presentations. All Ss yielded a visible increase in pressure pulse amplitude during the presentation of the erotic films. Statistical analyses of the pressure pulse data strongly confirmed ( $p < .001$ ) the visual impressions. In addition, total blood volume in the vaginal wall also increased during the presentation of the erotic film. Subjective ratings of sexual arousal did not correlate with physiological measures. Results indicate that measures obtained from the device appear to be useful for detecting sexual arousal in women.—*Journal abstract*.

8907. Gray, Gary D.; Zerylnick, Matthew; Davis, Harry N. & Dewsbury, Donald A. (U Florida) **Effects of variations in male copulatory behavior on ovulation and implantation in prairie voles, *Microtus ochrogaster*.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 389-396.—Conducted 2 experiments with a total of 100 female and 29 male adult voles. One ejaculatory series was sufficient for induction of ovulation and implantation, and a 2nd series did not elicit any increase in either the

probability of ovulation or the number of corpora lutea and implanted embryos. Within the 1st ejaculatory series, the probability of ovulation increased with increased numbers of intromissions and intravaginal thrusts. Mounting without vaginal penetration was not sufficient to induce ovulation. It is suggested that *Microtus* species display a coadaptation of male copulatory behavior and stimulation requirements of the female reproductive system.—*Journal abstract*.

8908. Guttman, Ruth; Liebllich, Israel & Gross, Ruth. (Hebrew U Jerusalem, Israel) **Behavioral correlates of estrous cycle stages in laboratory mice.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 127-132.—70 virgin female mice of 2 inbred strains (DBA/1J and C57BL/6J) and an F<sub>1</sub> cross between them displayed rhythmicity in behavior variables with changes in estrous cycle stage. Motor activity in the barrier apparatus, as measured by jumping, reached a peak during estrus and decreased between metestrus and diestrus. Anxiety—as expressed by defecation—followed an exactly opposite pattern. "Peeking," a complex trait including anxiety and exploration, followed no discernible pattern. During the 5 min of the observation period, jumping increased with time in the apparatus during all estrous stages, acting as a typically adaptive trait. The peeking pattern was far less clear-cut. It is concluded that, while a clear-cut correlation existed between estrus and locomotor activity, the association was less straightforward with estrus and more diffuse kinds of activity.—*Journal abstract*.

8909. Hilgard, Ernest R. et al. (Stanford U) **Heart rate changes in pain and hypnosis.** *Psychophysiology*, 1974(Nov), Vol 11(6), 692-702.—Measured heart rate in 4 experiments using the cold pressor test. Data from 53 high school and 65 college students and 12 highly hypnotizable Ss show that (a) the heart rate rise between relaxation and stress levels was significant when the water was sufficiently cold (significant in 0° and 5°C water, not 10°C); (b) the amount of heart rate rise in the normal waking state in 0°C water was unrelated to the hypnotizability of the S; (c) there was a significant difference in heart rate following a hypnotic induction with suggestions of analgesia, although the reduction in heart rate rise was unrelated to the amount of reduction in felt pain; and (d) heart rate rise during hallucinated pain in highly hypnotizable Ss was not significantly different from the rise recorded during normal waking or hypnotically analgesic conditions.—*Journal abstract*.

8910. Hirschman, Richard & Brumbaugh-Buehler, Barbara. (Kent State U) **Electrodermal habituation and subjective response: Effects of manifest anxiety and autonomic arousal.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 46-50.—Studied the effects of cortical function and individual differences on galvanic skin response (GSR) habituation to tones of low and moderate intensity. 40 female undergraduates were divided into high- and low-anxious groups, on the basis of their Taylor Manifest Anxiety scale scores, and into high- and low-arousal groups, on the basis of their resting-level GSR activity. High-anxious Ss perceived nonchanging, nonnoxious moderate and low tones as increasing in intensity over trials while their electrodermal responses to the tones were habituating. Although the low-anxious group and the high- and low-arousal

groups also showed electrodermal habituation, there were no significant effects of trials for intensity ratings. (17 ref)—*Journal abstract*.

8911. Jackson, Jan C. (U Wisconsin, Medical School, Lab of Neurophysiology, Madison) **Amplitude and habituation of the orienting reflex as a function of stimulus intensity.** *Psychophysiology*, 1974(Nov), Vol 11(6), 647-659.—Conducted 2 within-S experiments with 20 male undergraduates in each and 1 between-S experiment with 100 male undergraduates to examine effects of stimulus intensity on orienting response amplitude and habituation. 5 intensities of a 1000 Hz tone were presented, ranging from 0 to 40 db in Exp I and from 0 to 80 db in Exps II and III. Response measures were skin conductance response (SCR) and heart rate (HR). SCR amplitude increased monotonically with stimulus intensity while HR deceleration tended to decrease, increase, and finally decrease again as intensity increased. Not only was deceleration greatest at 0 db but it was more resistant to habituation. Several intensities of test stimulation were presented after habituating stimuli in the between-S experiment. The SCR to test stimuli was facilitated by habituation at 0 db and depressed by habituation at 80 db. Results suggest a direct relationship between stimulus intensity and development of habituation. (19 ref)—*Journal abstract*.

8912. Kasang, G.; Knauer, Barbara & Beroza, M. (Max-Planck-Inst für Biochemie, München, W Germany) **Uptake of the sex attractant <sup>3</sup>H-disparlure by male gypsy moth antennae (*Lymantria dispar*) [*-Porthetria dispar*].** *Experientia*, 1974, Vol 30(2), 147-148.—Exposed batches of 10 antennae from newly emerged adult male gypsy moths to an air stream containing <sup>3</sup>H-disparlure. Distribution of <sup>3</sup>H-activity was a function of duration of incubation of antennae. It is noted that penetration of pheromones is more specific in insect antennae than previously thought. (German summary) (16 ref)

8913. Katz, David. (Washington U) **Relaxation due to verbal suggestion: A psychophysiological study.** *Psychological Record*, 1974(Fal), Vol 24(4), 523-532.—Evaluated the effects of the verbal aspects of relaxation training procedures on physiological arousal. 3 groups of 30 17-26 yr old normal Ss participated in 5 experimental sequences consisting of a 1-min period of mental arithmetic followed by a 2-min recovery period. During recovery periods the relaxation group (R) received suggestions to feel relaxed, while comparison groups either received messages irrelevant to relaxation or rested in silence. Electrodermal (skin resistance) indices of physiological arousal revealed significantly lower scores for Group R during recovery periods. Results support the hypothesis that suggestion is an active ingredient in relaxation training. Implications for suggestive-related placebo and expectancy effects are discussed. (25 ref)—*Journal abstract*.

8914. Kozłowski, Stanisław & Domaniecki, Janusz. (Polish Academy of Sciences, Lab of Applied Physiology, Warsaw) **Thermoregulation during physical effort in humans of different physical performance capacity.** *Acta Physiologica Polonica*, 1972, Vol 23(5), 815-825.—Found that rectal temperature increased significantly in Ss of low physical performance capacity after physical



exertion requiring 65% of maximum oxygen intake. (26 ref)

8915. Lang, Peter J. & Twentyman, Craig T. (U Wisconsin, Madison) **Learning to control heart rate: Binary vs analogue feedback.** *Psychophysiology*, 1974(Nov), Vol 11(6), 616-629.—Used 22 male undergraduates to test the efficiency of 2 procedures, one emphasizing analog and the other binary feedback, in training human Ss to change their heart rate. Ss were seen for 7 separate sessions, which included 2 training sessions in speeding heart rate and 2 devoted to slowing. Both heart rate and respiration cycle length were recorded. The timing of the experiment, presentation of instructions, feedback, data acquisition, and primary data reduction were all accomplished by a computer. The feedback mediated acquisition of directional changes in heart rate, and these changes were sustained on instruction with feedback removed. No differences between the binary and analog procedures were noted for slowing. However, the analog display prompted significantly greater instructed acceleration than the binary method. An important distinction was made between organ feedback (heart activity) and task performance feedback (relative success or failure). It is noted that the acquisition of heart rate speeding and slowing appear to involve different psychophysiological mechanisms.—*Journal abstract*.

8916. McConaghy, N. (U New South Wales, Sydney, Australia) **Penile volume responses to moving and still pictures of male and female nudes.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 565-570.—12 medical students were shown 2 series of 10 pictures of orange circles followed by pictures of nude females, alternating at 1-min intervals with 10 pictures of blue triangles followed by pictures of nude males. All were shown for 10 sec. In one series, the pictures were moving and were inserted into a travelog film; in the other, they were still, and still pictures of landscapes were shown in the intervals. 6 students were randomly allocated to watch the moving sequences first; the other 6 watched the still sequences first. The summed penile volume increases of the students to the moving pictures of the women were significantly greater than those to the still pictures, and conditioned penile increases were greater to the pictures of circles preceding these moving pictures compared with those to circles preceding the still pictures. Only the former conditioned responses correlated significantly with the unconditioned penile responses on which they were based. It is concluded that conditioned penile volume increases could be established more satisfactorily using moving rather than still pictures of female nudes as unconditioned stimuli. The summed penile response to 10 such still stimuli nevertheless provided a reliable measure of the Ss' responsiveness.—*Journal abstract*.

8917. McCuaig, Larry W. (Dalhousie U, Faculty of Medicine, Halifax, Nova Scotia, Canada) **Salivary electrolytes, protein and pH during transcendental meditation.** *Experientia*, 1974, Vol 30(9), 988-989.—Examined the relationship of mineral metabolism to the state of consciousness induced by transcendental meditation. Meditation produced an increase in salivary minerals: Na (70%), Mg (42%), Ca (36%), Pi (46%), and

K (23%). Salivary pH decreases and protein content increases were noted. (French summary)

8918. McMahon, C. E. (State U New York, Buffalo) **Voluntary control of "involuntary" functions: The approach of the Stoics.** *Psychophysiology*, 1974(Nov), Vol 11(6), 710-714.—The Stoics expressed great concern about emotion-related psychophysiological phenomena as pathological states of body and spirit. They outlined procedures through which all bodily functions could be brought under voluntary control. The Pneumatist school of medicine of the 1st century A.D. adopted these philosophical convictions and instituted them in their diagnostic and treatment techniques for psychosomatic disorders. Pneumatic theory, and its application in this context, is described.—*Journal abstract*.

8919. Michael, Richard P.; Bonsall, R. W. & Warner, Patricia. (Emory U, Medical School) **Human vaginal secretions: Volatile fatty acid content.** *Science*, 1974(Dec), Vol 186(4170), 1217-1219.—Collected 682 vaginal samples by a tampon method from 50 healthy young university women. Samples were analyzed by gas chromatography. The volatile aliphatic acids increased during the late follicular phase of the menstrual cycle and declined progressively during the luteal phase. Women on oral contraceptives had lower amounts of volatile acids and did not show any rhythmic changes in acid content during the menstrual cycle. It is noted that these same substances possess sex-attractant properties in other primate species.—*Journal abstract*.

8920. Mitchell, D. & Hellon, R. F. (National Inst for Medical Research, London, England) **Latencies in a thermosensitive pathway.** *Experientia*, 1974, Vol 30(10), 1159-1161.—Studied thermal conduction latencies in the pathway from the scrotum to the somatosensory cortex of the rat. (German summary)

8921. Nishida, R.; Fukami, H. & Ishii, S. (Kyoto U, Coll of Agriculture, Pesticide Research Inst, Japan) **Sex pheromone of the German cockroach (*Blattella germanica* L.) responsible for male wing-raising: 3,11-dimethyl-2-nonacosanone.** *Experientia*, 1974, Vol 30(9), 978-979.—Describes the isolation and identification of 1 of the 2 sex pheromones of the German cockroach, from the body surface of sexually matured females. Contact with this compound is postulated to enable adult males to discriminate sexually through antennal contact. (German summary)

8922. Paré, William P. & Isom, Kile E. (VA Hosp, Pavlovian Research Lab, Perry Point, MD) **Gastric secretion as a function of acute and chronic stress in the gastric fistula rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 431-435.—Conducted 2 experiments using a total of 54 male Long-Evans rats chronically implanted with gastric cannulas. In Exp I Ss exposed to signaled and unsignaled grid shock secreted more gastric acid after shock stress (chronic stress) for 8 days compared to the 1st 12 hrs of shock stress (acute stress). However, Exp II indicated that the higher gastric acid values under chronic stress were not significantly greater than prestress baseline values. Results are interpreted to reflect an inhibition of gastric acid secretion as a function of acute stress. During chronic stress this inhibition was followed by an habituation of gastric secretory processes which was

observed as a return of secretion volume to baseline levels.—*Journal abstract.*

8923. Pátkai, Paula; Johansson, Gunn & Post, Birgitta. (U Stockholm, Psychological Lab, Sweden) **Mood, alertness and sympathetic-adrenal medullary activity during the menstrual cycle.** *Psychosomatic Medicine*, 1974(Nov-Dec), Vol 36(6), 503-512.—Studied 6 healthy women during a daily work routine for a period covering 2 menstrual cycles. Urinary catecholamines and body temperature were measured each morning of ordinary weekdays. On each occasion estimates of subjective mood and alertness were obtained. 4 periods of the menstrual cycle—premenstrual, postmenstrual, ovulation, and postovulation—were compared with respect to physiological and subjective variables. No significant differences in adrenaline and noradrenaline excretion between periods were found. Estimates of subjective states did not generally differ between periods except for feelings of restlessness. Night sleep was most disturbed during premenstrual, coinciding with the longest sleep duration. All physiological variables exhibited a high degree of intraindividual constancy during the cycle. (22 ref)—*Journal abstract.*

8924. Pearlman, Chester & Becker, Michael. (Boston VA Hosp, MA) **REM sleep deprivation impairs barpress acquisition in rats.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 813-817.—Conducted a study with 110 Long-Evans rats in which brief REM sleep deprivation immediately after training temporarily retarded the Ss' barpress acquisition, abolished observational learning of the barpress habit, and prevented adaptation to a shift from a continuous reinforcement to a differential reinforcement of low rate schedule. Results support the information-processing model of REM sleep function. (16 ref)—*Journal abstract.*

8925. Pirke, Karl M.; Kockott, Götz & Dittmar, Franz. (Max-Planck-Inst für Psychiatrie, München, W Germany) **Psychosexual stimulation and plasma testosterone in man.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 577-584.—Measured plasma testosterone every 15 min for 3½ hrs in 8 21-34 yr old males before, during, and after the showing of a sexually explicit movie. There was an average increase of 35% in testosterone. The maximum concentration was observed 60-90 min after the end of the film. No increase was found in 8 control Ss who saw a sexually neutral film.—*Journal abstract.*

8926. Robinson, G. Wilse. (California Inst of Technology, Arthur Amos Noyes Lab of Chemical Physics) **Rhodopsin cooperativity in visual response.** *Vision Research*, 1975(Jan), Vol 15(1), 35-48.—Proposes a theory of vertebrate scotopic vision. The essence of the theory is that absorption of 1 photon in the disc membrane gives rise to transmitter release through cooperativity among a number (10-50, depending on vertebrate species) of unbleached rhodopsin molecules. Conclusions based upon the theory are in good agreement with both psychophysical and electrophysiological threshold experiments carried out in the absence of background illumination. Empirical incorporation of a generalized Weber-Fechner law allows the theory to be applied in the case of certain backgrounds. (French, German, & Russian summaries) (59 ref)—*Journal abstract.*

8927. Schwartz, R.; Sackler, A. M. & Weltman, A. S. (Brooklyn Coll of Pharmacy, Long Island U, Lab for Therapeutic Research) **Adrenal relationships to aggressiveness in isolated female mice.** *Experientia*, 1974, Vol 30(2), 199-200.—Tested 46 isolated and Lab for Therapeutic Research, 22 paired U aggressiveness by introducing brown naive female mice into home cages weekly for 5-min periods. Isolated mice showed significant increases in body weights and locomotor activity and decreases in white blood cell counts. Organ weights at sacrifice indicated heavier adrenals and significantly higher plasma corticosterone titers in isolated than in paired Ss. Although total adrenal catecholamine levels did not differ between the 2 groups, isolated Ss classified as fighters had higher levels than isolated nonfighters. Findings are consistent with previous studies using male mice that indicated higher sympathetic-adrenal activity in isolated fighters vs nonfighters. (French summary) (26 ref)—*C. Wright.*

8928. Sheldrake, Peter & Cormack, Margaret. **Dream recall and the menstrual cycle.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 347-350.—Convergers, people who score higher on conventional IQ tests than on open-ended tests, were compared with divergers, those with the opposite bias. Divergers are more likely to recall a dream in REM sleep, while convergers report more dreams when awakened from non-REM sleep. 26 female biology students tended to be divergent when tested in the pre-ovulatory stage of their menstrual cycle and convergent during the final stage of the cycle. 4 divergers had most dreams in the pre-ovulatory stage while 3 convergers had the most dreams in the premenstrual stage of their cycle.—*W. G. Shipman.*

8929. Södersten, P.; de Jong, F. H.; Vreeburg, J. T. & Baum, M. J. (U Göteborg, Sweden) **Lordosis behavior in intact male rats: Absence of correlation with mounting behavior or testicular secretion of estradiol-17 $\beta$  and testosterone.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 803-808.—From a population of 64 Danish and 8 Dutch male Wistar rats, groups of intact Ss were selected according to whether or not they displayed lordosis in response to manual stimulation. In subsequent tests with estrous females no differences in mounting behavior were found between males which did or did not display lordosis. Estimation of the steroid hormones, estradiol-17 $\beta$  and testosterone, in testicular venous and peripheral plasma by radioimmunoassay showed that there was no relationship between the concentrations of these hormones and the display of either mounting behavior or lordosis elicited by the mounts of stud males. Findings show that sexual performance is not directly correlated with testicular secretion of hormones, and it is suggested that individual differences in mating behavior are caused by some other factor such as individual differences in neural sensitivity to gonadal hormones. (22 ref)—*Journal abstract.*

8930. Strahan, Robert F.; Todd, John B. & Inglis, Geoffrey B. (U Rochester) **A palmar sweat measure particularly suited for naturalistic research.** *Psychophysiology*, 1974(Nov), Vol 11(6), 715-720.—Describes a simple measure of palmar sweating that seems especially applicable to naturalistic research. A sweat sample is collected by inverting a small bottle of distilled water on



a palm or a fingertip. Inexpensive, simple apparatus is later used to measure the sweat solution's electrical conductivity. Substantial evidence speaking to issues of reliability and validity warrants further exploration of this measure.—*Journal abstract.*

8931. Velden, M. (U Mainz, W Germany) **An empirical test of Sokolov's entropy model of the orienting response.** *Psychophysiology*, 1974(Nov), Vol 11(6), 682-691.—Tested several hypotheses derived from Y. N. Sokolov's entropy model of the orienting response (OR). The galvanic skin response (GSR) served as the indicator of the OR. Printed language, analyzed with regard to the information content in bits, was used as stimulus material. 48 female students served as Ss. Results indicate that (a) the uncertainty of a situation does not determine the strength of the OR; (b) the strength of the OR depends on the information carried by an event; and (c) the processing of this information, as indicated by the OR, may be delayed by one or more events in a serial application. For tonic level over a series of events no trend could be found. (28 ref)—*Journal abstract.*

8932. Vick, K. W. et al. (USDA Agriculture Research Service, Biology Research Lab, Gainesville, FL) (Z-E)-7,11-hexadecadien-1-ol acetate: The sex pheromone of the angoumois grain moth, *Sitotroga cerealella*. *Experientia*, 1974, Vol 30(1), 17-18.—Describes the isolation, identification, and synthesis of the sex pheromone (male attractant) of the female Angoumois grain moth. (German summary)

### Genetics

8933. Akcasu, A.; Kameswaran, Lalitha; Sanyal, R. K. & West, G. B. (U Istanbul, Medical School, Turkey) **Taste thresholds of phenylthiocarbamate.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 305-315.—Reports that the common frequency of the nontasting gene for phenylthiocarbamate (about 28%) was found both in 301 Indian adults and in 305 Indian children aged 6-11 yrs. However, a much lower frequency (less than 11%) was obtained when both 315 Turkish adults and 306 6-11 yr old Turkish children were tested. On the other hand, 180 English children under the age of 7 yrs possessed a higher frequency (up to 60%). 327 English children aged 9 yrs or older had a frequency comparable with that of 581 English adults (about 28%). It was found that between the ages of 7 and 9 many English nontaster children became tasters, which accounts for the observed change in frequency.—*Journal abstract.*

8934. Angus, John. (U Birmingham, England) **Genetic control of activity, preening, and the response to a shadow stimulus in *Drosophila melanogaster*.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 317-329.—Spontaneous locomotor activity, preening, and the change in frequency of each in response to a shadow have been studied in *Drosophila melanogaster* by a time-sampling technique. The genetic control of these 4 behaviors was elucidated in the present study by application of biometrical genetic analysis. A total of 2,800 flies were tested, 200 from each of 14 generations comprising 2 inbred lines, 6C/L and Edinburgh, and their F<sub>1</sub> s, F<sub>2</sub> s, and first backcrosses including all reciprocals. The genetic architecture for spontaneous activity indicated a history of natural

selection for comparatively high activity. There was a tendency for both activity and preening to decrease in response to shadow stimulation. The genetic control indicates that this form of reaction is advantageous and suggests a relation to the avoidance of predation. (42 ref)—*Journal abstract.*

8935. Eleftheriou, B. E.; Bailey, D. W. & Denenberg, V. H. (Jackson Lab, Bar Harbor, ME) **Genetic analysis of fighting behavior in mice.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 773-777.—In 5 experiments, isolation-induced fighting behavior measured in a neutral arena for 5 min/day over a 5-day period differed significantly in C57BL/6By and BALB/cBy male mice. Evaluation of this performance in reciprocal F<sub>1</sub> hybrids of these 2 inbred strains and their recently developed recombinant inbred strains permitted the derivation of an hypothesis regarding possible genetic control of this behavior in mice. Additionally, examination was made regarding the possible influences of maternal social and uterine environments on fighting behavior. It is tentatively concluded that isolation-induced fighting behavior in mice is influenced by at least 2 homozygous loci and by a possible cytoplasmic factor of the ovum. (16 ref)—*Journal abstract.*

8936. Holmes, T. M.; Aksel, R. & Royce, J. R. (U Alberta, Edmonton, Canada) **Inheritance of avoidance behavior in *Mus musculus*.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 357-371.—Studied the inheritance of avoidance behavior in 2,204 mice (*Mus musculus*) consisting of the inbred strains A/HeJ, BALB/cJ, SWR/J, and 129/J, and F<sub>1</sub> and F<sub>2</sub> generations of all their crosses, and the 1st generation of their backcrosses. The mode of inheritance of avoidance behavior was different in the 2 sexes. In the males it was transmitted predominantly as an overdominant trait, whereas in the females both overdominance and partial dominance were observed. Significant nonallelic interaction was found mostly in the male data, indicating that the dominance observed in the males may be inflated. (38 ref)—*Journal abstract.*

8937. Horn, Joseph M. (U Texas) **Aggression as a component of relative fitness in four inbred strains of mice.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 373-381.—In 3 separate experiments, male mice from the RF/J, BALB/cJ, DBA/2J, and C57BL/6J strains were grouped in a seminaturalistic environment with females from the C57BL/6J strain. Observations were made concerning the aggressive behavior of the different strains, and starch gel electrophoresis of the esterase III and hemoglobin proteins was used to determine paternity of the offspring. Results indicate that the most aggressive strain, RF/J, sired 95.6% of all offspring. Control groups indicated that the reproductive disadvantage of the BALB and C57 males could be explained in terms of differences in general fertilizing ability, the effects of grouping mice together, or pregnancy blockage. These factors alone were not sufficient to explain the disadvantage of the DBA males. Differences in fighting success may therefore be an important determinant of fitness differences between RF and DBA males.—*Journal abstract.*

8938. Kristal, Mark B. & Eleftheriou, Basil E. (State U New York, Buffalo) **Placentophagia in nonpregnant nulliparous mice: A genetic investigation.** *Behavioral*

*Biology*, 1975(Jan), Vol 13(1), 113-119.—Investigated the genetic influence on the response of nonpregnant nulliparous mice to foster placenta. 16 virgin female mice in each of 2 highly inbred strains (BALB/cBy and C57BL/6By), their F<sub>1</sub> hybrids, a backcross generation, and 7 recombinant-inbred strains derived from the F<sub>1</sub> generation were tested. It is concluded that there is a genetic component to the response of female mice to placenta in the absence of previous experience and that more than 1, but possibly as few as 2, loci are involved. Alternative explanations of average dominance for placentophagia and for no placentophagia (by the promotion of competing responses) are considered.—*Journal abstract*.

8939. Padeh, Benjamin; Wahlsten, Douglas & DeFries, J. C. (Bar-Ilan U, Ramat-Gan, Israel) **Operant discrimination learning and operant bar-pressing rates in inbred and heterogeneous laboratory mice.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 383-393.—118 male and 125 female mice from 4 inbred strains (A/1bg, BALB/c1bg, C57BL/61bg, and DBA/21bg) and a heterogeneous line (HS/1bg) were first reduced to 90% of their *ad libitum* body weight and were then trained to press a bar to obtain food pellets. After 9 days of training with a continuous schedule of reinforcement (CRF), mice were required to discriminate between conditions of reward and nonreward as indicated by a tone and a light; discrimination training continued for 21 days. Considerable genetic variation was apparent for asymptotic pressing rates under CRF as well as discrimination performance. However, the highest discrimination ratios were achieved by mice with the lowest pressing rates. Results are discussed in terms of associative and nonassociative processes which may contribute to genetic variation in performance on learning tasks. (20 ref)—*Journal abstract*.

8940. Parsons, P. A. (La Trobe U, Bundoora, Vic, Australia) **Male mating speed as a component of fitness in *Drosophila*.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 395-404.—A review of the literature on *Drosophila* shows that male mating speed or male virility is probably the most important component of fitness. Rapid matings tend to be controlled by the male genotype, while the genotype of the female may assume importance for slower matings. Where data exist, male mating speed is subject to directional selection in the direction of rapid speed, as would be expected for an important component of fitness. (30 ref)—*Journal abstract*.

8941. Tobach, E.; Bellin, J. S. & Das, D. K. (American Museum of Natural History, New York, NY) **Differences in bitter taste perception in three strains of rats.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 405-410.—Reports that micromolar concentrations of cycloheximide (CH) can be used to test for genetic differences in the ability to taste bitter substances. 30 rats of 3 related strains of rats—Fawn-hooded, Long Evans, and Wistar—differed significantly in their ability to taste this substance, the former being unusually deficient in this respect. Wistar and Long Evans rats were able to perceive millimolar concentrations of phenylthiocarbam-

ide (PTC) and 0.2  $\mu$ M CH. Fawn-hooded Ss were unable to detect millimolar PTC and first recognized CH when it was present in 1.5  $\mu$ M concentration. (15 ref)—*Journal abstract*.

## PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

8942. Agadzhanian, N. A.; Doronin, G. P. & Elfmov, A. I. [Influence of pressure-chamber training on conditioned chain motor reflexes.] (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 37-45.—Subjected 132 male white rats to hypoxia during 10 days of pressure-chamber training at an altitude of 5000 m. Their adaptation involved reorganization of physiological reactions to provide more effective use of oxygen. The reorganization helped to reduce disturbances of the structural and temporal characteristics of chain motor reflexes and contributed to a more rapid recovery of complex behavior in the Ss after acute oxygen deficiency. The adaptive potentialities of the organism were lowered in Ss devoid of sinocarotid receptive zones. This indicates the important role of these chemoreceptors in the trigger compensatory-adaptive reactions of the organism and in maintaining adequate functioning of the higher parts of the brain during acute hypoxia. (16 ref)—*English abstract*.

8943. Arn, H.; Schwarz, C.; Limacher, H. & Mani, E. (Swiss Federal Research Station for Arboriculture, Viticulture & Horticulture, Wädenswil) **Sex attractant inhibitors of the codling moth *Laspeyresia pomonella* L.** *Experientia*, 1974, Vol 30(10), 1142-1144.—Studied the characteristics of sex attractant inhibitors. Implications for the usage of the inhibitors in insect control, reproductive isolation, and selective pest monitoring are discussed. (German summary)

8944. Barchas, Jack D. et al. (Stanford U, Medical School, Lab of Behavioral Neurochemistry) **Tryptolines: Formation from tryptamines and 5-MTHF by human platelets.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 862-867.—Reports that an enzymatic preparation from human platelets uses 5-MTHF as a cofactor to convert tryptamine and 2 tryptamine derivatives to tryptolines (tetrahydro- $\beta$ -carboline), a class of tricyclic compounds. Findings suggest the need for further examination of the pharmacological and psychological effects of tryptolines.

8945. Belluzzi, J. D.; Ritter, S.; Wise, C. D. & Stein, L. (Wyeth Lab, Philadelphia, PA) **Substantia nigra self-stimulation: Dependence on noradrenergic reward pathways.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 103-111.—Conducted 3 experiments with a total of 33 experimental and 9 control male Charles River rats. Electrodes in the dopamine cell groups of the substantia nigra lost their ability to support self-stimulation after mechanical or chemical damage to ipsilateral noradrenergic pathways, or after pharmacological inhibition of norepinephrine synthesis. Replenishment of depleted stores of norepinephrine by central administration of exogenous transmitter selectively reinstated the suppressed behavior. These findings, which demonstrate an essential role for norepinephrine in the mediation of substantia nigra self-stimulation, lend no support to the hypothesis that self-stimulation can result from the



activation of dopamine neurons alone. (27 ref)—*Journal abstract*.

8946. Carroll, Marilyn E. & Smith, James C. (Florida State U) Time course of radiation-induced taste aversion conditioning. *Physiology & Behavior*, 1974(Dec), Vol 13(6), 809-812.—Taste aversion conditioning was used with 162 male Sprague-Dawley albino rats to define the onset and duration of the period after exposure to 100 R gamma radiation which was most aversive to the Ss. Ss were irradiated and then allowed to drink a saccharin solution. A significant decrement appeared in their cumulative intake, compared to sham Ss at 90 min postexposure. When time delays between 0-90 min were imposed between offset of the radiation beam (unconditioned stimulus, UCS) and onset of saccharin exposure (conditioned stimulus, CS), the time at which a significant decrement in saccharin drinking occurred remained constant at 90 min. With UCS-CS delays of 2, 4, and 6 hrs a weaker aversion was found in terms of the time span before a significant decrement in the irradiated groups' saccharin drinking rate appeared. Groups which were irradiated then allowed access to tap water for 24 hrs, either immediately or 1.5 hrs after radiation offset, showed no decrement in their water drinking rate with respect to a sham control. The procedures used in this experiment provide a method for measuring the latency of onset of subtle physiological effects.—*Journal abstract*.

8947. Carter, Carol S. & Porges, Stephen W. (U Illinois) Ovarian hormones and the duration of sexual receptivity in the female golden hamster. *Hormones & Behavior*, 1974(Dec), Vol 5(4), 303-315.—In 2 experiments with a total of 112 female hamsters, the induction of sexual receptivity and its maintenance after copulation in ovariectomized Ss was a function of the levels of ovarian hormones administered. Various combinations of estradiol benzoate (.6-666 µg) and progesterone (.05-5.0 mg) were administered. Although some Ss responded at .6 µg, higher levels of estradiol benzoate (1-6 µg or more) were more effective in inducing levels of lordosis equivalent to those seen in intact Ss in natural estrus. After mating, a depression in lordosis was observed in both ovariectomized and intact Ss. However, in ovariectomized Ss (excluding those that did not respond initially) the duration of postcopulatory receptivity was a function of the level of progesterone administered. High levels of progesterone tended to prolong slightly the duration of postcopulatory receptivity. (25 ref)—*Journal abstract*.

8948. Chapman, Harold W. & Richardson, H. Mark. (U Guelph, Ontario, Canada) The role of systemic hydration in the acquisition of schedule-induced polydipsia by rats. *Behavioral Biology*, 1974(Dec), Vol 12(4), 501-508.—Conducted 3 experiments with a total of 32 male Sprague-Dawley rats. Intragastric water prevented the acquisition of schedule-induced polydipsia by Ss despite its lack of effect on established polydipsia. When drinking was maintained (by the prior induction of dry-mouth drinking) schedule-induced polydipsia was acquired in spite of intragastric hydration. Results suggest that polydipsia is an acquired, operant, behavior rather than an exaggeration of an existing behavior.—*Journal abstract*.

8949. Cheng, Mei-fang & Silver, Rae. (Hunter Coll, City U New York) Estrogen-progesterone regulation of nest-building and incubation behavior in ovariectomized ring doves (*Streptopelia risoria*). *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 256-263.—Determined the role of ovarian hormones in the induction of nest-building (tucking) and incubation behavior in female doves by systemic injections of estrogen, or progesterone, or estrogen combined with progesterone, or oil in 40 reproductively experienced, ovariectomized Ss. Combined estrogen and progesterone treatment was the most effective hormone regimen for eliciting both behavior patterns in females and also facilitated these behaviors in their 40 untreated mates. Differences in role of the gonadal progesterone in male and female doves are discussed. (23 ref)—*Journal abstract*.

8950. Damstra, Terri; Entingh, Dan; Wilson, John E. & Glassman, Edward. (U North Carolina, Medical School, Div of Chemical Neurobiology, Chapel Hill) Incorporation of <sup>3</sup>H-L-fucose into brain glycoproteins during environmental stimulation following intracranial, intravenous, or subcutaneous injections. *Behavioral Biology*, 1975(Jan), Vol 13(1), 121-126.—Conducted a series of experiments with a total of 84 male C57BL/6J mice. Previously reported changes in the amount of <sup>3</sup>H-letofucose incorporated into glycoproteins of brain and liver after subcutaneous injections of precursor when Ss were exposed to the training apparatus did not occur when the precursor was injected either intracranially or intravenously. The increased incorporation of subcutaneously injected <sup>3</sup>H-letofucose was attenuated by sham intracranial and by sham intravenous injections. Thus, the failure to detect incorporation changes when the precursor was administered through these routes may be partially due to stress caused by intracranial or intravenous injection.—*Journal abstract*.

8951. Edwards, M. J.; Penny, R. H.; Lyle, J. & Jonson, K. (U Sydney, NSW, Australia) Brain growth and learning behaviour of the guinea-pig following prenatal hyperthermia. *Experientia*, 1974, Vol 30(4), 406-407.—Exposed groups of pregnant female guinea pigs to excessive heat (42-43°C) at 3 different stages of gestation. More errors were made by offspring of groups stressed at 20-24 days and at 40-44 days than by controls on nonspatial discrimination reversal tasks at approximately 100 days of age. No differences appeared with the offspring of a group stressed on days 56-60. Whole brain and brain segment weights were lower for heat stressed offspring than for weight-matched controls, suggesting that the deficits in brain size did not result from general body growth retardation. (Germany summary)—C. Wright.

8952. Harrell, L. E. & Balagura, S. (U Massachusetts, Amherst) Influence of ovarian hormones on the recovery period following hypothalamic lesions. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 194-201.—Examined the effects of ovariectomy and its interaction with body weight on the recovery period following lateral hypothalamic lesions. Results in 18 ovariectomized and 24 control female Charles River rats indicate that but set point prior to lesioning, liable to be influenced by hormonal and metabolic factors, was a

more important variable in modifying the recovery process after lateral hypothalamic lesions than was absolute body weight, while absolute body weight determined the amount of weight loss that followed lesions of the lateral hypothalamus. (24 ref)—*Journal abstract*.

8953. Hough, John C.; Ho, George K-W; Cooke, Peter H. & Quadagno, David M. (U Kansas) **Actinomycin D: Reversible inhibition of lordosis behavior and correlated changes in nucleolar morphology.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 367-375.—Actinomycin D (Act D) infused into the preoptic area (POA) of 6 ovariectomized, estrogen-progesterone-primed female Sprague-Dawley rats inhibited sexual behavior and caused nucleolar segregation in neurons. When reprimed with estrogen and progesterone 7 days later the Ss displayed high levels of sexual behavior, and the nucleolar structure was normal. Nucleolar segregation has been related to the inhibition of RNA synthesis. The findings indicate that Act D has a reversible effect on sexual behavior and nucleolar morphology. Data also indicate a correlation between normal levels of sexual receptivity and normal nucleolar morphology. Results, although circumstantial, are consistent with earlier studies indicating that estrogen may stimulate RNA and/or protein synthesis in its facilitation of sexual receptivity in the female rat. (27 ref)—*Journal abstract*.

8954. Howland, B. E.; Beaton, D. B. & Jack, Mary I. (U Manitoba, Winnipeg, Canada) **Changes in serum levels of gonadotropins and testosterone in the male rat in response to fasting, surgery and ether.** *Experientia*, 1974, Vol 30(10), 1223-1225.—Studied male Long-Evans rats divided into groups with  $2 \times 2 \times 2$  factorial combinations of sham castration, fasting, and ether anesthesia as experimental variables. Blood serum was assayed using radioimmunoassay. Results indicate Ss anesthetized with ether had higher ( $P < .05$ ) levels of gonadotropins (LH and FSH) than Ss not exposed to ether. Fasted Ss had lower levels ( $P < .01$ ) of LH and FSH than nonfasted rats, as well as reduced testosterone levels ( $P < .05$ ). Surgery lowered LH levels ( $P < .01$ ) but did not alter FSH or testosterone levels. It is concluded that common procedures used in endocrine studies may affect the hormone levels being studied. (French summary)—*R. Tomasko*.

8955. Kelsey, John E. (Indiana U) **Role of pituitary-adrenocortical system in mediating avoidance behavior of rats with septal lesions.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 271-280.—3 experiments with a total of 186 male Sprague-Dawley rats examined the hypothesis that the effects of septal lesions and systemic injections of scopolamine on avoidance acquisition could be attributed to the effects of either of these treatments on ACTH secretion. Septal lesions and scopolamine facilitated 2-way conditioned avoidance response acquisition, and the lesions retarded passive avoidance acquisition. However, neither the injections of dexamethasone, a synthetic glucocorticoid which inhibited ACTH secretion as did septal lesions, nor injections of ACTH which mimicked the facilitatory effects of scopolamine on basal ACTH secretion, affected avoidance in these paradigms. Thus, the main hypothesis was not supported. The finding that scopolamine

did not affect passive avoidance indicates that a cholinergic system may not be involved in mediating the suppressive effects of punishment. (26 ref)—*Journal abstract*.

8956. Klein, Donald F. (Long Island Jewish-Hillside Medical Ctr, Glen Oaks, NY) **What should the package insert be?** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 735-741.—Considers that the professional and legal status of the package insert needs radical revision. Currently this insert is considered part of drug labeling and must be approved by the Food and Drug Administration (FDA). However, the package insert has achieved, in many physicians' minds, an unwarranted quasi-legal status so that an indication or dosage that is not specifically recommended becomes, by default, experimental or investigational and may open the physician to a charge of malpractice. An alternative format for the package insert is described, with use of a pharmacotherapeutic monograph as a model. A partial example of such a procedure with chlorpromazine is offered.—*Journal abstract*.

8957. Martin, Douglas & Webster, William G. (Carleton U, Ottawa, Ontario, Canada) **Paw preference shifts in the rat following forced practice.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 745-748.—Rats which are forced to reach for food pellets with the nonpreferred paw subsequently show a shift in paw preference. The present study was conducted with 20 experimental and 10 control male albino rats with sections of the corpus callosum, and with 20 experimental and 20 control intact Ss. Results demonstrate that the preference shift occurred regardless of whether the cerebral hemispheres were surgically separated and/or the hemisphere contralateral to the initially preferred paw was functionally depressed during the administration of forced practice training.—*Journal abstract*.

8958. Pearson, J. A. & Vickers, R. A. (U British Columbia, Vancouver, Canada) **Influence of ACTH and adrenal hormones on the amplitude and habituation of the flexor reflex.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 789-793.—Hypothesized that changes in conditioned-reflex habituation would result from experimental manipulation of the pituitary-adrenal axis. Habituation of the flexor reflex was investigated in adrenalectomized male Holtzman rats, demedullated Ss, and Ss which had received injection of ACTH, cortisol, or metyrapone. In none of these circumstances was the degree of habituation significantly different from that in control Ss. It is concluded that if extinction and habituation are due to a common mechanism, then an additional mechanism, which is sensitive to changes in ACTH and corticosteroids, must be postulated for extinction but not for habituation. The magnitude of flexor reflexes was lower in adrenalectomized than in control Ss. Administration of ACTH or cortisol caused elevation of response, whereas metyrapone had no effect. There was no difference between the responses from adrenalectomized Ss and those from demedullated Ss. From these data, the tentative conclusion is made that the amplitude of flexor responses is related to adrenal medullary catecholamines rather than to corticosteroids or ACTH. (34 ref)—*Journal abstract*.



8959. Pendse, G. S. (Indian Drugs Research Assn, Drug Research Lab, Poona) **A note on new chemical compounds isolated from a fungus hitherto unknown.** *Experientia*, 1974, Vol 30(1), 107-108.—Describes the isolation of a new compound, Paspaline-P, closely related to the cytochalasins. It was isolated from the *Phomopsis paspali* fungi, hosted by the *Paspalum scrobiculatum* (an Indian food grain).

8960. Pfaff, Donald W. & Lewis, Catherine. (Rockefeller U, New York, NY) **Film analyses of lordosis in female rats.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 317-335.—Studied the responses of 18 ovariectomized female Sprague-Dawley rats, subcutaneously injected with estradiol benzoate daily and with progesterone 2-6 hrs before testing, to 18 sexually experienced male Ss. Descriptions are presented of the males and females during the initiation of lordosis by the female, using observations with films taken from a side or ventral view. Where possible, behavioral events are described objectively, quantified, and plotted as a function of time. Responses of receptive and unreceptive females to mounts by the male are compared.—*Journal abstract*.

8961. Pietras, Richard J. & Wenzel, Bernice M. (U California, Medical School, Los Angeles) **Effects of androgens on body weight, feeding, and courtship behavior in the pigeon.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 289-302.—In 5 experiments adult male pigeons, 7 sham-operated and 29 castrated in adulthood, were housed in individual cages kept in an isolated room with temperature and lighting controlled. Weekly measurements were made of ad lib food intake and body weight for 4 mo after surgery. Castration was followed by a significant depression in body weight and by initially depressed but then progressively enhanced feeding. Food deprivation elicited an increase in food intake proportional to body weight loss, but castrates consumed less food at 100, 90, and 80% of ad lib feeding weight than either intact Ss or castrates treated daily with testosterone propionate (TP). Castrates gained weight and ate more than controls in response to daily intramuscular treatments with TP or 5 $\alpha$ -dihydrotestosterone (DHT, 6 mg/400 g), while androstenedione and androstosterone were ineffective. Administration of 100 mg of DHT subcutaneously to castrates produced a significant enhancement of body weight without elevating the level of food intake. The biological potency of these diverse androgens on male courtship behavior was reciprocal to that for weight-promoting potency. Results suggest that the structural requirements of the androgen molecule for promoting body weight differ from those for stimulating sexual behavior. (34 ref)—*Journal abstract*.

8962. Riege, Walter H. & Cherkin, Arthur. (VA Hosp, Sepulveda, CA) **Sensitive period for reversal of carbon-dioxide amnesia in goldfish.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 477-490.—In 3 experiments spontaneous upstream swimming of goldfish ( $N = 1118$ ) into a quiet well was suppressed in 1 training trial by brief electric shock. Posttraining treatment with normoxic carbon dioxide (CO<sub>2</sub>) solution (saturated with 80% CO<sub>2</sub>: 20% O<sub>2</sub>) produced retrograde amnesia; the extent depended upon the duration of CO<sub>2</sub> treatment (.5-32 min) and the training-CO<sub>2</sub> treatment

interval (.5-256 min). CO<sub>2</sub>-induced amnesia was reversed by treatments previously found to enhance retention retroactively. Complete reversal of amnesia was observed when a retention-enhancing temperature shift (a 4-min abrupt shift from 25 to 10 to 25°C) closely preceded (-8 min) or followed (+8 or +16 min) the CO<sub>2</sub> treatment within the 1st 2 hrs after training. Beyond this sensitive period enhancing treatments were ineffective; a delay of 64 min between CO<sub>2</sub> treatment and temperature shift weakened the reversal effect. Both treatments, alone or in combination, had no effect upon upstream swimming performance of noncontingently shocked controls. The time constraints for the posttraining amnesia reversal implicate processes involved in the consolidation of the memory trace. (50 ref)—*Journal abstract*.

8963. Routtenberg, Aryeh; George, Del R.; Davis, Leonard G. & Brunngraber, Eric G. (Northwestern U, Cresap Neuroscience Lab) **Memory consolidation and fucosylation of crude synaptosomal glycoproteins resolved by gel electrophoresis: A regional study.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 461-475.—36 male Holtzman albino rats were assigned to 1 of 3 training conditions: control, footshock only, and learning a simple withdrawal from footshock by climbing on a safe platform. Ss were injected intraperitoneally with <sup>3</sup>H-fucose prior to training condition. At various intervals after training the delipidated P2 fraction of Whittaker was prepared from the temporal cortex, hippocampus, caudate-putamen, and cerebellum of each S. Gel electrophoresis was carried out using a 3-layered discontinuous polyacrylamide-SDS system. It was found that, as a function of training condition, there were (a) no differences in any gel region in percentage of total protein determined densitometrically; (b) a region 4 mm into the gel and 22 mm into the gel where, as a function of training condition, statistically significant differences in the caudate-putamen but not the other 3 regions were observed in percentage of <sup>3</sup>H-fucose incorporation; (c) a region 26 mm from the origin where <sup>3</sup>H-fucose incorporation differences as a function of training were observed in temporal cortex only; and (d) no effects of training on <sup>3</sup>H-fucose incorporation in hippocampus or cerebellum. Results indicate that quantitative changes occur in particular brain regions in the rates of <sup>3</sup>H-fucose turnover of glycoproteins of particular molecular weight range after a training experience. (41 ref)—*Journal abstract*.

8964. Scouten, Charles W.; Grotelueschen, Linda K. & Beatty, William W. (North Dakota State U) **Androgens and the organization of sex differences in active avoidance behavior in the rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 264-270.—Performed 3 experiments to clarify the role of androgens in the development of sex differences in the acquisition of active avoidance behavior in a total of 248 male and 231 female Holtzman albino rats. Gonadectomy in adulthood did not affect the performance of either sex regardless of the length of the postoperative recovery interval. Neonatal castration also failed to improve the avoidance performance of males, but prenatal exposure to the antiandrogen cyproterone acetate combined with neonatal gonadectomy produced males whose avoidance acquisition and open field activity scores were indistin-

guishable from those of control females. Prenatal exposure to endogenous androgens was sufficient to organize the avoidance behavior characteristic of normal males, but there is no compelling evidence that exposure to androgens during the prenatal period was critical to this effect.—*Journal abstract.*

8965. **Snowdon, Charles T.** (U Wisconsin, Madison) **Production of satiety with small intraduodenal infusions in the rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 231-238.—9 male Sprague-Dawley rats equipped with chronic intragastric and intraduodenal catheters received small infusions of various solutions through 1 catheter during spontaneous meals. Regardless of which compartment or which solution was infused, the Ss maintained a constant daily nutrient intake. However, all hypertonic solutions reduced mean meal size and increased the frequency of feeding when injected intraduodenally, while only nutritive solutions reduced mean meal size when infused intragastrically. Water ingestion varied with the effective osmotic pressure of the injected solutions, but there were no differences in water ingestion as a function of the compartment infused. Data suggest both the presence of a duodenal satiety mechanism and the validity of interpreting the meal patterns of vagotomized Ss eating a liquid diet as resulting from the rapid emptying of the diet into the duodenum. (18 ref)—*Journal abstract.*

8966. **Södersten, P.** (Stanford U) **Mounting behavior in pregnant and pseudopregnant female rats.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 345-354.—In 2 experiments with a total of 108 female Wistar rats, mounting behavior by Ss with regular 4-day estrous cycles was significantly reduced after the induction of pregnancy, pseudopregnancy, or subcutaneous treatment with progesterone. The mounting behavior shown by pseudopregnant Ss was comparable to that shown by ovariectomized Ss. Pseudopregnant and unmated Ss showed mounts with pelvic thrusting with the same frequency after treatment with estradiol benzoate (EB). EB stimulated the display of mounts with pelvic thrusting in ovariectomized Ss, and this behavior was not affected by concurrent progesterone treatment. It is suggested that the reduction of mounting in pregnant and pseudopregnant female rats is due to decreased ovarian estrogen secretion. (20 ref)—*Journal abstract.*

8967. **Wade, George N.** (U Massachusetts, Amherst) **Some effects of ovarian hormones on food intake and body weight in female rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 183-193.—Conducted 3 experiments with a total of 63 ovariectomized and 41 ovariectomized-adrenalectomized Sprague-Dawley rats in which ovarian steroids affected food intake and body weight. These effects were probably mediated by estradiol and progesterone, since these 2 hormones were more effective than their principal metabolites (estrone and 5 $\alpha$ -pregnane-3, 20-dione, respectively) in altering the food intake and body weight of ovariectomized Ss. Estradiol seemed to affect food intake by lowering the set point about which body weight is regulated in a dose-dependent fashion. These actions of estradiol could be attenuated or completely blocked by concurrent injections of progesterone. Estradiol-treated ovariectomized Ss were

far more responsive to the weight- and appetite-promoting actions of progesterone than were ovariectomized-adrenalectomized Ss, suggesting that the principal action of progesterone on energy balance may be to interfere with the effects of estradiol. (30 ref)—*Journal abstract.*

8968. **Whalen, Richard E. et al.** (U California, Irvine) **Studies on the effects of intracerebral actinomycin D implants on estrogen-induced receptivity in rats.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 337-343.—In 3 experiments ovariectomized female Sprague-Dawley rats were injected subcutaneously with estrogen and progesterone, and actinomycin D was implanted into different brain areas. Implants of actinomycin D inhibited estrogen-induced lordosis behavior when applied to the preoptic region within 12 hrs of estrogen treatment regardless of whether the interval between implantation and testing was 29, 38, or 68 hrs. Implants 21 hrs after estrogen treatment were ineffective. Attempts to localize the site of action showed that implants into the preoptic region were effective even when the implant cannulae did not pierce the ventricles, that implants into the caudate nucleus were ineffective even if the cannulae pierced the lateral ventricles, and that implants into the 3rd ventricle were highly effective in inhibiting lordosis behavior.—*Journal abstract.*

8969. **Yahr, Pauline & Thiessen, D. D.** (U California, Irvine) **Estrogen control of scent marking in female Mongolian gerbils (*Meriones unguiculatus*).** *Behavioral Biology*, 1975(Jan), Vol 13(1), 95-101.—Ovarian hormones control a species-specific scent marking behavior displayed by female Mongolian gerbils. The present studies examined steroid induction of scent marking in 15 female gerbils that regularly displayed the response prior to treatment and in 28 Ss that rarely or never scent marked. In Ss that regularly scent marked preoperatively, marking behavior and scent gland size decreased after ovariectomy and were reinstated by subcutaneous estrogen given alone or with progesterone. Steroid injections did not stimulate scent marking in ovariectomized females that scent marked very seldom preoperatively, although the hormones promoted gland growth. In contrast to other studies, estrogen and estrogen plus progesterone proved equally effective in all cases.—*Journal abstract.*

### Brain & Electrical Stimulation & Lesions

8970. **Asratyan, E. A.** (USSR Academy of Sciences, Inst of Higher Nervous Activity & Neurophysiology, Moscow) **[Effects of limb deafferentation on the performance of conditioned reflexes of different degrees of complexity and precision.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 3-9.—Attempts to clarify the contradictory data and views of different investigators as to the role of afferents of the somatosensory system in different types of acquired motor actions. Experimental findings indicate that the effects of total or partial deafferentation of the paws of dogs on the performance of conditioned reflexes are more serious and prolonged the more complicated and precise the reflexes. The quick disappearance of classical conditioned reflexes and the slow disappearance of instrumental conditioned reflexes are probably explained



by the properties of the functional architecture of the arcs of each reflex. (19 ref)—*J. Larsen.*

8971. Boyle, Peter C. & Keesey, Richard E. (U Wisconsin, Madison) **Chronically reduced body weight in rats sustaining lesions of the lateral hypothalamus and maintained on palatable diets and drinking solutions.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 218-223.—12 male Holtzman rats sustaining lateral hypothalamic (LH) lesions regulated their body weight at a reduced level when maintained for 1 mo postlesion upon a wet mash diet. Thereafter, for a period of 84 days, half of these Ss were offered a high fat diet, whereas the remaining Ss continued to receive wet mash. A series of palatable drinking solutions were also offered. Body weight remained at reduced levels relative to 8 intake controls regardless of the diet offered, even under conditions of high fluid intake generated by the palatable drinking solutions. Results contradict the interpretation of E. J. Mufson and R. S. Wampler (see PA, Vol 49:428) that the lower body weight observed in LH-lesioned animals is secondary to lesion-produced "finickiness" and/or dehydration resulting from hypodipsia. Rather, a primary shift in the set point for body weight appears to underlie the reduced levels of weight maintenance in LH-lesioned animals. (16 ref)—*Journal abstract.*

8972. Burešová, Olga & Bureš, Jan. (Czechoslovak Academy of Sciences, Inst of Physiology, Prague) **Functional decortication by cortical spreading depression does not prevent forced extinction of conditioned saccharin aversion in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 47-52.—In 2 experiments conditioned taste aversion established in Druckrey hooded rats by association of saccharin drinking with subsequent lithium chloride intoxication decreased saccharin intake to 22% of normal consumption. Force-feeding saccharin to intact and functionally decorticate trained Ss returned saccharin consumption on the next day to 62% ( $n = 18$ ) and 77% ( $n = 19$ ), respectively. Overtrained conditioned saccharin aversion was affected by forced extinction in a similar way (saccharin intake increased from 28% to 50% and 63%, respectively). Intact-brain Ss refused to swallow saccharin during forced feeding, while functionally decorticate Ss showed no signs of aversion; extinction was almost equal in both cases. Application of lithium chloride after forced feeding of saccharin in functionally decorticate Ss neither prevented extinction of conditioned taste aversion nor reestablished the aversion habit extinguished earlier with intact brain. It is concluded that acquisition of the conditioned taste aversion requires cortical input to a short-term memory file, whereas decorticate extinction can be induced by subcortical gustatory processing analogous to the mechanism controlling feeding behavior during the preweaning period.—*Journal abstract.*

8973. Butcher, Larry L. & Gan, Jennifer. (U California, Los Angeles) **Effects on precise motor responding of bilateral intrastriatal application of dopamine.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 533-539.—Bilateral intrastriatal administration of dopamine (200  $\mu$ g over 2 hrs) in iproniazid-treated male Sprague-Dawley rats produced stereotyped movements of the jaws and

forelimbs. In an experimental situation specifically designed to measure behaviorally the analog characteristics of motor responses, these Ss displayed oscillatory, choreiform-like response patterns. This motor symptomatology was not observed after intrastriatal application of dopamine or noradrenaline alone, or after intracortical administration of dopamine. It is concluded that increments in striatal dopamine may be correlated with the production of chorea and related reiterative motor processes.—*Journal abstract.*

8974. Calhoun, Karen S.; Prewett, Michael J.; Peters, R. Douglas & Adams, Henry E. (U Georgia) **Factors in the modification by isolation of electroconvulsive shock-produced retrograde amnesia in the rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 373-377.—Cites earlier research which demonstrated that placing rats in a sensory-restricted environment during the electroconvulsive shock (ECS) retention interval following 1-trial appetitive learning will prevent or eliminate ECS-produced retrograde amnesia. Exp I replicated this finding using 32 male Dublin albino rats in a 1-trial aversive learning task, indicating that this effect is not task specific. Exp II attempted to determine whether illumination or the restricted environment was the crucial factor in this phenomenon. 64 male Sprague-Dawley rats placed in the light during the ECS-retention interval, whether restricted or in the colony, demonstrated retrograde amnesia after ECS. However, Ss left in the dark during this interval demonstrated little, if any, retention deficit particularly if this condition was combined with sensory isolation. These studies further indicate that manipulation of S's general environment after ECS can alter ECS-produced retention losses.—*Journal abstract.*

8975. Crowley, William R.; Ward, Ingeborg L. & Margules, D. L. (Rutgers State U, Inst of Animal Behavior) **Female lordotic behavior mediated by monoamines in male rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 62-68.—In Exp I direct application of serotonergic or  $\beta$ -adrenergic receptor blockers to anterior or posterior areas of the hypothalamus induced lordosis in 18 intact estrogen-primed male Sprague-Dawley rats. Such treatment with an  $\alpha$ -adrenergic blocker or systemic administration of progesterone failed to increase lordosis. In Exp II ( $n = 7$ ) centrally elicited lordosis did not occur without estrogen priming. It is concluded that anatomical and neurochemical similarity may exist in the brain mechanism mediating lordotic behavior in male and female adult rats. (36 ref)—*Journal abstract.*

8976. de Castro, John M. & Marrone, Babetta L. (Georgia State U) **Effect of fornix lesions on shock-induced aggression, muricide and motor behavior in the albino rat.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 737-743.—In Exp I a substantially lower fighting frequency was observed in shock-induced aggression in 10 fornix-lesioned male Holtzman rats as compared to 8 sham-operated controls. Exp II attempted to relate this low fighting frequency to a lesion-induced decrease in motor responsivity and also to determine whether another form of aggressive behavior, muricide, was affected by damage to the fornix. A battery of motor tests revealed a deficiency in motor responsivity which

coexisted with low shock-induced fighting frequencies in 8 lesioned Ss, compared to 20 controls. Muricidal behavior was not affected. In Exp III with 8 lesioned and 12 control Ss, no changes in shock-induced fighting frequencies were found in Ss which had previous experience with this form of aggression, despite significant changes in motor responsivity. Results indicate that the hippocampus affected motor behavior through the extrapyramidal motor system and played a substantial role in shock-induced fighting behavior. It is concluded that the effects of fornix lesions on aggressive behavior and motor ability are independent phenomena. (20 ref)—*Journal abstract*.

8977. Dean, P. (U Oxford, England) **Choice reaction times for pattern discriminations in monkeys with inferotemporal lesions.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 465-476.—Measured the choice reaction times of 3 rhesus monkeys with inferotemporal lesions for the performance of learned pattern discriminations. A titration schedule was used to make the Ss respond as rapidly as possible. Although all 3 inferotemporals were impaired at learning the pattern discriminations, 2 were able to perform them as fast as 3 Ss with superior temporal lesions and 3 normal Ss. It is suggested that the behavior of the 3rd may have been caused by invasion of foveal prestriate cortex, and that the results of the other 2 do not support the hypothesis that inferotemporal removal produces a defect in pattern perception. This is consistent with other experiments demonstrating normal perception in inferotemporal animals. (French & German summaries) (38 ref)—*Journal abstract*.

8978. Denisova, A. S. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) **[Differentiation and extinction inhibition in dogs after lesion of the caudate nuclei.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 54-59.—Evoked alimentary secretory conditioned reflexes in 7 dogs. Differentiation inhibition was disturbed after lesion of the head of the caudate nuclei, in all Ss regardless of the site of the lesion. Extinction inhibition was disturbed only after lesion of the dorsal part of the head of the caudate nuclei at the rostral level. Results show that the caudate nuclei, and not the cerebral cortex alone as had been postulated, participated in the formation of differentiation and extinction inhibition. (19 ref)—*English abstract*.

8979. Durinyan, R. A.; Reshetnyak, V. K. & Rabin, A. G. (USSR Academy of Medical Sciences, Inst of Normal & Pathological Physiology, Moscow) **[Effects of stimulation of somatic cortical areas in unrestrained cats.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 109-115.—Studied corticofugal effects of stimulation of the 1st and 2nd somatosensory cortical areas in 11 unrestrained cats, and their behavioral reactions during the stimulation. An "attention reaction" was frequently caused by repetitive stimulation of the 2nd somatosensory area, but stimulation of the 1st area produced no visible reactions. (29 ref)

8980. Eviatar, L.; Eviatar, A. & Naray, I. (Bronx-Lebanon Hosp Ctr, NY) **Maturation of neurovestibular responses in infants.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 435-446.—Full-term and preterm babies, divided according to birthweight into small (SGA), appropriate (AGA), and large (LGA)

for gestational age, were tested for nystagmus by per-rotatory stimulation (using a torsion swing) and ice-cold caloric stimulation. 83% of AGA and 24% of SGA babies responded with nystagmus to torsion swing; 69% of AGA and 26% of SGA babies to caloric irrigation. None of the preterm babies responded to vestibular stimulation. (German, French & Spanish summaries) (30 ref)—P. W. Pruyser.

8981. Gandelman, Ronald & Svare, Bruce. (Rutgers State U, New Brunswick) **Mice: Pregnancy termination, lactation, and aggression.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 397-405.—Conducted 2 experiments with a total of 154 female Rockland-Swiss albino mice. Hysterectomy on the 14th day of gestation in combination with the immediate and repetitive presentation of 1-day-old foster young produced lactation and fighting behavior toward adult males. The fighting behavior was comparable to that displayed by normally parturient Ss. Hysterectomy alone or the presentation of pups alone initiated neither lactation nor fighting. Hysterectomy performed prior to the 12th day of gestation plus the presentation of foster young also did not initiate lactation or fighting. Ovariectomy performed in conjunction with hysterectomy on the 14th day of pregnancy together with the presentation of young produced lactation but not fighting behavior, thus suggesting that fighting and lactation are controlled by somewhat different hormonal mechanisms.—*Journal abstract*.

8982. Gavrilo, L. N. (USSR Academy of Medical Sciences, Inst of Experimental Medicine, Leningrad) **[Taste sensitivity and the dynamics of conditioned and unconditioned salivation after unilateral ablation of thalamic nuclei in dogs.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 46-53.—Carried out unilateral electrocoagulation of the sensory taste thalamic nucleus (STN) and other associative and nonspecific nuclei with direct afferents from different levels (the medulla, thalamus, and orbital cortex) of the ascending taste pathway in 11 dogs. Coagulation led to impairment of taste sensitivity for 6-8 wks, tested by feeding meat and rusk powder dissolved in .03, .05, and .06 M quinine solutions. It also changed the dynamics of unconditioned salivation without substantially altering the total amount of secretion. The indicated changes were evident chiefly after ablation of the STN and to a lesser degree after ablation of other nuclei. Ablation of the nuclei of the anterior thalamic parts and the reticular nucleus did not perceptibly influence taste sensitivity and the dynamics of salivation, although it was accompanied by a diminution of the total amount of secretion. (39 ref)—*English abstract*.

8983. Glick, S. D. & Marsanico, R. G. (Mt Sinai School of Medicine, City U New York) **Time-dependent changes in amphetamine self-administration following frontal cortex ablations in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 355-359.—Conducted 2 experiments with a total of 28 operated, 25 sham-operated, and 21 normal female Sprague-Dawley albino rats. Ss were trained to intravenously self-administer dextroamphetamine (.01 mg/kg per reward infusion) during daily 1-hr testing sessions. Following removal of frontal cortex, rates of dextroamphetamine



self-administration were higher at early (3-5 days) postoperative intervals but lower at later (2-4 wks) postoperative intervals. These and other results indicate that, as a function of time after surgery, frontal Ss were first hyposensitive and then became increasingly hypersensitive to the rewarding effect of dextroamphetamine. —*Journal abstract.*

8984. Gold, Richard M. & Kapatos, Gregory. (U Massachusetts, Amherst) **Delayed hyperphagia and increased body length after hypothalamic knife cuts in weanling rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 202-209.—In 2 experiments a total of 23 4-wk-old female Carworth albino rats received parasagittal hypothalamic knife cuts. 11 Ss served as sham-operated controls. Polydipsia began in the experimental Ss right after surgery, but hyperphagia, obesity, and excessive nose-anal length did not begin until after the Ss were 7-8 wk old. The delayed onset appears to await some maturational event that is required for the expression of hypothalamic obesity. It appears likely that puberty is the critical maturational event. (49 ref)—*Journal abstract.*

8985. Goldstein, Melvin L. (Indiana U, Kokomo) **The effect of amygdectomy on acquisition of a classically conditioned fear response.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 465-466.—In an experiment with male albino Holtzman rats, 4 Ss were subjected to bilateral amygdectomy, and their performance latencies on acquisition of the classically conditioned fear response were compared with the performance of 4 normal Ss. Bilateral amygdectomy interfered with acquisition of a classically conditioned fear response. Amygdectomy also reduced the general level of activity. The amygdaloid complex is, therefore, essential for the acquisition of fear-motivated behaviors. This finding is consistent with the results obtained for other fear-motivated behavior such as active avoidance. It is concluded that the specific structures which are essential for the acquisition of a classically conditioned fear response need further investigation.—*Journal abstract.*

8986. Gromova, E. A. & Gil'man, I. M. (USSR Academy of Medical Sciences, Inst of Normal & Pathological Physiology, Moscow) **[The influence on the cerebral cortex of application of serotonin to hypothalamic structures.]** (Russ) *Zhurnal Vyshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 158-164.—Studied, in 9 grown unanesthetized cats with electrodes and cannulae implanted in the brain, the action on the cortex of serotonin, adrenalin, acetylcholine, and eserine applied to different structures of the hypothalamus. 20-40 µg serotonin had a 2-phase effect: a generalized desynchronization and then a synchronization of brain electrical activity, with corresponding shifts of evoked potentials appearing in response to photic stimulation. In Phase 1, Ss exhibited reactions of alertness and restlessness without motor activity; in Phase 2, sleep often developed. The most pronounced effects of serotonin were recorded after it was applied to the structures of the posterior hypothalamic-mamillary complex. It is suggested that the intensity of exchange and biosynthesis of serotonin in the hypothalamic area of the brain is one of the mechanisms for regulating the cortical activity level

and thus the sleep and alertness cycle. (30 ref)—*English abstract.*

8987. Horch, K. (U Utah, Medical Ctr) **Barth's myochordotonal organ as an acoustic sensor in the ghost crab, *Ocypode*.** *Experientia*, 1974, Vol 30(6), 630-631.—Tested the importance of Barth's organ in intraspecific communication. The organ was shown to be the Ss' only receptor sensitive to high frequency sounds. The organ is believed to be used for detection of acoustic signals, and probably crucial for intraspecific communication among crustaceans.

8988. Hranchuk, Kenneth B. & Webster, William G. (Carleton U, Ottawa, Ontario, Canada) **Interocular transfer of lateral mirror-image discrimination by cats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 368-372.—Interocular transfer of mirror-image discriminations has been shown to be paradoxical in split-chiasm monkeys tested in a lighted Wisconsin General Test Apparatus (WGTA) with 3-dimensional forms, but veridical in split-chiasm cats tested in a darkened 2-choice discrimination box with transilluminated patterns. In the present study, 8 split-chiasm cats showed veridical interocular transfer of a mirror-image and a non-mirror-image discrimination in a WGTA or a 2-choice discrimination box. On the basis of the testing parameters used, it is argued that the discrepancy in the literature arises from a species difference (having a behavioral rather than a gross neurological basis) and not from differences in behavioral testing apparatus or mode of stimulus presentation. (16 ref)—*Journal abstract.*

8989. Johnston, V. S.; Hart, M. & Howell, W. (New Mexico State U) **The nature of the medial wall deficit in the rat.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 497-504.—In 2 experiments, spatial and temporal (go-no-go) alternation tasks were run in a computerized Y-maze apparatus in an attempt to characterize the behavioral deficit which resulted from frontopolar ( $N = 11$ ) and medial cortex lesions ( $N = 11$ ) in male hooded and albino rats. The medial cortex lesions caused a severe behavioral impairment on both tasks. The deficit is characterized as an inability to temporally organize recent events. This interpretation is consistent with theories of primate frontal lobe function based on similar data obtained in nonhuman primates and man. (French & German summaries) (21 ref)—*Journal abstract.*

8990. Kadobayashi, Iwao & Nakamura, Michihiko. (Kyoto Prefectural U of Medicine, Japan) **Modification of visual, auditory, and somatosensory evoked responses in cortical primary receiving areas by nigral stimulation.** *Experientia*, 1974, Vol 30(3), 260-262.—Investigated the effects of stimulation of the substantia nigra on evoked visual, auditory, and somatosensory responses in 30 cats lightly anesthetized with pentobarbital. Stimuli were a flash from a xenon lamp, a click, and a 1-2 V electrical shock, respectively. Stimulation was effected with stereotactically placed .1-mm insulated stainless steel needles. There was an increased amplitude of primary components of all 3 evoked responses in cortical primary receiving areas. An effect of the conditioning-test interval was also noted. Nigral stimulation alone produced no response. It is concluded that the substantia

nigra has "nonspecific" functions in the brain stem. (German summary) (18 ref)—C. Wright.

8991. Kalashnikova, N. S. (Medical Inst, Voroshilovgrad, USSR) [The role of the claustrum in conditioned activity.] (Russ) *Zhurnal Vyshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 76-81.—Electrically stimulated the claustrum in 5 cats, and thus inhibited conditioned alimentary motor reflexes. The reflex was inhibited either completely or in its separate links, depending on the moment of stimulation. Lesion and ablation of the claustrum also caused disappearance of the conditioned reflexes, observed for 3-4 wks. (19 ref)—English abstract.

8992. Lanier, Linda P. & Isaacson, Robert L. (U Florida) Activity changes related to the location of lesions in the hippocampus. *Behavioral Biology*, 1975(Jan), Vol 13(1), 59-69.—Studied the effects of dorsal or ventral hippocampal lesions, as related to extent of damage to cytoarchitectural fields, on open-field activity. 30 male Long-Evans hooded rats with dorsal, ventral, or near-total hippocampal damage, 5 Ss with lesions restricted to the neocortex, and 5 operated controls without damage to the brain were given daily 5-min open-field activity tests in 9 postoperative testing sessions. Ss with dorsal or near-total hippocampal damage had significantly more destruction of CA1 fields than Ss with ventral hippocampal damage. In contrast, Ss with ventral or near-total hippocampal damage had significantly more damage to CA3 fields than Ss with dorsal damage and were significantly more active than the other groups. However, results of within-group correlational analyses indicate that differential CA field destruction was not correlated with open-field activity. (19 ref)—Journal abstract.

8993. Leith, Nancy J. & Barrett, Robert J. (Vanderbilt U, Medical School) Effects of hippocampal microinjections of  $\alpha$ -amphetamine and scopolamine on active avoidance behavior in rats. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 285-299.—100 male Sprague-Dawley rats received bilateral injections of 20 or 40  $\mu$ g of dextroamphetamine or scopolamine into the dorsal or ventral hippocampus prior to each of 8 daily training sessions in a discriminated Y-maze active avoidance task. Scopolamine, but not dextroamphetamine, facilitated avoidance responding in both sites, with the effect being greatest following administration of 20  $\mu$ g into the dorsal hippocampus. On Days 9 and 10, all Ss received saline injections and were tested for transfer of responding to the nondrug state. A decrement of performance occurred irrespective of whether the drug had facilitated avoidance responding. The performance changes were greater following termination of scopolamine than dextroamphetamine injections, and in no case were so great as those previously reported following peripheral injections of the drugs. (53 ref)—Journal abstract.

8994. LeVere, T. E. & Morlock, Gerald W. (North Carolina State U, Raleigh) The influence of preoperative learning on the recovery of a successive brightness discrimination. *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 507-509.—Data from 28 male hooded rats show that the recovery of a successive 2-choice brightness discrimination following posterior

neodecortication was significantly impaired if the reinforcement contingencies of the postoperative task were the reverse of those learned preoperatively. Results replicate a simultaneous 2-choice brightness discrimination.—Journal abstract.

8995. Livesey, P. J. & Rankine-Wilson, J. (U Western Australia, Nedlands) Delayed alternation learning under electrical (blocking) stimulation of the caudate nucleus in the cat. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 342-354.—Of 9 young adult cats with electrodes implanted in the dorsolateral caudate nucleus, 4 had previously reached criterion on a delayed alternation task. Tested under alternating conditions of stimulation and nonstimulation, these 4 Ss showed a significant performance decline with stimulation. When a marker was placed on 1 response panel, performance under stimulation did not decline. Stimulation did not affect the learning of a visual discrimination. The remaining 5 Ss were trained on delayed alternation with alternating stimulation and nonstimulation conditions. Under stimulation, performance remained near chance levels. These Ss were tested on position learning and reversal, and under unilateral stimulation. Results support the view that the caudate nucleus and prefrontal cortex mediate separate aspects of delayed response behavior. (35 ref)—Journal abstract.

8996. Lockhart, Mel & Moore, John W. (U Massachusetts, Amherst) Classical differential and operant conditioning in rabbits (*Oryctolagus cuniculus*) with septal lesions. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 147-154.—12 normal New Zealand white rabbits and 12 with septal lesions received classical differential conditioning of the nictitating membrane response (NMR), followed by auditory generalization tests run in extinction. Although rate of acquisition and asymptotic responding to positive conditioned stimuli did not differ, septals responded more than normals to nonreinforced stimuli. Resultant decrements in differential conditioning could not be attributed to changes in auditory or shock thresholds or to increased spontaneous NMRs. Septals also responded at higher rates in both operant conditioning (barpresses reinforced with food pellets on a variable interval schedule) and extinction sessions. No difference in suppression in a passive avoidance task was found. Results are discussed in relation to R. A. McCleary's (1966) response disinhibition analysis of septal function, and an habituation hypothesis is considered. (31 ref)—Journal abstract.

8997. Malakhovskaya, D. B. (USSR Academy of Sciences, Sechenov Inst of Evolutionary Physiology & Biochemistry, Leningrad) [Effect of cortical divaricate depression on the conditioned cleaning reflex in young rabbits.] (Russ) *Zhurnal Vyshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 89-96.—Evoked a conditioned cleaning reflex in 11 rabbits 10 days old. At the end of the 1st and beginning of the 2nd mo of life, when the reflex had been well stabilized, trepanation holes were made in the occipital-parietal areas, one on each side, to apply a potassium chloride solution to the dura mater. 24-48 hrs after the operation, a training session was carried out during cortical divaricate depression induced by application of the solution (2-25% in different cases).



The spreading of the cortical depression was observed by EEG records from the motor cortex. In all the training sessions made during the divaricate depression, the number of effective trials was considerably reduced. When the depression ended the conditioned reflex was recovered. Results suggest that under normal conditions the reflex is achieved with the involvement of the cerebral cortex. (36 ref)—*English abstract*.

8998. Marshall, Leslie B. & Smith, Orville A. (U Washington, Regional Primate Research Ctr) **Prefrontal control of conditioned suppression and associated cardiovascular variables in the monkey (*Macaca mulatta*)**. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 21-35.—Trained 17 male rhesus monkeys in a discriminated conditioned emotional responses paradigm. The discriminated conditioned response (CR) complex consisted of barpress suppression, increased terminal aortic blood flow, and increased arterial pressure. Barpress suppression and blood-flow responses were temporarily eliminated by single-stage bilateral prefrontal lobectomy but not by extensive posterior cortical ablation, 2-stage prefrontal lobe removal, or 3-stage prefrontal cortical surface ablation. The blood pressure CR was attenuated by almost every surgical operation. The changes in heart rate paralleled changes in general activity. Data indicate that the prefrontal lobes influenced the conditioned suppression of ongoing rewarded behavior and the vascular responses accompanying the suppression. The time course for recovery of the somatic CR after lobectomy differed from those of the cardiovascular CRs. (33 ref)—*Journal abstract*.

8999. Mast, M.; Blanchard, R. J. & Matsumoto, R. (U Hawaii) **Stimulus control of predatory aggression**. *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 454-456.—Results of 2 experiments indicate that in contrast to enucleation or deafening, olfactory bulbectomy increased mouse-killing in male Wistar-derived rats ( $N = 58$ ). Mice coated with lavender oil were killed more frequently by intact rats. Results of these and previous experiments indicate that olfactory bulbectomy releases an inhibition of mouse-killing in the rat, and suggest a specific mechanism for such inhibition.—*Journal abstract*.

9000. Meyer, Cornelius C. (Quinnipiac Coll) **Effects of lesions in the medial preoptic region on precocial copulation in the male chick**. *Hormones & Behavior*, 1974(Dec), Vol 5(4), 377-381.—Male Rhode Island Red  $\times$  White Rock chicks showing androgen-induced precocial copulation to a prone hand were given bilateral electrolytic lesions in the medial preoptic region. Symmetrical lesions ( $n = 16$ ) in the medial preoptic area disrupted copulatory behavior over the 10-day postoperative test period. Asymmetrical or sham lesions ( $n = 12$  and 15, respectively) did not differentially affect copulatory activity. Postoperative records indicated that all Ss showed similar increases in weight gain and comb size.—*Journal abstract*.

9001. Nie, V.; Maccabe, J. J.; Ettlinger, G. & Driver, M. V. (Inst of Psychiatry, London, England) **The development of secondary epileptic discharges in the rhesus monkey after commissure section**. *Electroencephalography & Clinical Neurophysiology*, 1974(Nov), Vol

37(5), 473-481.—9 rhesus monkeys had total or partial division of the forebrain commissures, the massa intermedia of the thalamus, and the posterior commissures. Celluloid caps containing aluminum hydroxide were then placed unilaterally on posterior parietal cortex in 5 Ss. Monthly EEG recordings were taken from all Ss. All 5 Ss with epileptogenic implants showed abnormal spike discharges over the primary hemisphere; in addition, transmitted discharges from the primary to the secondary hemisphere were noted. 4 Ss had unexpected contralateral EEG abnormalities (both ictal and interictal) which were independent in time of primary discharges. In all 4 of these Ss histological findings indicate complete division of the corpus callosum, anterior and posterior commissures, and of the massa intermedia. It is suggested that the discharges spread neuronally from the primary to the secondary hemisphere by way of certain remaining pathways. (French summary)—*Journal summary*.

9002. Oke, Arvin F.; Mendelson, Joseph & Justesen, Don R. (VA Hosp, Lab of Experimental Neuropsychology, Kansas City, MO) **Cortical hypothermia is a sequela of electroconvulsive shock**. *Nature*, 1974(Mar), Vol 248(5447), 437-439.—Studied the relationship between amnesia-inducing electroconvulsive treatment (ECT) and cortical hypothermia in 8 mature rats. Ss were implanted with electrodes used both to administer ECT and to record the electrocorticogram. Major findings were that (a) a reversible cortical hypothermia is a consequence of an amnesia-inducing ECT and (b) the hypothermia is associated with an alternation of electrocortical activity. The degree of hypothermia that was exhibited after ECT was less severe than that which has been previously reported as necessary to produce amnesia by partial immersion of the murine animal in cold water.—*R. S. Albin*.

9003. Overstreet, D. H.; Vasquez, Beatriz J. & Russell, R. W. (Flinders U South Australia, School of Biological Sciences) **Reduced behavioural effects of intrahippocampally administered carbachol in rats with low cholinesterase activity**. *Neuropharmacology*, 1974(Nov), Vol 13(10-11), 911-917.—Studied the effects of bilateral hippocampal administration of carbachol on discrete trial single alternation performance in 2 groups of male Sprague-Dawley rats. 6 Ss were examined both before and after chronic treatment with diisopropyl fluorophosphate (DFP), an irreversible anticholinesterase agent, and 6 Ss before and after treatment with its arachis oil vehicle. Initially, carbachol, a cholinomimetic, produced a dose-dependent decrease in the number of reinforced responses in both groups. A similar dose-dependence was found after chronic treatment with arachis oil. However, Ss chronically treated with DFP were unaffected. Results suggest that the sensitivity of cholinergic receptors in the hippocampus may be reduced during chronic treatment with DFP. This reduced sensitivity may be 1 mechanism underlying the development of behavioral tolerance to DFP. (27 ref)—*Journal abstract*.

9004. Rabin, Bernard M. (U Maryland, Baltimore County) **Independence of food intake and obesity following ventromedial hypothalamic lesions in the rat**. *Physiology & Behavior*, 1974(Dec), Vol 13(6), 769-772.

—Lesions of the ventromedial nucleus of the hypothalamus that did not cause overeating caused significantly greater accumulations of body fat in 24 male albino rats maintained on an ad lib diet than in 8 controls. Lesioned Ss that overate showed a still greater percentage of body fat. Results indicate that obesity caused by medial hypothalamic lesions can result from both primary metabolic disturbances and from overeating, and that experimental obesity consistently results from ventromedial hypothalamic lesions independently of the development of hyperphagia. (16 ref)—*Journal abstract*.

9005. Roldán, E.; Alvarez-Pelaez, R. & Fernandez de Molina, A. (Inst Cajal, Madrid, Spain) **Electrographic study of the amygdaloid defense response.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 779-787.—In 14 adult cats with chronic indwelling multiple electrodes, changes in the electrical activity of limbic and hypothalamic structures simultaneous with or following the amygdaloid defense response were assessed. Electrical stimulation of the dorsomedial amygdala consistently elicited a defense response without the simultaneous development of synchronous discharges. High amplitude discharges and afterdischarges recorded from the dorsomedial amygdala following stimulation of the nucleus basalis pars parvocellularis did not necessarily lead to the development of the defense response. Stimulation of the dorsomedial amygdala superimposed on previously elicited afterdischarges produced a defense response associated with a reduction in the amplitude and frequency of the discharges. Results are interpreted in terms of an interfering action of paroxysmal activity on the amygdalo-hypothalamic substrate for the defense response. (50 ref)—*Journal abstract*.

9006. Ruth, Russell E.; Rosenfield, J. Peter; Harris, David M. & Birkel, Paul. (Northwestern U, Cresap Neuroscience Lab) **Effects of aversive and rewarding electrical brain stimulation on auditory evoked responses in albino rat tectum.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 729-735.—Auditory evoked responses in the tectum of 14 Holtzman rats yielded recovery functions to aversive electrical brain stimulation of either contralateral mesencephalic central gray or deep superior colliculus. Effects of stimulation on inferior colliculus auditory potentials were abolished by pentobarbital and curare, implying tympanic muscle mediation due to reticular activation. Brain stimulation effects survived identical pharmacological manipulations when auditory responses were led from deep superior colliculus, showing independence from reticular processes or events occurring in inferior colliculus, 1 synapse previous. Rewarding brain stimulation also affected deep superior colliculus potentials but interacted in an undetermined manner with nonspecific process. (49 ref)—*Journal abstract*.

9007. Schneider, Allen M. (Swarthmore Coll) **Retrograde amnesia and the "reminder effect."** *Science*, 1974(Dec), Vol 186(4169), 1135-1136.—Discusses the explanation, advanced by P. E. Gold et al (see PA, Vol 55:8787), of the mechanism whereby noncontingent footshock (NCFS) restores memory for a learned response in amnesic animals. It is considered possible that Gold et al's learning interpretation of NCFS is

correct, but their experiment does not provide unequivocal support for that notion.

9008. Sclafani, Anthony; Berner, Charles N. & Maul, Glen. (Brooklyn Coll, City U New York) **Multiple knife cuts between the medial and lateral hypothalamus in the rat: A reevaluation of hypothalamic feeding circuitry.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 210-217.—In 2 experiments single or multiple sets of bilateral knife cuts were made in a total of 73 female CFE rats just lateral to the ventromedial hypothalamus (VMH) and/or just medial to the lateral hypothalamus (LH). The lateral VMH knife cuts by themselves produced greater hyperphagia and obesity than did the medial LH cuts. The lateral VMH knife cuts also significantly increased food intake and body weight in Ss previously given bilateral cuts along the medial LH border. Findings indicate that the feeding inhibitory fibers responsible for the hyperphagia syndrome do not project from the VMH to the LH, and this calls for a reevaluation of hypothalamic circuitry. It was also discovered that sham surgery in 7 Ss had a significant suppressive effect on the hyperphagia syndrome produced by hypothalamic knife cuts. (25 ref)—*Journal abstract*.

9009. Sclafani, Anthony; Gale, Steven K. & Maul, Glen. (Brooklyn Coll, City U New York) **The effects of knife cuts between the medial and lateral hypothalamus on feeding and LH self-stimulation in the rat.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 491-500.—9 female CFE strain rats which received bilateral parasagittal knife cuts between the ventromedial (VMH) and lateral hypothalamus (LH) increased their food intake and body weight during a 2-wk postoperative period. The knife-cut Ss did not, however, increase or decrease their LH self-stimulation behavior during this period compared to 6 sham-operated controls. Results question the view that the VMH inhibits the LH but are consistent with the recent suggestion that these hypothalamic areas involve different body-weight setpoint mechanisms. (20 ref)—*Journal abstract*.

9010. Shalyapina, V. G. & Telegdi, G. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) **[Conditioned activity of rats with serotonin implanted in the amygdaloid complex.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 104-108.—Conducted experiments on a total of 49 male rats (including controls) to study the avoidance reaction after bilateral implantation of serotonin. Implantation in the amygdala inhibited development of the avoidance reaction and depressed its reproduction. Implantation in the cerebral cortex had no substantial influence on conditioned activity. (24 ref)

9011. Shapiro, Sandra; Schuckman, Harold; Sussman, Daniel & Tucker, A. Marie. (Queens Coll, City U New York) **Effects of telencephalic lesions on the gill cover response of Siamese fighting fish.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 749-755.—Gill cover extension, a component of the fighting pattern of Siamese fighting fish, *Betta splendens*, was observed in 7 telencephalic-lesioned and 7 sham-operated Ss during exposure to mirror image and live *Betta* stimuli. The conspecific stimulus elicited more frequent and longer duration gill cover (operculum) responses than the mirror stimulus.



Lesioning decreased the frequency of gill cover responses to both stimuli. The mean duration of the gill cover response was not affected by lesioning and, unlike response rate, did not decrease (habituate) with repeated stimulus presentation. Lesioning reduced the efficiency of food retrieval and tended to reduce activity level. It is concluded that behavioral changes may be related to the extent of the lesion. Results are discussed in relation to current hypotheses concerning forebrain function. (29 ref)—*Journal abstract*.

9012. Sherman, S. Murray. (U Virginia, Medical School) **Monocularly deprived cats: Improvement of the deprived eye's vision by visual decortication.** *Science*, 1974(Oct), Vol 186(4160), 267-269.—Tested 3 monocularly deprived cats for visual perimetry before and after visual cortex lesions. Such a lesion greatly enhanced the deprived eye's performance and impaired that of the nondeprived eye so that the pronounced preoperative interocular asymmetry was lost postoperatively. Apparently this destruction of abnormal corticocortical pathways allows the expression of previously suppressed, normal retinotectal pathways. (26 ref)—*Journal abstract*.

9013. Simpson, C. W.; Baile, C. A. & Krabill, L. F. (State University Coll New York, Brockport) **Neurochemical coding for feeding in sheep and steers.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 176-182.—Feeding responses of 8 sheep (wethers) and 8 steers were compared following intraventricular injection of  $\alpha$ -adrenergic agonists and antagonists in 2-hr tests. In sheep, injection of the  $\alpha$ -agonist levonorepinephrine (L-NE) (140-1,120 nmoles) increased feed intakes 288% and 388% compared with intakes following synthetic cerebrospinal fluid. This response was blocked by the  $\alpha$ -antagonist phenoxybenzamine, whereas the antagonist alone decreased feed intake. The  $\alpha$ -adrenergic antagonist propranolol did not modify the L-NE response. A purer but weaker  $\alpha$ -agonist levophenylephrine, also resulted in increased feed intake that was blocked by phenoxybenzamine. In contrast to the feeding responses of sheep, L-NE caused hypophagia in steers, reducing intakes as much as 58% in 2-hr tests over doses ranging 42-27,800 nmoles. Phenoxybenzamine blocked the L-NE-induced hypophagia in steers; when injected alone, it increased feed intakes 181% of control values. Changes in feeding following L-NE injections are probably not attributable to changes in temperature, fat mobilization, or stupor. Data support the hypothesis of an  $\alpha$ -adrenergic-coded system for feeding in sheep and for satiety in steers. (24 ref)—*Journal abstract*.

9014. Sitdikova, V. V. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) **[Influence of electrical stimulation of the hippocampus on defensive shaking-off conditioned reflexes during development in rabbits.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 68-75.—Stimulated the dorsal hippocampus in 19 rabbits, changing the course of defensive shaking-off conditioned reflexes. In young Ss (1 and 3 mo), the stimulation only facilitated the defensive reflexes, regardless of the intensity of the current. This was shown by the considerable increase in the number of shaking movements in response to the positive signal. In 6-mo-old Ss, an inhibitory influence

was observed along with the facilitating effect. The differentiation reflex was disinhibited after stimulation of the hippocampus only in 4-wk-old Ss, remaining unchanged in 3- and 6-mo-old Ss. (35 ref)—*English abstract*.

9015. Slotnick, Burton M. & Nigrosh, Barry J. (American U) **Maternal behavior of mice with cingulate cortical, amygdala, or septal lesions.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 118-127.—Evaluated nest building, pup retrieving, and pup survival and growth in 11 primiparous female CF-1 strain mice and in 36 others with cingulate cortical, neocortical, amygdala, or septal lesions. Ss with neocortical or amygdala lesions showed little or no deficits in maternal behavior. Ss with septal lesions were severely impaired in all aspects of maternal care. These did not build nests, showed a variety of aberrant behaviors during pup retrieving, and their pups died or gained significantly less weight than those of controls. Ss with cingulate cortical lesions retrieved pups more slowly than controls, and retrieving deficits were correlated with the extent of retrograde degeneration found in the anterior thalamic nuclei. (26 ref)—*Journal abstract*.

9016. Suvorov, N. F. & Shapovalova, K. B. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) **[Analysis of the central mechanisms of the instrumental defensive reflex.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 26-36.—Conducted repeated experiments on 7 dogs to study the effect of lesion of the cortical projection areas C<sub>1</sub> and C<sub>2</sub> of the ventroposterior nucleus (VPN) and partial lesion of the posterior nuclear group (PNG) of the thalamus on the formation and perfection of motor instrumental reflexes linked with the maintenance of a certain posture, as well as on the recovery of preliminarily evoked reflexes of this type. VPN and PNG were important in the formation and maintenance of a stable instrumental reaction. Ablation of the same thalamic zones after preliminary evocation and stabilization of reflexes did not bring about any considerable changes in reflexes. More drastic and longer disturbances in evoking instrumental postural tonic reflexes and in their recovery (after preliminary evocation) occurred after ablation of the contralateral somatosensory cortical areas, particularly if the lesion spread to the bottom and walls of the anterior suprasylvian fissure. It is suggested that the evoked postural tonic defensive reaction is fixed bilaterally in the cortical projection areas C<sub>1</sub> and C<sub>2</sub>. (35 ref)—*English abstract*.

9017. Talalaenko, A. N. (Gorky Medical Inst, Donetsk, USSR) **[Neurochemical mechanisms of the inhibitory influence of the hippocampus on the avoidance reaction in rats.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 97-103.—Studied the results of applying gamma-aminobutyric acid (GABA), noradrenaline, serotonin, and their antagonists to the dorsal hippocampus on the latency of the avoidance reaction in 34 male rats. Bioamines and GABA substantially increased reaction latency. The inhibitory influence of noradrenaline on the avoidance reaction was weakened by phentolamine, dehydroergotamine, and chlorpromazine but not by propranolol. The effect of serotonin was eliminated by morphine injected in the

dorsal hippocampus and was not changed by methysergide administration. At the same time, antagonists of serotonin and of the adrenolytics did not prevent the depressing effect of GABA on the avoidance reaction. Results show that the depressing influence of bioamines on the conditioned defensive reflex is achieved through the alpha-adreno- and M-serotonin-sensitive structures of the dorsal hippocampus. The depressive effect of GABA on the avoidance reaction is not due to the action of acid on these receptive structures. (35 ref)—*English abstract*.

9018. Teschke, Eric J.; Maser, Jack D. & Gallup, Gordon G. (Tulane U) **Cortical involvement in tonic immobility ("animal hypnosis"): Effect of spreading cortical depression.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 139-143.—Either 25% potassium chloride (KCl) solution or .9% saline was applied to the surface of the brain of 20 male Sprague-Dawley rats. Ss were restrained on their dorsal surface and duration of the tonic immobility response (animal hypnosis) observed for 20 consecutive trials. Ss that received KCl showed significantly longer durations of tonic immobility than did saline Ss and 4 intact controls. A cyclic pattern of high to low durations was also found. Data support W. R. Klemm's (1971) neural model of tonic immobility which suggests that the neocortex inhibits a brain-stem immobility control center.—*Journal abstract*.

9019. Treichler, F. Robert. (Kent State U) **Two-stage frontal lesion influences upon severity of delayed-response deficit.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 35-47.—33 female rhesus monkeys underwent 1- or 2-stage bilateral aspirative removal of frontal cortical areas after acquisition of 5-sec spatial delayed response. Some Ss were tested for retention as normals, and all were eventually tested under some postoperative condition. Relative to normal retention, 1-stage dorsolateral removals produced severe deficits. 2-stage removals, divided into zones above or below the principal sulcus, generally yielded lesser severity, but this property was also influenced by the order and, to a lesser degree, the extent of these lesions. Some potential bases for the consequences of serial removals are discussed. (16 ref)—*Journal abstract*.

9020. Ursin, Holger & Divac, Ivan. (U Bergen, Inst of Physiology, Norway) **Emotional behavior in feral cats with ablations of prefrontal cortex and subsequent lesions in amygdala.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 36-39.—Bilateral ablations of gyrus preceus in 6 cats did not significantly alter either the intensity or the pattern of flight behavior during confrontation with a human. The scores for defense behavior were reduced in only 2 Ss. Subsequent lesions in the rostral part of the basolateral nuclei of amygdala reduced flight and transiently decreased defense scores in all Ss. It is concluded that the prefrontal cortex does not seem necessary for the flight and defense responding observed in feral cats. The role of amygdala in the regulation of these behaviors is confirmed. (26 ref)—*Journal abstract*.

9021. Wada, Juhn A.; Sato, Mitsumoto & Corcoran, Michael E. (U British Columbia, Div of Neurological Sciences, Vancouver, Canada) **Persistent seizure susceptibility and recurrent spontaneous seizures in**

**kindled cats.** *Epilepsia*, 1974(Dec), Vol 15(4), 465-478.—Daily unilateral electrical stimulation of initially subconvulsive amygdala resulted in progressive development of seizures (kindling) in 21 adult male cats, culminating in generalized convulsive seizures of focal onset that could occur spontaneously. Kindled cerebral epileptogenicity persisted for up to 12 mo and was characterized by both interictal spike discharges of consistent morphology and localization, and an "all or none" response to stimulation at the generalized seizure triggering threshold. Pentyleneetetrazol enhanced the frequency of interictal discharge without changing its localization or morphology, and caused generalized seizures with focal onset exactly like those produced by unilateral stimulation of the amygdala. Findings indicate that repeated electrical stimulation of amygdala produced widespread alteration of brain function resulting in a permanent state of epileptogenicity. Kindling thus qualifies as an experimental model reminiscent of certain types of human epilepsy. (French, Spanish, & German summaries)—*Journal summary*.

9022. Ward, Ingeborg L.; Crowley, William R.; Zemlan, Frank P. & Margules, D. L. (Villanova U) **Monoaminergic mediation of female sexual behavior.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 53-61.—Facilitated lordotic behavior in 18 estrogen-primed ovariectomized female Sprague-Dawley rats by direct application of progesterone or serotonergic or  $\beta$ -adrenergic receptor blockers to specific telencephalic, anterior hypothalamic-medial preoptic, or posterior hypothalamic sites. Blockade of the  $\alpha$ -adrenergic system was ineffective in facilitating lordosis, as was the application of the active drugs to control sites in the thalamus or basal ganglia. Female soliciting behavior was not evoked by any of the treatments. It is concluded that the lordotic behavior component of the female rat's estrous behavior pattern is inhibited by a specific central monoaminergic system that also responds to progesterone. Soliciting behavior appears to be mediated by systems that are anatomically, and possibly neurochemically, separable from those regulating lordosis. (57 ref)—*Journal abstract*.

9023. Webster, Joseph C. & Fox, Kevin A. (State U New York, Medical School, Buffalo) **Diminished aggression by recipients of brain extracts from trained aggressor mice.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 567-571.—The water-soluble fraction from the brains of C57BL/6J male mice which had been trained to a high level of aggressiveness was transferred to untrained Ss of the same sex and strain by subdural injection. An inversion effect was seen wherein the recipients of trained aggressor brain material were significantly less aggressive than were recipients of untrained brain material. Possible causes of these unexpected findings are discussed. (17 ref)—*Journal abstract*.

9024. Whishaw, Ian Q. & Nikkel, Ronald W. (U Lethbridge, Alberta, Canada) **Anterior hypothalamic electrical stimulation and hippocampal EEG in the rat: Suppressed EEG, locomotion, self-stimulation and inhibition of shock avoidance.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 1-20.—Stimulated 101 freely moving male Sprague-Dawley albino rats via electrodes



implanted in the forebrain and brainstem while concurrent hippocampal EEG and behavior were recorded. Stimulation of the preoptic-anterior hypothalamus and lateral hypothalamus produced desynchronization of slow hippocampal EEG but either increased or left fast hippocampal EEG unchanged. Increases in stimulation voltage produced intensity-related decreases in hippocampal EEG amplitude, increases in distance Ss ran, and increases in barpress rates. Stimulation in the medial hypothalamus produced hippocampal rhythmical slow activity, no change in fast activity, stimulus-bound running, and supported self-stimulation. On a jump-avoidance task, anterior and lateral hypothalamic stimulation disrupted performance, while medial hypothalamic stimulation did not. Stimulation of 2 sites in the medial septum and 7 in the dentate gyrus inhibited ongoing movement and depressed amplitude of slow and fast activity. Results suggest that movement inhibition may be related to depression of slow and fast activity, that rewarding properties of stimulation are not necessarily related to either slow or fast hippocampal EEG changes, and that stimulation which produces either rhythmic slow activity or desynchronization can differentially affect performance on a motor task. (45 ref) —*Journal abstract.*

9025. Wilcott, R. C. (Case Western Reserve U) **Skeletal and autonomic inhibition from low-frequency electrical stimulation of the cat's brain.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 487-496.—Results obtained at the head of the caudate nucleus and at parts of the frontal cortex of the cat indicate that these 2 structures are part of a common inhibitory system for both skeletal and autonomic responses. The inhibition of autonomic activity in the cat immobilized by flaxedil suggests that this inhibitory system may have a direct influence on autonomic centers in the brain. (French & German summaries) (22 ref)

9026. Woodruff, Michael L.; Hatton, Daniel C. & Meyer, Merle E. (U Florida) **Hippocampal ablation prolongs immobility response in rabbits (*Oryctolagus cuniculus*).** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 329-334.—Hypothesized that damage to the hippocampus would reduce tonic immobility in rabbits. 2 measures were used with 14 implanted and 6 control Dutch Belt rabbits: the number of successful inductions of tonic immobility in a test session and the duration of each successful immobilization. Both of these measures increased in Ss with hippocampal lesions rather than decreased as expected. It is suggested that the hippocampus may act to suppress any ongoing dominant or prepotent response, whether the response involves movement or cessation of movement. (28 ref)—*Journal abstract.*

9027. Woodruff, Michael L.; Kearley, Richard C. & Isaacson, Robert L. (Middlebury Coll) **Deficient brightness discrimination acquisition produced by daily intracranial injections of penicillin in rats.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 445-460.—12 male Wistar albino rats with unilateral epileptiform foci produced by daily injections of penicillin into either occipital cortex or hippocampus were trained on an operant visual discrimination. Both of the experimental groups were retarded in the acquisition of the discrimination, but the

Ss with foci in the occipital cortex demonstrated a more severe impairment, despite the fact that secondary epileptiform discharges appeared in hippocampus and visual cortex under both conditions. As a control for the nonepileptiform properties of the penicillin, 12 Ss received intracranial injections of sodium sulfadiazine. Ss injected with this drug were not significantly different from 6 normal controls in the percentage of correct responses emitted, despite reduced response rates. After 5-7 days of treatment this drug produced some slight seizure activity which was unrelated to performance. On Day 11 of discrimination training the Ss receiving penicillin were injected with sodium sulfadiazine and the Ss receiving sodium sulfadiazine were given penicillin. The Ss changed from penicillin to sodium sulfadiazine showed an immediate increase in the percentage of correct responses. Ss switched from sodium sulfadiazine to penicillin demonstrated a transitory impairment in performance. Data are interpreted to indicate that epileptiform activity produced by penicillin results in a deficit in retrieval of recently formed memories. (19 ref) —*Journal abstract.*

### Drug Effects

9028. Abreu, Luiz A. & Abreu, R. Raposo. (Inst Oswaldo Cruz, Lab of Biochemistry, Rio de Janeiro, Brazil) **Effect of long term lithium treatment on brain fumarase activity.** *Experientia*, 1974, Vol 30(9), 1056-1057.—Conducted experiments with male Swiss mice to study the mechanism responsible for lithium therapy's effectiveness in treating manic-depressive psychosis. (French summary)

9029. Ahlenius, Sven. (U Göteborg, Sweden) **Effects of low and high doses of L-dopa on the tetrabenazine or  $\alpha$ -methyltyrosine-induced suppression of behaviour in a successive discrimination task.** *Psychopharmacologia*, 1974, Vol 39(3), 199-212.—Studied the effect in male Sprague-Dawley rats of the administration of levodopa on the suppression of a successive discrimination-conditioned avoidance task induced by  $\alpha$ -methyltyrosine methylester hydrochloride ( $\alpha$ -MT) or tetrabenazine (TBZ). All drugs were administered intraperitoneally. Administration of 100 mg/kg levodopa resulted in a reversal of the  $\alpha$ -MT- or TBZ-induced suppression of the avoidance behavior, although the discrimination was lost. Restoration of the avoidance behavior and the correct discrimination were obtained with 10 mg/kg levodopa after  $\alpha$ -MT but not after TBZ. The difference in the behavioral response to levodopa after  $\alpha$ -MT as compared to the response obtained after TBZ is discussed in terms of the availability of the catecholamines formed from levodopa for release by the nerve impulses. Biochemical determinations of brain noradrenaline and dopamine were made in parallel. A simple and reliable method for the acquisition of a successive discrimination in the rat is described. (36 ref)—*Journal abstract.*

9030. Askew, W. E. & Ho, B. T. (Baylor Coll of Medicine, Houston, TX) **Effects of tetrahydrocannabinols on cyclic AMP levels in rat brain areas.** *Experientia*, 1974, Vol 30(8), 879-880.

9031. Beleslin, D. B.; Grbović, Leposava & Radmanović, B. Ž. (Medical Faculty, Beograd, Yugoslavia)

The pharmacology of gross behavioural effects of cholinomimetic substances injected into the cerebral ventricles of unanesthetized cats: Evidence for central muscarinic mediation. *Neuropharmacology*, 1974(Dec), Vol 13(12), 1163-1169.—Choline esters (acetylcholine, methacholine, and carbachol) as well as substances with a peripheral muscarinic type of action, such as pilocarpine and arecoline, injected intraventricularly in unanesthetized cats, evoked emotional behavior, autonomic changes, motor phenomena, and clonic-tonic convulsions. The gross behavioral effects of various single doses were dose-dependent. Of choline esters and substances with peripheral muscarinic type of actions that were administered, carbachol was the most potent. Atropine and scopolamine abolished the emotional behavior, autonomic changes, motor phenomena, and clonic-tonic convulsions of choline esters, while only scopolamine antagonized the gross behavioral effects of pilocarpine and arecoline. The excitant behavioral changes of choline esters, pilocarpine, and arecoline were resistant to, and potentiated by, administration of ganglionic or neuromuscular blocking agents. It is concluded that choline esters, applied intraventricularly to unanesthetized cats, elicit excitant behavioral phenomena by an action on central muscarinic cholinergic sites. (34 ref)

—*Journal abstract.*

9032. Beleslin, D. B.; Samardžić, Ranka & Malobabić, Z. S. (Medical Faculty, Beograd, Yugoslavia) An analysis of the gross behavioural changes induced by tetraethylammonium and a comparison with other substances affecting the autonomic and central nervous system after intraventricular injections to conscious cats. *Neuropharmacology*, 1974(Dec), Vol 13(12), 1171-1177.—Tetraethylammonium (TEA, 2-3.0 mg) injected intraventricularly in conscious cats caused dose-dependent emotional behavior, autonomic changes, motor phenomena, and clonic-tonic convulsions. Atropine and scopolamine abolished the emotional behavior but did not antagonize the autonomic and motor changes nor the clonic-tonic convulsions of TEA. Ganglionic and neuromuscular blocking agents, adrenergic blocking drugs, a 5-hydroxytryptamine antagonist, an antihistamine, antiepileptic drugs, calcium chloride, magnesium chloride, chlorpromazine, glycine, and noradrenaline failed to block the gross behavioral effects of TEA. It is concluded that the emotional behavior caused by TEA in conscious cats is mediated through central muscarinic cholinergic sites, probably by enhanced release of acetylcholine. Autonomic changes, motor phenomena, and convulsions are most likely the consequence of TEA's direct actions on the nerve cells. Hexamethonium, nicotine, (+)-tubocurarine, gallamine, atropine, scopolamine, and propranolol evoked excitant behavioral changes similar to those of TEA. Antazoline and magnesium chloride elicited excitant autonomic and motor phenomena followed by sedation and sleep. Noradrenaline and calcium chloride produced only depressant behavioral effects. (26 ref)

—*Journal abstract.*

9033. Berger, Philip A.; Barchas, Jack D. & Vernikos-Danellis, Joan. (U Stanford) Serotonin and pituitary-adrenal function. *Nature*, 1974(Mar), Vol 248(5447), 424-426.—Studied the relationship between the pituitary

secretion of steroids and brain serotonin in the rat—specifically, the response of the pituitary-adrenal system to a stress stimulus. Brain serotonin synthesis was inhibited with p-chlorophenylalanine or raised with precursors such as tryptophan or 5-hydroxytryptophan. In Exp I, 180 male rats were divided into 2 groups and injected either with saline or with PCPA in saline at a dose of 300 mg. In Exp II, 2 groups of 8 adrenalectomized rats each were stressed with ether 2 hrs after the administration of serotonin precursors, and the pattern of the rise in adrenocorticotrophic hormone was studied. A serotonin pituitary-adrenal relationship was demonstrated.—R. S. Albin.

9034. Bergmann, F.; Chaimovitz, M.; Pasternak, Y. & Ramu, A. (Hebrew U—Hadassah Medical School, Jerusalem, Israel) Compulsive gnawing in rats after implantation of drugs into the ventral thalamus: A contribution to the mechanism of morphine action. *British Journal of Pharmacology*, 1974(Jun), Vol 51(2), 197-205.—Bilateral implantation of apomorphine, morphine, or methadone into the region of the nucleus ventralis of the rat thalamus evoked compulsive gnawing. Chlorpromazine, haloperidol, or pimozide blocked the response to apomorphine and morphine, but pretreatment with  $\alpha$ -methyltyrosine methyl ester or  $\alpha$ -methyltyrosine suppressed only morphine-induced gnawing. Subcutaneous injections of high doses of morphine or pethidine reduced or abolished already established gnawing activity, evoked by intrathalamic deposits of either apomorphine or morphine. Nalorphine, applied subcutaneously, antagonized only the response to morphine. Injections of amphetamine potentiated morphine-induced gnawing. The action of morphine and methadone on the ventral thalamus may therefore be mediated by catecholamines, the drugs causing enhanced biosynthesis and release of these transmitters.—*Journal abstract.*

9035. Berridge, M. J. & Prince, W. T. (ARC Unit of Invertebrate Chemistry & Physiology, Cambridge, England) The nature of the binding between LSD and a 5-HT receptor: A possible explanation for hallucinogenic activity. *British Journal of Pharmacology*, 1974(Jun), Vol 51(2), 269-278.—LSD mimicked 5-hydroxytryptamine (5-HT) in its ability to stimulate fluid secretion, to change transepithelial and intracellular potentials, and to increase the cyclic adenosine monophosphate concentrations of isolated salivary glands of *Calliphora*. Unlike 5-HT, LSD disengaged slowly from the receptor, and fluid secretion continued despite repeated washing. Both 5-HT and tryptamine prevented LSD from acting on the glands. LSD bound to the receptor was slowly displaced when glands were treated with agonists (tryptamine) or antagonists (gramine). The property of LSD which permits it to function as an agonist despite remaining tightly bound to the receptor is discussed as a possible basis for its profound effects within the central nervous system.—*Journal abstract.*

9036. Blum, K. et al. (U Texas, Health Science Ctr, San Antonio) Ethanol narcosis in mice: Serotonergic involvement. *Experientia*, 1974, Vol 30(9), 1053-1054.—Investigated the chemical mechanisms involved in ethanol-induced sleep in 100 albino, male, Swiss-Webster mice. Biogenic amine metabolites, rather than amines



per se, are suggested to be involved in ethanol's sleep mechanism. The synergistic effect of dopamine on ethanol-induced sleep is considered due in part to a serotonergic rather than a dopaminergic mechanism. (German summary)

9037. Breese, G. R.; Cooper, R. R. & Mueller, R. A. (U North Carolina, Medical School, Chapel Hill) **Evidence for involvement of 5-hydroxytryptamine in the actions of amphetamine.** *British Journal of Pharmacology*, 1974(Oct), Vol 52(2), 307-314.—Administration of pargyline 1 hr before injection of dextroamphetamine (1 mg/kg) reduced amphetamine-stimulated motor activity. *p*-Chlorophenylalanine (PCPA) treatment prevented this inhibition. Reduction of brain 5-hydroxytryptamine (5-HT) with PCPA or 5,6-dihydroxytryptamine potentiated the amphetamine-induced locomotor response. This enhanced response to amphetamine following PCPA was reversed by 5-hydroxytryptophan treatment. While amphetamine-induced stereotypies were not altered by PCPA, depletion of 5-HT enhanced the induction of tyrosine-hydroxylase activity produced by amphetamine. The inhibition of amphetamine-stimulated motor activity produced by destruction of catecholamine-containing fibers could not be reversed by treatment with PCPA. —*Journal abstract.*

9038. Brus, R.; Herman, Z. S.; Sokola, A. & Jamrozik, Z. (Silesian School of Medicine, Inst of Biology & Physiology, Zabrze, Poland) **Effect of 6-hydroxydopamine on the duration of hexobarbital sleep in rats.** *Experientia*, 1974, Vol 30(1), 66.—Examined the prolongation of hexobarbital sleep in rats after a chemical sympathectomy of the central nervous system. Implications of the effects of barbiturates on the animal brain are noted. (German summary)

9039. Cappell, Howard & Pliner, Patricia. (Addiction Research Foundation, Toronto, Ontario, Canada) **Regulation of the self-administration of marijuana by psychological and pharmacological variables.** *Psychopharmacologia*, 1974, Vol 40(1), 65-76.—Investigated the roles of 3 variables as determinants of marijuana self-administration. Marijuana-use history was manipulated by selecting 30 18-29 yr old males at each of the 2 extremes of use frequency. To determine the possible contribution of learned smoking habits to consumption, Ss smoked either large or small cigarettes. Finally, cigarettes varying in concentration of  $\Delta^9$ -tetrahydrocannabinol were used. Ss were asked to smoke until they had attained a "nice high." Although there was some evidence of titration according to potency, Ss self-administered more total tetrahydrocannabinol the more potent the material in attaining the same subjective endpoint of intoxication. More material was ingested in the form of large than small cigarettes. The latter variable accounted for nearly as much variance as did drug potency itself. This result illustrates the importance of an essentially cognitive variable as a determinant of drug intake. There was no difference in the amount required by frequent and infrequent users to attain the intoxication criterion. The latter result is in opposition to the assertion by G. H. Nahas (1973) that frequent exposure to cannabis will ultimately result in an increase in the amount required to produce the reinforcing effects of marijuana. —*Journal abstract.*

9040. Carey, Robert J.; Goodall, Edwin & Lorens, Stanley A. (VA Hosp, Syracuse, NY) **Differential effects of amphetamine and food deprivation on self-stimulation of the lateral hypothalamus and medial frontal cortex.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 224-230.—Intracranial self-stimulation of the lateral hypothalamus in 5 male Sprague-Dawley rats was markedly increased by subcutaneous dextroamphetamine administration and by food deprivation. In contrast, similar self-stimulation response rates obtained in the same Ss from the medial frontal cortex were unaffected by food deprivation and only slightly increased by dextroamphetamine administration. Furthermore, a large difference between dextro- vs levoamphetamine on response rate was obtained for lateral hypothalamic but not for medial frontal cortex self-stimulation. Results are consistent with a noradrenergic self-stimulation system for the lateral hypothalamus. Medial frontal cortex self-stimulation, however, appears to be mediated by a neuroanatomical and neurochemical system different from that of the lateral hypothalamus. —*Journal abstract.*

9041. Carlson, R. H.; Sanders, M. G.; Tal, A. & Wood, W. G. (Texas Tech U) **Attenuation of "acute" habituation by scopolamine in the black-tailed prairie dog (*Cynomys ludovicianus*).** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 335-341.—Tested and confirmed the hypothesis that scopolamine attenuates habituation occurring within a training session as well as that occurring between training sessions. Subcutaneous scopolamine injections (.5 mg/kg) reduced spontaneous wheel running in 8 female prairie dogs. The same dosage did not affect the threshold for wheel running induced by electrical brain stimulation (EBS) in 6 Ss in Exp II. Exp III ( $n = 6$ ) demonstrated that EBS-induced running declined during a 10-min stimulation period and indicated that the decline was habituated since the response was repeatedly dishabituated. In Exp IV .5 mg/kg of scopolamine reduced habituation of EBS-induced wheel running during 10-min sessions with the 6 Ss used in Exp II. (22 ref) —*Journal abstract.*

9042. Charness, Michael E.; Amit, Zalman & Taylor, Max. (Johns Hopkins U, Medical School) **Morphine induced stereotypic behavior in rats.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 71-80.—5 groups of 8 male Wistar albino rats each received 5 daily intraperitoneal injections of 3 dose levels (3 mg/kg, 6 mg/kg, and 9 mg/kg) of morphine hydrochloride, 1 dose (10 mg/kg) of amphetamine, or saline. The occurrence of morphine-induced stereotypic behavior was measured and categorized into 3 subtypes. Diurnal influences on stereotypic behavior were also evaluated, and morphine and amphetamine stereotypic behavior was compared. In addition, the effect of haloperidol (a dopamine receptor blocker) on morphine- and amphetamine-stereotypic behavior was assessed. Since tolerance seemed to develop to the motor-depressant effects of morphine, while no increases in stereotypic behavior were observed when it was measured as percentage of active time, it is suggested that tolerance does not develop with respect to stereotypic behavior. It is argued that morphine-induced stereotypic behavior does not seem to be a rebound

phenomenon dependent on the development of motor tolerance. It is suggested that morphine-stereotyped behavior, unlike amphetamine-stereotyped behavior, is not wholly dependent on activity in dopamine pathways.

—*Journal abstract.*

9043. Collier, H. O.; Francis, D. L.; Henderson, G. & Schneider, C. (Miles Lab, Stoke Poges, England) **Quasi morphine-abstinence syndrome.** *Nature*, 1974(May), Vol 249(5456), 471-473.—Induced a quasi-abstinence syndrome in male albino rats previously untreated with any opiates to study the endogenous biochemical process involved in morphine dependence. Assuming that morphine induces dependence in response to continued interaction of the drug with an unidentified biochemical process of neurones, then it was felt that suitable pharmacological manipulation might produce a paradigm of the morphine abstinence syndrome in experimental animals not exposed to any opiate. (The number of rats studied is not reported.) It is concluded that the ability of theophylline to produce quasi-abstinence effects indicates that the cyclic nucleotides may be involved in morphine dependence, and that morphine tolerance and dependence may arise through compensatory changes in processes related to PGE-cyclic adenosine monophosphate interaction.—*R. S. Albin.*

9044. Constantinidis, J. et al. (U Geneva, Switzerland) **Enhancement of cerebral noradrenaline turnover by thyrotropin-releasing hormone: Evidence for fluorescence histochemistry.** *Experientia*, 1974, Vol 30(10), 1182-1183.—Studied the thyrotropin-releasing hormone's activation of noradrenaline neurons in the brain. It is suggested that this effect results in the antidepressant action of the tripeptide in man. (German summary)

9045. Crowley, Thomas J.; Styne, A. J.; Hyding, Marilyn & Kaufman, I. Charles. (U Colorado, Medical Ctr, Denver) **Ethanol, methamphetamine, pentobarbital, morphine, and monkey social behavior.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 829-838.—Reports findings of significant dose-response curves for social behaviors after single-dose administration of drugs in 5 adult male pigtail macaque monkeys living in their "home" troop of about 30 animals. Ethanol (0-2 ml/kg, gavage) produced ataxia without motor slowing, regressive playful fighting typical of juveniles, and a substantial increase in the ratio of heterosexual to autosexual behaviors. Aggressive dominance behavior was not altered. Pentobarbital sodium (0-1 mg/kg, intramuscularly) reduced submission behaviors, increasing the dominance-to-submission ratio. Methamphetamine hydrochloride (0-5 mg/kg intramuscularly) decreased the dominance-to-submission ratio, while producing hyperactivity, stereotypies, and social unrelatedness. Morphine (0-4 mg/kg, intramuscularly) blocked sexual behavior without impairing motor activity. (44 ref)—*Journal abstract.*

9046. Cummins, R. A.; Budtz-Olsen, O. E.; Walsh, R. N. & Worsley, A. (U Queensland, Brisbane, Australia) **Testosterone, early experience and behavioral arousal in a novel environment.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 283-288.—Rhode Island Red chicks were hatched either in isolation or in pairs. On the 2nd day after hatching they were injected intramuscularly with either 0, .5, 1.5, 4.5, or 13.5 mg of testosterone. 2

days later their emotional response to a novel environment was determined by counting the cheeping rate. It was found that, while low doses of testosterone elevated cheeping, the highest doses caused a depression back to or below control levels. The rearing environment also had an effect in that the isolated chicks cheeped more than their social counterparts for every dose except .5 mg. It is concluded that testosterone can influence behavioral arousal in chicks but that the effect is dependent upon both dose and previous environmental experience.—*Journal abstract.*

9047. Damitz, Charles; Tritt, John; Anderson, David & Goldstein, Melvin L. (Indiana U, Kokomo) **The effect of varying the dosage of sodium pentobarbital on the barpress rate of rats.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 471-472.—Determined the dose-response curve for sodium pentobarbital for 3 male albino Holtzman rats performing a simple barpress response for water reinforcement 20 min after having been injected with dosages of sodium pentobarbital ranging from 1.3 to 5.2 mg/kg of bodyweight. Sodium pentobarbital, in the relatively low dosages used, consistently depressed barpress responding. The barpress rate varied directly with the dosage of the drug. It is concluded that the low dosages of the drug used in the present study apparently have a depressant effect on the central nervous system.—*Journal abstract.*

9048. Davies, J. A. & Redfern, P. H. (Welsh National School of Medicine, Cardiff) **The interaction of dopamine-antagonists and amantadine hydrochloride on the acquisition of the conditioned avoidance response in rats.** *Neuropharmacology*, 1974(Nov), Vol 13(10-11), 941-948.—Studied the interaction between amantadine HCl and both pimozide and haloperidol (subcutaneously administered) on the acquisition of the conditioned avoidance response (CAR) by male Sprague-Dawley rats. Pretrial injection of haloperidol or pimozide inhibited the acquisition of the CAR in a dose-dependent manner. Amantadine HCl given 2 hrs after haloperidol or pimozide reversed the inhibitory effects of these drugs on acquisition. The significance of these results is discussed in terms of the role of brain dopamine in learning and memory mechanisms. (19 ref)—*Journal abstract.*

9049. Davies, J. A.; Navaratnam, V. & Redfern, P. H. (U Bath, School of Pharmacy, England) **The effect of phase-shift on the passive avoidance response in rats and the modifying action of chlordiazepoxide.** *British Journal of Pharmacology*, 1974(Jul), Vol 51(3), 447-451.—In rats trained to a 12-hr light-dark cycle, advancing at 12 hrs 00 min produced a resynchronization of the 24-hr variation in passive avoidance response which was completed after 10 days. The attainment of the new steady state was preceded by a period of disruption which was greatest 5 days after phase-shift. The presence of chlordiazepoxide (62.5-500 µg/ml) in the drinking water during the days after phase-shift produced a dose-dependent lessening of the disruptive effect of phase-shift and a more rapid adaptation to the new light-dark cycle. The significance of these results is discussed.—*Journal abstract.*

9050. Decsi, L. & Nagy, Julia. (Medical U, Inst of Pharmacology, Pécs, Hungary) **Chemical stimulation of**



the amygdala with special regard to influence on the hypothalamus. *Neuropharmacology*, 1974(Dec), Vol 13(12), 1153-1162.—4 different parts of the amygdala were chemically stimulated in 72 implanted, awake cats, and the effects on gross behavior, spontaneous electrical activity of the brain, and carbachol-induced hypothalamic emotional reaction were studied. Carbachol-stimulation had no effect on gross behavior. It caused a shift towards high-amplitude slow-wave activity in the EEG pattern and inhibited, in a dose-related manner, the rage reaction evoked by direct carbachol stimulation of the anteriomedial hypothalamus. The effect of carbachol from the central amygdala was blocked by a previous topical application of atropine. Nicotine inhibited the rage reaction only from the lateral part of the amygdala. Noradrenaline, when injected into the lateral or basal amygdala, caused very mild sedation, exhibited EEG effects similar to those seen after carbachol application in the central or lateral part of the amygdala, and inhibited the hypothalamic rage reaction. It is suggested that this action was a beta-receptor effect, for isoprenaline was also effective while phenylephrine and dopamine were not. (21 ref)—*Journal abstract*.

9051. Del Fiacco, M.; Fratta, W.; Gessa, G. L. & T. Diamante, A. (U Cagliari, Inst of Pharmacology, Italy) Lack of copulatory behaviour in male castrated rats after *p*-chlorophenylalanine. *British Journal of Pharmacology*, 1974(Jun), Vol 51(2), 249-251.—Notes that *p*-Chlorophenylalanine (PCPA), a compound which inhibits 5-hydroxytryptamine (5-HT) synthesis, stimulates homo- and heterosexual behavior in male animals. Previous studies have shown that the male-to-male mounting behavior elicited by PCPA is absent in castrated rats and is restored by the administration of testosterone. In the present study the effect of PCPA on the copulatory behavior of male castrated rats with receptive females was studied. Adult male rats, castrated 2 mo previously, failed to mount receptive females. PCPA, given in a dosage schedule which depleted brain 5-HT by 80%, failed to restore copulatory behavior; this behavior was restored by .1 mg/kg testosterone propionate, given subcutaneously.—*Journal abstract*.

9052. Deniker, P.; Ginestet, D. & Peron-Magnan, P. (University-Hosp Service of Mental Health & Therapy, Paris, France) New drug development in France and French-speaking countries: Short and long acting neuroleptics. *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 18-20.—Presents results of uncontrolled evaluations of neuroleptic drugs. Phenothiazines not available in the US, groups of neuroleptics with a new chemical formula, and new long-acting neuroleptics are discussed. The position of French clinicians concerning these drugs is cited.

9053. Foulon, C. (U libre Brussels, Lab de Physiologie, Belgium) [The effect of cycloheximide and actinomycin D on the spontaneous operative behaviors of the pigeon.] (Fren) *Acta Neurologica Belgica*, 1974 (May-Jun), Vol 74(3), 147-154.—Studied the effects of cycloheximide and actinomycin D (daclinomycin) in 3 groups of pigeons (including controls). Results show that in the controls, spontaneous activity increased during trials and learning was rapid, while in Ss treated with cycloheximide, spontaneous activity remained constant

during successive experiments and learning improved slowly, and in Ss given actinomycin D, spontaneous activity gradually disappeared and learning was nonexistent. Findings suggest a parallel between spontaneous and operative (operant?) behavior in control and treated animals. (18 ref)—*English abstract*.

9054. Friedman, E. & Gershon, S. (New York U, Medical Ctr) Effect of  $\Delta^1$ -THC on alcohol-induced sleeping time in the rat. *Psychopharmacologia*, 1974, Vol 39(3), 193-198.—Studied the effect of acute and repeated intraperitoneal  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC) administration on alcohol-induced sleeping time in male Sprague-Dawley albino rats. It was observed that acute pretreatment with  $\Delta^1$ -THC markedly potentiated alcohol-induced sleeping time in a dose-related manner. This potentiation of the alcohol sleeping time was shortened significantly after repeated prior treatment with  $\Delta^1$ -THC and could be observed 72 hrs after chronic treatment. The effect of  $\Delta^1$ -THC on alcohol-induced sleeping time was not associated with an altered alcohol metabolism rate. (17 ref)—*Journal abstract*.

9055. Friedman, Jeanette; Horvath, Thomas & Meares, Russell. (U Melbourne, Vic, Australia) Tobacco smoking and a "stimulus barrier." *Nature*, 1974(Mar), Vol 248(5447), 455-456.—Presents an hypothesis about the nature of the mechanism through which tobacco smoking might be positively reinforced. Ss were 10 men between the ages of 20-25 yrs who habitually smoked at least 1 packet of cigarettes a day. Alpha-desynchronization of the EEG was the aspect of the orienting response studied. The EEG was recorded in a sound-damped room. Subsequent sessions consisted of recording of EEG subsequent to cigarette smoking. During additional sessions, Ss were requested to abstain from cigarettes for 12 hrs; tones were presented both before and after smoking. Results indicate that the immediate effect of tobacco smoking was to greatly increase the speed of habituation, and that placebo smoking had no effect. Theoretical models of the habituation process that help to explain these results are discussed.—*R. S. Albin*.

9056. Garver, David L.; Schlemmer, R. Francis; Maas, James W. & Davis, John M. (Illinois State Psychiatric Inst, Chicago) A schizophreniform behavioral psychosis mediated by dopamine. *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 33-38.—Induced schizophrenic-like behavioral disturbances in 4 selected members of a macaque social colony by the chronic nasogastric administration of dextroamphetamine. Ss showed hyper-vigilance, hyperactivity, fragmented and repetitive behaviors, and progressive social withdrawal as well as the development of solitary stereotypes. The syndrome was dissected pharmacologically with alpha-methyl-para-tyrosine, chlorpromazine, pimozide, and haloperidol. Based on the behavioral findings and the known mechanisms of action of these drugs, it is concluded that the major elements of the psychotic-like behavior induced by dextroamphetamine were mediated by dopamine systems.—*Journal abstract*.

9057. Gates, G. R. & Chen, C. S. (U Monash, Clayton, Vic, Australia) Effects of barbiturate withdrawal on audiogenic seizure susceptibility in BALB/c mice. *Nature*, 1974(May), Vol 249(5453), 162-164.—Presents evidence demonstrating that barbiturate withdrawal in

mice is highly effective in producing audiogenic seizure susceptibility in a strain of mice which are normally resistant to seizure. This barbiturate withdrawal effect is not age-dependent. It is suggested that drug-induced susceptibility to seizure shares features in common with the seizure susceptibility than can be induced in these same mice following a reduction of auditory input. 21 mice from 8 litters were divided into 2 groups (split litters) at approximately 36 days of age. Each of 14 experimental Ss was given an intragastric dose of 1.8 mg of sodium phenobarbitone dissolved in 0.3 ml of water twice daily. The other group of 7 Ss was also given the same dose on the same regimen of isotonic saline. The barbiturate was given orally in both groups. 30 hrs after the last dose of drug, all Ss from both groups were tested for susceptibility to audiogenic seizure by exposing each to the sound of an intense electric bell. While all those on phenobarbitone had florid seizures, only one of the other group did so. The induction of seizure susceptibility through pharmacological means is viewed as significant. (17 ref)—R. S. Albin.

9058. Gibermann, E.; Chari-Bitron, A.; Millo, S. & Gothliff, S. (Israel Inst for Biological Research, Ness-Ziona) Effect of  $\Delta^1$ -tetrahydrocannabinol on K<sup>+</sup> influx in rat erythrocytes. *Experientia*, 1974, Vol 30(1), 68-69. —Examined the inhibiting effect of the major psychoactive component of hashish on cation transport in the red blood cells of rats. (German summary)

9059. Graham, J. D. & Lewis, M. J. (Welsh National School of Medicine, Cardiff) The effect of  $\Delta^1$ -tetrahydrocannabinol on the uptake of [<sup>3</sup>H]-(-)-noradrenaline by the isolated perfused heart of the rat. *British Journal of Pharmacology*, 1974(Oct), Vol 52(2), 233-236. —The effects of cocaine, Tween-80, and  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC) in Tween-80 on the uptake of [<sup>3</sup>H]-(-)-noradrenaline (<sup>3</sup>H-NA) by rat isolated perfused hearts were studied, using Iverson's methods (1963). It was found that both cocaine and  $\Delta^1$ -THC caused a concentration-related linear inhibition of the <sup>3</sup>H-NA uptake. Tween-80 alone also inhibited the uptake but to a lesser extent than that produced by the combination of  $\Delta^1$ -THC and Tween-80. It is concluded that  $\Delta^1$ -THC inhibits the accumulation of <sup>3</sup>H-NA in rat perfused hearts. —*Journal abstract*.

9060. Grahame-Smith, D. G. & Green, A. R. (Radcliffe Infirmary, Oxford, England) The role of brain 5-hydroxytryptamine in the hyperactivity produced in rats by lithium and monoamine oxidase inhibition. *British Journal of Pharmacology*, 1974(Sep), Vol 52(1), 19-26. —Subcutaneous administration to rats of lithium chloride (LiCl) (3 meq/kg) twice daily for 3 days followed by monoamine oxidase (MAO) inhibition the 4th day produced a hyperactivity syndrome. 3 or more injections of LiCl (3 meq/kg) were necessary for measurable hyperactivity, but 1 dose of 10 meq/kg 5 hrs before tranlycypromine also caused hyperactivity. The syndrome was blocked by *p*-chlorophenylalanine. 3 days of LiCl pretreatment did not alter brain tryptophan or 5-hydroxytryptamine (5-HT) concentrations, but 5-HT synthesis was increased 70%. LiCl did not potentiate the hyperactivity following 5-methoxy *N,N*-demethyltryptamine, but one dose of LiCl (3 meq/kg), while not altering 5-HT synthesis, potentiated hyperactivity following

MAO inhibition and levotryptophan (50 mg/kg). Results suggest that lithium causes an initial alteration of 5-HT available for release at the nerve ending, followed after further treatment by increased 5-HT synthesis. —*Journal abstract*.

9061. Gray, Peter. (Boston Coll) Effect of adrenocorticotrophic hormone on conditioned avoidance in rats interpreted as state-dependent learning. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 281-284. —140 male Charles River CD rats were given 1 training trial that was followed 2 days later by 1 test trial in a "step-out" passive avoidance task. Each S was injected with either ACTH or placebo before training and before testing. 4 groups of Ss were used, representing the 4 possible training-testing injection combinations: placebo-placebo, placebo-ACTH, ACTH-placebo, and ACTH-ACTH. ACTH given in testing increased avoidance for subjects that had received ACTH in training and decreased avoidance for those that had received placebo in training. —*Journal abstract*.

9062. Green, A. R. & Grahame-Smith, D. G. (Radcliffe Infirmary, MRC Unit, Oxford, England) The role of brain dopamine in the hyperactivity syndrome produced by increased 5-hydroxytryptamine synthesis in rats. *Neuropharmacology*, 1974(Nov), Vol 13(10-11), 949-959. —The syndrome of hyperactivity produced in rats by the administration of tranlycypromine followed 30 min later by tryptophan was inhibited by  $\alpha$ -methyl-*p*-tyrosine ( $\alpha$ -MPT). While brain tryptophan and 5-hydroxytryptamine (5-HT) concentrations rose to levels observed in Ss not pretreated with  $\alpha$ -MPT, noradrenaline (NA) and dopamine (DA) concentrations were depleted by 75%. The administration of levodopa 1 hr after the 2nd dose of  $\alpha$ -MPT almost restored the brain DA concentrations, did not restore brain NA concentrations but did cause return of the hyperactivity produced by tranlycypromine and tryptophan. The  $\beta$ -hydroxylase inhibitor disulfiram given 6 hrs before tranlycypromine and levotryptophan depleted brain NA by 75% but had no effect on brain DA and did not inhibit hyperactivity. The hyperactivity response seen after administration of tranlycypromine and 5-methoxy *N,N*-dimethyltryptamine, which probably acts as a 5-HT analog stimulating postsynaptic 5-HT receptor sites, was completely inhibited by  $\alpha$ -MPT pretreatment. Results are tentatively interpreted as indicating that at some point between the postsynaptic 5-HT receptor sites initiating the production of the hyperactivity syndrome and the mechanisms responsible for the expression of the syndrome, lies a system of dopaminergic neurones. Activity of these neurones depends on adequate DA concentrations, and depletion breaks the neuronal sequences necessary for the behavioral expression of 5-HT receptor site stimulation. (18 ref)—*Journal abstract*.

9063. Green, Marvin; Zelson, Carl & Behrendt, Hans. (New York Medical Coll, NY) Sweating function in the heroin withdrawal syndrome of neonates. *International Journal of the Addictions*, 1974, Vol 9(4), 495-502. —Examined the effect of 3 sudorific drugs—acetylcholine, epinephrine, and nicotine—on the sweating response of premature low-birth-weight neonates with heroin withdrawal symptoms. Results indicate signifi-



cantly greater hyperhidrotic responses in addicted neonates as compared to healthy premature controls. (17 ref)

9064. Greenblatt, David J.; Shader, Richard I. & Koch-Weser, Jan. (Massachusetts General Hosp. Boston) **Pharmacokinetic determinants of the response to single doses of chlordiazepoxide.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1395-1397.—Measured blood concentrations of chlordiazepoxide in 9 healthy male and female volunteers after administration of single 25-mg doses. Peak blood concentrations and rates of absorption and disappearance varied considerably among the Ss. Such pharmacokinetic variations have important clinical consequences and probably contribute to individual differences in the response to minor tranquilizers.—*Journal abstract.*

9065. Grelk, D. F.; Papon, B. A.; Cole, J. E. & Rowe, F. A. (Illinois Inst of Technology) **The influence of caging conditions and hormone treatments on fighting in male and female hamsters.** *Hormones & Behavior*, 1974(Dec), Vol 5(4), 355-366.—In an experiment with 45 male and 44 female golden hamsters, more individually caged, gonadectomized female Ss fought prior to the initiation of hormone treatments than did group-caged females. Daily injections of testosterone propionate (TP), estradiol benzoate (EB), or progesterone (P) had no influence on the number of individually caged females that fought. However, TP and EB were effective in increasing the number of group-caged females that fought. In contrast to females, both individually and group-caged males fought infrequently after castration. Daily injections of TP, EB, or P were effective in increasing the number of individually caged males that fought, while only TP and EB were effective in group-caged males. P failed to increase the number of group-caged Ss of either sex that fought. (21 ref)—*Journal abstract.*

9066. Hewitt, David & Milner, Jean. (U Toronto, School of Hygiene, Ontario, Canada) **Drug-related deaths in the United States: First decade of an epidemic.** *Health Services Reports*, 1974(May), Vol 89(3), 211-218.—Describes the increase in drug-related deaths in the US between the mid-1950s and the mid-1960s. (20 ref)

9067. Horn, A. S. & Trace, R. C. (MRC Neurochemical Pharmacology Unit, U Cambridge, England) **Structure-activity relations for the inhibition of 5-hydroxytryptamine uptake by tricyclic antidepressants into synaptosomes from serotonergic neurones in rat brain homogenates.** *British Journal of Pharmacology*, 1974(Jul), Vol 51(3), 399-403.—Examined the effects of imipramine analogs as inhibitors of <sup>3</sup>H-5-hydroxytryptamine uptake into homogenates of rat brain hypothalamus. For structures having a 3-carbon side chain, the tertiary amine derivative was more potent than the compound with a secondary amine function. Potency was reduced by increasing or decreasing the length of the 3-carbon side chain by 1 carbon atom. Substitution of methyl groups in the  $\alpha$  or  $\beta$  position also lead to a fall in potency. Replacement of the dimethylene bridge in imipramine by a sulphur atom or by substitution of a C=C double bond for the exocyclic N-C bond of

imipramine both produced weaker inhibitors of 5-hydroxytryptamine.—*Journal abstract.*

9068. Howes, J. & Osgood, P. (Sheehan Inst, Cambridge, MA) **The effect of  $\Delta^9$ -tetrahydrocannabinol on the uptake and release of <sup>3</sup>H-dopamine from crude striatal synaptosomal preparations.** *Neuropharmacology*, 1974(Dec), Vol 13(12), 1109-1114.— $\Delta^9$ -Tetrahydrocannabinol ( $\Delta^9$ -THC) and a water soluble ester derivative (compound I) caused a concentration-related decrease in the uptake of <sup>3</sup>H-dopamine (<sup>3</sup>H-DA) into crude synaptosomal preparations derived from male Charles River mouse striata. Both were less potent than amphetamine in this preparation. In the presence of amphetamine the  $IC_{50}$  of  $\Delta^9$ -THC was unaffected. The  $IC_{50}$  is the concentration of drug in the medium which will inhibit the uptake of <sup>3</sup>H-DA into the synaptosomes by 50%. However, in the presence of  $\Delta^9$ -THC, the dose response curve to amphetamine was shifted to the right, and the  $IC_{50}$  of amphetamine was increased.  $\Delta^9$ -THC and compound I increased the release of <sup>3</sup>H-DA from preparations pre-incubated with <sup>3</sup>H-DA. The effect was small but significant. The effects of amphetamine and  $\Delta^9$ -THC combined were additive on this system. The mode of action of  $\Delta^9$ -THC with regard to the dopaminergic system of the striatum is discussed. (25 ref)—*Journal abstract.*

9069. Huntley, M. Stephen. (U Vermont) **Effects of alcohol, uncertainty and novelty upon response reaction.** *Psychopharmacologia*, 1974, Vol 39(3), 259-266.—Conducted an experiment with 21-30 yr old male paid volunteers with normal vision. Following consumption of an alcohol or placebo beverage, 1 group of 12 Ss made familiar and a 2nd group made novel responses to tachistoscopically presented letters from stimulus groups comprised of 2, 4, or 8 letters. It was found that blood alcohol concentrations approximating 80 mg-% had little effect on letter identification times when stimulus-response associations were highly familiar. When associations were novel, identification times were increased by alcohol, and the magnitude of the increase was logarithmic with the number of equally likely stimulus-response pairs. When obtained, alcohol effects retarded selection of the identification response rather than influencing stimulus recognition per se.—*Journal abstract.*

9070. Jones, Ben M. (U Oklahoma, Health Sciences Ctr, Oklahoma City) **Circadian variation in the effects of alcohol on cognitive performance.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1212-1219.—Administered Raven's Advanced Progressive Matrices to 40 male medical students during the afternoon after Ss drank either 1.32 ml/kg of alcohol and their blood alcohol concentration (BAC) had descended to 0.09% or a placebo. Results are compared with a previous study which was identical except that the Ss were tested in the evening. The scores of the alcohol group were significantly poorer than those of the placebo group in the afternoon session, but the scores were no different between alcohol and placebo groups tested in the evening. The alcohol group in the afternoon performed significantly more poorly than the alcohol group in the evening. The alcohol metabolism rate was faster in the afternoon group than it was in the evening group. No

differences were found in amount of alcohol consumed, peak BAC, time to reach peak, or absorption rate. The correlation between test performance and elimination rate was not significant. Data suggest a circadian variation in the effects of alcohol. Possible state-dependent effects are discussed.—*Journal abstract.*

9071. Kamei, Chiaki & Ueki, Showa. (Dainippon Pharmaceutical Co, Research Lab, Osaka, Japan) **Naloxone-induced abstinence syndromes in morphine-treated mice.** *Japanese Journal of Pharmacology*, 1974(Aug), Vol 24(4), 655-657.—In male ddNS strain, morphine-dependent mice, naloxone caused increased jumping, ambulation, and rearing, loss of body weight, and fall in rectal temperature, peaking at 30 min after naloxone injection. It is suggested that changes in exploratory behavior and rectal temperature, as well as the jumping response and body-weight loss, would be more reliable in evaluating physical dependence in mice.

9072. Kamei, Chiaki; Masuda, Yoshinobu & Shimizu, Masanao. (Dainippon Pharmaceutical Co, Research Lab, Osaka, Japan) **Effects of psychotropic drugs on hypothalamic self-stimulation behavior in rats.** *Japanese Journal of Pharmacology*, 1974(Aug), Vol 24(4), 613-619.—In male Wistar rats with chronic electrodes implanted in the lateral posterior hypothalamus, intraperitoneal chlorpromazine, levomepromazine, haloperidol, clozapine, and oxypertine caused a selective depression of self-stimulation at nondebilitating doses, and a dose-response relationship was also observed. Diazepam depressed this behavior at a dose much larger than that impairing rotarod performance. Chlordiazepoxide failed to depress self-stimulation even at 50 mg/kg and rather slightly facilitated this behavior at smaller doses. The mode of action of pentobarbital was similar to that of diazepam. Antidepressants, imipramine, and amitriptyline depressed this behavior only at doses larger than those which significantly impaired coordinated motor activity. Methamphetamine facilitated self-stimulation at 5-1 mg/kg but depressed it at 5 mg/kg. It is concluded that hypothalamic self-stimulation is most selectively depressed by major tranquilizers.—*Journal abstract.*

9073. Kekki, Matti; Pentikäinen, Pertti & Mustala, Olli. (U Helsinki, Finland) **Effect of acute and prolonged ethanol administration on serotonin metabolism and excretion in urine and bile of rats.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1195-1204.—Acute administration of ethanol to male Sprague-Dawley rats increased the proportion of conjugates of 5-hydroxytryptophol in the urine and bile, whereas prolonged administration increased the formation of 5-hydroxyindoleacetic acid and its conjugates. (18 ref)

9074. Korol, S. & Owens, G. W. (U Geneva, Ophthalmological Clinic, Switzerland) **Glycine, strychnine and retinal inhibition.** *Experientia*, 1974, Vol 30(10), 1161-1162.—Studied the reversible inhibitory effect of glycine on rabbit retina in vivo. A loss of oscillatory potential and a reduction of amplitude were observed, and strychnine is indicated as a glycine antagonist. (French summary)

9075. Kulkarni, S. K. & Dandiya, P. C. (S.M.S. Medical Coll, Jaipur, India) **A preliminary report on the action of imipramine and antiparkinsonian agents on**

the open field behaviour of rats. *Japanese Journal of Pharmacology*, 1974(Oct), Vol 24(5), 809-810.

9076. Levy, Carolyn J.; Carroll, Marilyn E.; Smith, James C. & Hofer, Kurt G. (Florida State U) **Antihistamines block radiation-induced taste aversions.** *Science*, 1974(Dec), Vol 186(4168), 1044-1045.—When male albino rats were treated with an antihistamine prior to being given sublethal doses of ionizing radiation, the formation of a conditioned saccharin aversion was completely inhibited. It is suggested that an increase in histamine production after radiation exposure represents the physiological basis of radiation-induced taste aversions. (28 ref)

9077. Linnoila, M. (U Helsinki, Finland) **Effects of drugs and alcohol on psychomotor skills related to driving.** *Annals of Clinical Research*, 1974(Feb), Vol 6(1), 7-18.—Uses results of research from the literature to discuss the human information-processing system with respect to monitoring and processing data acquired and used during driving. Factors influencing this information processing and methods used to study extra-risk factors for traffic are outlined, with specific reference to the effects of alcohol, cannabis, neuroleptic and antianxiety agents, hypnotics, anesthetics, antihistamines, anticholinergics, analgesics, and stimulants, as well as the effects of drugs and alcohol in combination. Further and more sophisticated studies are urged, especially of dose-response relationships and of the correlations between psychomotor effects of drugs and their main metabolites' plasma concentrations. (126 ref)—B. McLean.

9078. Linnoila, M.; Otterström, S. & Anttila, M. (U Helsinki, Finland) **Serum chlordiazepoxide, diazepam and thioridazine concentrations after the simultaneous ingestion of alcohol or placebo drink.** *Annals of Clinical Research*, 1974(Feb), Vol 6(1), 4-6.—The effect of .8 g/kg of alcohol on serum diazepam, chlordiazepoxide, and thioridazine levels was examined in a double-blind cross-over trial with 5 healthy male student volunteers. The drugs were administered in gelatin capsules simultaneously with alcoholic or placebo bitter drinks of equal volume. Blood samples were taken 30, 60, 90, 120, 150, and 240 min later. Serum chlordiazepoxide levels only were significantly ( $p < .05$ ) increased at 120 and 150 min after alcohol as compared to those after placebo drink. The availability of any drug was not, however, significantly modified after alcohol. Taken with previous findings in behavioral studies, the results suggest that the interaction of diazepam, chlordiazepoxide, or thioridazine with alcohol takes place centrally.—*Journal abstract.*

9079. Lippmann, W. & Puzskey, T. A. **Effects of benzocetamine and chlordiazepoxide on turnover and uptake of 5-hydroxytryptamine in the brain.** *British Journal of Pharmacology*, 1974(Aug), Vol 51(4), 571-575.—Studied the effects of benzocetamine, a new antianxiety drug, and of chlordiazepoxide on the turnover of drug, and of 5-hydroxytryptamine (5-HT) and on 5-HT neuronal reuptake mechanisms in rat brain. Both drugs (20 mg/kg, administered intraperitoneally) decreased the disappearance of intraventricularly administered <sup>3</sup>H-5-HT. In addition, both drugs partially prevented the  $\alpha$ -ethyl-3-hydroxy-4-methylphenethylamine-induced depletion of rat brain 5-HT. It is concluded that benzocetamine, like chlordiazepoxide, decreased 5-HT turnover



and that this effect supports the suggestion that 5-HT neurons are involved in the antianxiety effects of these drugs in man.—*Journal abstract.*

9080. Lörcher, H. V.; Borbély, A. A.; Waser, P. G. & Huston, J. P. (U Zürich, Inst of Pharmacology, Switzerland) **Hypothalamic self-stimulation during light anesthesia in the rat.** *Experientia*, 1974, Vol 30(3), 253-254.—Investigated electrical muscle activity as an operant response in a self-stimulation experiment with adult male albino rats under light pentobarbital anesthesia (judged by loss of the righting reflex). Electrodes were implanted in the lateral hypothalamic area and Ss who exhibited self-stimulation were then tested. Reward was contingent on high activity in the left supraspinatus muscles concurrent with low activity in the right group, as measured by gold-tipped electrodes. Operant conditioning was successful despite the anesthesia. Results extend previous reports of successful operant conditioning after the ablation of forebrain structures. (German summary) —C. Wright.

9081. Marley, E. & Sellar, T. J. (Inst of Psychiatry, London, England) **Effects of nicotine given into the brain of fowls.** *British Journal of Pharmacology*, 1974(Jul), Vol 51(3), 335-346.—Nicotine was injected into the 3rd cerebral ventricle of adult nonanesthetized fowls and infused into various brain sites of nonanesthetized young chickens. Its effects given intraventricularly, applied to the brain stem, or injected intravenously to anesthetized fowls were also examined. Intraventricular nicotine in nonanesthetized Ss evoked behavioral and electrocortical sleep lasting 3-5 min; Ss then reawakened and developed postural changes and tachypnea. Intraventricular nicotine reduced or suppressed operant keypecking. Nicotine infused into the diencephalon, telencephalon, or myelencephalon of young Ss induced behavioral and electrocortical sleep; tachypnea and postural changes did not develop. Effects of nicotine, administered intraventricularly or infused into the brain, were prevented by pempidine but not hyoscine. Nicotine given intraventricularly to anesthetized Ss produced brief apnea and rise in blood pressure, the latter much prolonged by acute vagal division and abolished by spinal cord section.—*Journal abstract.*

9082. Marley, E. & Sellar, T. J. (Inst of Psychiatry, London, England) **Effects of cholinomimetic agents given into the brain of fowls.** *British Journal of Pharmacology*, 1974(Jul), Vol 51(3), 347-351.—5 cholinomimetic agents were injected into the 3rd cerebral ventricle of adult, nonanesthetized fowls and infused into the hypothalamus of nonanesthetized young chickens. Carbachol evoked behavioral and electrocortical arousal similar to that evoked by muscarine but lacked its postural and respiratory effects; pilocarpine increased respiratory rate and induced postural changes but lacked other behavioral effects and did not alter electrocortical activity. Benzoycholine induced tachypnea, postural changes, and brief electrocortical arousal; acetylcholine was effective only with physostigmine, when electrocortical arousal, postural changes, and tachypnea developed. Methacholine induced tachypnea and postural changes. Effects of carbachol and pilocarpine were prevented by hyoscine and those of benzoylcholine by pempidine; hyoscine and pempidine together prevented effects of

methacholine and attenuated those of acetylcholine with physostigmine.—*Journal abstract.*

9083. Mately, Robert E. & Krall, Roger G. (U Bridgeport) **An initial investigation of the psychedelic drug flashback phenomena.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 854-860.—Describes an initial investigation of some characteristics of those persons experiencing "flashbacks" (or recurrences of drug effects) and provides systematic descriptions of the flashback phenomena. Data from 22 undergraduates show that the drug user experiencing flashbacks, when compared with the drug user not experiencing flashbacks, exhibits neither significant differences in psychopathological characteristics as measured by the MMPI nor significant differences in attentional processes as measured by the Embedded Figures Test. There were few biographical differences between the 2 subject groups. Subjective reports by the flashback Ss offered some revealing details of the flashback experience itself.—*Journal abstract.*

9084. Minck, K.; Danneberg, P. & Knappen, F. [Effects of psychotropic drugs on exploratory behavior of mice.] (Germ) *Psychopharmacologia*, 1974, Vol 39(3), 245-257.—Studied locomotion (number of crossed squares) in an open-field situation and exploration (number of explored holes) in a hole-board situation in NMRI strain white mice. The sedative properties of chlorpromazine, haloperidol, and reserpine decreased both exploration and locomotion. Chlordiazepoxide, oxazepam, and diazepam in low doses caused an increase of locomotion and in higher doses a decrease of exploration. Phenobarbital increased both locomotion and exploration. Amphetamine caused a significant inhibition of exploration in low doses which did not increase locomotion. When locomotion was enhanced by higher doses, exploration still remained depressed. Imipramine in large doses caused a decrease of both locomotion and exploration. Mescaline caused an increase of locomotion and a decrease of exploration, but only in a dose range which has to be considered neurotoxic. (32 ref)—*English summary.*

9085. Moreau, Tina & Birch, Herbert G. (Queens Coll, City U New York) **Relationship between obstetrical general anesthesia and rate of neonatal habituation to repeated stimulation.** *Developmental Medicine & Child Neurology*, 1974(Oct), Vol 16(5), 612-619.—Compared 29 infants (GA) whose mothers had an obstetrical general anesthesia with 31 infants (NGA) whose mothers had not (though they might have had a local anesthesia or analgesic medication). Eye-movement responses to an auditory stimulus and cardiac responses to a somesthetic stimulus habituated more rapidly and remained more consistently reduced in NGA than in GA infants. (French, German, & Spanish summaries)—P. W. Pruyser.

9086. Mullins, Cecil J.; Vitola, Bart M. & Abellera, James W. **Users of cannabis only.** *US AFHRL Technical Report*, 1974(Apr), No 74-41, 12 p.—Compared 2,842 US Air Force trainees who had used only cannabis with 1,843 who had used cannabis along with other drugs and with a control sample of 9,368 on whom no drug-using information was available. All Ss were compared on 5 aptitude measures, educational level at time of enlist-

ment, and 3 measures of Air Force performance. Results indicate that cannabis-only users were more effective than users of other drugs and that even cannabis-only users compared unfavorably with controls in certain metrics which appear to require motivation as an important component. It is suggested that this may be evidence for the amotivational syndrome reported in the literature.—*Journal abstract.*

9087. Nakajima, Shinshu. (Dalhousie U, Halifax, Nova Scotia, Canada) **Amnesic effect of cycloheximide in the mouse mediated by adrenocortical hormones.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 378-385.—Conducted 6 experiments with a total of 33 groups of 10 male Swiss albino mice. Subcutaneous injection of cycloheximide shortly before a training trial of a passive avoidance task resulted in an amnesia of the avoidance response. However, amnesia was absent in adrenalectomized Ss in which cerebral protein synthesis was suppressed by cycloheximide. Injection of corticosteroids antagonized the amnesic effect, most effectively if the steroids were given immediately after training. The influence of the hormonal treatments upon the amnesic effect was not attributable to a change in general activity level. It is concluded that the amnesic effect of subcutaneously injected cycloheximide appeared to be mediated by hormonal deficiency and not related to suppression of the cerebral protein synthesis. (28 ref)—*Journal abstract.*

9088. Nasello, Antonia G.; Astrada, Carlos A. & Ramirez, Oscar. (U Nacional de Córdoba, Facultad de Ciencias, Químicas, Argentina) **Effects on the acquisition of conditioned avoidance responses and seizure threshold in the offspring of amphetamine treated gravid rats.** *Psychopharmacologia*, 1974, Vol 40(1), 25-31.—Female albino rats with 30-70% of conditioned responses in an avoidance conditioning session in a Warner cage were treated daily during pregnancy with .5 mg/kg of amphetamine administered subcutaneously. They had been mated with males selected with the same criterion who received no treatment. The control group differed from the treated one in that females received the same volume of saline solution instead of the drug. Teratogenic effects of the drug were not observed, and there were no differences in either the age of eyes or vaginal aperture or in growth rate determined by the weekly weight between offspring of treated and control mothers. The pups of amphetamine-treated mothers had better acquisition and retention of conditioned avoidance responses than those of control mothers when the pups were 90 days old, but no difference was observed at the age of 45 days. On the other hand, offspring of the treated group had a lower hippocampal seizure threshold than the control group. The relation between the mechanisms of learning and seizure is discussed in connection with potassium release by stimulation in the hippocampus. (26 ref)—*Journal abstract.*

9089. Nash, Harvey & Stone, George C. (California State Coll, School of Social & Behavioral Sciences, Dominguez Hills) **Psychological effects of drugs: A factor analytic approach.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 444-448.—Used factor analysis to reanalyze data of a previously reported study by H. Nash (see PA, Vol 37:656) on the human

psychological effects of amphetamines, barbiturates, and amphetamine-barbiturate combinations. In addition to having methodological implications, the reanalysis both confirms and further illuminates the previously reported findings. 240 male adult volunteers were assigned to 1 of 6 drug treatments (4 active medications and 2 placebos)—10 mg dextroamphetamine sulfate; 10 mg dextroamphetamine sulfate plus 65 mg amobarbital; 65 mg phenobarbital; and 10 mg methamphetamine hydrochloride plus 65 mg phenobarbital. Pre- and postdrug factor structures were similar which indicates that postdrug individual differences are largely predictable from predrug individual differences. Factor analysis results for the individual drugs also are reported. The importance of making optimal use of experimental and statistical controls to maximize detection and assessment of the effects of drugs administered in low to moderate doses is emphasized.—L. Gorse.

9090. National Clearinghouse for Drug Abuse Information. (Rockville, MD) **Methaqualone.** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(Oct), Ser 18(1), 14 p.—Describes the history, chemistry, pharmacology, and effects of methaqualone, a nonbarbiturate sedative. Articles on the potential benefits and dangers of methaqualone are reviewed. (55 ref)

9091. National Clearinghouse for Drug Abuse Information. (Rockville, MD) **DOM (STP).** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(May), Ser 17(1), 11 p.—Describes the history, chemistry, pharmacology, and effects of 2,5-dimethoxy-4-methylamphetamine (DOM), called STP in street slang, one of the psychotomimetic amphetamines—drugs which display hallucinogenic activity and are chemically related to mescaline and amphetamine. Articles on the potential benefits and dangers of the drug are reviewed. (21 ref)

9092. National Clearinghouse for Drug Abuse Information. (Rockville, MD) **Psilocybin.** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(May), Ser 16(1), 13 p.—Describes the history, chemistry, pharmacology, and effects of psilocybin which is an hallucinogen found in the mushroom family of *Psilocybe mexicana*. Articles are reviewed to show potential benefits and dangers of the drug. (56 ref)

9093. Nieschlag, E. & Kley, H. K. (U Düsseldorf Medizinische Klinik, W Germany) **Loss of sexual activity in rabbits actively immunized with testosterone.** *Experientia*, 1974, Vol 30(4), 434-435.—Investigated the effects of immunization with either testosterone or estrogen in 2 groups of 12-wk-old male white New Zealand rabbits. Ss were exposed to receptive female after 16 wks for 15 min and sexual activity was recorded (chasing, number of mountings, and ejaculations). Serum concentrations of total circulating testosterone, and percentages of binding of testosterone and estradiol the experimental Ss, were compared to a control group of 5 rabbits. No animal injected with testosterone showed sexual activity. Those injected with estrogen showed normal sexual activity, testosterone serum levels, and percentage binding. Serum testosterone levels in testosterone-immunized Ss were 30 times normal, and binding was increased.—C. Wright.



9094. Nicholson, A. N. & Wright, Catherine M. (Royal Air Force Inst of Aviation Medicine, Hampshire, England) **Inhibitory and disinhibitory effects of nitrazepam, diazepam and flurazepam hydrochloride on delayed matching behaviour in monkeys (*Macaca mulatta*).** *Neuropharmacology*, 1974(Nov), Vol 13(10-11), 919-926.—Studied the effect of 3 benzodiazepines—nitrazepam (.15, .45, and .75 mg/kg), diazepam (.6, 1.8, and 3.0 mg/kg), and flurazepam (.45, 1.35, and 2.25 mg/kg)—on total response time and on accuracy of response on a delayed matching task in 5 male rhesus monkeys. Increased total response time was observed after all 3 doses of diazepam and particularly nitrazepam, but after flurazepam increased total response time was limited to the highest dose. Accuracy of response on delayed matching was impaired by all 3 drugs. The effect of diazepam and flurazepam was limited to the highest dose in each case, but with nitrazepam performance was impaired also after .45 mg/kg. The effect of the 3 drugs on delayed matching was related in a complex way to the delay between stimuli and to the response demanded. It is suggested that the effect of the benzodiazepines depended on a complex interaction between the differential response of 2 systems leading to inhibited or disinhibited behavior.—*Journal abstract.*

9095. Papadakis, D. P.; Michael, C. M.; Kephais, T. A. & Miras, C. J. (U Athens, Medical School, Lab of Biological Chemistry, Greece) **Effects of cannabis smoking in blood lactic acid and glucose in humans.** *Experientia*, 1974, Vol 30(10), 1183-1184.—Tested blood samples of 5 chronic hashish smokers and 5 "naïves" (occasional smokers). Glucose was indicated not to change while lactic acid decreased immediately after hashish smoking. (French summary)

9096. Parker, Elizabeth S. et al. (U California, Coll of Medicine, Irvine) **Alcohol and the disruption of cognitive processes.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 824-828.—Studied memory processes of 12 alcoholic and 12 matched nonalcoholic male volunteers (mean ages = 35.6 and 36.3 yrs, respectively) under sober and 2 alcohol conditions (moderate dose—.67 ml/kg; high dose—1.33 ml/kg). Alcohol administration significantly impaired registration, recall, and organization in both groups. These processes were differentially susceptible to alcohol's acute effects. There were no significant differences between groups in the amount of information registered or recalled. However, alcoholics displayed significantly poorer organization under sober and intoxicated conditions, suggesting chronic impairment of abstracting ability due to alcohol. (29 ref)—*Journal abstract.*

9097. Pertwee, R. G. (U Oxford, England) **Tolerance to the effect of  $\Delta^1$ -tetrahydrocannabinol on corticosterone levels in mouse plasma produced by repeated administration of cannabis extract or  $\Delta^1$ -tetrahydrocannabinol.** *British Journal of Pharmacology*, 1974(Jul), Vol 51(3), 391-397.—Administration of 3 daily subcutaneous (SC) injections of 500 mg/kg cannabis in mice diminished thymus gland weight and produced tolerance both to the cataleptic effect of  $\Delta^1$ -tetrahydrocannabinol ( $\Delta^1$ -THC, 2 mg/kg intravenously) and to the effect of  $\Delta^1$ -THC (10 mg/kg intraperitoneally) on corticosterone plasma levels. The rise in corticosterone levels produced

by immobilization was not reduced by this pretreatment. Tolerance to the effect of  $\Delta^1$ -THC on corticosterone levels was also produced by 1 (10 mg/kg sc) and by 3 daily injections (10 or 30 mg/kg sc) of  $\Delta^1$ -THC. At 30-32°C, ambient temperatures at which cannabis does not produce hypothermia, the drug no longer reduced thymus gland weight. Both the rise in corticosterone levels produced by cannabis or  $\Delta^1$ -THC and tolerance to this effect were equally evident at room temperature and at 30-32°C.—*Journal abstract.*

9098. Pevet, P. & Saboureau, M. (Netherlands Central Inst for Brain Research, Amsterdam) **Effect of serotonin administration on the ultrastructure of pinealocytes during the period of maximal sexual activity of the male hedgehog (*Erinaceus europaeus* L.).** *Experientia*, 1974, Vol 30(9), 1069-1070.—Obtained electron microscopic data on the effect of serotonin on 8 adult male hedgehogs. A relationship between the decrease of sexual activity and the appearance of structural changes in male pinealocytes is confirmed. (French summary)

9099. Poschel, B. P.; Ninteman, F. W.; McLean, J. R. & Potoczak, D. (Parke, Davis, Research & Development Div, Ann Arbor, MI) **Intracranial reward after 5,6-dihydroxytryptamine: Further evidence for serotonin's inhibitory role.** *Life Sciences*, 1974(Oct), Vol 15(8), 1515-1522.—One intraventricular injection of 50  $\mu$ g of 5,6-dihydroxytryptamine produced, 24 hrs later, a marked increase in rates of medial forebrain bundle self-stimulation in 6 of 10 implanted male Holtzman albino rats. Whole brain serotonin levels were selectively depressed at this time, presumably because of the destructive effect on serotonin-containing neuron terminals. When whole brain serotonin levels had recovered fairly close to normal, the excitatory effect had disappeared. In Ss having self-stimulation electrodes positioned at slight distances from the medial forebrain bundle, the excitatory effect never appeared. Results support the theory that serotonergic neurons in the medial forebrain bundle are part of an inhibitory system subserving reward and motivational mechanisms. Results also show the great importance of electrode placement as a determinant of a drug's effect on self-stimulation.—*Journal abstract.*

9100. Quarterman, David & Botwinick, Chaim Y. (New York U, Medical School) **Role of biogenic amines in the reversal of cycloheximide-induced amnesia.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 386-401.—Conducted 6 experiments with male C57BL/6J mice in which amnesia was induced by pretraining subcutaneous injections of cycloheximide (CYC) in a food motivated discrimination reversal task. Magnitude of amnesia varied as a function of the amount of training on both the initial discrimination and the reversal and also as a function of the length of intertrial interval used on both the reversal and the test. Memory spontaneously recovered 48 hrs following reversal training. Recovery from amnesia was induced by pretesting injections of dextroamphetamine and 2 monoamine oxidase inhibitors, pargyline and catron. This enhanced performance was a true recovery of the memory and not a result of enhanced learning or increased arousal. Depletion of catecholamines by alpha-methyl-para-tyrosine, a tyrosine hydroxylase inhibitor,

and by diethylthiocarbamate, a dopamine beta hydroxylase inhibitor, resulted in an amnesia quantitatively and qualitatively similar to amnesia induced by CYC. Data support the hypothesis that CYC-induced amnesia is mediated via central catecholamines. (44 ref)—*Journal abstract*.

9101. Roberts, C. Allan; Kreisman, Norman R. & Waltman, Mary. (Tulane U, Medical School) **Uridine anticonvulsant effects: Selective control of nucleoside incorporation in experimental epilepsy.** *Epilepsia*, 1974(Dec), Vol 15(4), 479-500.—Determined whether uridine is the only nucleoside that has anticonvulsant properties, whether it enhances or inhibits epileptic activity and/or subsequent incorporation of nucleoside, and whether a change in RNA or DNA synthesis in epileptic regions is related to the etiology of seizures. Of the 5 nucleosides tested in male frogs, only uridine exerted an anticonvulsant effect related to selective increase in nuclear neuronal RNA of epileptic regions. The time between administration of uridine and anticonvulsant effect on electrocorticographic responses was consistent with the time required for maximal incorporation of uridine into nuclear RNA of brain components. Increase in RNA but not in DNA synthesis, in both primary and mirror focal regions, was related to epileptic phenomena. It is proposed that increased synthesis of nuclear neuronal RNA in primary and mirror foci of penicillin-induced epilepsy is directly related to the etiology of seizures and that selective alteration of uridine concentration may be responsible for both initiation and termination of epileptic activity. (French, Spanish, & German summaries) (39 ref)—*Journal summary*.

9102. Robinson, D. W.; Moberg, G. P. & Devers, Kathryn. (U California, Davis) **The feeding response to  $\beta$ -adrenergic active agents during induced compensatory growth in rats.** *Experientia*, 1974, Vol 30(6), 626-627.—Examined the sensitivity of the " $\beta$  satiety system" during induced compensatory growth in 40 female Sprague-Dawley rats. Ss were divided into 2 groups, with restrictions on 1 group's diet for a 4-wk period. Propanolol and isoproterenol were administered intraperitoneally at several stages of the experiment. The data indicate that at Day 11 the restricted diet group consumed twice as much food regardless of drug treatment. Data taken at 35 and 45 days indicate both groups had significantly ( $p < .001$ ) depressed food intake when injected with isoproterenol. Intake was restored to normal by combined injections of isoproterenol and propanolol. Results indicate there is a functional immaturity in young rats with respect to the  $\beta$ -adrenergic satiety system, but do not support the hypothesis that naturally hyperphagic Ss have a depressed  $\beta$  satiety activity. (French summary)—*R. Tomasko*.

9103. Rosloff, Barry N. & Davis, John M. (Vanderbilt U, Medical School) **Effect of iprindole on norepinephrine turnover and transport.** *Psychopharmacologia*, 1974, Vol 40(1), 53-64.—Iprindole, an antidepressant drug clinically similar to other tricyclic antidepressants, was administered chronically to groups of 5-10 male Sprague-Dawley rats by means of intraperitoneal injections. Such treatment did not alter the rate of decline of the log

of brain norepinephrine (NE) levels after NE synthesis inhibition with  $\alpha$ -methyltyrosine methyl ester. In addition, a single dose of iprindole did not significantly alter uptake of intracisternally administered H<sup>3</sup>-NE or the amount of H<sup>3</sup>-normetanephrine formed from such administration. Furthermore, iprindole added in vitro showed very low potency in blocking the uptake of labeled NE, metaraminol, serotonin, and dopamine into crude synaptosomal preparations. The bearing of these findings on the hypothesized mechanism of action of the tricyclic antidepressants, which affect all of the above parameters, is discussed. (47 ref)—*Journal abstract*.

9104. Šrám, R. J.; Goetz, P. & Zudová, Z. (Inst hygieny a epidemiologie, Prague, Czechoslovakia) [**Genetic effects of LSD.**] (Czech) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 80-87.—Studied mutation-producing effects of LSD on *Drosophila melanogaster*, rats, and mice. In *Drosophila* both the sex-linked recessive lethal and the mosaic mutation were found. Cytological tests of germinal cells in rats and mice did not show chromosome change after doses of 1,000  $\mu$ g LSD/kg. 1,000  $\mu$ g/dose changed the number of chromosomes only in cells of meiotic division. 5,000  $\mu$ g LSD/kg induced dominant lethal mutation in male mice and 1,000  $\mu$ g LSD/kg in females. When extrapolated to human organisms, approximately 800  $\mu$ g LSD/kg was found to be the threshold for dominant lethal mutation. An interval of 3 mo between LSD use and conception is recommended, in order to decrease the risk of damage to genetic material. (Russian & English summaries) (59 ref)—*V. Fischmann*.

9105. Sable-Amplis, R.; Agid, R. & Abadie, D. (ERA-CNRS, Inst de Psychologie, Toulouse, France) **Effects of morphine on plasma lipids in the rabbit.** *Experientia*, 1974, Vol 30(9), 1055-1056.—Studied nontolerant, chronically intoxicated, and abstinent Ss. Effects on free fatty acid concentration, on other plasma lipids, and the effects of food withdrawal are reported.

9106. Sara, V. R. & Lazarus, L. (St Vincent's Hosp, Garvan Inst of Medical Research, Sydney, NSW, Australia) **Prenatal action of growth hormone on brain and behaviour.** *Nature*, 1974(Jul), Vol 250(5463), 257-258.—Investigated the hypothesis that administration of prenatal growth factor would increase the number of cortical neurons, as well as enhance subsequent learning ability. Daily dosages of 3 mg, 1 mg, 100  $\mu$ g, or 10  $\mu$ g of purified porcine growth hormone (6 U/mg) were injected subcutaneously into pregnant Wistar rats from day 7-20 of gestation. Control Ss were injected with corresponding volumes of vehicle alone. On day 20, 500  $\mu$ Ci of tritiated thymidine (<sup>3</sup>H-TdR) were administered peritoneally to all Ss. On day 7 after birth half of each litter was killed, DNA extracted from each brain, and radioactivity measured. Autoradiograms were obtained from 1 brain in each litter. The remaining offspring were tested for performance on a series of conditioned discrimination tasks of increasing difficulty. Results show significant increase in brain weight and cellular content with specific neuronal proliferation indicated by <sup>3</sup>H-TdR uptake in treated Ss. Treated Ss demonstrated superior ability on discrimination tasks as measured by trials-to-criterion, differing significantly ( $p < .001$ ) from untreated controls.—*A. Cerf-Beare*.



9107. Schacht, Ulrich & Heptner, Wolfgang. Effect of nomifensine (Hoe 984), a new antidepressant, on uptake of noradrenaline and serotonin and on release of noradrenaline in rat brain synaptosomes. *Biochemical Pharmacology*, 1974(Dec), Vol 23(24), 3413-3422. —Nomifensine is a thymoleptic drug with a moderate centrally stimulating component. Its effects on noradrenaline (NA) and serotonin (5-HT) uptake by crude synaptosome preparations from both immature female Wistar rat whole brain and from hypothalamus were studied and compared with those of several tricyclic antidepressants and dextroamphetamine. Nomifensine inhibition of NA uptake by synaptosomal fractions from hypothalamus was similar to that of nortriptyline and protriptyline. In contrast to tricyclic antidepressants, nomifensine was a powerful inhibitor of NA uptake in synaptosomes obtained from whole brain. Nomifensine had only a moderate effect on 5-HT accumulation, comparable with that of desipramine. It is suggested that the centrally stimulating component of nomifensine, which is lacking in most thymoleptic drugs, is based upon its strong inhibition of catecholamine reuptake into noradrenergic as well as dopaminergic nerve endings. Nomifensine has no releasing effects on the efflux of NA from rat brain synaptosomes, thus differing clearly from dextroamphetamine and other indirectly acting sympathicomimetic agents. (37 ref)—*Journal abstract*.

9108. Schenkel-Hulliger, L.; Koella, W. P.; Hartmann, A. & Maitre, L. (Ciba-Geigy AG, Biological Lab, Basel, Switzerland) Tremorogenic effect of thyrotropin releasing hormone in rats. *Experientia*, 1974, Vol 30(10), 1168-1170. —Studied the mechanism of the thyrotropin releasing hormone (TRH) responsible for its beneficial effect in treating depressive patients. TRH's central nervous system effects are shown to be not mediated by stimulation of the pituitary-thyroid axis, nor through the known cholinergic or adrenergic pathways. Its antidepressant effect results from either a direct central nervous stimulation or indirect thyroid activation. (German summary)

9109. Schroeder, D. J.; Collins, W. E. & Elam, G. W. (FAA Civil Aeromedical Inst, Oklahoma City, OK) Effects of secobarbital and d-amphetamine on tracking performance during angular acceleration. *Ergonomics*, 1974(Sep), Vol 17(5), 613-621. —30 male college students were randomly assigned to one of the following groups: placebo (lactose), secobarbital (100 mg), or dextroamphetamine (10 mg). The drugs or placebo were administered in capsules in a double-blind procedure following practice at a tracking task and baseline determinations of tracking performance levels in both static (stationary) and dynamic (angular acceleration) conditions. Tests were conducted in total darkness with the exception of the illuminated tracking display. With the rotator stationary, dextroamphetamine Ss performed significantly better than controls during the 2-hr and 4-hr postdrug sessions. However, during angular acceleration, secobarbital Ss made significantly more tracking errors and had significantly more vestibular nystagmus than both the control and the dextroamphetamine groups for all postdrug sessions. Findings agree with previous studies of alcohol effects: depressant drugs may have little or no deleterious influence on tracking performance

in static environments, but may produce marked performance degradation during angular motion. The primary cause of this performance impairment appears to be a vestibulo-ocular one; the ability to inhibit vestibular nystagmus by visual fixation is impaired. (French & German summaries)—*Journal abstract*.

9110. Shimizu, M. et al. (Dainippon Pharmaceutical Co, Research Lab, Osaka, Japan) 1,2-Benzisoxazole-3-acetamidoxime hydrochloride: A new psychotropic agent. *Experientia*, 1974, Vol 30(4), 405. —Summarizes in vivo and in vitro studies in mice, rats, cats, and guinea pigs of the effects of 1,2-benzisoxazole-3-acetamidoxime hydrochloride (PF-257), a psychotropic agent that was shown to have a pharmacological profile and mode of action different from other psychotropic drugs. It is noted that PF-257 could prevent and reverse the decrease of monoamines caused by reserpine, although it is not a monoamine oxidase inhibitor. A property of retarding the catecholamine turnover is also suggested. (French summary)—*C. Wright*.

9111. Sofia, R. Duane & Barry, Herbert. (Wallace Lab, Cranbury, NJ) Acute and chronic effects of  $\Delta^9$ -tetrahydrocannabinol on food intake by rats. *Psychopharmacologia*, 1974, Vol 39(3), 213-222. —The effects of intraperitoneally injected  $\Delta^9$ -tetrahydrocannabinol (THC) were compared with dextroamphetamine sulfate (AMP) on food intake in 30 male Wistar albino rats which were given access to food for 6 hrs each day. Food intake was markedly reduced in a dose-related fashion by THC (2.5 and 5 mg/kg) in the 1st 2 hrs after drug administration. This anorexic effect persisted for the next 4 hrs and even on the next day. The anorexic potency of AMP (1.25 and 2.5 mg/kg) was approximately twice that of THC in the initial 2-hr interval after a single dose, but during the next 4 hrs and on the next day there was a compensatory increase in food consumption. Daily administration of THC (2.5 mg/kg) for 9 days greatly decreased food intake and body weight gain of Ss which were injected immediately before feeding, but had little effect on Ss injected 16 hrs before feeding. (25 ref)—*Journal abstract*.

9112. Squire, Larry R. & Davis, Hasker P. (VA Hosp, La Jolla, CA) Cerebral protein synthesis inhibition and discrimination training: Effects of extent and duration of inhibition. *Behavioral Biology*, 1975(Jan), Vol 13(1), 49-57. —Anisomycin, an inhibitor of cerebral protein synthesis, impaired memory in C3H  $\times$  Balb/c mice measured 5, 7, or 14 days after discrimination training. A large subcutaneous dose of anisomycin (210 mg/kg) impaired memory to a greater extent than a smaller dose (30 mg/kg) and inhibited cerebral protein synthesis more completely. The impairment produced by the smaller dose was not increased by maintaining protein synthesis inhibition for at least 13½ hrs beyond training with repeated injections (30 mg/kg). Moreover, memory was not measurably impaired by a prolonged period of inhibition, beginning 1½ hrs after training. The amnesic effects of the large dose could not easily be explained by illness or by state-dependent effects. Results suggest that, in the case of discrimination training, the amnesic effects of cerebral protein synthesis inhibition were determined largely by the extent of inhibition at the time of training, rather than by the duration of inhibition. For discrimina-



tion habits, sufficient protein synthesis for the establishment of long-term memory appeared to occur close to the time of training. (15 ref)—*Journal abstract*.

9113. Strykowska, Maria. (Adam Mickiewicz U Poznan, Psychological Inst, Poland) [The influence of Dantromin on human behaviour.] (Polh) *Przegląd Psychologiczny*, 1973, Vol 16(1), 49-59.—Conducted experiments with 4 groups of Ss ( $N = 186$ ) to study the effects of the stimulant pemoline (Dantromin) on attention, reaction time, efficiency, and accuracy. The drug had a positive influence on these functions, but no significant changes in blood pressure were noted and only 1/3 of the Ss reported improvement in general feeling due to the drug. (Russian & English summaries)

9114. Sugrue, M. F. (Organon Scientific Development Group, Newhouse, Scotland) The effects of acutely administered analgesics on the turnovers of noradrenaline and dopamine in various regions of the rat brain. *British Journal of Pharmacology*, 1974(Oct), Vol 52(2), 159-165.—Noradrenaline (NA) and dopamine (DA) turnover rates were determined following synthesis blockade by  $\alpha$ -methyl- $p$ -tyrosine. Morphine, pentazocine, and methadone had no effect either on steady-state levels or on NA turnover in whole brain and hypothalamus of the rat. Although morphine had no effect on medulla-pons NA steady-state levels, a drug-induced increase in turnover rate was observed, and this action was antagonized by pretreatment with naloxone. Neither pentazocine nor methadone altered steady-state levels of NA in the medulla-pons or NA turnover rate. All 3 drugs increased DA turnover in whole brain and in corpus striatum. Naloxone pretreatment prevented increases in striatal DA turnover.—*Journal abstract*.

9115. Syme, Lesley A. & Syme, G. J. (U Western Australia, Nedlands) The role of sex and novelty in determining the social response to lithium chloride. *Psychopharmacologia*, 1974, Vol 40(1), 91-99.—In Exp I the effects of intraperitoneal lithium chloride on the social behavior of 28 male and 28 female New Zealand hooded rats were measured in unfamiliar and familiar test situations using a photographic technique. Lithium-treated females showed an increase in body contact and a decrease in social distances in comparison with saline-treated controls in both test conditions. Males administered lithium showed increased corner occupancies in the novel test setting, while in the familiar test they showed decreased body contact and increased average group social distance in comparison with the saline condition. Further tests in an exploration box confirmed that lithium decreased the general environmental responsiveness of 14 male Wistar rats. Results are discussed with reference to the antiaggressive effect of lithium. (27 ref)—*Journal abstract*.

9116. Tagliamonte, A.; Fratta, W. & Gessa, G. L. (U Cagliari, Inst of Pharmacology, Italy) Aphrodisiac effect of L-DOPA and apomorphine in male sexually sluggish rats. *Experientia*, 1974, Vol 30(4), 381-382.—Administered apomorphine or a combination of levodopa and Ro 4-4602 to 50 male Wistar rats who had been identified as sexually sluggish. Copulatory behavior was measured by introducing female rats in heat into the male's home cage during the dark phase of the cycle. Both pharmacological treatments resulted in significant

increases in mounts, intromissions, and ejaculations. Haloperidol prevented the effects of the drugs and totally suppressed sexual behavior. The effect of apomorphine is cited in support of the hypothesized stimulating effect of dopamine. (Italian summary)—C. Wright.

9117. Tarsy, D. & Baldessarini, R. J. (Boston U, Medical School) Behavioural supersensitivity to apomorphine following chronic treatment with drugs which interfere with the synaptic function of catecholamines. *Neuropharmacology*, 1974(Nov), Vol 13(10-11), 927-940.—Studied stereotyped gnawing behavior in male Sprague-Dawley rats induced by apomorphine from 1 to 4 wks after withdrawal of drugs given daily for 3 wks. Significant shifts in the dose-response relationship toward increased sensitivity to the agonist were observed following subcutaneous  $\alpha$ -methyl- $p$ -tyrosine ( $\alpha$ -MPT), reserpine, chlorpromazine, or haloperidol, while promethazine, phenobarbital, and diazepam were ineffective. The addition of atropine did not alter the enhanced sensitivity following chlorpromazine. The enhanced response following chlorpromazine and haloperidol persisted for at least 4 wks. It was not significant after only 11 days of chronic pretreatment with chlorpromazine, reserpine, or  $\alpha$ -MPT. The effective drug treatments did not lead to changes in spontaneous locomotor activity at the time of testing stereotyped responses. The appearance of increased behavioral sensitivity to apomorphine, a putative direct agonist of dopamine receptors in the corpus striatum and limbic system, when nonspecific withdrawal effects and changes in the metabolism of catecholamines or of the agonist were unlikely, suggest that the phenomenon of receptor supersensitivity following pharmacologically induced "denervation" may be involved. (54 ref)—*Journal abstract*.

9118. Tharp, Van K.; Rundell, O. H.; Lester, Boyd K. & Williams, Harold L. (U Oklahoma, Health Sciences Ctr, Oklahoma City) Alcohol and information processing. *Psychopharmacologia*, 1974, Vol 40(1), 33-52.—Conducted 3 experiments with a total of 60 21-38 yr old male volunteers to investigate the effects of acute alcohol intoxication (average blood alcohol concentration 100 mg-%) on aspects—letter-recognition accuracy, memory search reaction time, and verbal reaction time—of human information processing. Results are interpreted within the framework of E. E. Smith's (see PA, Vol 42:4966) general information processing model, using S. Sterberg's (see PA, Vol 44:11748) additive-factor method of analysis. Alcohol consistently impaired information outputting operations (i.e., response selection-organization), rather than information inputting operations (i.e., stimulus preprocessing and encoding).—*Journal abstract*.

9119. Thor, Donald H. & Ghiselli, William B. (Edward R. Johnstone Training & Research Ctr, Bordentown, NJ) Suppression of mouse killing and apomorphine-induced social aggression in rats by local anesthesia of the mystacial vibrissae. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 40-46.—Local anesthesia of the facial epidermis can effect a substantial decrease in shock-elicited fighting of paired rats. The present experiments constitute methodological extensions to mouse killing and spontaneous drug-induced social aggression. In Exp I 28 known mouse-killing male



Long-Evans hooded rats were given bilateral lidocaine or placebo injections administered under ether anesthesia. Attack and kill latencies were significantly longer under lidocaine than under placebo; all Ss killed under placebo, whereas a third of all Ss failed to kill on the initial lidocaine test. On subsequent lidocaine testing, latencies decreased and nonkilling Ss killed. In Exp II intense apomorphine-induced conspecific fighting of 48 Ss preselected for aggressiveness was markedly reduced following lidocaine anesthesia. Comparative results of both experiments are interpreted in reference to theoretical assertions regarding the import of sensory information in stimulus-bound attack and the typology of central aggression systems. (24 ref)—*Journal abstract*.

9120. Tiefer, Leonore & Johnson, Wayne. (Colorado State U) Neonatal androstenedione and adult sexual behavior in golden hamsters. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 239-247. —Notes that male rats castrated and given androstenedione neonatally can show high levels of both masculine and feminine copulatory behavior in adulthood. In the present study, 24 intact female and 30 intact male hamsters castrated at birth were treated for their 1st 20 days with oil, free testosterone, or androstenedione. All neonatal androgen treatments mimicked the naturally occurring developmental process of the male in that all androgenized groups were capable of high levels of male behavior (males but not females showing ejaculation patterns) as well as moderate levels of lordotic receptivity. There were no significant differences in effect among neonatal androgen treatments. Results are discussed as they relate to species differences, sex differences, hamster "bisexuality," and posthormone copulatory performance. (30 ref)—*Journal abstract*.

9121. Van Buskirk, Roderick & McGaugh, James L. (U California, School of Biological Sciences, Irvine) Pentylentetrazol-induced retrograde amnesia and brain seizures in mice. *Psychopharmacologia*, 1974, Vol 40(1), 77-90. —Conducted 4 experiments with a total of 1,662 mice of 3 strains (Ha/ICR, Swiss Webster, and C57BL/6J) to examine the influence of pentylentetrazol injections on brain seizure activity recorded from cortical electrodes and on retrograde amnesia in an inhibitory avoidance task. In Ha/ICR Ss, pentylentetrazol administered after training impaired retention in doses that elicited brain seizures as well as in doses just below those which elicited brain seizures. The degree of retention impairment decreased with increasing training-treatment intervals. In Swiss Webster and C57BL/6J Ss, doses of pentylentetrazol which produced brain seizures did not affect retention. Results indicate that elicitation of brain seizures is not a sufficient condition for producing retrograde amnesia with pentylentetrazol. (20 ref)—*Journal abstract*.

9122. Vanderwolf, C. H. (U Western Ontario, London, Canada) Neocortical and hippocampal activation in relation to behavior: Effects of atropine, eserine, phenothiazines, and amphetamine. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 300-323. —Conducted a series of experiments with 126 male hooded rats implanted in neocortex, dorsal hippocampal formation, septal nuclei, thalamus, hypothalamus, or midbrain reticular formation. 12 nonimplanted

Ss were also tested. Evidence suggests that the hippocampus received 2 nonspecific inputs from the brainstem, each capable of producing rhythmical slow activity. The neocortex appeared to receive 2 similar inputs, each capable of producing low voltage fast activity. One input to both hippocampus and neocortex was blocked by atropine and stimulated by eserine, and was essentially unrelated to concurrent motor activity. A 2nd input to both hippocampus and neocortex was resistant to atropine, was depressed by phenothiazines, and was activated by dextroamphetamine. Activity in this system was closely related to concurrent voluntary movement. (49 ref)—*Journal abstract*.

9123. Wendel, O. T.; Waterbury, L. D. & Pearce, L. A. (Wake Forest U, Bowman Gray School of Medicine) Increase in monoamine concentration in rat brain following melatonin administration. *Experientia*, 1974, Vol 30(10), 1167-1168. —Tested male Sprague-Dawley rats with melatonin injected into the common carotid artery or the cisterna magna. Results show significant increases ( $p < .05$ ) in both brain dopamine and norepinephrine concentration. Administration of comparable amounts of 6-hydroxymelatonin did not significantly alter brain catecholamine content. (German summary)

9124. Whitsett, J. Mal & Vandenberg, John G. (North Carolina State U, Raleigh) Influence of testosterone propionate administered neonatally on puberty and bisexual behavior in female hamsters. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 248-255. —Treated female golden hamsters with oil, 3- $\mu$ g, 30- $\mu$ g, or 300- $\mu$ g testosterone propionate (TP) as neonates in Exp I. Neonatal TP treatment delayed the onset of puberty by 4.5 days to an age near that previously reported for the male hamster. In addition, neonatal TP altered genital morphology, induced the capacity for mounting behavior, and at the highest dosage, disrupted the ability to bear and rear young. Vaginal and behavioral estrous cycles, however, were not influenced by neonatal TP. In Exp II 600- $\mu$ g TP administered neonatally blocked estrous cyclicity but did not eliminate the capacity to display feminine sexual behavior. Results imply that masculinization and defeminization are separate aspects of neurobehavioral sexual differentiation, and that defeminization includes several independent physiological processes. (29 ref)—*Journal abstract*.

9125. Yarbrough, G. G. (U Saskatchewan, Saskatoon, Canada) Actions of acetylcholine and atropine on cerebral cortical neurons in chronically morphine-treated rats. *Life Sciences*, 1974(Oct), Vol 15(8), 1523-1529. —In 4 male Sprague-Dawley rats receiving a daily intraperitoneal injection of increasing doses of morphine for 25-29 days, the sensitivity of cerebral cortical neurons to acetylcholine (ACh) and the ability of atropine to antagonize ACh effects were examined. While the responses of neurons to ACh were qualitatively and quantitatively similar between the morphinized Ss and 4 saline-injected controls, there was a marked reduction in the efficacy of atropine in blocking ACh effects in the morphine-treated Ss.—*Journal abstract*.

9126. Yeh, S. Y. (NIDA Addiction Research Ctr, Lexington, KY) Absence of evidence of biotransforma-

tion of morphine to codeine in man. *Experientia*, 1974, Vol 30(3), 264-266.—Analyzed the urine of postaddict volunteer prisoners receiving morphine sulfate 4 times/day for the presence of codeine. The small amounts of codeine that were detected were interpreted as a codeine impurity in the injected morphine rather than a biotransformation product of morphine, as has been previously reported in animal studies.

## ANIMAL PSYCHOLOGY

9127. Blanchard, Robert J.; Mast, Marian & Blanchard, D. Caroline. (U Hawaii) **Stimulus control of defensive reactions in the albino rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 81-88.—Conducted 4 experiments with a total of 132 male Wistar rats to examine the characteristics of stimuli that produce unconditioned defensive reactions. Results show that neither the sound nor the smell of a cat, or the sight of a dead cat, produced freezing, but that either a moving cat or dog, or the abrupt and rapid movement of an inanimate card, resulted in freezing and failure to approach the stimulus object. It is suggested that movement is a major factor in the initiation of defensive responses and that movement of a neutral stimulus may enhance the acquisition of defensive responses to that stimulus.—*Journal abstract*.

9128. Bruch, Hilde & Voss, William R. (Baylor Coll of Medicine, Texas Medical Ctr, Houston) **Infantile obesity and later weight control in the baboon.** *Nature*, 1974(Jul), Vol 250(5463), 268-269.—6 infant baboons, 3 of whom were allowed ad lib feeding during infancy with consequent rapid weight gain, and 3 whose weight gain was controlled by regulated feeding, were later tested for predisposition to obesity by allowing unlimited feeding in both groups for 4 mo. Both groups showed rapid weight gain, yet stabilized at undifferentiated weight once controlled feeding was reintroduced.—*A. Cerf-Bearé*.

9129. Fabri, K. E. (Moscow State U, USSR) **[Imitation in animals.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 104-115.—Reviews research on imitation in animals. Contemporary research is compared with the work of a pioneer Soviet animal psychologist, B. I. Khotin (1895-1950), whose published and unpublished researches are discussed. A classificatory system of imitative behaviors in animals is presented. The relationship between group behavior and imitative behavior is considered, as well as the role of imitation in the development of individual behavior patterns, especially in play activity. It is shown that the behavior of higher animals is the result of the combining and interaction of all of these behavioral components. (English summary) (31 ref)—*L. Zusne*.

9130. Frame, George W. (Utah State U, Cooperative Wildlife Research Unit) **Black bear predation on salmon at Olsen Creek, Alaska.** *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1), 23-38.—Found that black bears prefer eggs over the rest of the salmon carcass and they are able to recognize live unspawned female salmon. There was no evidence of fishing territories. (German summary)

9131. Gantt, W. Horsley. (VA Hosp, Pavlovian Lab, Perry Point, MD) **Autokinesis, schizokinesis, centrokinesis and organ-system responsibility: Concepts and definition.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 187-191.—Presents a brief account of the origins and meanings of words derived from research in Gantt's laboratory.

9132. Hughes, Carroll W. (U Maryland, Medical School, Baltimore) **Early experience in domestication.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 407-417.—Conducted 2 experiments to assess the ontogenetic as well as phylogenetic influences of early experience on domestication. A total of 40 Long-Evans hooded and 32 Sprague-Dawley albino domestic rats and 72 1st generation, laboratory-reared wild rats were the Ss. Exp I was a factorial, reciprocal cross-foster study. Exp II was a factorial assessment of the combined effects of preweaning handling and postweaning enriched environments. These experiments on rat domestication show that preweaning handling had a strong influence on the ontogenetic development of the S in terms of reduced emotionality. Handled wild Ss became much more like domestic Ss in their behavior. This finding for handling contrasted with minimal effects for cross-fostering and enriched environments. (27 ref)—*Journal abstract*.

9133. Makarenko, N. V. (Ukrainian SSR Academy of Sciences, Bogomolets Inst of Physiology, Kiev) **[Higher nervous activity in dogs reanimated after long periods of clinical death from drowning and loss of blood.]** (Russ) *Zhurnal Vyshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 82-88.—Studied, by the secretory-alimentary technique, the state of higher nervous activity in 3 dogs reanimated after long periods of clinical death from drowning in fresh and salt water and from loss of blood. The reanimation was carried out by the donor technique with the use of 1 Bruchanenko pump and a parabiont donor. In 2 Ss the clinical death, lasting 18 min 3 sec and 20 min 39 sec from the last inspiration (21 min 51 sec and 28 min 30 sec from the moment the heart stopped) to the beginning of reanimation, was provoked by submerging the head under water. Lethal bleeding was effected from the right carotid. Death lasted 17 min 15 sec (29 min 4 sec from the beginning of blood loss). The Ss thus reanimated retained their capacity to form temporary connections to acoustic stimuli. Their higher nervous activity in these experiments corresponded to that of normal Ss. (20 ref)—*English abstract*.

9134. Pinto, D.; Doyle, G. A. & Bearder, S. K. (U Witwatersrand, Johannesburg, S Africa) **Patterns of activity in three nocturnal prosimian species, *Galago senegalensis moholi*, *G. crassicaudatus umbrosus*, and *Microcebus murinus murinus*, under semi-natural conditions.** *Folia Primatologica*, 1974, Vol 21(2), 135-147.—Studied activity patterns of 8 bushbabies (*G. senegalensis*), 3 thick-tailed galagos (*G. crassicaudatus*), and 4 lesser mouse lemurs (*M. murinus*) in laboratory cages. Total daily activity, patterns of sleep and rest, awakening behaviors, drinking, feeding, auto- and allogrooming, locomotion, and urine washing are compared in terms of species and sex differences. (38 ref)—*W. K. Redican*.

9135. Richards, David B. & Stevens, David A. (Clarion U) **Evidence for marking with urine by rats.** *Behaviora*



*Biology*, 1974(Dec), Vol 12(4), 517-523.—In an experiment with 59 Charles River CD strain albino rats, urine was collected on paper under cages housing single Ss in isolation, or adjacent to another male. Nonisolated Ss urinated only along the periphery of their cages while isolated Ss showed no such pattern of urination. When samples from the collection papers were presented to other males in preference tests, papers having high urine density were preferred over those of low urine density, papers with urine from isolated Ss were preferred over those with urine from nonisolated Ss, and papers with urine from either housing condition were preferred over clean papers.—*Journal abstract*.

### Learning & Motivation

9136. Ayres, John J.; Benedict, James O. & Witcher, Elizabeth S. (U Massachusetts, Amherst) **Systematic manipulation of individual events in a truly random control in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 97-103.—Truly random sequences of tone (conditioned stimuli, CSs) and shock (unconditioned stimuli, UCSs) were given to a total of 78 male Holtzman albino rats. Conditioning to the CS was measured using a conditioned suppression procedure. In Exp I eliminating chance CS-UCS pairings by systematically removing CSs that overlapped UCSs weakened conditioning monotonically as a function of the number of paired CSs removed. In Exp II systematically delaying early chance pairings, while holding constant the number of CSs, UCSs, and pairings, produced a nonsignificant weakening of conditioning. In Exp III delaying pairings again produced a nonsignificant weakening of conditioning when the early nonpaired events were CSs but significantly weakened conditioning when the early nonpairings were UCSs. Data suggest that each chance pairing in the truly random control produces an increment in conditioning unless blocked by prior UCSs alone.—*Journal abstract*.

9137. Bateson, P. P. (U Cambridge, England) **Atmospheric pressure during incubation and post-hatch behaviour in chicks.** *Nature*, 1974(May), Vol 248(5451), 805-807.—Investigated the influence of atmospheric pressure during incubation on posthatch behavioral variabilities in 10 batches (90 eggs each) of chicks. Eggs were incubated in dark, temperature-controlled incubators. Running wheels facing flashing rotating lights were used to investigate posthatch latency and frequency of approach to the lights, and preference for familiar vs novel lights. Barometric pressure during incubation was most highly associated with approach frequency. No association existed between pressure and "hatchability." Controlled pressure is suggested as a means of eliminating behavioral variability in experimental chicks.—C. Wright.

9138. Blass, Elliott M. & Hall, Warren G. (Johns Hopkins U) **Behavioural and physiological bases of drinking inhibition in water deprived rats.** *Nature*, 1974(May), Vol 249(5456), 485-486.—Studied voluntary dehydration which occurs after water deprivation when neither rat nor man drink enough water to correct the incurred fluid deficit until food also is made available. 10 adult female rats were each studied on 9 occasions on a deprivation, preloading, and drinking schedule. Results

suggest that as drinking ensues, water is quickly cleared from the stomach and absorbed, the cellular phase becomes rapidly overhydrated, and this occurs while the rats are actively engaged in drinking. The water remaining in the stomach and intestine is cleared, absorbed, and excreted in dilute urine. The exaggeration of voluntary dehydration is likely a result of allowing ample time for complete absorption following the preloads and thereby avoiding any lag in the system. Additional implications concerning other ingestive phenomena are discussed.—R. S. Albin.

9139. Blough, Donald S. (Brown U) **Steady state data and a quantitative model of operant generalization and discrimination.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 3-21.—Derives a model which predicts data related to generalization and discrimination among stimuli, using data resulting from a reference experiment with 6 naive male White Carneaux pigeons. A 2nd experiment with 3 experienced Ss provided data corresponding to the prediction of step-function results from the model. This steady-state procedure yielded positive, negative, and combination gradients of stimulus control on a wavelength continuum. Results are predicted by computer simulations based on a linear difference equation. The model applies to a set of stimuli that activate common elements; a gaussian weighting function controls the degree of activation of an element by any given stimulus. The model is conceptually similar to, and compatible with, a model of conditioning previously stated by R. A. Rescorla and A. R. Wagner (1972). (24 ref)—*Journal abstract*.

9140. Boakes, R. A. & Halliday, M. S. (U Sussex, Lab of Experimental Psychology, Brighton, England) **Disinhibition and spontaneous recovery of response decrements produced by free reinforcement in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 436-446.—Conducted 3 experiments with a total of 16 Holtzman albino and 48 hooded male rats. After the Ss had been trained to barpress on a variable interval schedule of reinforcement, response rates were reduced by the introduction either of extinction or of a response-independent (free) reinforcement schedule. Spontaneous recovery was consistently obtained in extinction, especially when session durations were long. Under free reinforcement conditions there was little sign of spontaneous recovery, even when with high reinforcement rates response reduction was almost as rapid as in extinction. In disinhibition tests the introduction of noise produced increased responding under free reinforcement conditions but not in extinction. Results are interpreted as demonstrating a dissociation between spontaneous recovery and disinhibition. (23 ref)—*Journal abstract*.

9141. Bronstein, Paul M.; Wolkoff, F. Dmitri & Levine, M. Jov. (Brooklyn Coll, City U New York) **Sex-related differences in rats' open-field activity.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 133-138.—Conducted 2 experiments with 8 male and 8 female juvenile Sprague-Dawley albino rats in each. Results show that females were more active than males in the open field. This relationship was not apparent during initial trials but emerged as Ss were tested repeatedly. Sex-related

differences were greatly reduced, however, if postweaning handling was restricted.—*Journal abstract.*

9142. Buerkle, Udo. (Fisheries & Marine Service Biological Station, St Andrews, New Brunswick, Canada) **Gill-net catches of cod (*Gadus morhua* L.) in relation to trawling noise.** *Marine Behaviour & Physiology*, 1974(Aug), Vol 2(4), 277-281.—More cod were caught in a gill net during periods with trawling noise than during periods without trawling noise, indicating that trawling noise stimulated increased locomotor activity among cod. (18 ref)

9143. Clarke, Margaret E. & Hupka, Ralph B. (California State U, Long Beach) **The effects of stimulus duration and frequency of daily preconditioning stimulus exposures on latent inhibition in Pavlovian conditioning of the rabbit nictitating membrane response.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 225-228.—Results of manipulating the daily frequency and duration of the preconditioning stimulus exposure in Pavlovian conditioning of the nictitating membrane response of 32 New Zealand white rabbits suggest that the intensity of latent inhibition was related to the absolute frequency of preconditioning stimulus exposure trials, and was a stepwise function of the frequency of daily preconditioning trials. Similarly, the intensity of latent inhibition was related to the absolute duration of the preconditioning stimulus exposure. However, latent inhibition accrued to the cumulative effect of all stimulus durations across days rather than only to the repetitive presentation of 1 stimulus.—*Journal abstract.*

9144. Cohen, Jerome S. & Tubaro, Giselle. (U Windsor, Ontario, Canada) **Effects of thirst drive on cue utilization and cue dominance of spatially separate cues in albino rats.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 451-453.—36 male Wistar albino rats under moderate (18 hrs/day) or high (23.5 hrs/day) water deprivation were required to learn either a central door cue or peripheral wall cue simultaneous discrimination in a 2-choice discrimination apparatus. Following this acquisition phase, a series of redundant-relevant cue trials with both door and wall cues were introduced. Ss were tested on the utilization of wall and door cues separately and on the dominance for each cue. It was found that drive level only affected original discrimination acquisition of the peripheral wall-cue task. Moderate-drive Ss were better able to learn the wall-cue discrimination than high-drive Ss. In general, door-cue learners were able to utilize both cues but showed dominance for door over wall cues. Wall-cue learners, however, were only able to utilize wall cues and showed dominance for wall over door cues.—*Journal abstract.*

9145. Collier, George; Hirsch, Edward; Levitsky, David & Leshner, A. I. (Rutgers State U, New Brunswick) **Effort as a dimension of spontaneous activity in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 89-96.—Studied the relationship between effort and voluntary activity in a braked running wheel and a voluntary treadmill. 3 experiments were conducted with a total of 60 male Sprague-Dawley rats. Effort was manipulated by varying the torque required to turn the wheel and by changing the angle of inclination of the treadmill. In both situations distance run was a linear decreasing function of effort, and work

accomplished was a nonmonotonic increasing function of effort. Findings are discussed in relation to responsivity and regulatory views of the genesis of spontaneous activity. (20 ref)—*Journal abstract.*

9146. Cone, Al L. & Teel, Parker R. (Lynchburg Training School & Hosp, VA) **Interaction of illumination with previous reinforcement history during stable FI performance.** *Psychological Record*, 1974(Fal), Vol 24(4), 511-514.—Trained 8 male Holtzman albino rats either to a high response-rate typography by an adjusting ratio technique or to a low rate typography by an adjusting interval technique before establishing stable fixed interval (FI) 60-sec performance under dim illumination. The effects of subsequent dark and bright light on FI performance were dependent on the early training procedure. It is concluded that some independent variable effects upon baseline schedules of reinforcement may actually result from interactions with previous schedules in Ss' behavioral history.—*Journal abstract.*

9147. Couch, J. V. (Madison Coll) **Reinforcement magnitude and schedule-induced polydipsia: A reexamination.** *Psychological Record*, 1974(Fal), Vol 24(4), 559-562.—Used 5 male albino Holtzman rats in a 4-phase experiment to determine the effect of reinforcement magnitude on schedule-induced polydipsia. Since previous investigations were seen as confounding reinforcement magnitude and the number of reinforcement periods, the present experiment sought to vary individually these 2 determinants of polydipsia. Unlike previous investigations, results indicate that with the number of reinforcement periods held constant, an increase in the degree of polydipsia was concomitant with an increase in the reinforcement magnitude.—*Journal abstract.*

9148. Cunningham, Christopher L. (U Oregon, Medical School, Portland) **The ultrasonic motion detector: A conditioned stimulus for rats in the CER paradigm.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 441-444.—Conducted a conditioned emotional response (CER) study with 16 female albino rats to investigate conflicting data concerning the conditioned-stimulus (CS) properties of the 40-kHz signal generated by the ultrasonic motion detector; the high-frequency signal (96-112 db) was used as the CS. Rats receiving forward pairings of the tone with shock showed progressive decreases in activity in the presence of the tone as compared to controls during off-the-baseline conditioning sessions. During the CER test session, the forward-pairings group showed reliably more suppression to the high-frequency CS. It is concluded that the ultrasonic motion detector can mediate associative response tendencies.—*Journal abstract.*

9149. Delfini, Leo F. & Fouts, Gregory T. (U Denver) **Acquisition of social facilitation in rats: A methodological study.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 807-814.—Describes a methodology to assess the effects of discrimination training on social facilitation of barpressing in rats. 12 male Sprague-Dawley albino rats were initially trained to barpress for food and then given 1 of 3 kinds of discrimination training—stimulus present (S<sup>+</sup>), stimulus absent (S<sup>-</sup>), and stimulus presented on half the trials (S<sup>0</sup>)—in a runway task. After discrimination training, Ss were again given an opportunity to barpress in the original apparatus under an extinction procedure



and were tested in the presence and absence of a stimulus rat. Ss in the S<sup>o</sup> group responded 50% less in the presence of a stimulus rat, suggesting an initial tendency for social impairment rather than facilitation in the presence of another rat. Ss in the S<sup>+</sup> group showed less social impairment than those in the S<sup>o</sup> group, with the S<sup>+</sup> group tending to respond more in the presence than absence of a stimulus rat (i.e., social facilitation). (18 ref)—*Journal abstract*.

9150. Dickinson, Anthony & Scull, John. (U Sussex, Lab of Experimental Psychology, Brighton, England) **Transient effects of reward presentation and omission on subsequent operant responding.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 447-458.—In 3 experiments a total of 12 male Lister hooded rats were run in a 2-component operant analog of the double runway in which the frequency of reward in the 1st component was varied over 0, 50, and 100%. Responding in the 2nd component was measured after either a long (60-sec) or short (3-sec) intercomponent interval (ICI). After the short ICI, 2nd-component responding was faster following nonreward than reward, while the preceding goal event had no effect after the long ICI. A comparison of performance after long and short ICIs showed that the difference at short ICIs was due solely to the depressive effects of reward which persisted well into the instrumental response sequence. (36 ref)—*Journal abstract*.

9151. Dobrovolskaya, V. N. (USSR Academy of Sciences, Pavlov Inst of Physiology, Leningrad) [Characteristics of the formation and preservation of conditioned defensive motor reflexes in the ontogeny of rats.] (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 60-67.—Performed experiments with 133 Wistar rats of both sexes in 6 age groups in an apparatus with a programed control. An avoidance reaction to a photic signal was evoked in 2 stages with a 2-mo interval between them. The rate of evocation diminished with age. There was a significant group linear connection between evocation rate and degree of preservation of traces in the nervous system during the daily learning period (30 sec or 24 hrs). Preservation of the evoked habit after a 2-mo interval increased with age up to 12 mo. In older Ss (21-24 mo) the evoked habit persisted to a lesser degree than in 12-mo-old Ss. There was a significant group reverse correlation between rate of learning and preservation of the evoked habit after the 2 mo. (24 ref)—*English abstract*.

9152. Engel, Bernard T. (Baltimore City Hosp, MD) **Electroencephalographic and blood pressure correlates of operantly conditioned heart rate in the restrained monkey.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 222-232.—Trained 4 monkeys to decrease and increase heart rate (HR). Mean blood pressure was positively correlated with HR during speeding and slowing. These correlations increased from early training to late training for all Ss during slowing, but not during speeding. Correlations between EEG changes and HR changes became more negative during the late phase of slow training but did not change reliably during speeding training. Baseline levels in all physiological functions changed as a function of stage of training. Response patterns during escape behavior

indicate dissociation of HR and blood pressure, whereas response patterns during avoidance behavior show correlation of HR and blood pressure.—*Journal abstract*.

9153. Figler, Michael H.; Mills, Carol J. & Petri, Herbert L. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Effects of imprinting strength on stimulus generalization in chicks (*Gallus gallus*).** *Behavioral Biology*, 1974(Dec), Vol 12(4), 541-545.—Effects of original imprinting strength on color and shape generalization involving other test objects were investigated in 19 male and female Warren Sex-Sal-Link chicks. Strength of imprinting was manipulated by varying the age at which Ss were initially exposed to the original imprinting stimulus. Results indicated that original imprinting strength affected generalization to color but not to shape cues. Data suggest that original imprinting strength affects the generalization process for those dimensions of the imprinting stimulus exerting strongest stimulus control over following behavior.—*Journal abstract*.

9154. Flaherty, Charles F. & Avdzej, Alexandra. (Rutgers State U, New Brunswick) **Bidirectional contrast as a function of rate of alternation of two sucrose solutions.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 505-507.—Reliable positive and negative contrast effects in lick-rate were obtained when the same 12 male Sprague-Dawley rats were exposed on some days to both a 32% and a 4% sucrose solution and on control days to only the 32% or only the 4% solution. Daily test sessions were 270-sec long, and the tubes containing the sucrose solutions alternated every 15 sec in one group and every 45 sec in another group. The Ss in the 15-sec alternation condition licked more in a daily session, but the degree of contrast, both positive and negative, was uninfluenced by rate of sucrose alternation.—*Journal abstract*.

9155. Foree, Donald D. & LoLordo, Vincent M. (Dalhousie U, Halifax, Nova Scotia, Canada) **Stimulus-reinforcer interactions in the pigeon: The role of electric shock and the avoidance contingency.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 39-46.—Assessed the importance of (a) the presence of shock and (b) the presence of an avoidance contingency in determining the control of treadle-pressing by the auditory or the visual component of a compound auditory-visual discriminative stimulus. In Exp I 6 naive male White Carneaux pigeons pressed a foot treadle in the presence of a compound stimulus to avoid extinction for keypecking, and in Exp II 4 other Ss pressed the treadle in the compound to avoid punishment of keypecking by electric shock. In both cases, treadle-pressing was predominantly controlled by the visual component of the compound stimulus. In Exp III 6 additional Ss pressed the treadle in the presence of the compound to obtain grain; intertrial responses were punished by electric shock. As in Exps I and II, treadle-pressing was controlled primarily by the visual component of the compound stimulus. It is hypothesized that the common element in the 3 procedures—the presence of food reinforcement—determined control by the visual element.—*Journal abstract*.

9156. Holland, Peter C. & Rescoria, Robert A. (Yale U) **Second-order conditioning with food unconditioned**

**stimulus.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 459-467.—3 experiments investigating 2nd-order conditioning were conducted with a total of 72 male Sprague-Dawley rats. An appetitive Pavlovian conditioning situation was employed in which the response measure was the amount of general activity. Exp I provided a well-controlled demonstration of substantial 2nd-order conditioning. In Exp II extinction of the 1st-order conditioned stimulus (CS) had no effect upon the response to the 2nd-order CS. Exp III examined the relationship of the 2nd-order conditioning paradigm to that of conditioned inhibition. Both phenomena could be observed simultaneously in the same setting. Implications for 2nd-order conditioning and related conditioning phenomena are discussed. (16 ref)—*Journal abstract*.

9157. Hornbuckle, Phyllis A. & Beall, Thomas. (Virginia Commonwealth U) **Escape reactions to the blood of selected mammals by rats.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 573-576.—15 female Holtzman rats were placed on an elevated glass surface which was coated with either Holtzman rat blood, Long-Evans rat blood, mouse blood, human blood, or distilled water. Ss' escape latencies from these substances were recorded and compared. Both strains of rat blood and the mouse blood elicited significantly faster escape latencies than the distilled water, while human blood did not. The possibility that only the blood of organisms sharing a common habitat or common predators may normally elicit escape responses is suggested.—*Journal abstract*.

9158. Hull, John H. & Myer, James S. (Kent State U) **Effects of prior discriminative stimulus and reinforcer presentation on acquisition of instrumental responding in rats.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 437-440.—Independent groups of female Long-Evans rats ( $N = 88$ ) underwent various pretraining procedures involving key light illumination and presentation of food before introduction of instrumental conditioning in which food reinforcement was immediately contingent upon pressing the illuminated key. Results show that key illumination followed immediately by food presentation produced facilitation of subsequent acquisition of instrumental responding which increased with 0, 10, 50, and 200 pretraining trials; the facilitation effect of 1,000 pairings of key illumination and food was no greater than that of 200 pairings. The facilitative effect of key illumination and food presentation upon subsequent instrumental learning was the same regardless of whether food presentations in pretraining immediately accompanied illumination offset or were delayed for 8 sec. Food presentations alone on 10, 50, or 200 pretraining trials facilitated subsequent instrumental learning less than equivalent numbers of presentations of illumination and food, but 200 presentations of food alone facilitated subsequent instrumental learning more than 0 pretraining trials.—*Journal abstract*.

9159. Huston, J. P.; Mondadori, C. & Waser, P. G. (U Zurich, Inst of Pharmacology, Switzerland) **Facilitation of learning by reward of post-trial memory processes.** *Experientia*, 1974, Vol 30(9), 1038-1040.—Investigated the effect of operant conditioning rewards on the period of memory consolidation in albino mice. 927 Ss, some previously deprived of food, were trained in the 1-trial

passive avoidance step-down task and given a food reward at various times after the learning trial. 24 hrs later, step-down latencies were re-recorded. Results indicate that rewards given after 20, 30, and 50 sec showed significantly longer latencies ( $p < .001$ ). At 60- and 80-sec delays, the reward had the opposite effect. It is concluded that the administration of a reward at a critical period after a passive avoidance trial facilitates performance upon recall. (German summary) (30 ref)—*R. Tomasko*.

9160. Jackson, Donald E. (Eastern Michigan U) **CS-free food contingencies and subsequent acquisition of conditioned suppression: No transfer effect.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 235-236.—Conducted a study of 32 male albino Sprague-Dawley rats to test the generality of the transfer-of-control phenomenon, using Ss in a conditioned suppression paradigm. Following VI training for food, 32 rats received 12 conditioned stimuli (CSs)—levers retracted—over 2 days, during which 3 of 4 groups received free food. CS-free food contingencies were positive, negative, or absent; the 4th group received CSs alone. Subsequent conditioned emotional response (CER) acquisition (3 days) on the baseline reveal only a significant trials effect.—*Journal abstract*.

9161. Kehoe, E. James & Gormezano, I. (U Iowa) **Effects of trials per session on conditioning of the rabbit's nictitating membrane response.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 434-436.—Conducted a study of 48 albino rats to determine the effects of 1, 5, 10, and 50 conditioning trials per session on classical conditioning of the rabbit's nictitating membrane response. It was found that single-trial sessions produced more rapid increases in conditioned response (CR) frequency across trials and required fewer trials to attain criterion performance than multiple-trial sessions. The finding of a superiority of single-trial sessions on CR acquisition is discussed with regard to traditional accounts of trial distribution effects on learning (i.e., reactive inhibition, stimulus sampling, and consolidation hypothesis), as well as with regard to stimulus variability accounts. (16 ref)—*Journal abstract*.

9162. Keith-Lucas, Timothy & Guttman, Norman. (U of the South) **Robust-single-trial delayed backward conditioning.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 468-476.—80 female albino rats, shocked once while eating in the presence of a novel stimulus panel, were exposed to a complex stimulus object after a blackout period of 1-40 sec. 40 other Ss served as controls. The next day Ss were observed in a test for differential avoidance of the shock location, the forward-order conditioned stimulus (CS) and the backward-order CS. On the basis of 5 different classes of behavior, Ss in the 1-, 5-, and 10-sec blackout groups avoided the backward-order CS rather than the shock location or the forward-order CS. The association does not appear to be based primarily on temporal sequence or the signaling relationship involved in Pavlovian conditioning. Instead, it appears that the association is dependent on the specific nature of the stimuli, possibly reflecting an evolved learning capability for associating noxious exteroceptive stimuli with predatorlike objects. (22 ref)—*Journal abstract*.



9163. Mager, P. P. (U Greifswald, Inst für Pharmakologie, E Germany) A note on the autoregressive process during the conditioned avoidance response in rats. *Experientia*, 1974, Vol 30(2), 154-155.—Trained 6 Drucker rats to avoid a 50-V footshock using a tone (conditioned stimulus; CS) and intertrial intervals of 10-90 sec. Reaction time (RT) from CS to avoidance was measured, and noncircular serial correlation coefficients of mean RT in each session were determined. Significant autocorrelations were found only during Days 4-7 of the 14-day training. This is interpreted as indication of 2 oscillatory processes occurring during conditioned avoidance response—one of spontaneous background activity in the central nervous system and the other a consolidation phase indicated by autoregressive periodicity on Days 4-7. It is proposed that unspecific activity is reduced during this phase to a level that makes optimum learning possible. (German summary)—C. Wright.

9164. Marrazo, Martin J. & Riccio, David C. (VA Hosp, Psychological Services, Albany, NY) Effects of location of response prevention upon extinction of instrumental avoidance in young and adult rats. *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 521-523.—Following acquisition of an avoidance response in a straight alley, 30 young and 30 adult male Holtzman rats received response prevention (blocking) either in the startbox or in the runway. For adults, both blocking locations yielded facilitated extinction compared with unblocked (regular extinction) controls, but blocking in the startbox was significantly more effective. In young Ss, only the startbox blocking condition reliably reduced later resistance to extinction.—*Journal abstract*.

9165. Matysiak, Jan; Jankowski, Kazimierz; Knoll, Elzbieta & Maszkiewicz, Krystyna. (Inst of Psychology, Children's Neuropsychiatric Sanatorium, Garwolin, Poland) [The effect of the kind of reinforcement during toilet training on dogs' behavior in a novel situation.] (Poln) *Przegląd Psychologiczny*, 1973, Vol 16(1), 19-28.—Divided 10 littermates into 2 equal groups by matching the frequency of their use of a litter-box. During 30 days of training 1 group was only rewarded for using the litter-box by patting and a piece of meat, and the other was in addition punished for not using it, 1st by a blow of air into the ear, and later by a rap of a rubber hose. The 2nd group decreased the number of errors only in the 3rd 10 days of training. After training, both groups showed signs of fear at sight of the rubber hose. The 2nd group had significantly longer latencies of advancing into an unknown area, and covered shorter distances than the 1st group. (English & Russian summaries)—I. Divac.

9166. Meltzer, Donald & Hamm, Robert J. (Southern Illinois U, Carbondale) Conditioned enhancement as a function of the percentage of CS-US pairings and CS duration. *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 467-470.—Trained 18 male hooded rats to barpress on a variable-interval 90-sec schedule of sucrose-solution reinforcement. Ss were then divided into 3 groups of 6 and exposed to a classical conditioning contingency while barpressing, in which a 2-min light conditioned stimulus (CS) preceded the delivery of a

food pellet unconditioned stimulus (UCS) on either 100, 66, or 33% of the CS presentations. When the response rate during the CS was compared to response rate prior to the CS, it was found that the CS response rate was directly related to the percentage of UCS presentation. When the CS duration was changed to 8 sec, the highest CS response rates were associated with the partial pairing of CS and UCS. (16 ref)—*Journal abstract*.

9167. Miller, Laurence. (Western Washington State Coll) Compounding of discriminative stimuli from the same and different sensory modalities which maintain responding on separate levers. *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 426-428.—29 male Holtzman albino rats barpressed for food during light or tone or 2 separate lights. Each stimulus maintained responding on a separate lever. In Phase 1, 1 lever and its correlated stimulus appeared during a session. In Phase 2, both levers were concurrently exposed and each stimulus appeared. Results show that when light and tone were combined in Phase 1, responding increased with either lever exposed. Responding also increased during compounding in Phase 2, but nearly all responses occurred on the light-correlated lever. When the 2 lights were combined in Phase 1, no change in responding occurred with either lever present, regardless of the intensity of each light. No change in responding also occurred during compounding in Phase 2 with lights of different intensity. However, responding increased significantly with lights of equal intensity. There was no significant difference in the number of responses emitted on each lever with either set of intensities.—*Journal abstract*.

9168. Mineka, Susan & Seligman, Martin E. (U Wisconsin) Conditioned drinking as avoidance learning. *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 69-80.—Conducted 4 experiments with a total of 104 male Sprague-Dawley albino rats. Blocking the robust conditioned drinking response following conditioning eliminated the isotonic procaine conditioned response (CR) but not the hypertonic procaine CR. Ss allowed to drink in the box during conditioning formed a larger CR than Ss merely injected with hypertonic or isotonic procaine who were prevented from drinking in the box: response blocking during extinction eliminated the latter CR. The CR to hypertonic procaine could also be eliminated if no experience of drinking water in the box occurred either during baseline or during conditioning. Blocking the drinking response, like blocking shock avoidance, markedly reduced its high resistance to extinction. Results suggest that rats overdrink to avoid anticipated illness, and fail to extinguish partially because they are never exposed to the fact that no illness will occur even if no drinking occurs.—*Journal abstract*.

9169. Mitchell, Denis; Kirschbaum, E. H. & Perry, Roseanna L. (U Washington) Effects of neophobia and habituation on the poison-induced avoidance of exteroceptive stimuli in the rat. *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 47-55.—Gave 20 male Long-Evans rats in Exp 1 either 10 or 25 days of habituation to the test situation prior to conditioning. Those Ss with the longer habituation period avoided a complex of novel exteroceptive

stimuli while those with the shorter habituation period did not. In Exp II 30 Ss initially avoided the more novel of 2 containers but gradually came to eat equal amounts from both. A single pairing of toxicosis with consumption from either the novel or the familiar container reinstated the avoidance of the novel container in both cases. Results suggest that previously reported differences between interoceptive and exteroceptive conditioning effects may have been influenced by the differential novelty of the 2 classes of stimuli in the test situation. It is further suggested that noncontingently poisoned control groups should routinely be included in poison avoidance conditioning studies. (43 ref)—*Journal abstract*.

9170. Moot, Seward A.; Nelson, Kelly & Bolles, Robert C. (U Washington) **Avoidance learning in a black and white shuttlebox.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 501-502.—Studied possible reasons for the poor avoidance performance of rats in a heterogeneous black-white shuttlebox reported by R. G. Weisman et al (see PA, Vol 41:4306). Little evidence of this decrement was found when 24 female Long-Evans rats were free to make intertrial responses. There was a general deficit in learning when a door was used to prevent intertrial responding, however, and this deficit was greater when the Ss were confined in the black-white apparatus.—*Journal abstract*.

9171. Myerson, Joel. (U California, Berkeley) **Lever-pecking elicited by signaled presentation of grain.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 499-500.—In an experiment with 1 White Carneaux pigeon, the pairing of a keylight with food elicited downward-pecking movements directly in front of the key. These pecks were recorded, using an appropriately positioned lever. Leverpecks and keypecks, which developed later, were maintained by stimulus-reinforcer pairings; occurrence of either response extended the trial duration and postponed food, thereby precluding adventitious reinforcement. Results suggest that movements, approach to the key, and keypecking may be considered 3 distinct response classes, because approach to the key does not insure that ongoing pecking will be directed at it.—*Journal abstract*.

9172. Parker, Adrian. (U Edinburgh, Scotland) **ESP in gerbils using positive reinforcement.** *Journal of Parapsychology*, 1974(Sep), Vol 38(3), 301-311.—Trained 3 gerbils in a task involving a choice between 2 keys, one of which produced a reward of sunflower seeds if pressed. Determining which of the 2 keys (right or left) would yield a reward was completed automatically by a random sequence of holes and spaces on a paper-punch tape. Random behavior trials (RBTs) were defined to be trials in which the S changed to the other key from that key on which it had been rewarded in the previous trial. It was found that the Ss obtained significantly more than the chance number of rewards in both RBTs and non-RBTs. The scoring rate in overall trials was 52.6%, with RBTs producing a slightly higher scoring rate (55%) than non-RBTs (52%).—*Journal abstract*.

9173. Pliskoff, Stanley S. & Gollub, Lewis R. (U Maine, Orono) **Confidence lost and found, or, Is the organism always right?** *Psychological Record*, 1974(Fal), Vol 24(4), 507-509.—Discusses some previous data

obtained by the authors in an operant keypecking experiment with 2 pigeons. Data from 1 pigeon appeared routine, while that from the 2nd pigeon showed no rate change. Reasons for the peculiar data are offered, and it is concluded that the organism is always right.

9174. Porter, Richard H. & Treadway, Jerry T. (George Peabody Coll, John F. Kennedy Ctr for Research on Education & Human Development) **Effects of previous exposure on olfactory discrimination in *Acomys cahirinus*.** *Nature*, 1974(May), Vol 249(5453), 157-158.—Studied the effects of previous exposure to one or both olfactory discriminanda upon subsequent discrimination of olfactory stimuli. 8 nocturnal mice in each of 3 treatment conditions were studied. Groups were exposed to one, both, or neither of the olfactory stimuli for 7 days before the time of testing. During discrimination testing, the 2 odors were blown into opposite ends of the runway, and 2 small food cups containing a piece of apple as a reward were placed into the runway, one at each end. To obtain the apple reinforcement, the mouse had to approach the appropriate odor of the 2 being emitted into the T maze. Results indicate that spiny mice learn to discriminate between a familiar and novel odor faster than they learn to discriminate between 2 unfamiliar odors. Possible explanations are discussed with reference to other relevant literature and research.—R. S. Albin.

9175. Rescorla, Robert A. & Heth, C. Donald. (Yale U) **Reinstatement of fear to an extinguished conditioned stimulus.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 88-96.—Conducted 4 experiments with a total of 120 male Sprague-Dawley rats, the results of which demonstrate the ability of an unconditioned stimulus (UCS) presentation following extinction to partially reinstate the conditioned response. These experiments are interpreted in terms of the strengthening of an extinction-reduced UCS representation. The 1st 2 experiments offer alternative interpretations in terms of sensitization, reinstating the stimulus conditions of acquisition, conditioning of background cues, and stimulus generalization. Exp III suggests that reinstatement is possible with a UCS qualitatively different from that used in conditioning. Exp IV explored an alternative extinction procedure which preserved the conditioned stimulus-unconditioned stimulus association while encouraging modification of the UCS representation. Results are discussed both in terms of related empirical phenomena, such as spontaneous recovery and sensory preconditioning, and in relation to the general role of the UCS representation in conditioning. (17 ref)—*Journal abstract*.

9176. Revusky, Sam. (Memorial U Newfoundland, St John's, Canada) **Long-delay learning in rats: A black-white discrimination.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-B), 526-528.—Rats can associate between events separated by intertrial intervals as long as several hours. For instance, they can learn that the type of food reward on one trial in a runway is correlated with whether running will be rewarded on the following trial. They also can learn that they will be rewarded if they alternate responses in a T-maze. In the otherwise similar experiments reported here, more traditional discriminative stimuli were used with 4 female



Sprague-Dawley rats. Whether running down a runway was to be rewarded with sugar solution depended on whether the goalbox on the preceding trial, over 4 min ago, had been white or black. The Ss learned this discrimination and retained it through an extinction phase.—*Journal abstract.*

9177. **Schachter, Stanley & Rodin, Judith. Obese humans and rats.** Potomac, MD: Lawrence Erlbaum, 1974. ix, 182 p. \$10.95.—14 papers review and present new findings on the behavioral similarities of obese humans and animals whose ventromedial hypothalamic nuclei (the "feeding center") have been lesioned. A theoretical framework which synthesizes animal and human data is presented which suggests that the relationship of cue prominence and probability of response is stronger for the obese than for normals. (6% p ref)

9178. **Shettleworth, Sara J.** (U Toronto, Ontario, Canada) **Reinforcement and the organization of behavior in golden hamsters: Hunger, environment, and food reinforcement.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975 (Jan), Vol 104(1), 56-87.—The effects of food deprivation, feeding regime, exposure to a strange environment, and free food on the behavior of a total of 46 hamsters were studied in 3 experiments. Behavior was recorded as 20-24 mutually exclusive, exhaustive action patterns (APs). Certain APs, chiefly those involving locomotion and active contact with the environment, increased in food-deprived Ss near feeding time while others, including grooming APs and scent marking, were depressed. In Exp IV additional, hungry Ss were reinforced with food for accumulating time performing 1 of 6 of the APs. 3 showed large immediate increases in rate and tended to increase in bout length. The other 3 showed at best small delayed increases in rate and tended to decrease in bout length. The APs that showed large effects of food reinforcement were facilitated by hunger in the 1st 3 experiments, and those that showed small effects were depressed. An incentive-motivational mechanism is suggested in which the classically conditioned component facilitates only behaviors appropriate to anticipation of the reinforcer rather than any reinforced response, as is usually assumed. (60 ref)—*Journal abstract.*

9179. **Siegel, R. K. & Jarvik, M. E.** (U California, Los Angeles) **Learning in the land snail (*Helix aspersa* Müller).** *Bulletin of the Psychonomic Society*, 1974 (Nov), Vol 4(5-A), 476-478.—Discusses 2 experiments which demonstrate avoidance learning in land snails ( $N = 40$ ). Exp I utilized the snail's negative geotaxis and its chemoreceptive characteristics, and required the Ss to climb a vertical pole which contained a quinine-saturated loop of thread at the top. Exp II substituted electric shock loops for the quinine. Ss in both experimental groups manifested progressively increasing climbing latencies and avoidance responses throughout 5 successive training sessions and a 1-wk retention test. Control Ss which received noncontingent quinine or shock did not show evidence of learning. Results provide evidence of rapid avoidance learning in gastropod mollusks.—*Journal abstract.*

9180. **Smith, Stanley G. & Davis, W. Marvin.** (U Mississippi) **Punishment of amphetamine and morphine**

**self-administration behavior.** *Psychological Record*, 1974 (Fall), Vol 24(4), 477-480.—Studied the effectiveness of shock punishment on self-administration of morphine and amphetamine in 2 groups of 14 adult male Holtzman rats. Each group was reinforced for leverpresses in a Skinner box first with saline and then by either a 60 mcg/kg dose of morphine or amphetamine sulfate. Punishment contingencies were introduced after the last 3-hr acquisition period; 3 acquisition and 3 punishment sessions were used for each group of Ss. Results indicate that shortly following initial acquisition of the behavior, the punishment contingency quickly suppressed self-administration of the 2 drugs. Implications for treatment of self-administration of drugs in humans are discussed.—*L. Gorsey.*

9181. **Solomon, Paul R.; Brennan, George & Moore, John W.** (U Massachusetts, Amherst) **Latent inhibition of the rabbit's nictitating membrane response as a function of CS intensity.** *Bulletin of the Psychonomic Society*, 1974 (Nov), Vol 4(5-A), 445-448.—Reports results of 2 experiments with a total of 80 New Zealand rabbits. In Exp I a series of 450 pre-exposures to a tone conditioned stimulus (CS) retarded subsequent conditioning of the Ss' nictitating membrane response. Retardation relative to non-pre-exposed controls was observed with strong (95 db) as well as weak (75 db) tones. A subsequent experiment involving summation tests in which the tone was compounded with an excitatory (light) CS as a function of tone intensity suggested that pre-exposure resulted in a loss of salience rather than active inhibition.—*Journal abstract.*

9182. **Spatz, H. Ch.; Emanns, A. & Reichert, H.** (U Freiburg, W Germany) **Associative learning of *Drosophila melanogaster*.** *Nature*, 1974 (Mar), Vol 248(5446), 359-361.—Attempted to demonstrate associative learning in *Drosophila melanogaster* as the basis for a genetic study of the mechanism of information acquisition and storage. *Drosophila* strains wild type (Berlin) and ebony, aged between 1 and 10 days after eclosion, were kept on standard media. For each run, approximately 300 Ss were placed in the starting unit of a T maze, from which they could move freely into a training alley consisting of 2 narrow funnels capable of administering electroshock and of exposing the Ss to an intense blue or yellow light. After passing through the training alley the Ss reached a T unit where they could choose to proceed through a blue or through a yellow funnel constructed and illuminated exactly as in the training alley. Comparison of the behavior of the shocked test groups and the unshocked control group indicates that both *Drosophila* strains avoided the optical stimuli ( $P < .01$ ). It is concluded that the Ss did learn to associate the lights with electroshocks.—*B. Lindsey.*

9183. **Sutherland, C. J. & Zbrozyna, A. W.** (U Birmingham, Medical School, England) **Extinction of the vasodilator component of the defense reaction in the cat.** *Experientia*, 1974, Vol 30(1), 49-50.—Investigated the extinction of the vasodilator response of the cat to threatened aggression. 3 cats were exposed to repeated visual confrontation with a threatening dog for 6 days. Visual observations of the Ss' behavior were correlated with measurements of arterial blood pressure, external iliac blood flow, heart rate, electromyographic activity in

the hindlimb, and the respiratory rate. The Ss' threatening posture continued with undiminished intensity throughout the 6 days, though by the 4th day vasoconstriction rather than vasodilation appeared in the hindlimb. Results indicate that muscle vasodilation was the easiest component of the cat's defense reaction to be extinguished, as long as no noxious stimulation followed the conditioned visual stimulus. (French summary)—R. Tomasko.

9184. Taylor, George T. (State University Coll New York, Potsdam) **Discriminability and the contrafreeloading phenomenon.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 104-109.—According to previous reports of the contrafreeloading phenomenon, animals will work for a reward, and sometimes work quite hard, in the presence of the same reward available freely. Results of the present 2 experiments with a total of 21 male Holtzman albino rats suggest that the contrafreeloading data are explainable with a basic learning principle, discriminability, and its accompanying response decrement. For some Ss the change in stimulus conditions with introduction of free water was made more highly discriminable by a change in earned reinforcement conditions. The other Ss remained on the same earned reinforcement conditions under which all the Ss had been trained. Findings demonstrate that the discriminability between the conditions of working and freeloading was a most important factor contributing to the continued responding in the presence of free rewards. (18 ref)—*Journal abstract*.

9185. Tennant, W. A. & Bitterman, M. E. (U Hawaii) **Blocking and overshadowing in two species of fish.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 22-29.—In Exp I a mixed blocking-overshadowing effect of color on an auditory discrimination was demonstrated in 13 goldfish. In Exp II (with lines differing in color and angle), blocking of angle by color and of color by angle was demonstrated in 12 additional goldfish. In Exp III (again with lines differing in color and angle), overshadowing of angle by color was demonstrated in 12 carp, but these, like goldfish, failed to show greater intra- than extradimensional transfer. Results are consistent with the hypothesis that blocking and overshadowing are general phenomena of vertebrate learning. They suggest that the processes responsible for blocking and overshadowing are different from those which produce the dimensional transfer effect.—*Journal abstract*.

9186. Topping, Jeff S. & Ford, Thomas W. (Mississippi State U) **Response elimination with DRO and extinction: A within-subject comparison.** *Psychological Record*, 1974(Fal), Vol 24(4), 563-568.—3 male White King pigeons initially received nondifferential reinforcement training for keypecking on a 3-component multiple schedule, with identical variable-interval 30-sec schedules in effect in each component. Following response rate stabilization in each component, the reinforcement contingencies were changed in 2 components. In one, reinforcement occurred whenever a response was not emitted for a designated time interval; in the other, reinforcement was no longer available. Responding was eliminated faster with the differential-reinforcement (DRO) schedule than with extinction in all Ss, and

response rates above baseline consistently developed in the unaltered component. Findings from a retention test indicate that response elimination was very durable with DRO, whereas spontaneous recovery occurred with the extinction schedule.—*Journal abstract*.

9187. Wasserman, Edward A. & Molina, Enrique J. (U Iowa) **Explicitly unpaired key light and food presentations: Interference with subsequent auto-shaped key pecking in pigeons.** *Journal of Experimental Psychology: Animal Behavior Processes*, 1975(Jan), Vol 104(1), 30-38.—Previous research has shown that prior training involving explicitly unpaired key light and food presentations later interferes with autoshaping the pigeon's keypeck. The present 3 experiments with a total of 34 naive pigeons identified 2 separable characteristics of this interference: delayed initiation of keypecking and reduction in the postacquisition level of keypecking. The 1st characteristic was specific to the pretraining stimulus but the 2nd was not. Findings are discussed in terms of conditioned inhibition and learned laziness. (23 ref)—*Journal abstract*.

9188. Wiltz, Robert A. et al. (Comprehensive Mental Health Board of Central Illinois, East Peoria) **Generalization gradients and combined-stimulus control after equal training with two related stimuli: II. Effects of "errorless" training: III. Effects of chlorpromazine.** *Psychological Record*, 1974(Fal), Vol 24(4), 449-468.—For 2 groups of 8 male White Carneaux pigeons, each of 2 differentially positioned stimulus lamps were correlated with identical reinforcement schedules, and the absence of both lamps signalled extinction. Keypecking responses of 1 group were brought under stimulus control by a procedure which initially resulted in many "errors." The 2nd group's responses were brought under control by a "fading" procedure, and few errors occurred. In Exp I both the intermediate stimulus and the combined stimuli controlled higher response rates than the single training stimuli, and other stimuli controlled lower rates. In Exp II, chlorpromazine reduced responding during the stimuli correlated with reinforcement but had no effect on responding during the stimulus signalling extinction. Results emphasize the importance of terminal performance as a variable in "errorful" vs errorless discrimination learning. (27 ref)—*Journal abstract*.

9189. Wong, Roderick & Oguzsoff, Susan. (U British Columbia, Vancouver, Canada) **Note on sex difference, early experience and food intake in rats.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 841-843.—Long-Evans hooded rats which received either pre- or postweaning stimulation were compared with controls for 11 days on a 10-min feeding test. Results indicate that although males consumed more wet mash than females, the nonstimulated controls ate as much as did Ss in the 2 experimental groups. When body weight differences between the sexes were taken into account in the analysis, the food consumption of female Ss was found to be equivalent to that of the males. (26 ref)—*Journal abstract*.

### Social & Sexual Behavior

9190. Bauer, R. & Kramer, B. (CNRS, Lab de Physiologie Nerveuse, Gif-sur-Yvette, France) **Agonistic**



behaviour in mormyrid fish: Latency: Relationship between the electric discharges of *Gnathonemus petersii* and *Mormyrus rume*. *Experientia*, 1974, Vol 30(1), 51-52.—Studied the role of electric organ discharge in communication by examining the latency relationship between the pulses of a *G. petersii* and an intruding *M. rume*. A successive 5 day series of experiments was performed using a tank with 120 wires forming a regular array on each of the 6 surfaces. The potentials resulting from each of the fishes' discharges were amplified and displayed on an oscilloscope. The *G. petersii* responded to the *M. rume*'s exteroceptive electric stimulus, as perceived through its electroreceptors, by an electric organ discharge within 11 msec. This observation indicates the existence of an extremely rapid reflex arc. (German summary)—*R. Tomaska*.

9191. Bernstein, Irwin S.; Gordon, Thomas P. & Rose, Robert M. (U Georgia) Aggression and social controls in rhesus monkey (*Macaca mulatta*) groups revealed in group formation studies. *Folia Primatologica*, 1974, Vol 21(2), 81-107.—Investigated formation of 5 groups of rhesus macaques totalling 132 Ss. Groups were formed both by introducing individuals and by merging established groups. Initial exploration was followed by agonistic (aggressive and submissive) behavior. Adult males were most aggressive in initial fighting, but few serious wounds resulted and contact aggression waned rapidly. Frequency of agonistic behavior by females gradually increased and eventually exceeded that of males. Defeated, nonresisting Ss were attacked principally by females. Rank stability was greater among females than males. Merging of established groups resulted in inversion of dominance rank of several males. All-male groups were formed with little injury and fighting, but the addition of females increased the frequency of aggression, in part by their enlistment of males to attack other males. Fighting among males was not due to sexual competition. Ss raised in social isolation were unable to form a cohesive social unit. Initial agonistic interactions established the social order of emerging groups. As groups organized, extreme forms of aggression disappeared and frequency of aggression declined. Social mechanisms which inhibit aggression appear to be inherent in the organization of macaque groups. (25 ref)—*W. K. Redican*.

9192. Chase, Ivan D. (Dartmouth Coll) Models of hierarchy formation in animal societies. *Behavioral Science*, 1974(Nov), Vol 19(6), 374-382.—Discusses 2 models—round robin and correlation—that have been proposed to explain the process of hierarchy formation. It is demonstrated that both models require stringent mathematical conditions to predict linear and near-linear hierarchies, and that available data indicate that these conditions are not met. Most of the data cited are from studies of dominance in chickens, but it is suggested that the same mathematical conditions are necessary to generate linear and near-linear hierarchies by the round robin and correlational models in any species.—*Journal abstract*.

9193. Cone, Al L. (Lynchburg Coll) Maternal retrieving behavior in rats as predicted by locomotor activity and weight of six-day-old pups. *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 233-234.—Exam-

ined several characteristics of 88 6-day postpartum rat pups to determine whether any combination of characteristics permitted reliable prediction of the retrieval behavior of 10 primiparous Charles River albino rat mothers. On the 6th day postpartum, retrieval latencies, body weights, and 2 activity measures were quantified for the pups. Sex of the pups was identified on the 22nd day and stepwise linear regression analyses were performed. Results show that if individual differences among mothers were ignored, the best predictor of retrieval latency was pup activity—mothers retrieved their less active pups faster; if individual differences were held constant, mothers retrieved their lighter pups faster. These findings are in contrast to studies in which inactivity was experimentally produced by killing or sedating the pups as well as to popular legends which assert that mother animals give preferential treatment to their stronger pups.—*Journal abstract*.

9194. Dewsbury, Donald A. & Lovecky, Deirdre V. (U Florida) Copulatory behavior of old-field mice (*Peromyscus polionotus*) from different natural populations. *Behavior Genetics*, 1974(Dec), Vol 4(4), 347-355.—Compared the copulatory behavior of *Peromyscus polionotus* from South Carolina and from Santa Rosa Island, Florida, with that of *P. polionotus* from the Ocala National Forest, Florida. 12 male and 16 female South Carolina mice received 71 tests, and 5 male and 3 female Santa Rosa mice received 18 tests. The basic pattern was identical across all 3 samples, being characterized by no lock, no intravaginal thrusting, multiple intromissions, and multiple ejaculations. Prolonged intromissions followed organized ejaculatory series. Quantitative differences among samples were found for several measures. Intromission frequency appears particularly susceptible to local variation. Between-population differences in copulatory behavior appear to be of a quantitative rather than a qualitative nature.—*Journal abstract*.

9195. Fox, M. W.; Lockwood, R. & Shideler, R. (Washington U) Introduction studies in captive wolf packs. *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1), 39-48.—Introduced 1-yr- and 3-yr-old wolves of different rank and sex into the home cage of 2-yr-old wolves of known rank. Reverse tests were also run (resident test wolf placed in stranger's home cage). High-ranking residents were more aggressive than low-ranking residents toward strangers; the resident alpha female was most aggressive toward strangers (even in the latter's home cage) and when paired with the alpha male from her pack, tended to potentiate (incite) his aggression toward strangers. Yearling wolves showed more fear and defensive aggression than 3-yr-olds, some of the latter showing attack-inhibiting "passive indifference." Alpha male and female yearlings, in the presence of an aged leader wolf in their home cage, were dominant over 2-yr-olds, but when alone in the latter's cage, were subordinate. The possibility of 2 separate groups or packs having the potential for integration through each having a social bond with 1 old wolf is considered. (German summary)—*Journal summary*.

9196. Grotta, Lee J. & Ader, Robert. (U Rochester, Medical Ctr) Behavior of lactating rats in a dual-chambered maternity cage. *Hormones & Behavior*, 1974(Dec), Vol 5(4), 275-282.—Videotape sampling of

the behavior of female Charles River rats in a dual-chambered apparatus indicated that the continuous monitoring of the amount of time a mother spent in the cage with its litter could be taken as a valid reflection of maternal behavior. Nursing was the principal behavior of lactating females while in the compartment with their litters; lying still, consummatory behavior, and activity occurred with greater frequency in the cage away from the litter. Both the time that mothers spent with their litters and their nursing behavior displayed a 24-hr rhythm with crest values occurring during the period of light.—*Journal abstract.*

9197. Hill, James L. (Michigan State U) **Peromyscus: Effect of early pairing on reproduction.** *Science*, 1974(Dec), Vol 186(4168), 1042-1044.—Sibling mating in 4 groups of bisexual pairs of deer mice (*Peromyscus maniculatus bairdi*) resulted in poor reproductive performance. Siblings paired before puberty exhibited delayed reproduction when adult. It is concluded that a behavioral mechanism is involved in this reproductive delay, since prepubertal familiarity also delayed reproduction in nonsibling pairs. Such a reproductive delay may act to reduce inbreeding depression and regulate population growth. (17 ref)—*Journal abstract.*

9198. Howard, John W. (U Oregon) **Dominance and relation coloration in green sunfish, *Lepomis cyanellus*.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 559-565.—Established 6 green sunfish as residents of a community aquarium and observed dominance relationships. Independent judges rated relative coloration of the fish, and comparisons were made between coloration and dominance rank. When dominance rank was manipulated by exposing the most dominant fish to larger fish in another tank, then replacing him in the study tank, relative coloration correlated perfectly with dominance rank. "Food dominance" was independent of size, coloration, and spatial dominance.—*Journal abstract.*

9199. Hull, Elaine M.; Chapin, Elizabeth & Kastaniotis, Chris. (State U New York, Buffalo) **Effects of crowding and intermittent isolation of gerbils (*Meriones unguiculatus*).** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 723-727.—50 female and 46 male gerbils were reared from weaning to adulthood in mixed-sex paired, crowded, or isolate-crowded conditions, the latter consisting of placing crowded Ss into individual boxes for 2 hrs/day. Paired males exhibited more ventral marking and nonaggressive contact in social interaction tests; paired females were far more successful reproductively than either crowded group. Isolate-crowded males were more aggressive in the home cage and in social interaction tests, and isolate-crowded females were somewhat less successful reproductively than crowded females. The only anatomical or biochemical differences among groups were heavier testes in paired males and heavier body weights in crowded males. Reproductive failure and decreases in behavioral measures were not mediated by adrenal steroids. The isolate-crowded conditions aggravated the effects of crowding, rather than decreasing them. (22 ref)—*Journal abstract.*

9200. Lamb, Michael E. (Yale U) **Physiological mechanisms in the control of maternal behavior in rats: A review.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 104-119.—Examined the evidence derived from 2 types

of studies—those employing lesion techniques and those manipulating hormonal levels. The hormone studies suggest that prolactin, progesterone, and estrogen—and maybe another, as yet unidentified substance—play a coordinated role in the initiation of maternal behavior. Though the lesion studies are inconclusive, the evidence suggests that lesions of the hypothalamic-pituitary system, which maintains the hormonal balance, produce deficits in the motivational aspects of maternal behavior, whereas lesions of the limbic system produce deficits in the integration and organization of the behavior. It is suggested that researchers specify the deficits they find and assess the possible disruption of other behavior patterns, so that valid conclusions can be reached about functional specificity in the control of maternal behavior. (145 ref)—*Journal abstract.*

9201. Lippert, Wolfgang. (Tierpark, Berlin, E Germany) **[Observations on behavior during pregnancy and birth in orang-utans (*Pongo pygmaeus*) at Tierpark, Berlin.]** (Germ) *Folia Primatologica*, 1974, Vol 21(2), 108-134.—Describes pregnancies and births among 5 female Sumatran orang-utans in a zoo. Genital swelling (edema of labia majora) appeared 28-40 days after the absence of a menstrual period, and it increased as pregnancy progressed. Fluctuating labor pains were evident 8 days before birth. A spontaneous and a very difficult birth are described in detail. Estimates of birth date based on appearance of genitalia were more accurate than those based on menstrual cycles. (15 ref)—*English summary.*

9202. McLean, R. B. (Florida State U) **Direct shell acquisition by hermit crabs from gastropods.** *Experientia*, 1974, Vol 30(2), 206-208.—Describes the observed acquisition by hermit crabs of new shells from gastropods just killed by natural predators. A dominance hierarchy was noted among 4 species of hermit crabs in the acquisition process. A chemical stimulant eliciting harassment behavior is posited.

9203. Möglich, M.; Maschwitz, U. & Hölldobler, B. (U Frankfurt, Frankfurt am Main, W Germany) **Tandem calling: A new kind of signal in ant communication.** *Science*, 1974(Dec), Vol 186(4168), 1046-1047.—Observation of *Leptothorax acervorum*, *L. muscorum*, and *L. nylanderii* revealed that these species recruit nest mates to a new food source by tandem running, with only 1 nest mate being recruited at a time. This technique is initiated by a special "tandem calling" behavior; the recruiter slants its gaster upward and discharges poison gland secretions from the extruded sting. Nest mates are attracted, and as soon as one of them touches the calling ant, tandem running starts. Further details of the full recruitment sequence are provided. Evidence is presented to suggest that tandem running is the evolutionary precursor of odor-trail communication and sex attraction within certain phylogenetic lines of myrmicine ants.—*Journal abstract.*

9204. Parzefall, Jakob. (U Hamburg, Zoologisches Inst und Museum, W Germany) **[Reduction of aggressive behavior patterns in a cave form of *Poecilia sphenops* (Pisces, Poeciliidae).]** (Germ) *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1), 66-84.—In contrast to 2 epigeal populations, males in 3 populations of the cave form of *Poecilia sphenops* showed a gradual



reduction of aggressive behavior although their optic orientation was apparently undisturbed. Breeding the cave form fish in daylight or rearing them with epigeal-form fish had no effect on aggressiveness. On coming into contact with the epigeal form, the cave form usually reacts with sexual behavior. In darkness the epigeal population does not exhibit any aggressive behavior except tailbiting. Presumably the aggressive behavior in *P. sphenops* depends mainly on optic release mechanisms. In the cave biotope this behavior obviously lost its biological significance and could then be reduced. The process of reduction is explained by the absence of selectional pressures preserving aggression. (25 ref)—*English summary*.

9205. Polsky, Richard H. (Uffculme Clinic, Ethology Lab, Birmingham, England) **Hunger, prey feeding, and predatory aggression.** *Behavioral Biology*, 1975(Jan), Vol 13(1), 81-93.—Reviews the research, discussing specifically the effects hunger and prey feeding have on the development and maintenance of the mammalian killing response. Findings are dichotomized into those which suggest a positive relationship between these 2 variables and killing, and those which negate a relationship. Those findings which suggest no relationship are drawn from the neurophysiological literature as well as from research which shows that experienced killers will kill in surplus, that the act of killing does not potentiate feeding, that nonkillers cannot be induced to kill through starvation, that experienced killers may not eat the prey after their first kills, and that experienced killers do not have to feed on the prey in order to maintain the killing response. Findings suggest that killing is self-reinforcing, and studies are reviewed which buttress this belief. Studies which support the view that hunger, feeding, and killing are positively related come from research in which naive animals were either starved or fed dead prey prior to the initial test for prey killing. It is concluded that hunger and feeding are not needed in order to maintain the killing response in the experienced killer, but both can serve as potentiators for the induction of killing in the naive S. (56 ref)—*Journal abstract*.

9206. Syme, G. J. & Syme, Lesley A. (Ruakura Animal Research Station, Hamilton, New Zealand) **The relationship between the peck order and performance in a competitive group feeding situation by two groups of cockerel.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 547-550.—Investigated group food competition in White Leghorn  $\times$  Australorp roosters. 2 groups of 8 and 7 Ss, respectively, were placed on a 33-hr food-deprivation schedule. Each group was required to compete for mash at a point source. In contrast to previous findings when a paired-comparison competitive technique was employed, a low correlation for both groups emerged between the peck order in nonfeeding situations and competitive performance. Aggression during competition also correlated poorly with competitive performance. Implications for the interpretation of the peck order as a general measure of social dominance are discussed.—*Journal abstract*.

9207. Taylor, George T. & Moore, Suzanne. (State University Coll New York, Potsdam) **Social position and competition in laboratory rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 424-430.

—Conducted 2 experiments with male albino rats which controlled for social position (i.e., relative dominance-submission) in an appetitive social learning-performance setting. The 10 most dominant and 10 most submissive of 30 Ss were used in Exp I, and the 20 most dominant of 30 Ss were paired in Exp II. Results indicate that Ss which performed effectively when alone exhibited significantly reduced levels of responding when placed into a social environment. The severity of the response decrement was partly a function of the relative social position of the Ss involved. A dominant male made few responses when paired with another dominant male. Yet, a dominant S made even fewer responses when paired with a submissive S, which barpressed at approximately half the individual level. Findings suggest that social position, with its accompanying characteristic form of aggression, is an important determinant of performance in a social learning environment. (18 ref)—*Journal abstract*.

9208. Waser, Peter M. & Floody, Owen. (Rockefeller U, New York, NY) **Ranging patterns of the mangabey, *Cercocebus albigena*, in the Kibale Forest, Uganda.** *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1), 85-101.—Studied daily movements and dispersion of a free-ranging group of mangabeys. The spatial organization of this group contrasted in several respects with patterns exhibited by other rain-forest monkeys; e.g., while other arboreal forest primates inhabit quite restricted areas, the home range of this group exceeded 34 ha and was comparable to the areas occupied by some open-country primates. Similarly, the extent of daily movements and the average spread of this group resembled those of terrestrial forms inhabiting relatively open terrain more than those of other arboreal forest-dwelling groups. Results indicate that arboreal rain-forest species may vary considerably with respect to spatial parameters such as home range, daily range, and group spread. Thus, theoretical positions or general assumptions suggesting that the social organizations of forest species are less variable than those of open-country primates require reconsideration. (German summary) (28 ref)—*Journal summary*.

9209. Wise, Larry A.; Zimmermann, Robert R.; Strobel, David A. & Smith, Olin W. (Texas Wesleyan Coll) **Device for study of communication of dominance without physical contact.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 863-866.—Compared dominance competition between 3 groups of 12 paired rhesus monkeys using a standard apparatus, the Wisconsin General Test Apparatus (WGTA) and a new device called the Parallel Competition Box. The Parallel Competition Box does not allow physical contact between individual Ss during testing as does the WGTA. Results comparing the Parallel Competition Box and the WGTA on food incentive competition indicate that physical contact is not necessary for assertion and maintenance of dominance between socialized rhesus monkeys.—*Journal abstract*.

9210. Worsley, A. (U Queensland, Animal Behaviour Unit, Brisbane, Australia) **Long-term effects of imprinting exposure upon breed discriminatory behaviour in chickens: II. Imprinting to the dam ("dampprinting").** *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1).

10-22.—Investigated long-term effects of imprinting exposure to the dam ("damprinting") upon breed discriminatory behavior in Rhode Island Red (RIR) and Australorp chickens. In Exp I damprinting interacted with sex and breed factors to affect agonistic interactions during the 1st 13 wks of life. RIR males appear to have been most affected by damprinting, directing more agonistic interactions to their own breed when they had been exposed to a RIR dam than to an Australorp dam. In Exp II it was shown that the Breed Experience factor interacted with the Damprinting factor as well as with sex and breed. Results indicate that damprinting can have long-term effects upon breed discriminatory behavior and breed preference. These effects are modifiable, principally by subsequent breed experience. (German summary)—*Journal summary*.

9211. Worsley, A. (U Queensland, Animal Behaviour Unit, Brisbane, Australia) **Long-term effects of imprinting exposure upon breed discriminatory behaviour in chickens: I. Imprinting to peers ("peerprinting").** *Zeitschrift für Tierpsychologie*, 1974(Aug), Vol 35(1), 1-9.—Investigated the effects of early exposure to peers on subsequent breed discriminatory behavior in chickens. In Exp I, day-old Rhode Island Red (RIR) and Australorp chicks were exposed to peers ("peerprinted") in 4 different treatments. After 48-hr exposure, chicks of both breeds were reared together until maturity. It was found that males which had been exposed to 2 peers of their own breed directed more agonistic interactions to members of their own breed than did birds in the other preprinting treatments during the 1st 6-11 wks, but not afterwards. In Exp II, similarly peerprinted RIR cockerels were reared with members of their own breed only. Peerprinting exposure affected breed discriminatory (sexual) behavior at maturity. Thus, the intermingling of birds in Exp I may have been responsible for the diminution of the peerprinting effect in that experiment. (German summary) (18 ref)—*Journal summary*.

9212. Zack, Sheldon. (Max-Planck-Inst für Verhaltensphysiologie, Seewiesen, W Germany) **Sequences of agonistic behavior patterns and food deprivation in *Hermisenda*.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 525-532.—Food deprivation had little effect on the behavior patterns occurring during encounters between 2 *Hermisenda* molluscs. Deprivation did result in increased duration of bouts of certain behavior patterns, such as biting, and decreased durations of bouts of other patterns, such as withdrawal. The ability to predict which behavior pattern will follow another is unaffected by the food deprivation. On other measures, such as the sequential organization of the patterns occurring during an encounter (e.g., the differences in patterns of winners and losers), the food-deprived Ss were not significantly different from the controls. Measures taken on encounters 1 day after the end of the deprivation period generally fell between those of the deprived and control Ss, indicating that the effects of food deprivation were declining slowly.—*Journal abstract*.

9213. Zook, John M. & Adams, David B. (Duke U) **Competitive fighting in the rat.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 418-423.—Obtained competitive fighting in 29 of 60 pairs of like-sexed DA agouti laboratory rats by placing a single piece

of food into the food hopper following 48 hrs of food deprivation. The fighting was characterized by offensive sideways posture, full aggressive posture, and bite and kick attack. Tests were conducted at 110-120 days of age on pairs of Ss that had been housed together since weaning. Fighting was more frequent in pairs consisting of nonlittermates than in pairs of littermates, and it was equally frequent in male and female pairings. Probability of fighting was enhanced by prior experience with food deprivation, and attack was most often initiated by the heavier animal of the pair.—*Journal abstract*.

### Sensory Processes

9214. Afanador, Arthur J. & Adams, Anthony J. (Indiana U, Div of Optometry) **Early visual adaptation in goldfish retinal ganglion cells.** *Nature*, 1974(Jul), Vol 250(5464), 346-348.—Recorded transient losses of sensitivity at onset and offset of a 570-nm adapting light in 13 isolated goldfish retinal ganglion cells of the opponent center-surround type. A 480-nm test light stimulated the 530-nm excitatory cone system. Stimulation was focused on the center of the cell's receptor field under steady photopic background conditions. Results show that under transient and steady state adaptation conditions the range of incremental response from threshold to peak remained the same, with the operating range shifting along the intensity axis, consistent with a gain change. Implications for similar transient sensitivity changes in the human visual system are discussed. (16 ref)—*A. Cerf-Bearé*.

9215. Atkinson, R. J. (U Liverpool, Pt Erin, Isle of Man, England) **The activity rhythm of *Goneplax rhomboides* (L.).** *Marine Behaviour & Physiology*, 1974(Aug), Vol 2(4), 325-335.—Laboratory observation of *Goneplax* showed that this crab had a persistent nocturnal rhythm of emergence when maintained in constant conditions in an actograph providing a simulated burrow. The rhythm was synchronized by the light-dark cycle and appeared to be reinforced by contact with the burrow walls. The activity of an S seemed to be inhibited by the presence of others of the same species. The burrow is considered to play an important role in the life of the crab.—*Journal abstract*.

9216. Babighian, Gregorio; Moushegian, George & Rupert, Allen L. (U Padova, Verona, Italy) **Central auditory fatigue.** *Audiology*, 1975(Jan-Feb), Vol 14(1), 72-83.—Conducted experiments which recorded evoked and single-neuronal responses in 8 anesthetized Kangaroo rats. Results reveal that there is a central involvement in auditory fatigue. Cochlear potentials (microphonic and whole-nerve action potential) and inferior colliculus electrical responses were simultaneously obtained before and after excessive sound exposure. In general, sound exposure produced a greater reduction of the collicular evoked responses than of the cochlear microphonics and action potentials. Recordings from single neurons support the evoked-response findings. (French summary) (36 ref)—*Journal abstract*.

9217. Bridgeman, Bruce. (U California, Santa Cruz) **Correlates of metacontrast in single cells of the cat visual system.** *Vision Research*, 1975(Jan), Vol 15(1), 91-99.—23 curarized cats received light stimuli consisting of 2 spatially adjacent bars, each flashed for 20 msec



with onset asynchronies of 0-120 msec. Extracellular single unit activity was recorded from optic tract, lateral geniculate, and visual cortex. After a receptive field was plotted, the stimuli were presented symmetrically about the field center and in several eccentric locations. In the optic tract and lateral geniculate, monotonic decreases of cell firing occurred as the stimuli became closer in time. In the cortex, cells which showed a late peak of firing 200 msec after stimulus onset showed a reduction of the late peak which followed a U-shaped function, with minimum firing at onset asynchronies of about 60 msec. A simple summation of excitation and inhibition can account for the masking. The data explain several paradoxes in the metacontrast literature. (French, German, & Russian summaries) (38 ref)—*Journal abstract*.

9218. Clark, David L. (Ohio State U) **Effects of chronic 2g centrifugation on equilibrium behavior in the rat.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 509-516.—Exposed mature Sprague-Dawley rats to chronic centrifugation at 2g for 60 days. A rail test was utilized to quantitatively evaluate equilibrium behavior in a static and dynamic situation after return to the earth-standard 1g environment. Exposure to chronic centrifugation significantly altered equilibrium behavior. The 2g Ss showed greater disequilibrium than 1g control Ss under both static and dynamic situations. The 1g between the 2 groups increased under more dynamic test conditions. A mechanism is suggested to account for these differences.—*Journal abstract*.

9219. Dooling, Robert J. & Saunders, James C. (Central Inst for the Deaf, St Louis, MO) **Hearing in the parakeet (*Melopsittacus undulatus*): Absolute thresholds, critical ratios, frequency difference limens, and vocalizations.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 1-20.—In Exps I and II avoidance conditioning and the method of limits were used to measure absolute auditory thresholds, masked thresholds, and critical ratios in 4 parakeets. The same procedure was then used in Exps III and IV to study frequency difference limens in 6 additional Ss. The power spectrum and "constancy of intonation" of the parakeet call were also measured and related to the absolute and differential frequency sensitivity. The mechanism of frequency analysis in the parakeet ear is considered in relation to the present results and to the anatomical and functional differences between the avian and mammalian auditory systems. (71 ref)—*Journal abstract*.

9220. Eales, Anthony J. (U Liverpool, Pt Erin, Isle of Man, England) **Sex pheromone in the shore crab *Carcinus maenas*, and the site of its release from females.** *Marine Behaviour & Physiology*, 1974(Aug), Vol 2(4), 345-355.—Demonstrated sex pheromones in pre-molt and recently molted female *Carcinus maenas* and *Macropipus holsatus* (Crustacea Decapoda, Portunidae) under laboratory conditions. Male conspecifics responded with searching activity. Dilute solutions of urine, aspirated from the antennal glands of females of each species, released characteristic responses in conspecific males, but males of other species responded differently if at all. Aspects of responses of test animals in bioassays are discussed. (32 ref)—*Journal abstract*.

9221. Ebel, A. et al. (CNRS, Ctr de Neurochimie, Strasbourg, France) **Activity of cholinergic system enzymes in the cochlea of audiogenic seizure susceptible mice.** *Experientia*, 1974, Vol 30(1), 48-49.—Examined inborn neurochemical differences between mice strains sensitive and insensitive to auditory stimulus. Implications for the study of audiogenic epileptic seizures are noted. (French summary) (17 ref)

9222. Fischer, Gloria J.; Morris, Grant L. & Ruhsam, John P. (Washington State U) **Color picking preferences in white leghorn chickens.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 402-406.—Previous studies of color pecking preferences in newly hatched chicks (*Gallus domesticus*) have shown unimodal preference in the orange region of the spectrum or bimodal preferences at blue and orange. In the present Exp I, 138 dark-hatched White Leghorn chicks were tested in darkness with targets illuminated at 1 or 3 radiant intensity levels. Results show the least amount of pecking at green (541 nm) and peak preferences in blue-violet and orange-red regions. Findings were similar in Exp II when 150 other dark-hatched Ss were tested in the light. Overall, findings suggest unlearned pecking preferences for short and long wavelengths, with minimums at green. Possible evolutionary and photochemical bases for such a bimodal wavelength preference function are discussed. Since bimodality was unaffected by target intensity and background, these variables probably do not account for the unimodal function reported by others.—*Journal abstract*.

9223. Freed, Earl X. (VA Hosp, Lyons, NJ) **Home cage fluid selection by rats following polydipsic fluid choice.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 20-22.—Investigated the hypothesis that caloric need is a variable in animal models of alcoholism. 8 rats were given varying choice combinations of water, ethanol, and 1,3-butenediol with and without food deprivation both in a Skinner box and the home cage. Results show that alcohol ingestion was based upon caloric deprivation.

9224. Govardovskii, V. I. & Zueva, L. V. (Inst of Evolutionary Physiology & Biochemistry, Lab of Evolutionary Morphology, Leningrad, USSR) **Spectral sensitivity of the frog eye in the ultraviolet and visible region.** *Vision Research*, 1974(Dec), Vol 14(12), 1317-1321.—Spectral sensitivity curve of isolated frog retina showed 3 peaks corresponding to  $\alpha$ -,  $\beta$ -, and protein absorption bands of the rhodopsin. Ocular media of *Rana temporaria* were transparent down to 330 nm so that the whole eye showed an appreciable sensitivity in the near ultraviolet. This fact may be of some ecological importance. (French, German, & Russian summaries) (24 ref)

9225. Hendry, L. B. et al. (Pennsylvania State U) **Cis-10-tetradecenyl acetate, an attractant component in the sex pheromone of the oak leaf roller moth (*Archips semiferanus* Walker).** *Experientia*, 1974, Vol 30(8), 886-888.

9226. Horton, Brian J.; Turley, Stephen D. & West, Clive E. (Australian National U, John Curtin School of Medical Research, Canberra City, ACT) **Diurnal variation in the feeding pattern of rabbits.** *Life Sciences*, 1974(Dec), Vol 15(11), 1895-1907.—Conducted 3 experi-

ments with a total of 32 female laboratory-bred rabbits maintained under controlled lighting and fed ad lib. Ss exhibited a weak but consistent diurnal fluctuation in feed intake. There were 2 major periods of eating—at the beginning and at the end of the light period—resulting in similar feed consumption for the light and dark periods. Water intake showed a similar diurnal variation. When the normal lighting cycle was retarded by 6 hrs, Ss adjusted their diurnal rhythm of feeding behavior to the new cycle within 8–15 days. Results of comparative studies with 20 male Wistar albino rats are included. (27 ref)—*Journal abstract*.

9227. Hume, Ann L. (U Auckland, New Zealand) **Optimal response biases and the slope of ROC curves as a function of signal intensity, signal probability, and relative payoff.** *Perception & Psychophysics*, 1974(Oct), Vol 16(2), 377–384.—5 male albino rats performed in a 2-lever analog of the yes-no psychophysical procedure. The signal consisted of an increment in the intensity of a random noise. Correct responses were reinforced with single bursts of brain stimulation; incorrect responses produced brief periods of time-out. Receiver-operating-characteristic (ROC) curves were generated at each of several signal intensities by varying either the signal probability or the relative number of brain stimulations for correct responses. The index of sensitivity increased with the signal intensity and was independent of response bias. When the signal probability was varied, the Ss optimized the number of correct trials and hence the number of brain stimulations obtained at each level of detection. They approximated this optimum more closely as the signal intensity was reduced. When the ratio of brain stimulations was varied, the Ss compromised between optimizing the number of correct trials and optimizing the number of brain stimulations obtained. The slopes of the ROC curves plotted on normal-normal coordinates frequently departed from unity, but did not change systematically with either the signal intensity or the method by which they were generated. (24 ref)—*Journal abstract*.

9228. Humphrey, N. K. (U Cambridge, England) **Species and individuals in the perceptual world of monkeys.** *Perception*, 1974, Vol 3(1), 105–114.—When a monkey is given the choice of looking at a novel picture or a blank white screen he shows an initial preference for the picture which usually abates within about 200 sec; if the picture is then changed for another his preference revives. The level of preference for the 2nd picture depends on the degree to which it is perceived as similar to or different from the 1st. 2 experiments investigated how rhesus monkeys classify pictures of animals and the extent to which they differentiate between individual animals of the same species. 2 classes of animal pictures were used: pictures of other rhesus monkeys and pictures of domestic animals. Results indicate that the 4 inexperienced males, to whom the domestic animals were unfamiliar, treated individual domestic animals of the same species as being closely similar; they treated individual monkeys, on the other hand, as being quite different from each other. The 2 experienced Ss, who were exposed over the course of 6 mo to many further pictures of animals, came to treat all individuals as different from each other.—*Journal abstract*.

9229. Kalinina, A. V. (Lobachevsky State U, Research Inst for Applied Mathematics & Cybernetics, Gorky, USSR) **Classification of frog retina neurons by their quantitative characteristics.** *Vision Research*, 1974(Dec), Vol 14(12), 1305–1316.—On the basis of morphometric analysis, lake frog retina neurons were classified into 5 types that differ from each other by dimensions of perikaryon, dimensions and shape of dendrite field, and character of dendrite ramification. The proposed classification is compared with other concepts on neuron structures of frog retina ganglionic layer. (French, German, & Russian summaries) (43 ref)

9230. Kayes, R. J. (U Cambridge, England) **The daily activity pattern of *Octopus vulgaris* in a natural habitat.** *Marine Behaviour & Physiology*, 1974(Aug), Vol 2(4), 337–343.—Hourly inspection of the octopus by day and night was maintained for 11 days, showing that *O. vulgaris* in this habitat generally hunted throughout the night, with only short excursions from the hole by day.

9231. Maiorana, Valerie A. & Schleidt, Wolfgang M. (U Maryland) **The auditory sensitivity of the turkey.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 203–207.—Utilized a modification of the conditioned suppression technique to assess auditory sensitivity of the domestic turkey, *Meleagris gallopavo domesticus*. 2 female turkeys were trained to keypeck for food reinforcement. Electric shock to the axillae was used to produce suppression of pecking during tonal stimuli. Auditory sensitivity was tested at .5, 1, 2, 4, and 8 kHz. Sensitivity was greatest at 1 and 2 kHz. Sensitivity functions were consistent with gobbling responses elicited by pure tones as reported by M. and M. W. Schleidt in 1958.—*M. B. Meikle*.

9232. Mansfield, R. J. (Harvard U) **Neural basis of orientation perception in primate vision.** *Science*, 1974(Dec), Vol 186(4169), 1133–1135.—Notes that orientational differences in human visual acuity can be related parametrically to the distribution of optimal orientations for the receptive fields of neurons in the striate cortex of the rhesus monkey. In the present study neurons were examined in 5 implanted Ss, using single unit extracellular recording techniques to measure the distribution of receptive field orientation sensitivity. Both behavioral measures of acuity and the distribution of receptive fields exhibited maximums for stimuli horizontal or vertical relative to the retina; the effect diminished with distance from the fovea. The anisotropy in the neuronal population and in visual acuity appeared to be determined by postnatal visual experience. (33 ref)—*Journal abstract*.

9233. Martin, Graham R. & Gordon, Ian E. (U Exeter, England) **Visual acuity in the twany owl (*Strix aluco*).** *Vision Research*, 1974(Dec), Vol 14(12), 1393–1397.—Determined threshold visual acuity for grating stimuli in 2 tawny owls (a totally nocturnal avian species). Extensive training was given in a runway apparatus in which stimuli were presented well beyond the near point at a distance of 95 cm. Stimuli were presented according to a modified method of constant stimuli. At a stimulus luminance of 1.7 log mL, acuity thresholds for the 2 Ss equalled 2.7' and 3.7'. Acuity was also determined in 1 S at stimulus luminance at 2 and 1.2 log mL, and equalled 3.4' and 2.5' at each luminance, respectively. These



thresholds are compared with those of 2 humans tested in the same apparatus and with previously published acuity data for other avian and nocturnal species. (French, German, & Russian summaries) (24 ref)—*Journal abstract*.

9234. Phelps, Robert W. (U Rochester) **Effects of interactions of two moving lines on single unit responses in the cat's visual cortex.** *Vision Research*, 1974(Dec), Vol 14(12), 1371-1375.—Recorded the responses of single units with extracellular microelectrodes from the visual cortex of cats. Response histograms were collected to stimuli which consisted of 2 narrow parallel lines of different separations moving through each neuron's receptive field. The majority of units showed a clear decrease in both peak and total response when the separation of the stimulating lines averaged about  $.5^\circ$ . Some units showed an enhancement of their response at separations greater than or less than this. This enhancement could only sometimes be correlated with a "bimodal" excitatory response to a single line. (French, German, & Russian summaries)—*Journal abstract*.

9235. Pilleri, G. (U Berne, Brain Anatomy Inst, Switzerland) **Side-swimming, vision and sense of touch in *Platanista indi* (Cetacea, Platanistidae).** *Experientia*, 1974, Vol 30(1), 100-104.—Studied the vision, touch, side-swimming and acoustic orientation of the *P. indi* dolphin. 4 captive dolphins (3 female, 1 male), originally captured in the lower Indus River, were observed in 2 laboratory tanks equipped with portholes and hydrophones linked to an oscilloscope. The experiments confirmed the *P. indi*'s microphthalmic, lensless eye's ability to only determine a light's direction and to distinguish between light and dark. The *P. indi* emits supersonic (160 kHz) and low frequency sounds, whose echoes are received by the organ of hearing. The experiments showed this sonar apparatus to distinguish between different types of fish of the same size. Side-swimming is attributed to the sense of touch developed in the dolphin's fins, and a phylogenetic explanation of side-swimming is presented. (German summary)—*R. Tomasko*.

9236. Wallman, Joshua. (Rutgers State U, Inst of Animal Behavior, Newark) **A simple technique using an optomotor response for visual psychophysical measurements in animals.** *Vision Research*, 1975(Jan), Vol 15(1), 3-8.—Describes a method for rapidly determining certain visual parameters in animals. It uses the optokinetic or optomotor responses and involves having the stimulus of interest travel in one direction around the animal while a standard grating of adjustable contrast travels in the other direction. The amount of contrast of the standard grating necessary to match the stimulus of interest is compared under different stimulus conditions. Although devised primarily to study color vision, the method can be applied to modulation transfer function and spectral sensitivity, and readily lends itself to screening large numbers of animals. (French, German, & Russian summaries)—*Journal abstract*.

## DEVELOPMENTAL PSYCHOLOGY

9237. Aaron, P. G. & Malatesha, R. N. (Indiana State U) **Discrimination of mirror image stimuli in children.** *Neuropsychologia*, (Oct), Vol 12(4), 549-551.—Studied mirror-image discrimination under 4 conditions with 94 5.9-9.11 yr old males. Results show that Ss recognized and discriminated certain letters and geometrical shapes more readily under a brief tachistoscopic exposure of 80 msec than under a longer exposure of 3.5 sec. This paradoxical finding seems to provide 1 explanation for mirror-image confusions and letter reversals in children. (French & German summaries)—*Journal abstract*.

9238. Brassell, William R. & Kaye, Herbert. (Western Carolina Ctr. Infants' Program, Morganton, NC) **Reinforcement from the sucking environment and subsequent modification of sucking behavior in the human neonate.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 448-463.—Studied the reinforcing aspects of sucking behavior in 36 human newborns in a limited instrumental conditioning paradigm where sucking was both operant and a reinforcer. During training, response density (rate based on sucking opportunity time) and latency were measures of 2 components of nonnutritive sucking, contingent negative pressure suction, and incidental jaw movement. The strategy for determining the reinforcing aspect of sucking involved comparisons of 3 types of sucking stimuli as reinforcers. The nature of modified operant sucking was investigated during extinction by examining number of sucks/burst, number of bursts emitted, and interburst interval time. The feedback from sucking which acted as reinforcement was concluded to be response density. Sucking was modified by changes in pausing behavior, including response latency and pauses between bursts of sucks. The number of sucks/burst also showed a significant change under certain conditioning arrangements.—*Journal abstract*.

9239. Bryant, Gillian M. & Davies, Kathleen J. (South Glamorgan Area Health Authority, Cardiff, Wales) **The effect of sex, social class, and parity on achievement of Denver Developmental Screening Test items in the first year of life.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 485-493.—In standardizing the Denver Developmental Screening Test on 668 Cardiff infants in their 1st yr, (see PA, Vol 53:Issue 5), no conclusive differences in the effects of sex, social class, and position in family were seen. The data suggest that differences are either random, or become more definite in subsequent years. (French, German, & Spanish summaries)

9240. Bryant, Gillian M.; Davies, Kathleen J. & Newcombe, Robert G. (South Glamorgan Area Health Authority, Cardiff, Wales) **The Denver Developmental Screening Test: Achievement of test items in the first year of life by Denver and Cardiff infants.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 475-484.—Attempted to standardize the Denver Developmental Screening Test on 668 infants in Cardiff. These Ss appeared slightly more advanced than Denver infants on language and personal-social items of the 1st yr, and somewhat slower on motor items. (German, French & Spanish summaries)

9241. Buss, Allan R. (U Alberta, Ctr for Advanced Study in Theoretical Psychology, Edmonton, Canada) **Generational analysis: Description, explanation, and theory.** *Journal of Social Issues*, 1974, Vol 30(2), 55-71.

—Notes that an adequate strategy in generational analysis must concern itself with at least 3 general matters: obtaining adequate descriptive data, explaining such data, and relating explanation to a general theory of generational differences and social change. At the descriptive level, generational differences at a given point in time may be associated with age, cohort, and/or interactional effects. The explanation of age, cohort, and interactional effects necessitates introducing additional variables and considerations into the basic descriptive model. Finally, for research on generational differences and social change to be most useful, empirical studies should be couched within a theoretical perspective. (42 ref)—*Journal abstract*.

9242. Gruber, Howard E. & Barrett, Paul H. (Rutgers State U, Inst for Cognitive Studies) **Darwin on man: A psychological study of scientific creativity.** New York, NY: E. P. Dutton, 1974. xxv, 495 p. \$20.—Presents an historical and biographical study of the development of Darwin's thought and a general discussion of the creative process from the standpoint of developmental psychology. The history of the suppression of scientific thought, Darwin's theories on religion, and the problem of philosophic materialism are also examined.

9243. Harris, P. L.; Cassel, T. Z. & Bamborough, P. (U Lancaster, England) **Tracking by young infants.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 345-349.—Conducted 2 experiments with a total of 44 8-28 wk old infants to determine the degree to which tracking activities are supported by the displacement of an object relative to a background in contrast to displacement of the whole field. Results support this hypothesis. When object and background moved together tracking was disrupted. This disruption is showed to be due to the absence of relative displacement between object and background and not to movement of the background as such. It is suggested that the absence of relative displacement reduces the duration of pursuit but does not alter the frequency of target-capture.—*Journal abstract*.

9244. Hurlock, Elizabeth B. **Developmental psychology.** (4th ed). New York, NY: McGraw-Hill, 1975. xiv, 395 p. \$11.95.—This is the revised 4th edition of a textbook on theories and research in developmental psychology. Topics include infancy; personal and social adjustment in early and late childhood, adolescence, and adulthood; and vocational and family adjustment in middle and old age.

9245. Kostrzewski, Janusz. (State Inst of Professional Pedagogy, Warsaw, Poland) **[The mental, social and motor development of children from day nurseries and family homes.]** (Polh) *Przegląd Psychologiczny*, 1973, Vol 16(1), 3-18.—Compared 14 girls and 18 boys who had spent 1-12 mo (mean 5 mo) in a day care center (described in some detail) with 13 girls and 19 boys living at home. Mean age of the Ss was 13 mo, and the groups were approximately matched for education of parents. All were tested in the presence of their mothers on modifications of the Cattell Infant Intelligence Scale, the

Vineland Social Maturity Scale, and the Test of Motor Proficiency for Children from 1-5 yrs old. No significant difference was found on any of the tests, but the children from homes showed a greater emotional stability and were easier to establish contact with. (Russian & English summaries) (28 ref)—*I. Divac*.

9246. Lemond, L. Charles & Nunnally, Jum C. (Vanderbilt U) **The influence of incongruity and preexposure on the familiarity effect in visual selection of children.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 373-381.—A consistent finding in the literature concerning visual selection is that Ss will spend more time viewing unfamiliar stimuli than stimuli with which they have been familiarized. In the present experiment, the relationship between the magnitude of this familiarity effect and the level of stimulus incongruity was examined with 30 4th graders and found to be monotonic and increasing. Amount of stimulus preexposure had no significant effect on the magnitude of the familiarity effect. There was no overall difference in Ss' preference for familiar and unfamiliar stimuli. Results support a theory of visual selection based on information-conflict resolution. (20 ref)—*Journal abstract*.

9247. McGurk, Harry & Jahoda, Gustav. (U Surrey, Guildford, England) **The development of pictorial depth perception: The role of figural elevation.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 367-376.—Conducted 2 follow-up experiments of a previous study by G. Jahoda and H. McGurk (see PA, Vol 52:9818), in which pictorial depth cues were systematically manipulated. In Exp 1 144 4-10½ yr old children were presented with stimulus pictures in which depth cues were reduced to elevation and walking or standing posture of 2 figures. In 1 condition a training picture reminding Ss of the actual size relations remained visible, in order to test for possible memory effects, and in the other condition it was absent. Ss were required to construct 3-dimensional models representing the size and spatial relationships between figures in the pictures, scoring being in terms of size and spatial accuracy. Results are consistent with previous ones, indicating that elevation alone constitutes a relatively weak but effective depth cue. There was a moderate memory effect, posture being insignificant. Exp 2 tested the hypothesis that the difficulties experienced by younger Ss are response rather than perceptually based. The 72 4-6 yr old Ss from Exp 1 were given the task of reproducing a 3-dimensional model. Ss had no difficulty with size, but spatial responses were at a very low level at the age of 4, increasing significantly in accuracy by the age of 6. The predominant error at both age levels was horizontal instead of diagonal orientation. This is in conformity with the hypothesis and consistent with previous results.—*Journal abstract*.

9248. Nikolskaya, A. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[A review of literature in child and pedagogical psychology in pre-revolutionary Russia from the beginning of XX century to the October revolution.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 156-157.

9249. Oyama, Tadasu & Sato, Keiko. (Chiba U, Japan) **Relative similarity of rotated and reversed figures to the original figures as a function of children's**





**Effects of successive pretraining of components in a dimension-abstracted oddity task.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 398-411.

—Investigated the effects of training 2 components of a dimension-abstracted oddity problem, oddity responding and attention. All Ss (96 2nd graders) were given a series of 3 problems. Type of oddity training was manipulated on Problem 1, and Ss learned (a) an oddity response in a problem whose format was the same as the final transfer problem, (b) an oddity response in a problem whose format was different from the final problem, or (c) no oddity response. Attention training was manipulated on Problem 2. Results show that (a) Ss given same format oddity training and appropriate attention training were able to integrate that information on the final problem, (b) the probability of transferring the oddity response learned on Problem 1 to Problem 3 depended upon the similarity of the task formats, and (c) the 2 trained components tended to combine in an interactive fashion. —*Journal abstract.*

9257. Carrow, Elizabeth. (U Texas, Austin) **A test using elicited imitations in assessing grammatical structure in children.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 437-444.—Used elicited imitation to obtain performance data on the grammatical system of 475 3-7 yr olds. The procedure attempted to provide an instrument which would be valid and reliable while at the same time easy to administer and score without extensive training or knowledge of linguistics. Grammatical categories included were articles, adjectives, nouns, pronouns, demonstratives, conjunctions, verbs, negatives, contractions, prepositions, and adverbs. Results demonstrate reliability and validity as well as test usefulness in specific analysis of grammatical constructions. (15 ref)—*Journal abstract.*

9258. Case, Robbie. (U California, School of Education, Berkeley) **Mental strategies, mental capacity, and instruction: A neo-Piagetian investigation.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 382-397.—Conducted 2 experiments which used J. Pascual-Leone's neo-Piagetian theory of development to predict the pre- and postinstruction distributions of scores on an S-controlled digit placement task as a function of 3 parameters: (a) the mental strategy which Ss attempted to apply, (b) the demand which attempting to apply this strategy placed on their mental capacity, and (c) the maximum mental capacity which they were capable of mobilizing. Ss were a total of 180 6-10 yr old children. The predicted and obtained distributions corresponded quite closely for each kind of strategy at each age level sampled (6, 8, and 10 yrs). Methodological and analytic requirements which must be met if the same approach is to be applied to making successful predictions in more naturalistic paradigms are discussed. —*Journal abstract.*

9259. de Villiers, Peter A. & de Villiers, Jill G. (Harvard U) **On this, that, and the other: Nonegocentrism in very young children.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 438-447.—Studied the development of comprehension and production of spatial deictic terms "this-that," "here-there," "my-your," and "in front of-behind" in the context of a hide-and-seek game. The 1st 3 contrasts are produced

according to the speaker's perspective, so comprehension requires a nonegocentric viewpoint. The contrast "in front of-behind" is produced relative to the hearer (i.e., production is nonegocentric). Ss were 39 children, ranging in age from 2.5-4.5 yrs, and 18 undergraduates. The 2.5-yr-old children were best at those contrasts which do not require a shift in perspective. The 3- and 4-yr-old children were adept at switching to the speaker's perspective for comprehension of the terms requiring this shift (i.e., were nonegocentric). 4-yr-olds were also capable of nonegocentric production of "in front of-behind." —*Journal abstract.*

9260. Elser, Christine. (U Bristol, England) **Recognition and inference in the co-ordination of perspectives.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 309-312.—Conducted a study of 30 6-8 yr olds to compare (a) a recognition procedure, in which the S views a model from different perspectives prior to selecting the viewpoint required; and (b) an inference procedure, in which the S makes his choice after viewing a model from 1 position only. Ss demonstrated less egocentrism in the recognition than in the inference condition. It is suggested that this distinction can help explain some apparent anomalies in the results of earlier research. —*Journal abstract.*

9261. Evans, Joyce S. (Southwest Educational Development Lab, Early Childhood Div, Austin, TX) **Word-pair discrimination and imitation abilities of preschool Spanish-speaking children.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 573-580.—Investigated auditory abilities, measured by word-pair discrimination and single word imitation, of 20 economically disadvantaged native-Spanish-speaking preschool children aged 4 yrs and over in 2 languages, Spanish and English. In order to provide age-related comparative information, 20 nondisadvantaged native-English-speaking preschoolers were evaluated on the same tasks. In spite of the dual problems of economic disadvantage and 2nd-language learning, the Spanish-speaking children were not significantly different from their advantaged English-speaking peers in total performance on the 4 tasks. In addition, Spanish speakers made fewer errors in their native language than did the English speakers. Thus, previously hypothesized negative effects of poverty or of linguistic interference do not appear to be depressing auditory performance. A descriptive analysis of errors indicates directions for educational programs in the area of auditory training for preschool bilingual programs. (16 ref)—*Journal abstract.*

9262. Friedrich, Douglas. (Central Michigan U) **Slow learner, average, and gifted third graders: Strategy analysis and training for learning.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 344-350.—Measured the performance of 48 gifted, average, and slow-learning 3rd graders on a visual-term memory task which involved free recall of objects presented sequentially by a Kodak Carousel. The objects were grouped into conceptual sets, with 4 objects per set. Ss performed better on concrete than on abstract short-term memory concept tasks. —H. Kaczowski.

9263. Haaf, Robert A. (U Toledo) **Complexity and facial resemblance as determinants of response to facelike stimuli by 5- and 10-week-old infants.** *Journal*



of *Experimental Child Psychology*, 1974(Dec), Vol 18(3), 480-487.—Determined whether infants at 5 and 10 wks of age respond to facelike drawings on the basis of stimulus complexity or on the basis of degree of resemblance to the human face. 24 Ss at each age were shown 4 patterns in which these 2 dimensions were varied orthogonally. Fixation time was recorded using the successive, single stimulus procedure. Results provide no evidence of response to the facial resemblance dimension at either age level. However, there was a significant complexity component in the responses of both groups. The 5-wk-old infants preferred an intermediate level of stimulus complexity. Those at 10 wks showed a linear preference for increasing levels of the complexity dimension.—*Journal abstract*.

9264. Harris, P. L. (U Lancaster, England) **Perseverative search at a visibly empty place by young infants.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 535-542.—Results of 2 experiments with 40 infants (mean age range = 307-383 days) indicate that when an object moved to a new place, Ss approached both its new location and its prior location. These object locations were not treated as mutually exclusive by the Ss even when the object was visible at the new location and visibly absent from the old location. It is concluded that perseverative error cannot therefore simply be a memory problem.—*Journal abstract*.

9265. Heron, Alastair & Dowel, Wendy. (U Melbourne, Vic, Australia) **The questionable unity of the concrete operations stage.** *International Journal of Psychology*, 1974, Vol 9(1), 1-9.—49 Yugoslav immigrants 9-13 yrs old who had been in Australia 3-24 mo, had had 1-4 yrs of schooling in Yugoslavia, and were enrolled in Grades 4 and 5 in Melbourne schools, took individually administered tests in the Serbo-Croat language, including conservation measures (number, quantity, weight, and volume), seriation measures, class inclusion measures, and multiple classification tests. While these Ss were approximately 2 yrs behind Geneva children on several aspects of concrete operational performance, exploration of the relationship between performance on the multiple classification tasks and performance on other concrete operational tasks revealed that at least 1/3 of the nonconservers could deal successfully with 7 out of 8 operational multiple classification tasks. Results lead to the conclusion that there is no essential causal connection between operational performance on conservation tasks and on multiple classification tasks. The concrete operations stage, judging from these data, does not seem to be a formal unity. It may be viewed more productively as a set of structures without necessary interdependence. (20 ref)—E. A. Gavin.

9266. Inhelder, Bärbel; Sinclair, Hermine & Bovet, Magali. (U Geneva, Ecole de Psychologie, Switzerland) **Learning and the development of cognition.** (Trans S. Wedgwood). Cambridge, MA: Harvard University Press, 1974. xiv, 308 p. \$15.—Presents findings on language and cognitive development in children based on the authors' 10 yrs of research on Piagetian concepts. Topics include concepts of conservation of continuous quantities, from numerical equality to the conservation of matter, a cross-cultural study of conservation concepts, and class

inclusion training and its influence on conservation. (5% p ref)

9267. Kail, Robert V. & Schroll, John T. (U Michigan) **Evaluative and taxonomic encoding in children's memory.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 426-437.—Conducted 2 experiments with a total of 168 2nd, 3rd, 5th, and 6th graders to investigate the development of evaluative and taxonomic encoding in children's memory. The task used was a modification of D. D. Wickens's short-term memory task in which Ss' recall of words is tested following a distraction task. Exp I found that 11-yr-old children, but not 8-yr-old children, encoded words using the evaluative dimension of the semantic differential. In Exp II, both 7- and 11-yr-olds demonstrated the ability to encode words according to taxonomic categories. (19 ref)—*Journal abstract*.

9268. Kail, Robert V. (U Michigan) **Familiarity and attraction to stimuli: Developmental change or methodological artifact?** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 504-511.—113 7-, 9-, and 11-yr-old children viewed a series of stimuli consisting of Chinese characters exposed a different number of times. Following exposure to the stimuli, Ss ranked the stimuli according to liking. 7 and 9 yr olds preferred the more familiar characters to those seen less frequently, but the oldest children preferred novel stimuli. In rankings taken 3 wks after original exposure a subsample of 11 yr olds preferred the more familiar characters. Results suggest that discrepancies obtained in previous research on the affective consequences of mere exposure are of methodological rather than developmental origin. Possible critical differences in procedure are discussed. (15 ref)—*Journal abstract*.

9269. Kendler, Howard H. & Helland, Joan. (U California, Santa Barbara) **Ontogenetic changes in classification behavior.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 456-458.—Conducted a developmental study of free-classification behavior within the age range of 3.5-19 yrs, using 192 Ss. Results indicate that categorical responses, which are characteristic of adult human behavior, increased with age; overgeneralized responses—classifications including noncategorical instances—decreased with age. Overdiscriminated responses which are incomplete categorical classifications increased from ages 3.5 to 6 yrs and then decreased to 19 yrs of age. These results are discussed within a 2-stage theory of conceptual development by H. Kendler (1971).—*Journal abstract*.

9270. Kopp, Claire B. (U California, Los Angeles) **Fine motor abilities of infants.** *Developmental Medicine & Child Neurology*, 1974(Oct), Vol 16(5), 629-636.—Classified 26 full-term and 10 preterm infants 8 mo old as either coordinated or clumsy in fine motor movements. Coordinated babies did significantly more manipulative and oral object-exploring than the clumsy ones, each group showing a distinct style of object interaction. (French, German, & Spanish summaries) (22 ref)—P. W. Pruyser.

9271. L'vov, M. R. (Magnitogorsk Pedagogical Inst, USSR) **[The nature of the written language of high school students.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 150-154.—Performed a quantitative study of the sentence structure of 67,580 sentences

collected from essays written by students in Grades 3-10 over a period of 7 yrs. Statistical regularities in the development of the use of written language are noted.

9272. Lesser, Harvey. (Rutgers State U, Camden) **Children's unusual responses to observed movement.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 201-206.—Investigated V. Olum's finding that 7-yr-old children, in contrast to adults, give unusual responses to observed movement. The following procedural changes were made: (a) stimuli was presented without repetition, (b) neutral instructions were used, (c) different and more complicated stimuli were used, and (d) 20 7-yr-old and 20 10-yr-old Ss were used. Results show the same unusual responses. They cannot be explained as an effect of repetition, particular stimuli, or procedure. The younger Ss' responses were less accurate and more variable. The finding supports Piaget's perceptual theory as it relates to stages of cognitive development.—*Journal abstract*.

9273. MacDonald, Randolph; Hines, Brainard & Kenoyer, Charles. (West Virginia Dept of Mental Health, Children's Mental Health Services, Charleston) **Socioeconomic status as related to two levels of conceptual attainment.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 195-199.—Conducted a study of approximately 225 3-5 yr old children to test 4 of A. R. Jensen's (1969) hypotheses relating socioeconomic level and certain types of concept learning. Ss were administered 5 subtests, identified as corresponding to Jensen's 2 levels of cognitive functioning, of the Illinois Test of Psycholinguistic Abilities. Results show that tasks reflecting both Level I and Level II abilities were performed with more accuracy by preschool children identified in the upper socioeconomic status (SES) level; this performance remained the same even after the variable of IQ was controlled for by covariance for the SES levels. It is suggested that the results may reflect a general state of cognitive deprivation for children in the lower SES level as opposed to a specific Level II deficit. However, the performance on Subtest 2 (visual reception) was not significantly different for the 2 socioeconomic groups involved. Thus, the Level I-Level II dichotomy has not been substantiated, and the corollary hypotheses have equivocal substantiation.—*Journal abstract*.

9274. Morrison, Frederick J.; Holmes, Deborah L. & Halth, Marshall M. (Dartmouth Coll) **A developmental study of the effect of familiarity on short-term visual memory.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 412-425.—Investigated whether previously reported limitations on young children's full-report capacity lay in a smaller amount of available information, in a shorter trace duration of information in visual information storage (VIS), or in poorer coding of information into permanent storage. 5 and 8 yr olds and undergraduates ( $N = 36$ ) were shown an 8-item array of figures, followed at varying intervals by an indicator signaling the S to report the figure to which the indicator had pointed. 3 levels of familiarity were used. While no age differences were revealed in amount of information available or in the trace duration of information in VIS, strong age differences emerged in coding of information into permanent storage. The differences seemed to lie in the use of organized visual coding and rehearsal

strategies by adults and their relative lack of use by children. (17 ref)—*Journal abstract*.

9275. Mulford, W. R. & Young, R. E. **Cognitive development studies in Papua New Guinea.** *New Guinea Psychologist*, 1973, Mono Suppl No 5, 23 p.—A review of the literature on cognitive development in Papua New Guinea reveals that most studies do not find the people engaging in abstract thinking. Anthropological observations of social and moral behavior reinforce this impression of concrete thinking. Attitude and value studies have found an emphasis on pragmatism and a punishment-obedience orientation. Possible explanations for these findings include the fact that most studies were conducted by foreign, white social scientists. The preferred explanation is that problem-solving skills with long histories in other cultures are new in Papua New Guinea, whose people are therefore at an earlier stage of cognitive development. (36 ref)—*C. Wright*.

9276. Nelson, Lois N. (San Francisco State U) **The development of cognitive operations in young children.** *Journal of Educational Research*, 1974(Nov), Vol 68(3), 116-123.—Investigated the age when certain cognitive operations involved in conservation of number, mass, and continuous quantity develop in young children. 257 5.4-7.7 yr old kindergartners and 1st graders were exposed to 3 conservation tasks, 84% of the 5-yr-old group and 94% of the 6-yr-old group understood equivalency and reversibility involved in conservation of number. It appears that conservation of number is developed at an earlier age than the normative data suggests. Performance on conservation of mass and continuous quantity tasks indicated that most Ss were not able to conserve mass and quantity before the age of 7 yrs. No significant sex difference was found in the performance of males and females on any of the 3 tasks at any age level.—*Journal abstract*.

9277. Okonji, M. O. (U Lagos, Nigeria) **The development of logical thinking in preschool Zambian children: Classification.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 247-255.—Conducted a study of a total of 128 3-6 yr old children from high and low socioeconomic backgrounds to determine the extent to which Ss displayed the pattern of the early classificatory behavior described by B. Inhelder and Piaget (1967). Ss were given a classificatory task comprising pieces of wooden geometric shapes which also varied in color and size. Sorting was done under 2 conditions—free sorting and guided sorting. Results show that these Ss were not yet able to form true classes as expected in light of Piaget's theory. It was observed, however, that "graphic collections" were not a dominant feature of Ss' classificatory performance. The usefulness of designating a substage of the growth of logic as the stage of graphic collections is questioned especially if it is intended to be a universal descriptive category. The need for longitudinal studies or cross-sectional studies covering from age 2 to beyond 11 yrs is stressed to streamline and strengthen the evidence from Africa suggesting that in overall pattern it is not different from the pattern observed elsewhere by Piaget and others.—*Journal abstract*.

9278. Philip, Hugh & Kelly, M. (Macquarie U, School of Education, North Ryde, NSW, Australia) **Product and process in cognitive development: Some compara-**



tive data on the performance of school age children in different cultures. *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 248-265.—Administered tasks derived from the theoretical positions of Piaget (1955) and J. Bruner (1966) to a total of 1,536 children, aged 5-15 yrs, in 3 cultures—New South Wales, Australia, and 3 different areas in Papua New Guinea. The tasks were divided into 2 groups—product (getting it right) and process (how it was done). Behaviors, representative of development according to the theories of Piaget and Bruner, were found in all 3 cultures. The order of difficulty of the Piagetian product tasks, with some minor exceptions, was the same for all 3 cultures, whether the children had been to school or not. The Bruner process tasks presented a different picture. There were material differences from culture to culture in the order of appearance of various identifiable processes. As difficulty of task increased, the process commonly used by the children of each culture changed. With the most difficult tasks, the children from all cultures tended to use the same process.—*Journal abstract*.

9279. Piaget, Jean & Inhelder, Bärbel. (U Geneva, Switzerland) *The origin of the idea of chance in children*. (Trans L. Leake et al). New York, NY: W. W. Norton, 1975. xx, 251 p. \$12.50.—Examines the formation of the physical aspects of the notion of chance and the development of combining operations which contribute to determining the relationship between chance, probability, and the mind's operating mechanisms. Theoretical and empirical findings are examined in relation to both random and combinatoric operations and different groups of Ss.

9280. Ploog, Detlev. (Max-Planck-Inst für Psychiatrie, Munich, W Germany) *Similarities and differences of behavior as a function of cerebral evolution and dissolution*. *Social Science Information*, 1974(Jun), Vol 13(3), 83-95.—Analyzes behavior from the viewpoint that there is no dichotomy between humans and other primates. Language and speech are based upon special human biology, with new faculties within past biological framework. Behavior similar to other primates is, however, part of a human response; there is no purely animal residue, nor uniquely human behavior, as totally separated from animal. Vocal communication demands parallel evolution of signal system, motor control, sensory reception, and cortical decoding. 8 different squirrel monkey calls have been elicited by localized cortical stimulation in research cited, and these calls were shown to be identifiably present in neonate monkeys. Deafened adults retained the calls, and fetuses of squirrel monkeys muted during pregnancy had vocal ontology similar to normals. This animal does not need feedback for vocal behavior, and any modifications of this behavior are limited to length and intensity of calls, not variety. Man, however, has cerebral representation into the substrate of the motor cortex and therefore a varied ontology of phonemes and vocal patterns, paralleled by vocal tract evolution. (25 ref)—R. J. Anderson.

9281. Rich, Eugene C.; Marshall, Richard E. & Volpe, Joseph J. (Washington U, Medical School) *The normal neonatal response to pin-prick*. *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 432-434.

—Gave 5 pinpricks in rapid succession, moving proximally along the medial side of the leg from just below to above the knee, to 130 healthy neonates. The response was movement of upper and lower limbs, usually accompanied by grimace and/or cry. (German, French, & Spanish summaries)

9282. Scandura, Joseph M. & McGee, Robert. (U Pennsylvania) *An exploratory investigation of basic mathematical abilities of kindergarten children*. *Journal of Structural Learning*, 1972, Vol 3(3), 79-98.—Studied certain basic mathematical abilities with which kindergarten children enter school, particularly the ability to perform certain types of conservation tasks and the processing skills involved in learning and transmitting mathematical knowledge. 4 types of processing skills were studied in 16 kindergarten children: ability to detect regularities, to describe regularities, to interpret descriptions of regularities, and to make simple deductions. Results suggest that these skills are not possessed by the majority of children entering school, and cannot be assumed in planning instruction.—R. S. Albin.

9283. Smoll, Frank L. (U Washington) *Development of rhythmic ability in response to selected tempos*. *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 767-772.—Studied the development of space-time characteristics of children's motor responses to auditory rhythmic stimuli. 20 Ss were randomly selected from each of 6 groupings representing ages 6-11 yrs. Utilizing a rhythmic analysis system, Ss performed 16 consecutive motor responses in time with auditory rhythmic stimuli presented at intervals of 1.4, 1.1, and .8 sec. Findings indicate a significant reduction of error in spatial and temporal accuracy with increasing age for each tempo. However, the Tempo main effect was not significant, and no level of tempo interacted with any specific level of age. The influence of personal rhythm on responses to externally imposed tempos is discussed.—*Journal abstract*.

9284. Somerville, Susan C. (U Melbourne, Vic, Australia) *The pendulum problem: Patterns of performance defining developmental stages*. *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 266-281.—Performance on B. Inhelder and Piaget's (1958) pendulum problem was obtained as a validating measure in a study of 236 children, aged 10-14 yrs, investigating the transition from concrete to formal thinking. A detailed scoring procedure was devised, which distinguished method from content aspects of performance on the problem and which allowed categorization of each child into 1 of 9 developmental stages; quantitative performance scores were also derived. Overall level of performance on the pendulum problem was strongly related to age, but not to sex or to school attended. In general, the results support Inhelder and Piaget's account of the transition from concrete to formal thinking. However, a specific problem, for their theory, arises from the relationship between method and content aspects of performance in the early formal operational stage. This problem is discussed in detail and attention is drawn to the effects of a child's expectations on his performance.—*Journal abstract*.

9285. Strauss, Sidney & Liberman, Dov. (Tel-Aviv U, School of Education, Israel) *The empirical violation of conservation laws and its relation to structural change*.

*Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 464-479.—In 2 experiments, 105 4-10 yr old concrete operational Ss were provided empirical evidence of nonconservation of discontinuous quantity and weight. Few Ss accepted this evidence. This was interpreted as supporting the organismic-developmental claim that lower forms of reasoning are transformed into structurally more advanced forms. It was also found that (a) probing provided a more accurate assessment of Ss' operational levels, (b) one could empirically distinguish between logicomathematical and physical knowledge, and (c) the former was understood by Ss to be nomically necessary and the latter, in the case of weight, may not be. (26 ref)—*Journal abstract*.

9286. Strzyzewski, Stanislaw. (Coll of Physical Training, Katowice, Poland) [Youth from Bydgoszcz primary schools in the light of J. C. Raven's Progressive Matrices Test.] (Polish) *Przegląd Psychologiczny*, 1973, Vol 16(1), 61-70.—1,436 girls and 1,382 boys, 8.5-15.5 yrs old were given 30 min to solve 5 series of 12 problems each. Results indicate that (a) boys and girls do not differ in reasoning abilities, (b) maximal development of reasoning takes place before 14 yrs of age, and (c) interpersonal distribution of reasoning abilities is normal for the youngest groups and becomes increasingly negatively skewed with age. (Russian & English summaries)

9287. Swanson, Guy E. (U California, Berkeley) **Family structure and the reflective intelligence of children.** *Sociometry*, 1974(Dec), Vol 37(4), 459-490.—Piaget, and more explicitly, G. H. Mead (1934), have suggested that a child's being reared in groups which institutionalize and integrate diverse points of view will foster the use of reflective intelligence. Scores on 2 Piagetian cognitive tasks were obtained from 103 children and adolescents who came from 52 families in the Oakland Growth Study. These scores were then correlated with the patterns of corporate decision making found in these families, and the result suggested by Mead was obtained. This result survived when each of several variables was controlled, including the age and sex of the children, IQ and Piagetian cognitive scores of their parents, the socioeconomic status of the families, and the "warmth" of familial relations. The children's IQ scores were not related to the patterns of decision making in their families, but were related to indices of familial warmth. (3 p ref)—*Journal abstract*.

9288. Timko, Henry G. (U Victoria, Toronto, Ontario, Canada) **Effects of discrimination training mode and letter similarity on paired-associate learning.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 71-72.—Tested 40 1st graders to determine the effect of presentation mode (simultaneous vs successive) and letter similarity (similar—b, d, q vs distinctive—m, s, c) on visual discrimination learning. An attempt was also made to determine what effect the differential initial learning conditions have on subsequent paired-associate learning. On initial learning, Ss performed significantly better on the simultaneous mode and on distinctive letters ( $p < .01$ ). A significant interaction showed that simultaneous discriminations were easier to learn than successive discriminations with similar letters but not with distinctive letters. The letter similarity dimension

produced the only significant difference on the transfer task ( $p < .05$ ).—*Journal abstract*.

9289. Tyrrell, Donald J. (Franklin & Marshall Coll) **Crossmodal transfer of conceptual responding in children.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-A), 269-271.—Compared the speed with which 48 3rd-grade children acquired the oddity concept in the haptic and visual modalities and assessed the extent to which they transferred that concept to problems presented in the alternate modality. Ss were presented with 2 consecutive 2-choice discrimination problems or 2 double-stimulus oddity problems. Half of the children received these training problems in the visual modality, while the remainder experienced the problems by active touch; all children were then presented with 2 double-stimulus oddity problems in the alternate modality. During original learning, the tactual oddity task was more difficult than both the visual oddity problem and the tactual discrimination problem. All oddity trained groups learned the crossmodal oddity task at a rate superior to the children given discrimination training. It is concluded that crossmodal transfer of the oddity concept did occur. (15 ref)—*Journal abstract*.

9290. Zajonc, R. B. & Markus, Gregory B. (U Michigan, Research Ctr for Group Dynamics) **Birth order and intellectual development.** *Psychological Review*, 1975(Jan), Vol 82(1), 74-88.—Describes a confluence model that explains the effects of birth order and family size on intelligence. Intellectual development within the family context is conceived of as depending on the cumulative effects of the intellectual environment, which consists primarily of the siblings' and parents' intelligence. Mutual influences, through time, on the intellectual development of the siblings are described by the growth parameter  $\alpha$ . The confluence model predicts positive as well as negative effects of birth order, a necessarily negative effect of family size, and a handicap for the last born and the only child. The model explains several features of a large birth order study carried out on nearly 400,000 19 yr olds. Extensions of the confluence model to other social processes are discussed, along with the usefulness of the confluence model in explicating the emergence of individual differences in a social context. (39 ref)—*Journal abstract*.

9291. Zimmerman, Barry J. & Rosenthal, Ted L. (Graduate School & University Ctr, City U New York) **Conceptual generalization and retention by young children: Age, modeling, and feedback effects.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 233-245.—Studied the effects of modeling and corrective feedback on conceptual rule acquisition and retention with 24 3- and 24 4-yr-old children. Results show that (a) brief observation of a model was effective in creating significant acquisition and retention of conceptual rule judgments and explanations, (b) corrective feedback improved the S's ability to explain the conceptual rule but did not assist nonverbal performance, (c) the facilitative influence of corrective feedback was largely confined to the 4-yr-old age group, and (d) 4-yr-old Ss were more successful than 3-yr-olds in learning to provide viable reasons for conceptual judgments. (19 ref)—*Journal abstract*.



## Emotional &amp; Personality Development

9292. Chudnovskii, V. E. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) [The stability of personality as a problem in the psychology of child-rearing.] (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 43-58.—Considers the nature, origin, and dynamics of the moral aspects of personality. Consistency in personality results from the incorporation of moral norms into character. The difference between stability of the physiological bases of individuality and consistency in behavior is stressed. Consistent personal behavior and nonconformity are considered 2 different things; Western conformity and group pressure research is criticized. Features of moral development are described, the importance of personality formation in the course of upbringing is underlined, and the role of future goals and of a time perspective in moral development is discussed. In the discussion of age-related trends in moral development the internalization of group values and the shift of the center of gravity of a value framework toward society and societal groups is stressed as an indispensable aspect of moral development. The methodology of research on the stability of personality is also considered. (English summary) (41 ref)—L. Zusne.

9293. Goggin, James E. (Texas Tech U, Medical School) Dependency, imitation learning, and the process of identification. *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 207-217.—Conducted a study of 73 preschool children (41 males and 32 females) to investigate the relationship between dependency and imitation learning. Instrumental dependency and emotional dependency were measured by a naturalistic behavioral observation technique. Purposive and incidental imitation learning were taught by modeling procedures. The Ss' degree of emotional dependency was related to their propensity to imitate the model's irrelevant behavior (i.e., incidental learning). While the nature of the postulated relationship remained unclear, the results suggest that sex and age were influential factors. (17 ref)—*Journal abstract*.

9294. Herzog, John D. (Northeastern U) Initiation and high school in the development of Kikuyu youths' self-concept. *Ethos*, 1973(Win), Vol 1(4), 478-489.—Studied the effect of initiation rites on the self-images of Kikuyu boys. It was found that initiation alone did not have an immediate impact on Ss' self-concepts, but that initiation combined with secondary education led to the development of mature and sexually appropriate self-images.

9295. McConochie, Daniel; Greenberger, Ellen & Josselson, Ruthellen. (Johns Hopkins U, Ctr for Social Organization of Schools) An exploratory examination of individual, family and school influences on psychosocial maturity. *Center for Social Organization of Schools Report, Johns Hopkins University*, 1974(Nov), No 184, 40 p.—Presents exploratory analyses of the relative effect of various individual, school, and family characteristics on Individual Adequacy and Social Adequacy—2 of the summary variables developed to measure theoretical components of psychosocial maturity. Multivariate analyses were conducted using sex, parental education, racial composition of the school, and fathers' education-

al level of the school as independent variables. The study used samples of 5th, 8th, and 11th grade students in 29 schools. Separate analyses were conducted for black and white students at each grade level. Results indicate that individual, family, and school characteristics have different potency in explaining variations in students' individual and social adequacy, depending on the race, sex, and year in school.—*Journal abstract*.

## Social Behavior &amp; Family Relations

9296. Baider, Lea & Rosenfeld, Eva. (Hebrew U, Paul Baerwald School of Social Work, Jerusalem, Israel) Effect of parental fears on children in wartime. *Social Casework*, 1974(Oct), Vol 55(8), 497-503.—Suggests, on the basis of recent war experiences in Israel, that parental fear reactions are especially traumatic for the small child when the parents try to protect him by denying the facts of war. Illustrations are cited which show that small children react to unexplained and hidden stress in their environment with distress. Children notice and can be helped to comprehend events that affect their lives. When an adult is able to act as mediator and interpreter of stressful events, the child's anxiety lessens and both adult and child find a new source of comfort and strength in each other.—M. W. Linn.

9297. Bengtson, Vern L.; Furlong, Michael J. & Laufer, Robert S. (U Southern California) Time, aging, and the continuity of social structure: Themes and issues in generational analysis. *Journal of Social Issues*, 1974, Vol 30(2), 1-30.—A review of the literature indicates that 3 progressive stages of theory and research in generational analysis can be traced: (a) a "classic" period during which competing perspectives were developed regarding the impact of youth groups on social structure, (b) a phase focused on interpretations of the youth protest movement or on processes in old age, and (c) a period of consolidation with more precise specification of competing theoretical frameworks and the analysis of increasing empirical data. 5 issues which summarize the perspectives of generational analysis are identified and discussed—definition of "generation" as a construct, the degree of continuity between age groups, the persistence of generation units over time, within-generation solidarity, and the articulation between generations and other elements of social structure. A feedback model appears useful in assessing the relationship between generations and social change. (4% p ref)—*Journal abstract*.

9298. Braungart, Richard G. (Syracuse U) The sociology of generations and student politics: A comparison of the functionalist and generational unit models. *Journal of Social Issues*, 1974, Vol 30(2), 31-54.—An examination and comparison of 2 competing interpretations of generational conflict—the functionalist model of S. N. Eisenstadt and T. Parsons and the generational unit model of K. Mannheim—reveals that the generational unit model provides more theoretical and empirical opportunities for investigation than the functionalist model. While both interpretations share similar sequential characteristics, each predicts the emergence of youth politics employing different sets of independent and intervening variables. Both interpreta-

tions appear to be the result of current domestic and international conditions. (3 p ref)—*Journal abstract*.

9299. Brody, Eugene B.; Ottey, Frank & LaGranade, Janet. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Couple communication in the contraceptive decision making of Jamaican women.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 407-412.—Almost  $\frac{1}{2}$  of 80 female Jamaica Family Planning Association clients made their decisions to contracept without prior discussion or agreement with their mates. 20 of these women were compared with a group matched according to age and occupation who had discussed contraceptives with mates prior to using them. The prevalent form of cohabitation for both groups was a common-law household. Most regarded Jamaican men as irresponsible and sexually promiscuous, felt a woman's primary responsibility to be to her mother rather than to her mate, were reared in families headed by women, did not believe that they had been given adequate sexual information while growing up, and resented this lack. The unilateral decision makers in contrast to the joint decision makers had initial coitus at a younger age, became pregnant earlier, had more mates, more often regarded husbands as a burden than a help, and had briefer current relationships with mates.—*Journal abstract*.

9300. Carlsmith, Lyn. (Stanford U) **Some personality characteristics of boys separated from their fathers during World War II.** *Ethos*, 1973(Win), Vol 1(4), 466-477.—Compared the aptitudes, interests, and other personality characteristics of boys whose fathers were absent during World War II with those of boys whose fathers were present. A sample of 20 Harvard sophomores from intact families who reported that their fathers had left before they were 6 mo old and had been absent between 22 and 36 mo was compared with a matched sample of 20 students who had not been separated from their fathers. Each S was administered Terman and Miles's Attitude Interest Analysis Test, the Strong Vocational Interest Blank, a semantic differential measuring self-evaluation and potency, and a 2-hr interview. It was found that father-absent Ss showed more feminine vocational interests and more satisfaction with their present identity than did father-present Ss. It is concluded that absence of the father during early childhood has a significant, but not necessarily negative, long-range effect on development.—*J. Kelly*.

9301. Collins, John K. & Harper, Juliet F. (Macquarie U, School of Behavioral Sciences, North Ryde, NSW, Australia) **Problems of adolescents in Sydney, Australia.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 187-194.—Investigated the problems of 514 14-15 yr old male and female adolescents, using an open-ended questionnaire. Results show that while there was a high correlation between problem areas for boys and girls, boys reported more problems concerned with educational adjustment and girls more problems concerned with family adjustments. The mean number of reported problems by girls was significantly higher than those reported by boys. It is concluded that the problems of the Sydney adolescent are basically similar to those of adolescents in other Western cultures. (16 ref)—*Journal abstract*.

9302. Connolly, Kevin & Bruner, Jerome (Eds.). (U Sheffield, England) **The growth of competence.** London, England: Academic Press, 1974. xii, 327 p. \$17.50.—16 papers discuss evolutionary perspectives of the development of moral and social competence in children, as well as the relationship between this competence and mother-child relations, language acquisition, personality, and clinical and social policies.

9303. Danziger, Kurt. (York U, Toronto, Ontario, Canada) **The acculturation of Italian immigrant girls in Canada.** *International Journal of Psychology*, 1974, Vol 9(2), 129-137.—Found that immigrant girls of Italian parentage, in contrast to boys, experience the effects of parental conservatism as it relates to sex roles, expectations, and decision making. Greater conservative demands upon females may reflect a belief that the woman maintains the traditional family culture.

9304. Kol'tsova, M. M. (USSR Academy of Pedagogical Sciences, Inst of Child & Juvenile Physiology, Leningrad) **[Physiological role of verbal signals in the development of voluntary movements.]** (Russ) *Zhurnal Vysshei Nervnoi Deyatel'nosti*, 1972(Jan), Vol 22(1), 10-15.—Compares the views of Russian and foreign authors on the question of which motor reactions to verbal signals are voluntary. Investigation of the reactions of school children to commands indicates that the degree of voluntariness depends mainly on the S's ability to form systems of conditioned connections a priori, and not on the amount of freedom given by different types of command. A state of tonic excitation of the corresponding structures of the brain is suggested as the necessary physiological mechanism for this ability.—*J. Larsen*.

9305. Kolominskii, Ya. L. **[The socio-psychological nature of children's groups.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 31-40.—Reviews the work of the author and others sharing his position on the interaction between the developing and mature personality and society. The work is based on sociometric studies of the intragroup structure of small groups and small group-society relationships. Intragroup relations are described in terms of 2 criteria: level of relational satisfaction and an index of isolation. A mutuality coefficient is computed to describe the internal structure of small groups composed of individuals of different ages. Computations are presented that allow the identification of the structural units of groups, called the range of preferred contacts. The substantive contents of intragroup relations are examined and their influence on personality formation discussed. (English summary)—*L. Zusne*.

9306. Lietaer, Germain. (U Leuven Counseling Ctr, Belgium) **[Netherlands revision of Barrett-Lennard's Relationship Inventory: A factor-analytical approach to student-parent relationships.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(May), Vol 29(3), 191-212.—Revised and extended G. T. Barrett-Lennard's Relationship Inventory (RI) from 64 to 123 items, divided into subscales of empathy, positive disposition, genuineness, and unconditionality. The RI measures the feelings of 1 person towards another and indicates how he thinks the other regards him. The revised form measures the S's regard for his parents and his view of how his parents consider him. Ss were 800 university students; half responded with



reference to their fathers and half with reference to their mothers. Factor analysis indicated the subscales originally identified as empathy, positive disposition, the communicative aspects of genuineness, unconditionality, and directivity. The reliabilities of the first 3 subscales ranged from .80 to .90. The 5 subscales were incorporated into a new test, with 10 items for each subscale.—A. J. Ter Keurst.

9307. Longabaugh, Richard. (Brown U) **Mother behavior as a variable moderating the effects of father absence.** *Ethos*, 1973(Win), Vol 1(4), 456-465.—Tested the hypotheses that father-absent boys have a more feminine semantic style than father-present boys, and that father-absent homes have a higher rate of mother-son interaction than father-present homes. 51 mother-child dyads were selected for study from a group of black, lower-class households. Children ranged in age from 5 to 12 yrs, and 18 were from households in which the father had been absent for at least 2 yrs prior to the study. Mother-child interactions were observed and coded with a resource process coding system, and each child was administered a modified semantic differential test. No significant relationship was found between father absence and masculinity of semantic style of either sons or daughters. Father absence was related to alterations in the behavior of mothers toward sons. It is concluded that increased mother-son interaction moderates the impact of father absence on the femininity of the son's semantic style.—J. Kelly.

9308. Miller, H. Richard & King, E. M. (Southern Illinois U) **Sex education for parents using behavioral rehearsal.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 28-31.—Considers that traditional sex education methods have failed. School-centered programs provide too little, too late, but are better than no sex education at all. Sex education programs for parents fail because they do not reduce the parents' anxiety in talking about sex and do not permit the parents to practice. A new approach to sex education for parents using behavior rehearsal—Behavior Rehearsal Adult Sex Education, BRASE—is described. Behavior rehearsal involves having parents role play in response to children's questions and giving them helpful feedback on their performance. A posttraining questionnaire sent to 82 participants in this program indicates that behavior rehearsal significantly improves parents' ability to talk with their children about sex. (Spanish & French abstracts)—*Journal abstract*.

9309. Miller, Warren B. (Stanford U, Medical School, Lab of Behavior & Population) **Relationships between the intendedness of conception and the wantedness of pregnancy.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 396-406.—Studied the relationship between the "intendedness" of conception and the "wantedness" of pregnancy in 221 predominantly white, middle-class women who reported on 379 conception-pregnancies. Virtually all consciously intended conceptions led to fully wanted pregnancies, but conceptions resulting from inadequate contraception or from contraceptive accidents fell evenly across the full range of wantedness. Ss had a "wantedness reserve," in that 15% of the conceptions were subintended (i.e., were less than fully intended), yet led to fully wanted pregnancies. The

absolute levels of intendedness and wantedness and the wantedness reserve varied during the different sexual-procreational phases of the Ss' life cycle. These variations confirmed the existence of 4 previously hypothesized points in the life cycle during which women are especially vulnerable to the occurrence of an unwanted pregnancy. The variations in the wantedness reserve showed some independence from the measures of intendedness and wantedness, supporting the proposition that the wantedness reserve is a fertility measure which deserves separate consideration.—*Journal abstract*.

9310. Salas, Eduardo J. [Notes on the study of the role of parents in development, technical consequences, and applications in psychotherapies.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 403-438.—Presents a synthesis of ideas on the role of parents, especially the father, in the psychoanalytic development of children.

9311. Schwartz, Barbara K. (U New Mexico, Medical School) **Easing the adaptation to parenthood.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 32-39.—Recent data has suggested that a critical bonding period immediately following birth is present in humans as well as in certain other mammals. This bonding may be disrupted by a variety of factors including hospital procedures and postpartum emotional problems and, if disrupted, may be a contributing factor in such problems as child abuse. Criteria for spotting "high-risk parents" are enumerated, and a group approach is suggested which could help members adapt to their roles as parents. (Spanish & French abstracts) (3/4 p ref)—*Journal abstract*.

9312. Stokols, Daniel. (U California, Program in Social Ecology, Irvine) **Toward a psychological theory of alienation.** *Psychological Review*, 1975(Jan), Vol 82(1), 26-44.—Views the experience of alienation as a sequential-developmental process which (a) develops in the context of an ongoing relationship between an individual and another person or group of people, (b) involves an unexpected deterioration in the quality of outcomes provided to the individual by the other(s), and (c) persists to the extent that the individual and the other(s) remain spatially or psychologically proximal. On the basis of 2 variable components, personal-neutral thwarting and salience-nonsalience of alternatives, a typology of estrangement experiences is proposed which includes 4 behavioral syndromes: isolation, reintegration, subjugation, and rebellion. Though in each of these syndromes the individual's appraisal of the situation leads to at least temporary disillusionment, the induction of persisting cognitive changes as a result of one's exposure to personal thwarting by another is viewed to be the central and unique feature of the alienation experience. (51 ref)—*Journal abstract*.

9313. Wills, Thomas A.; Weiss, Robert L. & Patterson, Gerald R. (U Oregon) **A behavioral analysis of the determinants of marital satisfaction.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 802-811.—Tested hypotheses about the determinants of global ratings of marital satisfaction, the role of reciprocity in marital interaction, and the influence of external experiences on the marital relationship. 7 nondistressed

married couples made daily observations of their spouse's pleasurable and displeasurable behavior for 14 consecutive days and daily ratings of the enjoyability of their outside experiences and of their satisfaction with the relationship. Multiple regression analysis, with satisfaction ratings as the criterion variable, showed that both types of displeasurable behavior contributed to rated satisfaction, accounting together for 65% of the explainable variance. For pleasurable behaviors, a sex difference was noted, with males emphasizing pleasurable instrumental behaviors from their spouses and females emphasizing pleasurable affectional behavior. The immediate tendency to reciprocate displeasurable behaviors was stronger than that for pleasurable behaviors. The influence of external experiences was negligible. (23 ref)—*Journal abstract*.

9314. Wilson, Richard W. (Rutgers State U) **Learning to be Chinese: The political socialization of children in Taiwan.** Cambridge, MA: MIT Press, 1970. xiii, 203 p. \$2.95.—Attempts to explain the often puzzling behavior of the Chinese in terms of the concept of "face" and how Chinese children acquire attitudes toward authority, group cohesiveness, acceptable targets for aggression, and other nonpolitical but relevant aspects of personality. Data from 3 large primary schools are presented, and the relationships of "face" to group loyalty, political hierarchies, and political stability and how this relationship affects the style of government in China are discussed. (6½ p ref)

9315. Wolfgang, Charles. (Ohio State U) **An exploration of the relationship between the cognitive area of reading and selected developmental aspects of children's play.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 338-343.—Reports on the relationship between the level of play attained by a child and his initial reading ability, using L. S. Vygotski's schemata to classify the child's level of play. Ss were 30 1st-grade boys who were classified as good or poor readers on the basis of the paragraph meaning scores of the Stanford Achievement Test. The better readers appeared to achieve the dramatic level of play while the poor readers were still engaged in fantasy play.—H. Kaczowski.

#### Adult Development & Aging

9316. Ames, Louise B. **Calibration of aging.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 507-529.—Studied 92 57-92 yr old Ss to find a battery of psychological tests which would effectively measure their level of intactness or deterioration of function. 5 tests were used: the Rorschach Test, Gesell Incomplete Man Test, Bender Gestalt, Monroe's Visual Three, and the Color Tree Test. Ss were identified as normal adult, intact presenile, medium presenile, and deteriorated, on the basis of their Rorschach response. To check on the adequacy of this sorting, responses of each group were averaged for each of the other 4 tests. Differences between the several groups, on every test, were significant as measured by the median test ( $p < .001$ ).—*Journal abstract*.

9317. Butler, Robert N. (Washington School of Psychiatry, DC) **Successful aging and the role of the life review.** *Journal of the American Geriatrics Society*, 1974(Dec), Vol 22(12), 529-535.—Contends that the

negative view of old age, with its across-the-board labels of unproductivity, inflexibility, and senility, must be changed if the elderly are to have more opportunities for successful aging. It is stressed that there is a distinct difference between the intrinsic features of aging and the reactions of the elderly to their lives. Old age can be a period in which unique developmental work can be accomplished, a time when one can find use for what he has obtained in a lifetime of learning and adapting. Review therapy and life-cycle group therapy are cited as effective aids in this direction.—*Journal abstract*.

9318. Douse, Len. **Older people: Recreation's greatest challenge?** *Journal of Leisureability*, 1974(Oct), Vol 1(4), 18-24.—Stresses the life-long nature of the learning process and the need to continue this process into old age. Preretirement education which teaches people to deal effectively with their changed circumstances is suggested, and it is noted that many older people are capable of learning new physical and mental skills.

9319. Giambra, Leonard M. (National Inst of Child Health & Human Development, Gerontology Research Ctr, Baltimore, MD) **Daydreaming across the life span: Late adolescent to senior citizen.** *International Journal of Aging & Human Development*, 1974(Spring), Vol 5(2), 115-140.—Used the Imaginal Processes Inventory to investigate the effects of aging on daydreaming and related mental activity in 378 predominantly white middle-class or upper middle-class males 17-91 yrs old. Daydreaming frequency declined linearly with age. A linear decline was also observed in absorption in daydreaming, daydreams with future temporal settings, affective reactions in daydreams, imagery and vividness in daydreams, and content involving sex, bizarre-improbable events, achievement, hostility, heroism, fear of failure, and guilt. No decline was observed for acceptance of daydreams, impersonal and interpersonal curiosity, mentation rate, past and present temporal setting in daydreams, and daydreams involving problem solving. Problem-solving daydreams were predominant at every age except the youngest where sexual daydreams predominated. A factor analysis revealed 7 factors, 4 of which involved age. It is concluded that daydreaming reflects current concerns and not suppressed desires.—*Journal abstract*.

9320. Heritage, Jeannette G. & Daniels, Jack L. (Middle Tennessee State U) **Postdivorce adjustment.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 44-49.—Administered the 16 Personality Factor Questionnaire and A. H. Hilden's Q-Sort of Personal Constructs to 104 divorced persons. Ss were classified according to the degree of postdivorce adjustment, degree of religious activity, presence or absence of children during the marriage, duration of marriage (more or less than 10 yrs), time since divorce (more or less than 2 yrs), degree of contact with ex-spouse, and sex. 2 factors—Apprehension (O) and Tenseness (Q)—contributed most to significant differences between the "better adjusted" and "poorer adjusted" (assessed by Q-sort results). The effects of the other variables appeared to be contingent on degree of adjustment. Advantages of the Q-sort in assessing adjustment of divorced persons are noted, and



6 recommendations for studying the effects of divorce are presented. (Spanish & French abstracts)—*L. Gorsey.*

9321. **Hutchison, Sam L.** (West Virginia Inst of Technology) **An investigation of learning under two types of social reinforcers in young and elderly adults.** *International Journal of Aging & Human Development*, 1974(Spr), Vol 5(2), 181-186.—Compared the verbal learning performance of 54 young Ss (median age 20 yrs) and 54 elderly Ss (median age 75 yrs) under a factorial design employing praise and reproof and verbal feedback as social reinforcers. Regardless of age group, all Ss made fewer errors under a feedback condition where a correct response was reinforced with a "right" and an incorrect response was not responded to by the E. Elderly Ss performed equally well under praise, reproof, and a neutral control condition. Younger Ss showed superior performance under the control treatment and poorer learning under both praise and reproof.—*Journal abstract.*

9322. **Jacobs, Jerry.** (Syracuse U) **An ethnographic study of a retirement setting.** *Gerontologist*, 1974(Dec), Vol 14(6), 483-487.—Data from a year-long study of residents in a white middle- to upper-class retirement community, heralded as a model retirement setting, show that promises of an active way of life went unfulfilled. The data, however, are contrary to the expectations of disengagement theory.

9323. **Katz, Michael M.** (VA Hosp, Allen Park, MI) **The effects of aging on the verbal control of motor behavior.** *International Journal of Aging & Human Development*, 1974(Spr), Vol 5(2), 141-156.—Investigated the effects of aging on self-control within the framework of A. Luria's theory of the verbal regulation of motor behavior. 48 Ss 65-96 yrs old were given a set of 24 tasks requiring them to either make or inhibit a motor response (pushing a lever) in the presence of different combinations of verbal and physical stimuli. Self-control was also assessed by their ability to write the phrase "New Jersey Chamber of Commerce" as slowly as possible. Performances on the 24 tasks were compared with those of children in previous research. It was found that verbal control of behavior remained strong until very late in life. Ss who did well on the 24 tasks displayed more self-control on the slow writing test, had faster regular writing speed, and were more active physically and socially in their everyday lives than those who did poorly. (20 ref)—*Journal abstract.*

9324. **Klassen, Deidre; Roth, Aleda & Hornstra, Robijn K.** (Greater Kansas City Mental Health Foundation, MO) **Perception of life events as gains or losses in a community survey.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 330-336.—Attempted to determine whether there are perceived differences in the desirability of life events for different groups of people. 190 adults aged 18 yrs or older rated 40 events as to whether they represented a gain or a loss (i.e., whether people would generally find the events desirable or undesirable). These ratings were analyzed across groups according to the sex, age, marital status, education, and race of the respondent. Findings indicate there was not great consensus about the gain-loss value of the items, but there was much agreement in the right direction. Only 15 of the 40 items showed agreement of 90% or more, whereas about

1/4 of the items showed agreement of 80% or more. Previous research found surprisingly high correlations on magnitude ratings across race, sex, age, marital status, education, and social class. Results of this study do not refute this finding, as the similarities for groups outweighed the differences. (16 ref)—*P. O'Brien.*

9325. **Kuypers, Joseph A.** (U California, Inst of Human Development, Berkeley) **Ego functioning in old age: Early adult life antecedents.** *International Journal of Aging & Human Development*, 1974(Spr), Vol 5(2), 157-179.—Examined the relationship between adaptability in old age and intelligence, health, socioeconomic status (SES), personality, and family relations in young adulthood. Correlations are reported between 3 alternative measures of old age adaptability (coping, defense, and disorganization) and measures in 5 areas of status and behavior in young adulthood (representing a 40-yr longitudinal analysis). Coping ability in old age is most associated with variations in intellectual capacity and SES, especially for women. Ego disorganization in old age is most related to variations in SES and family relations in young adulthood. The data suggest that adaptability in old age is associated with environments and behaviors early in adult life, but that the strength of the association over time varies according to the sex of the S, the model of old age adaptability used, and the aspects of status and behavior considered in young adulthood.—*Journal abstract.*

9326. **Lawton, M. Powell & Cohen, Jacob.** (Philadelphia Geriatric Ctr, PA) **Environment and the well-being of elderly inner-city residents.** *Environment & Behavior*, 1974(Jun), Vol 6(2), 194-211.—Attempted to estimate, using multiple regression methods, behavior attributable to environmental as compared with social factors. The well-being of 115 elderly Jewish residents of a high-crime, predominantly black slum in Philadelphia was studied in relation to demographic and environmental factors. The 6 environmental factors, reduced by principal components analysis from 34 environmental attributes obtained by observational methods, were (a) distance from area with high Jewish concentration, (b) distance from facilities, (c) independence of the household, (d) level of activity of people and vehicles on the S's block, (e) well-kept neighborhood, and (f) living on a residential block. Well-being was measured by indices derived from hour-long interviews: motility, morale, housing satisfaction, peer interaction, family interaction, and responsiveness to the interviewer. Neighborhood motility was high in areas of high Jewish concentration, with many independent households that tended to be distant from resources. The Ss rated as most alert and responsive by interviewers tended to live in the area of high Jewish concentration and in well-kept neighborhoods. Results demonstrate the explanatory power of environmental factors in some areas of behavior.—*S. T. Margulis.*

9327. **Levy, Judith M. & McGee, Richard K.** (U Florida, J. Hillis Miller Health Ctr) **Childbirth as a crisis: A test of Janis's theory of communication and stress resolution.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 171-179.—Investigated the relationship between expectation and subjective outcome in childbirth. 60 primigravidae responded to a question-

naire before and after labor and delivery. The evaluation of childbirth as favorable or unfavorable was related to whether the experience was rated better or worse than expectation. Anticipation of labor and delivery was positively related to a woman's perception of her mother's experience in childbirth, but was not related to the woman's evaluation of her actual delivery experience. Women receiving extreme communications or no information from their mother reported poorer outcomes than women who received moderate communications. Anxiety, as measured by the Taylor Manifest Anxiety scale, and denial, as measured by the Self-Criticism scale of the Tennessee Self-Concept Scale, were not related to anticipation or subjective outcome measures. Results support I. L. Janis's 1958 theory of psychological stress.—*Journal abstract.*

9328. Petrov, Ya. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General Adult Education, Leningrad) [Changes in the memory function in adults.] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 145-149.—Studied age-related changes in short- and long-term memory in adults 18-40 yrs old. The sample of 460 Ss was stratified according to age, sex, and education. Measures on 14 memory tests were scaled, with a mean of 100 and a standard deviation of 15, and intercorrelated. Age-related changes in the memory structure are described, of which the most salient are the fluctuation of memory measures between the ages of 18 and 40 yrs and the increase in the size of correlation among them with increasing age. (15 ref)—*L. Zusne.*

9329. Rindskopf, Kathryn & Charles, Don C. (Iowa State U) Instructor age and the older learner. *Gerontologist*, 1974(Dec), Vol 14(6), 479-482.—Conducted a study to determine whether learning is facilitated when teacher and student are of the same age group. Old and young instructors taught old and young students in controlled circumstances. Teachers were 4 25-yr-old male graduate students and 4 active or retired 55-70 yr old male professors. Learners were 40 female college students aged 17-23 yrs and 40 females aged 56-92. Results indicate no like-age facilitation; older learners profited from either age instructors, as did the young. The latter, however, preferred older instructors while older students liked both.—*Journal abstract.*

9330. Squire, Larry R. (U California, Medical School, La Jolla) Remote memory as affected by aging. *Neuropsychologia*, 1974(Oct), Vol 12(4), 429-435.—Exp I assessed memory for public events that occurred between 1930-1972 in 94 50-89 yr old medical inpatients of average education. With increasing age, performance declined similarly for all time periods sampled. No evidence for the selective preservation of remote memory was obtained. Similar results were found in Exp II in 101 60-89 yr old highly educated Ss. Results are taken to mean that aging produces a deficiency in recall that can extend to much, if not all, of remote memory. (French & German summaries) (20 ref)—*Journal abstract.*

Austria) [Forced marriage and the divorce court.] (Germ) *Praxis der Psychotherapie*, 1973(Jun), Vol 18(3), 104-113.—Reports on the incidence of marriages in Austria that were necessitated by premarital pregnancy and later ended in divorce.

9332. MacDonald, A. P. (U North Carolina, Developmental Disabilities Technical Assistance System, Chapel Hill) The importance of sex-role to gay liberation. *Homosexual Counseling Journal*, 1974(Oct), Vol 1(4), 169-180.—Conducted a study with 101 college students and faculty to determine characteristics of people who hold positive and negative attitudes toward homosexuality. In addition to a homosexual attitude scale, Ss were given the Intimacy Permissiveness Scale, and the Premarital Sexual Permissiveness Scale. Results indicate that Ss who held more negative attitudes toward homosexuals were more (a) likely to support a double standard between the sexes, (b) cognitively rigid, (c) intolerant of ambiguity, and (d) authoritarian. Data support the belief that attitudes toward homosexuals are maximally determined by the need to preserve masculine and feminine roles, and minimally determined by conservative sexual standards. (21 ref)—*Journal abstract.*

#### Culture & Ethnology & Race Relations & Religion

9333. Anant, Santokh S. (U Lethbridge, Alberta, Canada) The effect of political realignments during an armed conflict on ethnic stereotypes. *International Journal of Psychology*, 1974, Vol 9(2), 139-144.—Immediately before and after the 14-day Indo-Pakistani war, the same group of 42 Indian postgraduate students responded to a stereotype checklist that called for marking 5 traits judged most characteristic of persons of each of 7 nations. Following the war, stereotypic shifts toward positive perception accompanied ratings of nations that had favored India while perception of those that favored Pakistan became more negative.—*E. A. Gavin.*

9334. Ayres, Barbara. (U Massachusetts, Boston) Effects of infant carrying practices on rhythm in music. *Ethos*, 1973(Win), Vol 1(4), 387-404.—Studied the relationship between cross-cultural variations in the frequency and importance of regular rhythm in music and the amount of infantile stimulation derived from body contact with the mother. The psychological origins and functions of music are discussed. (26 ref)

9335. Banton, Michael. (U Bristol, England) 1960: A turning point in the study of race relations. *Daedalus*, 1974(Spring), Vol 103(2), 31-44.—Recommends that future research in race relations use multivariate methods of analysis. The price placed on the results of prejudices should be investigated as well as the phenomenon of race consciousness itself.

9336. Bennett, Don C. (Indiana U) Interracial ratios and proximity in dormitories: Attitudes of university students. *Environment & Behavior*, 1974(Jun), Vol 6(2), 212-232.—Surveyed 432 white and 92 black undergraduates, integrated in university dormitories, and representing 5% of the whites and 20% of the blacks in the dormitories, regarding their opinions about interracial

#### CULTURAL INFLUENCES AND SOCIAL ISSUES

9331. Cermak, Ida. (U Vienna, Psychiatric Clinic,



proximities and proportionalities. Both groups indicated they could feel comfortable with a higher percentage of the other race present than they preferred. However, blacks required fewer persons of their own race on their floors or in their buildings to feel comfortable than did whites. Both groups agreed that it was uncomfortable to be the only person attitudes their race on a floor or in a building. Both groups expressed preference for at least 50% occupancy by persons of their own race on their floor or in their building. A sizable minority in each group preferred own-group numerical dominance to 75% or more of the total. Interracial room-sharing, an unfamiliar experience for Ss, was acceptable, but objections to room-sharing were greater among blacks. A majority of both groups believed that voluntary segregation had occurred in the dormitories. Voluntary segregation was perceived as desirable by blacks, undesirable by whites. Previous interracial contacts, and intraracial sex differences in attitudes, are also presented. (15 ref)—S. T. Margulis.

9337. Berger, Bennett M. & Hackett, Bruce H. (U California, San Diego) **On the decline of age grading in rural hippie communes.** *Journal of Social Issues*, 1974, Vol 30(2), 163-183.—Ethnographic data from a study of rural hippie communes suggest a clear attenuation of the normative differences usually ascribed to children on the grounds of their age. The participation of children in drug use and sex, as well as their autonomy in the settlement of their disputes, are cited as examples of this decline in age grading. Interpretations are offered of the ways in which this equalitarian conception of children is systematically sustained by other facts of communal life and by the ideological postures of parents. Finally, inferences are made from the decline of age grading in the communes of the counterculture for possible changes in the relations between the generations in the future.—*Journal abstract.*

9338. Bruner, Edward M. (U Illinois) **The missing tins of chicken: A symbolic interactionist approach to culture change.** *Ethos*, 1973(Sum), Vol 1(2), 219-238.—Discusses the psychological concomitants of rapid social change among the Toba Batak group of Sumatra and among American Indians. It is suggested that the Batak have escaped severe psychological stress by incorporating modernization into their traditional kinship and ritual organizations. (22 ref)

9339. Bullard, M. Kenyon. (U South Alabama) **Hide and secrete: Women's sexual magic in Belize.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 259-265.—Presents an interpretive description and analysis of certain magical practices used by women in Belize.

9340. Caudill, William. **The influence of social structure and culture on human behavior in modern Japan.** *Ethos*, 1973(Fal), Vol 1(3), 343-382.—Discusses the psychological and behavioral implications of the combination of social change and cultural continuity in modern Japan. It is suggested that modern social structure and traditional culture have independent effects on psychological adjustment in Japan. (9 p ref)—J. Kelly.

9341. Chandler, Charles R. (Texas Tech U) **Value orientations among Mexican Americans in a southwestern city.** *Sociology & Social Research*, 1974(Apr), Vol

58(3), 262-271.—Asked a random sample of 300 Mexican-American men and women in an urban setting value orientation questions related to activity, integration with kin, trust, and occupational primacy. As hypothesized, "modern" orientations were expressed by younger respondents with more formal schooling and higher-status occupations. The majority gave "traditional" responses. Results are discussed in relation to other studies and in light of "modernism" theory.—*Journal abstract.*

9342. Chang, Theresa S. (Kansas State U, Coll of Education) **The self-concept of children of ethnically different marriages.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 245-252.—Administered the Piers-Harris Children's Self-Concept Scale to 251 4th-, 5th-, and 6th-grade children of ethnically similar marriages and 98 children from ethnically different marriages. All Ss were from 2 schools in a low socioeconomic status community. Ss' reading and mathematics scores were also examined in relation to the self-concept measure. Children of mixed parentage had higher mean self-concept scores than children of similar parentage. Mixed-parentage Ss also had higher scores on reading and mathematics achievement tests. Significant differences in the same direction were also found on the Behavior subscale of the self-concept measure. It is concluded that all individuals occupying a marginal status in society should not be expected or assumed to have marginal personality characteristics.—L. Gorsey.

9343. Cress, Joseph N. & O'Donnell, James P. (Southern Illinois U, Carbondale) **Indianness, sex, and grade differences on behavior and personality measures among Oglala Sioux adolescents.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 306-308.—Studied the degree of acculturation of 104 Oglala Sioux to the dominant American culture. The study is an extension of J. F. Bryde's findings and the results are similar to those reported by him.

9344. Cusick, Philip A. & Ayling, Richard J. (Michigan State U) **Biracial interaction in an urban secondary school.** *School Review*, 1974(May), Vol 82(3), 486-494.—Attempted to study what activities black and white students jointly engage in when they attend desegregated schools. For 6 mo the authors attended classes a few days a week. Data were collected through informal interviews, background material, and scheduled formal interviews. Interracial interaction occurred only when the students were academically motivated and the teacher was highly structured. Generally there was significant separation between the races and evidence of deep racial hatred.—C. K. Miller.

9345. Denis, Margaret. (Canadian Catholic Conference, Winnipeg, Manitoba) **Religious education among North American Indian peoples.** *Religious Education*, 1974(May), Vol 69(3), 343-354.—Indians of Western Canada show at least 3 different degrees of assimilation to the white man's technological culture. Understanding the mentality and values of the native people, regardless of their degree of assimilation, is basic to any religious education program. Western white society is characterized by linear thinking patterns, whereas these Indians tend to think and reason spirally, going around the point with concrete stories and examples until the point is

established. Native speech abounds in concrete rather than in abstract expressions, and dynamic action verbs generally take the place of the verb "to be." The Indians show a greater propensity for contemplation than whites, and understand symbols and parables more easily. Their principal values include respect for the person, respect for nature, and a sense of time based on the changing seasons.—E. A. Gavin.

9346. Elias, John L. (Trenton State Coll) B. F. Skinner and religious education. *Religious Education*, 1974(Sep-Oct), Vol 69(5), 558-567.—Discusses Skinner's views of religion in relation to freedom and to fear. His insights on religion and behavior modification, behaviorism and religious beliefs, and Utopianism indicate that he should not be ignored by religious educators, especially since his thought represents the scientific and technological culture within which religion is currently taught.

9347. Feather, Norman T. & Hutton, Malcolm A. (Flinders U South Australia, Bedford Park) Value systems of students in Papua New Guinea and Australia. *International Journal of Psychology*, 1974, Vol 9(2), 91-104.—1,100 indigenous English-speaking Ss from Papua New Guinea, enrolled in tertiary institutions and training programs or serving as headmasters, and making up 12 subsamples (mean age 18.74 yrs for university students, 29.23 yrs for inspectors and headmasters) completed the Rokeach Value Survey anonymously, and provided information about age, sex, course of study, religion, clan, home, and district. Average value systems of these Ss were compared with those of approximately 3,900 Australian secondary and university students with Papua New Guinea Ss, revealing greater concern among Papuan students with general social values, with orthodox religious values, and with values implying deference to authority, and among Australian students greater concern with personal, humanistic values. Factor analyses of the 12 Papua New Guinea subgroups revealed general similarities in average value systems across all groups but suggested some differences in the case of instrumental values, a finding hard to interpret since it is confounded with differences in age. Results in Papua that reflect emphasis upon safety and security needs, contrast with emphasis in Australian Ss upon competence and self-actualization. The differences are related to level of development of the respective countries and to history of the areas (especially the missionary influence, extended families, and concern with emerging nationhood). (30 ref)—E. A. Gavin.

9348. Harkness, Sara. (Harvard U) Universal aspects of learning color codes: A study in two cultures. *Ethos*, 1973(Sum), Vol 1(2), 175-200.—Studied the universality and evolution of color naming among children and adults in 2 differing cultures. 60 Spanish speaking Ss from 3 age brackets (7-8 yrs, 11-12 yrs, and adult) and 40 Mam speaking Ss from 2 age brackets (7-8 yrs and adult) were chosen for study from 2 small rural communities in Guatemala. Ss were asked to perform color naming, recognition, and selection tasks using Munsell color chips. It was found that there was a high degree of agreement between Spanish and Mam speaking Ss on best examples of corresponding color terms. Agreement on color naming between Ss speaking the

same language decreased as colors moved farther from the focal areas of best color representatives. Results from Spanish speaking Ss indicated that some basic color terms (e.g., pink, orange) were "less basic" than other basic color terms (e.g., red, green). It is concluded that the results support previous findings on the universality and evolution of basic color terms.—J. Kelly.

9349. Hippler, Arthur E. (U Alaska, Inst of Social, Economic, & Government Research) Patterns of sexual behavior: The Athabascans of interior Alaska. *Ethos*, 1974(Spr), Vol 2(1), 47-68.—Discusses the relationships between personality, sociocultural phenomena, and sexual behavior among the Athabascans. Field observations and projective test protocols were collected from individuals in 4 Athabascan villages and in Fairbanks, Alaska. It is noted that sexual activities are a source of fear and anxiety for both male and female Athabascans, and that sexual intercourse is often accompanied by intoxication and violence. Childhood in Athabascan society was found to be characterized by recurrent threats of hunger, frequent death of siblings, and perception of the mother as sad and distant. It is suggested that these conditions create an Athabascan personality structure based on deeply repressed anger, suppression of affect, and feelings of essential badness. It is concluded that present Athabascan sexual patterns are due to a combination of traditional child-rearing conditions and loosening of previous social controls over aberrant sexual expression. (3 p ref)—J. Kelly.

9350. Johnson, Arthur L.; Brekke, Milo L.; Strommen, Merton P. & Underwager, Ralph C. (U Minnesota, Minneapolis) Age differences and dimensions of religious behavior. *Journal of Social Issues*, 1974, Vol 30(3), 43-67.—Explored the magnitude, sources, and consequences of differences among age strata in various dimensions of religious orientation and practice. Results support a "selective gap" theory rather than a "great gap" interpretation of contrasts among age strata. 19-23 yr olds were most heterogeneous in beliefs, attitudes, or life-styles. (51 ref)

9351. Joyce, J. T. A preliminary study of cultural differences in values influencing western education in the Enga district: II. Moral development and cognitive factors. *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 63-77.—Provides a follow-up analysis and discussion of the author's earlier study in which a questionnaire was administered to 2 groups of Papua New Guineans who differed in amount of exposure to Western influences. Differences in moral development between the 2 groups were hypothesized on the basis of significant differences on responses to questionnaire items dealing with such concepts as stealing and the characteristics that make an act "bad." It is concluded that, despite these differences, the more remote tribe is not underdeveloped in terms of value systems. Educational procedures that are less authoritarian and more consistent with basic tribal language and philosophy are recommended. (2½ p ref)—C. Wright.

9352. Lex, Barbara W. (Western Michigan U) Voodoo death: New thoughts on an old explanation. *American Anthropologist*, 1974(Dec), Vol 76(4), 818-823.—Augments extant physiological explanations of "voodoo death" with information about neurophysiological re-



search on sensitization, or tuning, of the autonomic nervous system. The process of suggestion is defined as incorporating both an automatic and cognitive component in tuned individuals: the significance of autonomic tuning in cause and cure of psychosomatic illness and in voodoo death is explored.—*Journal abstract.*

9353. **Montgomery, Rita E.** (Meramec Community Coll) **A cross-cultural study of menstruation, menstrual taboos, and related social variables.** *Ethos*, 1974(Sum), Vol 2(2), 137-170.—Studied the relationship between severity of menstrual taboos and vagina envy as evidenced by the degree of male participation in birth and reproduction rituals in 44 societies. Chi-square tests show a strong relationship. (2 p ref)

9354. **Murphy, Jane M.** (Harvard U, School of Public Health) **Sociocultural change and psychiatric disorder among rural Yorubas in Nigeria.** *Ethos*, 1973(Sum), Vol 1(2), 239-262.—Studied the effects of Western education, modern occupations, and nontraditional religious affiliation on the mental health of 138 Yoruba men. It is suggested that high risks of psychological maladjustment in changing societies result from poor integration of new and traditional social processes, rather than from modernization per se. (22 ref)

9355. **Price, John A.** (York U, Downsview, Ontario, Canada) **The superorganic fringe: Protoculture, idioculture, and material culture.** *Ethos*, 1973(Sum), Vol 1(2), 201-218.—Discusses the relationship of the origins of superorganic culture among humans to the behavioral learning abilities of animals. The usefulness of the concepts of protoculture, idioculture, and material culture, and of the distinction between sign and symbol in examinations of the development of superorganic culture are explored.

9356. **Saunders, John; Davis, J. Michael & Monsees, David M.** (Mississippi State U) **Opinion leadership in family planning.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 217-227.—Interviewed 587 clients at a family planning clinic in Lima, Peru, who were classified as opinion leaders, ineffectives, or followers, and as early or late adopters and pre- or postacceptors. Education, income, motivation, mass media exposure, length of time in current house, fertility, and information transactions were positively associated with opinion leadership.

9357. **Schwartz, Theodore.** (U California, San Diego) **Cult and context: The paranoid ethos in Melanesia.** *Ethos*, 1973(Sum), Vol 1(2), 153-174.—Discusses the cargo cults of Melanesia as modes of psychocultural adjustment to contact with Western cultures. It is suggested that the internalized personality structures and the institutionalized structures of Melanesia have a strongly developed paranoid ethos which leads to both extreme suspicion and extreme credulity. (35 ref)

9358. **Scott, William C.; Johnson, Craig & Bailey, Roger C.** (Oklahoma State U) **The influence of the experimenter attributes and the labeling of an attitude object on the measurement of prejudice.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 299-300.—Investigated the effects of the attitude object label "Negro" or "black" and the E's personal attributes on the measurement of prejudice, using C. Sellitz and S. Cook's

(1970) instrument. Findings demonstrate the complexity of the influence of the E's attributes.

9359. **Sowell, Thomas.** (Urban Inst, Washington, DC) **The plight of black students in the United States.** *Daedalus*, 1974(Spr), Vol 103(2), 179-196.—Black intellectuals and academic persons agree almost unanimously that black students are placed under tremendous pressures by white institutions. The use of double standards does not alleviate, but in subtle ways increases, the pressures through increasing the degree of alienation.

9360. **Spiegel, Leo A.** **Youth, culture and psychoanalysis.** *American Imago*, 1974(Sum), Vol 31(2), 206-231.—Discusses the influence of 20th century cultural changes on the psychic structure of youth and on youth's attitudes toward psychoanalysis. It is suggested that the young have undergone collective regression in response to the prevailing unconscious collective atmosphere of death, depression, and meaninglessness. This regression is manifested with youth's preoccupation with the immediate and tangible and in its restless desire for social change. Disillusionment with psychoanalysis is merely one aspect of general cultural disillusionment on the part of the young. It is concluded that psychoanalysis can still be beneficial for young people, but that its ultimate benefit will depend, in part, on the meaningfulness or meaninglessness of the culture in which the analysts must live. (44 ref)—*J. Kelly.*

9361. **Stein, Howard F.** (Meharry Medical Coll) **Confirmation of the white ethnic stereotype.** *School Review*, 1974(May), Vol 82(3), 437-454.—Studied a Catholic high school with a majority of Polish-American students in relation to a reciprocal-cumulative causation theory of prejudice. Using a transactional model of analysis, it was determined that the student's poor performance and resistance to learning provide both teachers and students with a self-fulfilling prophecy. Family, school, and community together perpetuate by constant recreation a psychosocial identity which is rooted in failure. (15 ref)—*C. K. Miller.*

9362. **Stein, Howard F.** (Meharry Medical Coll, Community Mental Health Ctr) **Envy and the evil eye among Slovak-Americans: An essay in the psychological ontogeny of belief and ritual.** *Ethos*, 1974(Spr), Vol 2(1), 15-46.—Discusses the interpersonal and intrapsychic dynamics of the acquisition and influence of belief in the "evil eye" among Slovak-Americans. The development of the evil eye in a particular individual is attributed in Slovak oral tradition to allowing breast feeding after sudden weaning. The evil eye in traditional Slovak life acted as an explanation of misfortune and malevolence and as an effective means of social control. It is suggested that the evil eye symbolically embodies the contradictory protective and projective elements of the Slovak jealousy ethos which developed in response to competition for limited material goods and demonstrations of affection. It is concluded that belief in the evil eye is related to both environmental factors and child-rearing practices. (3 p ref)—*J. Kelly.*

9363. **Stewart, V. Mary.** (York U, Toronto, Ontario, Canada) **A cross-cultural test of the "carpentered world" hypothesis using the Ames Distorted Room illusion.** *International Journal of Psychology*, 1974, Vol 9(2), 79-89.—120 American school children stratified by

race, sex, and age (6-17 yrs) and 432 nonwhite Zambian Ss similarly stratified by age, sex, and also by degree of environmental carpenteredness (which yielded 5 subsamples) experienced, on successive trials, a randomized series of 10 different-sized rods that appeared in the left and right windows of the Ames distorted room. On each trial, S selected from unmounted rods the rod that appeared to be like the one he had just seen. The difference between mean responses to the 10 stimuli shown in the left window and the responses to the same 10 stimuli shown in the right window yielded a measure of illusion susceptibility. Size of correlation coefficient that resulted from relating actual stimulus size to response measures determined ordinal accuracy. Results generally support the empiricist position of illusion susceptibility. No significant effect of pigmentation upon response appeared within the American samples, but a direct relationship between environmental carpenteredness and illusion susceptibility appeared for the 5 Zambian subsamples. Older Ss showed less susceptibility to illusions than younger Ss, and female Ss revealed significantly greater illusion-susceptibility than did males. (23 ref)—*E. A. Gavin.*

9364. Sutcliffe, Claud R. (U of the South) **Achievement motivation and economic development among peasants: An exploration of measurement problems.** *Rural Sociology*, 1974(Sum), Vol 39(2), 238-246.—Interviewed Palestinian refugees and nonrefugees to test the hypothesis that achievement motivation is partially responsible for economic growth. Results suggest there was little correlation between achievement motivation and economic growth.

9365. Thomas, David R. (U Waikato, Hamilton, New Zealand) **The relationship between ethnocentrism and conservatism in an "authoritarian" culture.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 179-186.—Results of a study of 56 Australian mothers show highly significant correlations between scores on the Wilson-Patterson Conservatism scale and 2 measures of ethnic prejudice among Ss. While social processes are seen as an important determinant of differences between cultural groups in mean levels of ethnocentrism, it is suggested that studies which attempt to show a difference in the degree of association between authoritarianism and ethnocentrism allow for the effect of differences in instrument variances, between cultural groups, on the measures used. (32 ref)—*Journal abstract.*

9366. Tomich, Alda K. (Bowling Green State U) **Alienation: A cross-cultural analysis.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 187-200.—Examined alienation in 136 Middle-Eastern and 150 American undergraduates, using a self-administered questionnaire. Results indicate that Ss from a transitional society expressed greater feelings of alienation; they felt more powerless and scored higher on the normlessness, meaninglessness, and social isolation scales. These relationships were not altered when socioeconomic status and sex were controlled, with 1 exception—American students with a professional background showed higher normlessness than Middle Eastern respondents of the same occupational level. The variability in results obtained within and across the cultural groups studied is

explained in terms of cultural context effects. (18 ref)—*Journal abstract.*

9367. von Fleckenstein, Fritz. (Australian National U, Port Moresby, New Guinea) **Are innovativeness scales useful?** *Rural Sociology*, 1974(Sum), Vol 39(2), 257-260.—Presents data which demonstrate the value of separate analyses of different adopted innovations. Farmers in northeastern Thailand were interviewed. Results suggest that the early adoption of one innovation did not generally correlate with early adoption of other innovations.

9368. Wiedler, D. Lawrence & Zimmerman, Don H. (U California, Santa Barbara) **Generational experience and the development of freak culture.** *Journal of Social Issues*, 1974, Vol 30(2), 137-161.—Discusses the emergence of "freak culture" within the present generation of middle-class youth and some of the implications of the freak value system and life style for societal change. An empirical description of freak culture is presented, based on ethnographic and survey data. The content of freak culture is related to distinctive generation-based experiences of middle-class youth born after World War II. Those who as students established their own residences discovered that they could be "real persons" independently of their families, while not having an occupational identity—a critical and novel discovery for middle-class males. Isolated from previous generations and ghettoized, some middle-class members of this generation undertook a self-transformation, and in the process formulated and lived out new conceptions of society which were consistent with their own distinctive experiences. (41 ref)—*Journal abstract.*

### Social Issues & Social Processes

9369. Arafat, Ibtihaj S. & Cotton, Wayne L. (City Coll, City U New York) **Masturbation practices of males and females.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 293-307.—Attempted to determine if there is any relationship between gender and masturbation practices with regard to frequency, cause, effect, regularity, feelings, and awareness. A questionnaire was administered to 435 university students. In both sexes most individuals begin masturbating between 9 and 16 yrs old. More females than males report a greater intensity of orgasm from masturbation than from intercourse. The immediate reasons for masturbating are similar for both sexes. Twice as many females as males report feeling depressed after masturbation. (18 ref)—*E. B. Jaffe.*

9370. Bauman, Karl E. & Wilson, Robert R. (U North Carolina, School of Public Health, Chapel Hill) **Sexual behavior of unmarried university students in 1968 and 1972.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 327-333.—Compares data from random samples of unmarried university students in 1968 and 1972. More coital experience was reported by both sexes in 1972.

9371. Boote, R. E. **Human environment and social welfare.** *Social Defence*, 1973(Jan), Vol 8(31), 6-17, 20.—Discusses the relationship between population numbers, economic growth, and expectations for life. It is noted that population limitation, economic limitation, and the development of new ethical standards are necessary if environmental health, planetary order, and distributive justice are to be preserved and conserved. It



is suggested that the new ethical standards should be based on integrity, humanity, determination, and judgment in order to maintain earth as a healthy place to live. Advances made at the 1972 United Nations World Conference in alerting world opinion to common environmental problems and interests are reported.—*A. de la Haba.*

9372. Brill, Norman Q. & Christie, Richard L. (U California, Medical School, Los Angeles) **Marihuana use and psychosocial adaptation: Follow-up study of a collegiate population.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 713-719.—A longitudinal study of a representative sample of 1,380 1970 college students disclosed that a great majority of students who had used marihuana reported "no effect" or "improved" adjustment in 1972, but a small group reported worsened adjustment and showed a clear trend to have decreased or quit the use of the drug. Many others who quit or reduced their use of marihuana, nevertheless reported its effects as favorable. No significant difference in grade point average or educational achievement was found between users and nonusers. Marihuana users experienced somewhat more difficulty in deciding on career goals and left college a little more often (than nonusers) to reassess their goals. Amotivational syndromes, if they occurred, were not observed in a large number of students who, despite using marihuana, were continuing to function satisfactorily.—*Journal abstract.*

9373. Bruvold, William H. (U California, School of Public Health, Berkeley) **Attitudes toward science and accompanying beliefs.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 269-274.—Used data collected in a statewide interview survey of California to assess current attitudes toward science and to assess the relationship between affective response toward science and beliefs about the contributions of science to modern life. Results from 972 participating respondents indicate that they exhibited very positive attitudes toward science. The study also demonstrated that attitudes toward science were related to beliefs about science in the manner predicted by earlier theoretical developments.—*Journal abstract.*

9374. Cangemi, Joseph P.; Laird, A. W. & Deeb, Norman A. (Western Kentucky U) **The philosophy of existentialism and a psychology of irreversible homosexuality.** *College Student Journal Monograph*, 1974(Sep-Oct), Vol 8(3, Pt 2), 12 p.—Suggests a causal relationship between early fear of the opposite sex and the incidence of homosexuality, in which the sex drive seeks outlet in sexual relations with persons of the same sex. The philosophy of existentialism holds that the essence of man is his existence and that his concern is with his present life. The individual's richest existence is to be what he can become. It is suggested that the fusion between existentialism and homosexuality has to do with this concept of man as an autonomous being. (47 ref) —*A. J. Ter Keurst.*

9375. Cassel, Russell N. & Zander, Gail. (U Wisconsin, Milwaukee) **Teach Me What I Want to Know About Drugs for junior high school students.** *International Journal of the Addictions*, 1974, Vol 9(4), 541-567.—Compared 271 7th, 8th and 9th graders to assess interest in different areas of drug-abuse information and

personal and social development. The Rotter Internal-External Control Scale (I-E) and the Ego Development Scale, measuring personal, social and educational development, and the Teach Me What I Want to Know about Drugs Questionnaire, measuring interest in 13 areas of drug-abuse information, were administered. Although there were no differences between grade levels on I-E scores, internally oriented Ss indicated a greater interest in drug-abuse information. Also, the higher the grade level the lower the interest in drug information, with differences in areas of interest at each grade level. The importance of basing educational programs on student interests and attitudes is discussed, and 3 computer-based programs based on these and other related results are referenced.—*F. Beyer.*

9376. Ciccone, Pasquale. (US Medical Ctr, Springfield, MO) **The federal government: Process and program.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender*. I. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.—Describes federal statutes which regulate the medical, surgical, and psychiatric care provided for all persons charged with or convicted of a federal offense. Specific operations of the US Medical Center for Federal Prisoners in Missouri are described.

9377. Coates, Robert B. & Miller, Alden D. (Harvard U, Law School, Ctr for Criminal Justice) **Patrolmen and addicts: A study of police perception and police-citizen interaction.** *Journal of Police Science & Administration*, 1974(Sep), Vol 2(3), 308-321.—Presents part of a larger study of the effect of methadone treatment on crime careers of addicts, documenting (a) the extent of interaction between patrolmen and addicts; (b) police perceptions of drug-related crime, addicts, and drug treatment programs; and (c) problems in policing addicts. Participant observation, interviews, and questionnaires were used. Police viewed heroin addiction as a severe problem and as a reason for 50-75% of all crime, but there was very little interaction between addicts and police. 50% of police were opposed to drug treatment programs and all patrolmen felt such programs were ineffective. Constraints in the courts and the criminal justice system were seen as accounting for the low level of police-addict interaction.—*R. J. Albers.*

9378. Colew, Colin. **How to raise your child without threats or violence.** Hicksville, NY: Exposition, 1974. 104 p. \$7.50.—Explores child-rearing theories and techniques. Major topics include significant considerations in child discipline; the effect of a specific method of punishment on the child's future behavior; and brain imprinting and its effects.

9379. Cooke, Gerald; Pogany, Eric & Johnston, Norman G. (Norristown State Hosp, PA) **A comparison of blacks and whites committed for evaluation of competency to stand trial on criminal charges.** *Journal of Psychiatry & Law*, 1974(Fal), Vol 2(3), 319-337.—Evaluated 70 blacks and 70 whites referred to a center for forensic psychiatry to investigate whether differences in judgments of pathology of blacks and whites may be attributed to actual differences in those referred or to systematic biases in the judgment procedure. Ss were analyzed for characteristics associated with MMPI administration and for differences in MMPI profiles.

Results are consistent with previous literature and indicate a tendency to clinically overestimate psychopathology in blacks, though there was no supporting evidence for a difference in level of pathology in terms of the more objective MMPI measure.—*Journal abstract.*

9380. Culver, Charles M. & King, Francis W. (Dartmouth Coll, Medical School) **Neuropsychological assessment of undergraduate marihuana and LSD users.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 707-711.—Administered an extended battery of neuropsychological tests to 3 groups of 42 college seniors (LSD/mescaline users; marihuana/hashish users; and controls) who were matched on predrug usage intellectual and personality dimensions. The study was replicated 1 yr later. In the combined-years' analyses, the 3 groups showed statistically significant differences only on the Trail Making Test: LSD/mescaline users performed within normal limits but significantly worse than either of the other 2 groups. Since the 3 groups also differed significantly in the extent of their alcohol usage, a covariance analysis was carried out that indicated that this variable did not account for the LSD/mescaline group's performance on the Trail Making Test. (15 ref)—*Journal abstract.*

9381. Denber, Herman C. (U Louisville, Medical School) **Trials with drugs outside the United States.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 8-9.—Critiques national, state, and local laws in the US which make early clinical drug evaluations an almost impossible task. Drug studies in Switzerland of AHR 2277 (a butyrophenone) and 1766 CERM (an antidepressant) are reviewed. It is concluded that unless remedial action is taken immediately, US medical care will become 2nd class.

9382. Doob, Leonard W. (Yale U) **A Cyprus workshop: An exercise in intervention methodology.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 161-178.—Describes aborted efforts to conduct a workshop planned for Greek and Turkish Cypriotes on solving one or more of the problems that divided Cyprus into 2 isolated communities. It is suggested that the clinical and practical experience gained from the effort might be used in future enterprises.—*Journal abstract.*

9383. Drahn, Theodore L. (U Alaska) **Alcohol and working Americans.** *Industrial Gerontology*, 1974(Fal), NS, Vol 1(4), 1-19.—Reviews the literature on the increasing rise of alcohol use among working men and women. Responses generated from the evidence now available about the personal and societal cost that results are also discussed. (143 ref)

9384. Dynes, Russell R.; Quarantelli, E. L. & Ross, James L. (Ohio State U, Disaster Research Ctr) **Police perspectives and behavior in a campus disturbance.** *Journal of Police Science & Administration*, 1974(Sep), Vol 2(3), 344-351.—Reports on the Spring 1970 "riot" at Ohio State University from the police viewpoint, using questionnaire data from 499 policemen. Police perceived the situation as a real personal and group danger from a hostile, aggressive crowd requiring forceful control techniques. Social variables or differences in rank did not differentiate levels of this perception suggesting that the nature of the police occupation is a stronger influence on police behavior than personality or organi-

zational variables. Limitations of the study and recommendations regarding future research in this area are discussed. (20 ref)—*R. J. Albers.*

9385. Ember, Carol R. (Hunter Coll, City U New York) **Feminine task assignment and the social behavior of boys.** *Ethos*, 1973(Win), Vol 1(4), 424-439.—Studied the effects of feminine task assignments on the social behavior of Luo boys in Kenya. The egoistic, altruistic, and prosocial behavior of 28 Luo children ranging in age from 7.5 to 16 yrs was observed for a total of 135 minutes per child. Estimates of the amount of feminine work performed by each child were obtained from their mothers. It was found that boys exhibited more egoistic behavior than girls, and that girls showed a higher proportion of prosocial behavior than boys. Boys performing large amounts of feminine work inside the home were more feminine in their social behavior than other boys, but feminine work done outside the home did not result in feminized social behavior. It is concluded that differential task assignments are related to sex-linked differences in social behavior. (22 ref)—*J. Kelly.*

9386. Franti, Charles E.; Kraus, Jess F. & Borhani, Nemat O. (U California, School of Veterinary Medicine, Davis) **Pet ownership in a suburban-rural area of California, 1970.** *Public Health Reports*, 1974(Sep-Oct), Vol 89(5), 473-484.—Studied the relationship between pet ownership, demographic characteristics, and health for a sample of 1,091 central California households.

9387. Freed, Stanley A. (American Museum of Natural History, New York, NY) **Attitudes, behavior, and urban influences in a North Indian village.** *Annals of the New York Academy of Sciences*, 1974(Mar), Vol 220(6), 411-424.—Presents data concerning the effects of urbanization on 799 Indian villagers in the Union Territory of Delhi. The principal economic activity of the village is agriculture. 89 villagers were asked to fill out a 44-item questionnaire. Questions pertained to urban employment, work preferences, expectations for children's future work, preference for occupations, the nature and cost of religious and ceremonial events, best ways to serve God, and preferences for people among the community. Several themes emerged. The majority of men desired city jobs; reasons for this appeared to be primarily economic. Both men and women generally preferred to live in the village. No evidence of family breakdown or reduction in kinship ties was found, nor was there any evidence for the secularization of village life. It is concluded that all of the traditional village institutions will remain in full working order.—*R. S. Albin.*

9388. Friedman, Cornelia M.; Greenspan, Rhoda & Mittleman, Fay. (Boston Hosp for Women, MA) **The decision-making process and the outcome of therapeutic abortion.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1332-1337.—A review of the American literature on abortion suggests that an immediate negative response to abortion is not uncommon among women undergoing this procedure and that short-term unhappiness and guilt may be part of the normal response. The proportion of women with serious psychiatric complications is probably less than 10%. 4 case reports of postabortion psychiatric illness are presented that indicate (in agreement with the literature) that there



is high risk in abortion when any of the following elements is present: strong ambivalence, coercion, medical indication, concomitant severe psychiatric illness, and the woman's feeling that the decision was not her own. (25 ref)—*Journal abstract*.

9389. Galbraith, Gary G.; Strauss, Michael R.; Jordan-Viola, Eunice & Cross, Herbert. (Washington State U) **Social desirability ratings from males and females: A sexual item pool.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 909-910.—Administered the male and female forms of Thorne's Sex Inventory to 2 groups of 80 undergraduates who either rated the social desirability of a true response to each item or answered the items according to standard self-report instructions. Findings question the use of obvious-direct items with pathological import in sex behavior questionnaires.

9390. Girdano, Daniel A. & Girdano, Dorothy D. (U Maryland) **Drug usage trends among college students.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 94-96.—Presents data on drug usage during a 6-mo period in 1973 among 1,385 students at the University of Maryland. 87% of the Ss had used alcohol, 62% marijuana, 39% hashish, 20% methaqualone, 20% "speed" (amphetamines), and 13% tranquilizers.

9391. Goldschmidt, Jean; Gergen, Mary M.; Quigley, Karen & Gergen, Kenneth J. **The women's liberation movement: Attitudes and action.** *Journal of Personality*, 1974(Dec), Vol 42(4), 601-617.—Examines the women's liberation movement to gain systematic knowledge about the participants and thus learn the movement's practical implications as well as its implications for socio-activism. Ss were 448 undergraduate females from 4 educational settings: (a) a large, heterogeneous private urban university; (b) a small, suburban, academically elite coeducational college; (c) a Catholic women's college in a rural community; and (d) a small suburban women's college with moderate entrance standards. On a questionnaire containing 84 items and 2 personality scales, the issue of women's liberation was not introduced until the final section. Results indicate that in terms of family background, the women's liberation activist was not motivated by marital strife or by rebellion against values and attitudes espoused by her parents. Data do suggest that she was strongly motivated by professional aspirations and that those most active were talented women who had good reason to expect success under unbiased social conditions. In comparing women's liberation and other forms of activism, it appears that the movement is unique in important aspects. Parents' income, education and religion, the individual's own religious preferences, and aggressive tendencies were not related in the same way to liberation activism as they have been to antiwar and radical political protest. Women who were both least active and moderately active in the heterosexual realm were especially drawn to the movement. (21 ref)—P. O'Brien.

9392. Goldsmith, Alfredo & Goldberg, Rona J. (U North Carolina, International Fertility Research Program, Carolina Population Ctr, Chapel Hill) **Psychosocial aspects of vasectomy in Latin America.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 278-292.—Examines reasons for the paucity of vasectomy programs in

Latin America. Social constraints, family structure and the "machismo" cult are discussed. It is concluded that vasectomy programs could be successful if self-selection, screening, and counseling were employed. (42 ref)

9393. Greden, John F.; Frenkel, Sinai I. & Morgan, Donald W. (U Michigan, Medical Ctr, Neuropsychiatric Inst) **Alcohol use in the army: Patterns and associated behaviors.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 11-16.—Assessed by questionnaire the alcohol use of 1,873 US soldiers in the US and Vietnam. According to operational definitions based on total ethyl alcohol consumption and several behaviors associated with drinking, 7% were classed as alcoholics, 5% as borderline alcoholics, and 24% as potential alcoholics. Contrary to popular stereotypes, there was a disproportionate number of younger and lower ranking soldiers in these 3 groups; there was also a positive relationship between drinking and use of illicit drugs across groups. It is stated that future studies of alcohol use should include determinations of total ethyl alcohol intake to permit generalizability of results. (17 ref)—*Journal abstract*.

9394. Greenhouse, Phyllis & Rosenthal, Esther. (Brooklyn Coll, City U New York) **Attitudes toward women's right to self-determination.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 64-70.—223 women and 146 men, aged 18-50 yrs, were presented with 10 statements to test their attitudes toward women's right to self-determination. Results show that (a) younger Ss were more positive in attitude than older Ss and (b) women were more positive in attitude than men. The main issues of disagreement concerned women's careers, subordination of career to the home, and the decision to seek an abortion resting with the wife. Possible reasons for the recalcitrance to change on these issues are presented along with predictions of changes in families and child-rearing practices as young women become wives and mothers. (Spanish & French abstracts)—*Journal abstract*.

9395. Grenough, John L. (Pacemaker Planning, Louisville, KY) **Crime prevention: A new approach: Environmental psychology and criminal behavior.** *Journal of Police Science & Administration*, 1974(Sep), Vol 2(3), 339-343.—Discusses the environmental psychology approach to the prevention of criminal behavior. The concepts of environmental design, defensible space, and territoriality are applied to the problem of manipulating the environment to control criminal behavior.—R. J. Albers.

9396. Hayward, D. Geoffrey; Rothenberg, Marilyn & Beasley, Robert R. (Graduate School & University Ctr, City U New York) **Children's play and urban playground environments: A comparison of traditional, contemporary, and adventure playground types.** *Environment & Behavior*, 1974(Jun), Vol 6(2), 131-168.—Studied children's activities and interactions in 3 playgrounds: a traditional equipment playground, a contemporary-design playground, and an adventure playground (which supplies play material, not play equipment). Observation, interviews, behavioral mapping, and behavior setting records were employed. The playgrounds had different predominant user groups, different patterns of use of areas and equipment, and different roles for and participation by play setting

supervisors. Adults and preschoolers predominated at the traditional and contemporary playgrounds; 6-13 yr olds predominated at the adventure play area. At the 2 prebuilt playgrounds, use focused on the equipment, whereas at the adventure playground interactive play was common. The atmosphere of the playgrounds and the activities of users were shaped by a variety of factors, including opportunities and constraints of the physical environment, social influences, and freedom to make use of available opportunities. Information on users' choices and opinions relative to opportunities and freedom is presented, and implications for research and planning are discussed.—S. T. Margulis.

9397. Hollister, Leo E. (VA Hosp, Palo Alto, CA) **Psychotropic drugs and court competence.** In L. M. Irvine, T. B. Brelje (Eds.), *Law, psychiatry and the mentally disordered offender*. I. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

9398. Illner, Michal & Foret, Miroslav. (Československá Akademie Věd, Ústav pro filosofii a sociologii, Prague, Czechoslovakia) [Social indicators and measuring the goals and effects of a social plan.] (Czech) *Sociologický Časopis*, 1974, Vol 10(1), 79-92.—Discusses the concept, function, construction, form, and source of social indicators. It is noted that they can fulfill either an analytical, normative, or evaluative function and that their construction should proceed from the Marxist conceptual model. The methodological goal is to combine dialectically their qualitative and quantitative aspects. Socioeconomic and statistical sociological investigations are the basic sources of information but the statistical practice in Czechoslovakia has not yet been sufficiently adapted to these purposes. Sociological investigation into social planning is advocated. (Russian & English summaries)—V. Fischmann.

9399. Irvine, L. M. & Brelje, T. B. (Eds.). (Illinois Security Hosp, Chester) *Law, psychiatry and the mentally disordered offender*. I. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

9400. Jacobs, Keith W. (U Southern Mississippi) **Asthmador: A legal hallucinogen.** *International Journal of the Addictions*, 1974, Vol 9(4), 503-512.—Describes the physical and psychological effects of Asthmador abuse based on observations of 5 cases. A review of the literature on Asthmador is included.

9401. Jaffe, Yoram; Malamuth, Nell; Feingold, Joan & Feshbach, Seymour. (U California, Los Angeles) **Sexual arousal and behavioral aggression.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 759-764.—Investigated the effects of sexual arousal on behavioral aggression in 44 male and 47 female undergraduates. Half the Ss read erotic passages, whereas the other half read neutral passages. All Ss were then given the opportunity, as part of a bogus ESP task, to deliver electric shocks to an experimental confederate as punishment for incorrect responses. The gender of the aggressor (S), of the recipient of aggression (confederate), and of the E were also varied to yield a  $2 \times 2 \times 2 \times 2$  design. Sexually aroused males and females delivered more intense shocks than nonaroused Ss regardless of the gender of the confederate or E. Results strongly suggest a link between sex and aggression, but the relative contribution of sexual arousal vs

more general arousal mechanisms remains a question for future research. (18 ref)—*Journal abstract*.

9402. Jeffries, Vincent. (California State U, Northridge) **Political generations and the acceptance or rejection of nuclear warfare.** *Journal of Social Issues*, 1974, Vol 30(3), 119-136.—On the basis of historical events and the differing climates of public opinion pertaining to war, 3 political generations were discriminated: Dissent (born between 1943 and 1949), Cold War (born between 1927 and 1942), and World War II (born before 1927). Results of an attitudinal survey indicate differences between these generations on acceptance of nuclear warfare. (31 ref)

9403. Kandel, Denise. (New York State Dept of Mental Hygiene, Biometrics Research, New York) **Inter- and intragenerational influences on adolescent marijuana use.** *Journal of Social Issues*, 1974, Vol 30(2), 107-135.—To investigate inter- and intragenerational influences in adolescent marijuana use, a survey was undertaken on a representative sample of 8,206 public secondary school students in New York State. Independent data were obtained from adolescents, their parents, and their best-school-friends. Data document the crucial role which members of the same generation play in adolescent illegal drug use. Involvement with other drug-using adolescents was a more important correlate of adolescent marijuana use than was parental use of psychoactive drugs or alcohol (which provided a small influence). Inter- and intragenerational influences were synergistic, however. The highest rates of marijuana usage were observed among adolescents whose parents and best friends were drug users. Interactional generational factors influenced levels of intragenerational influences. (4 p ref)—*Journal abstract*.

9404. Kasschau, Patricia L.; Ransford, H. Edward & Bengtson, Vern L. (U Southern California) **Generational consciousness and youth movement participation: Contrasts in blue collar and white collar youth.** *Journal of Social Issues*, 1974, Vol 30(3), 69-94.—Notes that the spread of youth-group consciousness and counterculture behavior during the 1960s has been accounted for by 2 competing theoretical rationales: the "movement sweep" and the "blend" theses. The present study explored the development of youth stratum consciousness in 4 groups of 18-22 yr old youth: white collar and blue collar students and nonstudents ( $N = 287$ ). The research employed a social movement paradigm suggesting an explicit developmental sequence from initial awareness through crystallized ideology and behavior expression. The attempt to operationalize generational consciousness based on K. Mannheim's (1952) definition was partially successful. Data clearly provide little support for the "sweep" thesis of youth movement phenomena but do suggest some confirmation for the "blend" perspective. (59 ref)—*Journal abstract*.

9405. Katz, Daniel. (U Michigan) **Factors affecting social change: A social-psychological interpretation.** *Journal of Social Issues*, 1974, Vol 30(3), 159-180.—Considers that the concern of the psychologist with person-blame attribution has meant a failure to analyze types of change and social causes of societal changes. Social change can be radically structural (revolutionary), incrementally structural, or cultural. Sources of change



can be found in (a) internal contradictions within a society as in Marxian analysis, (b) uneven rates of growth of various parts of the system, (c) contact and clash with other systems, and (d) generational differences. Ongoing social systems are based upon a number of mechanisms designed to insure a continuing input so that effective forces of change need some accumulation and mobilization of social disaffection along group lines rather than the alienation of scattered individuals or transient subgroupings. It is argued that the basic contradictions in society have led to incremental rather than radical change. Generational differences have produced cultural rather than structural change. Thus, the divisiveness and rebellion stemming from differences in social class, age, sex, and race have not resulted in sharp deep lines of cleavage facilitative of revolutionary movements, but have been contained within the society. They may assume more significance, however, as the American system comes into increasing competition and conflict with other systems for resources, markets, and power. (16 ref)—*Journal abstract*.

9406. Keeler, Martin H. & Moore, Edward. (Medical U South Carolina) **Paranoid reactions while using marijuana.** *Diseases of the Nervous System*, 1974(Nov), Vol 35(11), 535-536.—Studied the percentage of 2 groups of marihuana users who had ever suspected that there would be a police raid or that their companions were playing some trick on them while using the drug. 138 undergraduates (all male) and 48 members of the counter-culture (60% male) were administered questionnaires. Results show that paranoid phenomena while using marihuana are common. About half the Ss suspected some trick on the part of their friends, with more frequent paranoid reactions among the counter-culture group.—*R. S. Albin*.

9407. Kessler, Kenneth & Weiss, Theodore. (Psychiatric Inst, Washington, DC) **Ward staff problems with abortions.** *International Journal of Psychiatry in Medicine*, 1974(Spring), Vol 5(2), 97-103.—Describes a 1-yr experience in dealing with the staff problems—primarily in nursing—created by performing abortions in a university hospital. Problem areas are highlighted and recommendations for dealing with these are offered.—*R. M. Cohen*.

9408. Kessler, Marc & Gomberg, Christopher. (U Vermont) **Observations of barroom drinking: Methodology and preliminary results.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1392-1396.—Observed the behavior and drinking patterns of 53 men in 15 bars in a New England city between 9 PM and 2 AM on Wednesday, Thursday, Friday, and Saturday nights. Most of the men (62%) had 1 or 2 drinks; only 1 had more than 6, and 66% spent an hour or less in the bars. More men drank with others than alone (74 vs 26%); there were no differences between the groups in how long they stayed or how much they drank; most finished their drink in 20 min. Number of sips per drink did not vary greatly between drinks or type of bars. Beer was preferred by 68%, highballs by 24%, and cocktails by 5%. It is concluded that a number of barroom and drinking behaviors can be studied without disrupting on-going barroom activities.—*Journal abstract*.

9409. Kilwein, John H.; St Denis, Gerald C. & Hall, William T. (U Pittsburgh, School of Pharmacy) **The**

**social class of young adults and their views on the environment: "How much would you sacrifice?"** *Journal of School Health*, 1974(Apr), Vol 44(4), 196-197.—Obtained questionnaire data from 865 high school seniors balanced to represent middle-class and working-class backgrounds. Over 90% of the students from each social class and area of residence evaluated the environmental situation as serious. In addition, Ss were asked to indicate their willingness to (a) use fewer electrical appliances, (b) limit children to 2 or less, (c) reduce car use by 50%, (d) pay more taxes to clean up the environment, and (e) check on the contents of foods eaten. Results show that only 47.6% of the participants were willing to reduce the use of electrical appliances while 60.9% were willing to limit the number of children to 2 or less. Willingness to take these suggested actions decreased as social class decreased. Furthermore, there was a strong reluctance on the part of the total group to reduce use of the automobile. It is suggested that students do not fully realize the need for individual acts combined with governmental programs to alleviate the current environmental and energy crisis.—*R. S. Albin*.

9410. Kleiter, G. D.; Miribung, J. & Perrez, M. (U Salzburg, Psychologisches Inst, Austria) **Drug abuse among high school and vocational school students in a small city.** [Germ] *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 161-168.—Administered a drug-abuse questionnaire (see R. Zimmermann; PA, Vol 53:Issue 5), previously administered to Essen, West Germany, high school students to 972 high school students in Salzburg, Austria, to compare the incidence of drug abuse in the 2 cities. Results show a similar frequency of drug abuse, but percentages were considerably higher for vocational students. This is attributed to the fact that vocational students live apart from their families. Correlations were found between drug abuse and cigarette smoking, contact with friends, school information about drugs, free time activities, home conditions, and other factors.—*S. D. Babcock*.

9411. Knox, Wilma J. (VA Ctr, Biloxi, MS) **Attitudes of psychology graduate students toward drug abuse.** *Professional Psychology*, 1974(May), Vol 5(2), 185-190.—Administered an opinion questionnaire on attitudes toward drug abuse to 262 Veterans Administration psychology trainees. Most of the 174 respondents reported little or no experience with drug abusers. A regular user of heroin, amphetamines, barbituates, cocaine, or LSD was considered to be a drug abuser by 80% or more of the respondents, whereas only 21.8% identified a regular user of marijuana with drug abuse. The pattern of the responses indicated a high regard for personal freedom. Outpatient treatment and open-ward care within a neuropsychiatric hospital were the preferred treatment environments, and fewer than 5% of the respondents supported court probation, jail term, or tranquilizing medication as preferred treatment modalities. A willingness to undertake full-time work with drug abusers was expressed by 44.3%, and 23.6% were definitely unwilling to do so.—*B. Lindsey*.

9412. Kolb, Douglas; Gunderson, E. K. & Nail, Richard L. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Perceptions of drug abuse risks in relation to type of drug used and level of experience.**

*Journal of Community Psychology*, 1974(Oct), Vol 2(4), 380-389.—Investigated perceptions of risks involved with specific drugs, using as Ss 998 US Navy enlisted men in a drug rehabilitation center. Ss typically were 20-23 yrs old, Caucasian, and multiple drug users who had been involved with drugs for about 2-4 yrs. A list of 39 possible social, psychiatric, and medical risks were presented to Ss. Results show high frequencies with which risks were attributed to opiates, hallucinogens, amphetamines, and barbituates, particularly by heavy users of these drugs, and a high degree of specificity of risks in relation to drug type. Most of the Ss considered use of certain drugs to be risky, and their perceptions of specific adverse effects were generally consistent with those of professional investigators. (17 ref)—P. O'Brien.

9413. Laufer, Robert S. & Bengtson, Vern L. (Brooklyn Coll, City U New York) **Generations, aging, and social stratification: On the development of generational units.** *Journal of Social Issues*, 1974, Vol 30(3), 181-205.—Discusses methods for exploring the antecedent of generation unit formation among upper middle-class youth of the past decade. 4 types of generational units among youth are delineated—radicalism, freakism, communalism, and revivalism—and the possibility of generational units among the elderly is discussed. (59 ref)

9414. Loo, Chalsa M. (Ed.). (U California, Santa Cruz) **Crowding and behavior.** New York, NY: MSS Information Corp, 1974. 245 p. \$6.25.—Includes discussions on the effect of population and urbanization on crowding behavior and articles which cover theoretical, empirical, and anthropological approaches to understanding the phenomenon.

9415. LoPiccolo, Joseph & Stegar, Jeffrey C. (State U New York, Stony Brook) **The Sexual Interaction Inventory: A new instrument for assessment of sexual dysfunction.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 585-595.—Describes a paper-and-pencil self-report inventory for assessing the sexual adjustment and sexual satisfaction of heterosexual couples, the Sexual Interaction Inventory (SII). The SII consists of a list of 17 heterosexual behaviors; for each behavior, both husband and wife separately answer 6 questions using a 6-point rating scale with verbal labels relating to the frequency of the behavior. Responses from each partner are summed across all 17 behaviors, and these totals are used to derive an 11-scale profile. To test the reliability and validity of the SII, it was administered to 4 samples with a total of 191 couples. Test-retest reliability (2 wks) coefficients for the 11 scales ranged from .652 to .902 ( $p < .05$ ). Internal consistency coefficients were adequate, but convergent validity measures indicate that the traits measured by each scale separately did not bear strong relationships to global self-ratings of sexual satisfaction. Scores of 28 sexually dysfunctional couples indicated that 9 of the 11 SII scales discriminated client applicants from sexually satisfied couples. All 11 scales were reactive to treatment. (23 ref)—L. Gorsey.

9416. Lumsden, L. P. (Public Service Board, Psychological Services Branch, Papua New Guinea) **Women in agriculture.** *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 45-49.—Discusses the supply, training, and requisite skills of agricultural teachers and extension officers in Papua New Guinea, stressing the need for full

utilization of the potential of women in rural agricultural programs. It is noted that personnel trained outside of their villages often become alienated and are not well-received by village farmers. It is suggested that women in these positions would be more successful with the primarily female subsistence farmers. Successful training and utilization of women in these positions in seen as a means to increase the status of women in Papua New Guinea as well as to educate women farmers.—C. Wright.

9417. Maccoby, Eleanor E. & Jacklin, Carol N. (Stanford U) **The psychology of sex differences.** Stanford, CA: Stanford University Press, 1974. xiii, 634 p. \$18.95.—Discusses the development of sexual behavior on the basis of the theory that psychological sex differentiation occurs through imitation, praise or discouragement, and self-socialization. The validity of some of the most widely held beliefs about sex differences is assessed.

9418. Maday, Bela C. (NIMH, Bethesda, MD) **Urbanization and the vanishing peasantry in Hungary.** *Annals of the New York Academy of Sciences*, 1974(Mar), Vol 220(6), 560-568.—Discusses reasons for the disappearance of the peasant way of life in Hungary. Historical perspectives on the problem, the single family homestead system (tanya), migration to the industrialized cities, and urbanization of the villages themselves are described.

9419. Mann, Jay et al. (U California, Medical Ctr, San Francisco) **Satiation of the transient stimulating effect of erotic films.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 729-735.—Reanalyzed data from a 1971 study by J. Mann et al which showed either erotic films or nonsexual movies 1 time/wk for 1 mo to 85 married couples (age range, 30-64 yrs) and found that the sex films had stimulated a relatively high level of sexual activity on movie-viewing nights. There was no evidence that the sex movies had produced a "disinhibition" effect or had brought about new learning. Rather, the film had apparently activated previously acquired sexual habits which then became dormant again with the passage of time. As a further test of this stimulus-response analysis, the possibility that there was a satiation effect with repeated exposure to the erotic films was studied. Findings indicate that these movies had become less and less effective elicitors of sexual reactions with the successive presentations, which supports the appropriateness of the stimulus-response analysis.—*Journal abstract.*

9420. Mehrabian, Albert & Russell, James A. (U California, Los Angeles) **A verbal measure of information rate for studies in environmental psychology.** *Environment & Behavior*, 1974(Jun), Vol 6(2), 233-252.—The information rate from a stimulus is a correlate of the arousal elicited by it. To develop a convenient, verbal measure of information rate, 214 undergraduates rated 6 verbal descriptions using 21 paired-adjective scales. In addition, measures of the pleasure, arousal, and dominance elicited by each description were obtained. Following data reduction and the elimination of items with an evaluative bias (i.e., associated with pleasure reactions), a 14-item scale remained whose items were significantly associated with arousal but not with



pleasure or dominance reactions. The association of scale items with arousal was cross-validated in a 2nd study employing photographic slides as targets. Findings indicate the construct validity of the scale through the information rate/arousal hypothesis. The 2nd study also provided reliability information about the scale. It is concluded that the measure should be helpful in assessing information rate of situations across many modes of presentation. (49 ref)—*S. T. Margulis.*

9421. Merlis, Sidney. (Central Islip State Hosp, NY) **Problems and experiences with drug trials outside the United States: The time lag in new drug availability.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 5-7.—Discusses the restrictions placed on new drug research and usage in the US relative to clinical trials done abroad. Current practices stemming from Federal Drug Administration interpretation of laws enacted in 1938 and 1962 are criticized because of the limitations they place on the way in which drugs in the US must be manufactured, shipped, labeled, and administered.

9422. Moll, Kendall. (Stanford Research Inst, Menlo Park, CA) **International conflict as a decision system.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 555-577.—Discusses the decision system that combines a behavioral decision-making approach with a quantitative systems theory. Several hypotheses about how the British Navy budget was decided over a 70-yr period before World Wars I and II are proposed and quantitatively verified to illustrate the decision system. (29 ref)

9423. Morris, Norval. (U Chicago, Ctr for the Study of Criminal Justice) **The criminal justice system and psychiatry: Past, present, and future.** In L. M. Irvine, T. B. Brejle (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

9424. Muller, Charlotte & Schoenberg, Mark. (City U New York, Ctr for Social Research Graduate Ctr) **Insurance for mental health: A viewpoint on its scope.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 871-878.—Considers that insurance, although important as a finance source for certain subsets of mental health services, plays a restricted role in the financing of their aggregate costs and the delivery of care to low-income groups. The present level of insurance reflects the location of initiative and leverage within the health care market and the trade-off of economic interests involving professionals, consumers, carriers, and employers. Various methods of cost control, a prerequisite in any insurance program, differ as to expected mechanisms of action, side effects, and power. A consumer-oriented insurance system must deal with problems of quality control related to competing conceptual models governing therapy today. (23 ref)—*Journal abstract.*

9425. Nemeth, Charlan & Wachtler, Joel. (U Virginia) **Creating the perceptions of consistency and confidence: A necessary condition for minority influence.** *Sociometry*, 1974(Dec), Vol 37(4), 529-540.—Suggested that uniformity in small groups could be achieved by the majority moving towards the minority conception, as well as the reverse. It was hypothesized that actions and behavioral styles which foster perceptions of consistency and confidence aid the minority in its influence attempts. Relating this to the literature that links occupation of the

head seat at a rectangular table to influence, it was hypothesized that it is the act of choosing the head seat that fosters influence, not its simple occupation. Thus, (a) a minority of one who consistently takes a very deviant position would be able to influence a majority, particularly if he chooses the head seat rather than simply occupying it and (b) this same individual would be more effective if he chooses the head seat than if he chooses a side seat. Data from 116 male undergraduates confirm these hypotheses.—*Journal abstract.*

9426. Nishida, Hirohumi et al. (Kuramitsu Hosp, Kyushu, Japan) **[On the deliberate inhalation of organic solvents (glue sniffing) which spread in a junior high school.]** (Japn) *Kyushu Neuro-psychiatry*, 1973(Dec), Vol 19(3-4), 219-223.—Reports results of (a) medical and psychological examinations of 7 male and 5 female habitual glue sniffers and (b) a questionnaire survey of 464 students in a junior high school. Changes of feeling and perceptual disorders were the major symptoms of acute poisoning from organic solvents. Other symptoms were lassitude and passivity, a drop in school grades, increased truancy from school and home, and increased lying. Questionnaire results show that attitudes about life were important initial motives for glue sniffing, that there was a high correlation between the age of the student and the frequency of sniffing, and that pressure from teachers and other students contributed to a decrease in sniffing. (English summary)—*S. Ashida.*

9427. Orford, Jim; Waller, Seta & Peto, Julian. **Drinking behavior and attitudes and their correlates among university students in England: I. Principal components in the drinking domain: II. Personality and social influences: III. Sex differences.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1316-1374.—Administered a questionnaire on drinking behavior and attitudes to a total of 1,323 English undergraduates. A factor analysis of responses revealed 2 major factors: (a) one which accounted for 40% of the total variance and was related to a general involvement with and appreciation of alcoholic beverages and (b) one which accounted for 8-10% of the variance and involved an interest in drinking *per se* vs drinking for psychological effects. No separate "problem drinking" component emerged. Scores from the Eysenck Personality Inventory, a specially constructed Adventurous-Pleasure-Seeking Scale, Eysenck's Social Attitude Inventory (measuring radicalism-conservatism and tender-tough-mindedness), and measures of quantity and frequency of drinking by parents and friends and approval of drinking by parents were found to be correlated with the 2 above factors. Significant sex differences were found in the amount and frequency of drinking, social settings for drinking, and alcohol-related behaviors. It is suggested that as many women as men may be motivated to drink for the mood-modifying effects of alcohol and have experienced these effects. (95 ref)—*Journal abstract.*

9428. Osmond, Humphry; Franks, Violet & Burtie, Vasanti. **Changing views of women and therapeutic approaches: Some historical considerations.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

9429. Peterson, George L. (Northwestern U) **Evaluating the quality of the wilderness environment: Congruence between perception and aspiration.** *Environment & Behavior*, 1974(Jun), Vol 6(2), 169-193.—Proposes and demonstrates a method for evaluating the quality of the wilderness environment from the viewpoint of the recreational user. In the proposed method, psychological inventories are used to measure aspirations for and perceptions of specific details of the wilderness experience and to quantitatively compare aspirations and perceptions in terms of detailed environmental conditions and experiences. The quantitative comparisons allowed the development of an overall index of quality (satisfaction) and permitted the identification of specific environmental sources of satisfaction and dissatisfaction as well as measures of the relative contribution of each. This is potentially useful to the wilderness manager, because it explains the reasons for a given level of performance in terms that can be translated into management decisions. Data collected in the Boundary Waters Canoe Areas of the Superior National Forest were used to illustrate the technique. Although the wilderness environment is emphasized, the method is regarded as applicable in concept to a wide range of environmental situations.—S. T. Margulis.

9430. Rappeport, Jonas R. (Medical Service of the Supreme Bench of Baltimore, MD) **The psychiatrist as a friend of the court.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

9431. Ratliffe, Bruce E. & Helsten, Carmen. **Street drug analysis as an adjunct to emergency medical care at rock concerts.** *PharmChem Newsletter*, 1974, Vol 3(7), 1, 3.—Describes the process and results of drug analysis as an adjunct to emergency medical services at a weekend rock concert in California in the summer of 1974. Results of analyzing 46 drug samples show that nearly all tetrahydrocannabinol, mescaline, and psilocybin samples contained LSD and/or parachlorophenylamine; that marihuana was nearly always pure; and that LSD dosages were well below those advertised in selling.

9432. Rless, Bernard F. (Postgraduate Ctr for Mental Health, New York, NY) **New viewpoints on the female homosexual.** In V. Franks & V. Burtle (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

9433. Ritzel, Günther. (U Göttingen, Psychiatrische Klinik und Poliklinik, W Germany) **[History and present state of psychiatric research into vagrancy.]** (Germ) *Psychiatria Clinica*, 1974, Vol 7(1), 26-49.—Discusses the frequency and forms of vagrancy. Following a historical review, the results of psychiatric research into vagrancy conducted in the German-speaking world since the beginning of the 20th century are described against the background of the overall development of the discipline of psychiatry. The present state of knowledge of cause and origin of vagrancy is reported with special reference to social causes. (112 ref)—*English summary*.

9434. Roško, Róbert. (Slovenská Akadémia Vied, Bratislava, Czechoslovakia) **[Methodological questions in studying the intelligentsia.]** (Slov) *Sociologický časopis*, 1974, Vol 10(1), 23-32.—Deplores the fact that

Marxist authors continue to differ about the definition of the intelligentsia and its position in the structural system of society. The orthodox Marxist position represented by Lenin is defended. The opinion that the intelligentsia, being defined by a professional variable, constitutes a group outside social classes, is seen as an idea of a petty bourgeois intellectual in capitalism who does not distinguish between class groups and professional groups. (Russian & English summaries) (19 ref)

9435. Scoullar, Brian B. **A note on some research into agricultural extension methods.** *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 53-55.—Studied 14 successful and 14 unsuccessful rural development programs in the Papua New Guinea Highlands to determine criteria that contributed to success. Goal orientation related to group prestige and individual status and income accounted for 41.5% of the variance and traditional vs alien sanctions for 7%. It is concluded that the locality group is the basic unit in this area and that internal and external competition consistent with maintaining within-group obligations will be inevitable factors of programs in this part of New Guinea. A study in progress attempting to differentiate characteristics of high vs low producing individuals is described. C. Wright.

9436. Settle, Russell. (Menninger Foundation, Topeka, KS) **The state government: Process and program.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.—Discusses the generally inadequate attempts by states to deal with the mentally disturbed criminal offender. It is argued that the traditional separation of the mentally disturbed offender from other groups is not in the best interest of either the offender or society, and that a more realistic approach would be to uniformly administer the cases of all persons coming into contact with the criminal justice system. New Kansas statutes which represent some forward steps in this area are described.

9437. Shelley, R. L. (Capricornia Inst of Advanced Education, Rockhampton, Papua New Guinea) **Attitudes of educated Papua New Guineans to contemporary political issues: A note on the influence of church and Western contact.** *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 78-83.—Administered a questionnaire to study the attitudes of 511 high school seniors from 4 districts of Papua New Guinea toward the government. Testing took place 6 mo before self-government was implemented. Variables included length of contact with European or Western ideas and government vs church or mission schools. Ss in mission schools had significantly more favorable attitudes toward the government, although government school Ss' attitudes were also generally favorable. Degree of development was not related to favorableness of opinion. It is noted that further analyses of the data are in progress and may lead to stronger conclusions.—C. Wright.

9438. Starosta, William J. (U Virginia) **The use of traditional entertainment forms to stimulate social change.** *Quarterly Journal of Speech*, 1974(Oct), Vol 60(3), 306-312.—Proposes that mass media (radio, television, cinema, newspaper) are not particularly effective in facilitating social change in transitional



societies. In those societies, traditional entertainment media—story-telling, folk drama, puppet shows, dance forms, and religious ceremonies—are more likely to prove effective.

9439. Starr, Jerold M. (U Pennsylvania) **The peace and love generation: Changing attitudes toward sex and violence among college youth.** *Journal of Social Issues*, 1974, Vol 30(2), 73-106.—Notes that the period of the 1960s marked the emergence of a distinctive generational ideology among a substantial segment of American youth. This "peace and love" ideology featured a high degree of age-group consciousness and unique integration of life-style and political concerns, the psychological foundation for which was laid by the increased differentiation of age roles and de-differentiation of sex roles associated with advanced industrial development. The expansion of higher education, emergence of the multi-billion dollar youth market, and growth of the mass media provided the means by which many such youth were able to achieve consciousness of their common interests and join active generation units with distinctive styles of expression. The war in Indochina constituted the traumatic episode which differentiated the various age groups in America and galvanized the middle class, college segment of the youth cohort into action. action. (4½ p ref)—*Journal abstract*.

9440. Sternbach, Oscar. (Private practice, New York, NY) **The pursuit of happiness and the epidemic of depression.** *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 283-293.—The goals of the Declaration of Independence—life, liberty, and the pursuit of happiness—are interpreted as expressing infantile impulse gratifications that generate depression, violence, and social problems.

9441. Strang, Heinz. (Lehrstuhl für Sozialpädagogik, Hannover, W Germany) [The current situation of the family in our society.] (Germ) *Heilpädagogik*, 1974(Mar), Vol 43(1), 3-10.—Descriptions of the contemporary family in current literature show great discrepancies as to its structure and function. The question of whether the traditional family contributes to the stability of its members is often discussed. New perspectives lead to a greater variety of views regarding the nature and function of the family. National policy determines to some extent how a family pursues its goals: in a Marxist society the family will follow Marxist social patterns; in a capitalist society the family will follow capitalist patterns. Social unrest caused by political changes is leading to disorganization of the small family. Families threatened by social unrest must be strengthened by professional assistance if the family is to be preserved. (22 ref)—C. D. Bauer.

9442. Strimbu, Jerry L. & Sims, O. Suthern. (National Bank of Detroit, MI) **A university system drug profile.** *International Journal of the Addictions*, 1974, Vol 9(4), 569-583.—Administered a questionnaire to 24,609 university students using a maximum saturation survey technique, in order to assess patterns of drug use, attitudes toward drug use, and demographic variables related to drug use. Results indicate the 3 most frequently used drugs are alcohol (46.3%), tobacco (26.3%), and marihuana (15.5%). The most striking finding concerning attitudes was that both users and nonusers emphasized the social and individual aspects of

drug use rather than legal or moral aspects. A profile of a typical university drug user was constructed, based on 9 personal background variables and 2 student status variables. A discussion of the study's advantages over other surveys of college drug use is included. (20 ref)—F. Beyer.

9443. Sue, Stanley; Smith, Ronald E. & Gilbert, Renee. (U Washington) **Biasing effects of pretrial publicity on judicial decisions.** *Journal of Criminal Justice*, 1974(Sum), Vol 2(2), 163-171.—In a 4-factor design, the effects on judicial decisions of sample (102 undergraduates vs 100 nonstudents over 18 yrs of age), sex of S. pretrial publicity (damaging and relevant vs irrelevant), and judge's instructions (warning to disregard pretrial publicity vs a neutral statement) were examined. Results indicate that sample and judge's instructions had no effects on verdicts, recommendations for sentencing, or ratings of the strength of the prosecution and defense's cases. Pretrial publicity, however, exerted a strong influence defense's verdicts and ratings of the prosecution's case, particularly among females. It is suggested that pretrial publicity may serve to affect evaluations of the evidence presented at the trial.—*Journal abstract*.

9444. Thomas, L. Eugene. (U Connecticut) **Generational discontinuity in beliefs: An exploration of the generation gap.** *Journal of Social Issues*, 1974, Vol 30(3), 1-22.—Data from college students and their parents indicate striking generational differences on a measure of time perspective. Results suggest that arguments that a counterculture is emerging among youth concentrate on the value orientation level, while the debunkers of the notion of a generation gap focus almost entirely upon level of attitudes. (47 ref)

9445. Thomas, Mrs Howell. **Prostitution in Great Britain today.** *Social Defence*, 1972(Oct), Vol 8(30), 14-26.—Presents arguments for changing the law relating to sexual offenses. Past laws, present legislation, and suggestions for effecting change are described.

9446. Tift, Larry L. (U Illinois, Chicago Circle) **The "cop personality" reconsidered.** *Journal of Police Science & Administration*, 1974(Sep), Vol 2(3), 266-278.—Tested the hypothesis that "working personalities" of police develop from task-related values and attitudes created by specialized roles rather than from selection factors or personality traits. Participant observations and interviews of police-citizen interactions were conducted in 5 police units performing different tasks. 5 environment variables were differentially important to each of the police units. Attitudes toward citizens were documented by police district, race, and organizational unit with all variables found to interact. Results show that unit or task-specific attitudes were dominant in citizen-police encounters. (18 ref)—R. J. Albers.

9447. Tognacci, Louis N. & Cook, Stuart W. (U Colorado) **Conditioned autonomic responses as bidirectional indicators of racial attitude.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 137-144.—Present physiological techniques of attitude measurement tap attitude intensity but not attitude direction. An alternative physiological technique, based upon the phenomenon of semantic generalization of conditioned autonomic responses, was tested to determine whether it

would provide a bidirectional indicator of attitude. 24 white undergraduates with favorable or unfavorable self-reported attitudes toward blacks were conditioned to statements having no racial content which they had previously evaluated as "bad." Subsequently, they were presented with statements with racial content; the latter were sentences which would be differentially evaluated as "good" or "bad" by persons with dissimilar racial attitudes. It was hypothesized that racial attitude would predict conditioned autonomic responses elicited by the generalization statements. Groups differing in racial attitude could be distinguished on the basis of their conditioned responses to the race-related generalization statements. (20 ref)—*Journal abstract*.

9448. Tuteur, Werner. (Elgin State Hosp, IL) **The Chicago Eleven trial and its psychiatric implications.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

9449. Vinod, Mahendra C. (Fiji Coll of Agriculture, Nausori) **Agricultural education for women.** *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 50-52.—Suggests that women should play a major part in rural agricultural programs in developing countries. Women are considered suitable agricultural extension officers in Papua New Guinea because they can comfortably approach other women, who can then influence their husbands to adopt new procedures. Feminine characteristics of patience and respectfulness are seen as potentially useful with farmers, who are often resistant to change. It is suggested that course content in training be guided by local needs and objectives.—*C. Wright*.

9450. Vista Hill Psychiatric Foundation. (San Diego, CA) **Drug X: The most dangerous drug on earth.** *Drug Abuse & Alcoholism Newsletter*, 1974(Oct), Vol 3(7), 1-4.—Describes the statistics on alcohol abuse, citing data concerning (a) the 10,000,000 Americans who are dependent upon alcohol, with its usage by them out of control; (b) the several-hour length of the intoxication state it produces; (c) the 25,000 traffic deaths that are associated with alcohol ingestion; (d) the 35-50% of all arrests and 50% of all rapes committed while the offender is under the influence of alcohol; (e) the suicide rate among alcoholics which is 6-20 times higher than in the general population; (f) the family problems, including separations, divorces, and desertions that result either directly or indirectly from alcohol abuse; (g) the economic loss to industry in days absent from work and sick leave and compensation benefits; (h) the brain damage, eventually irreversible, that comes from alcoholism; (i) the tension and depression that accompany it; and (j) alcohol as the first step in the ladder to misuse of more harmful drugs. Factors responsible for the high rate of alcohol abuse in this country are discussed, and recommendations are made for resolution of the problem.—*R. S. Albin*.

9451. Vogel-Sprott, M. (U Waterloo, Ontario, Canada) **Defining "light" and "heavy" social drinking: Research implications and hypotheses.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1388-1392.—Obtained data on drinking from 131 18-67 yr old men. S's mean "typical" dose of alcohol was estimated from the percentage of absolute alcohol in his

customary beverage times the amount drunk on each occasion. The mean typical dose was .924 ml/kg, and the mean frequency of drinking was 2.46 times/wk. Dose and frequency were significantly related to age. It is suggested that construction of age norms on dose and frequency could help to provide an empirical definition of light and heavy social drinking, to chart changes in social drinking over time, and to provide a means of identifying deviant and possibly "prealcoholic" drinkers.—*Journal abstract*.

9452. Wainer, Howard. (U Chicago) **Predicting the outcome of the Senate trial of Richard M. Nixon.** *Behavioral Science*, 1974(Nov), Vol 19(6), 404-406.—Tested a prediction model for individual voting behavior in the US Senate. A prediction is made about the results of the impeachment trial of Richard M. Nixon.

9453. Wilkinson, Kenneth P. (Pennsylvania State U) **A behavioral approach to measurement and analysis of community field structure.** *Rural Sociology*, 1974(Sum), Vol 39(2), 247-256.—Discusses procedures that could be used as behavioral indicators of community action. Actors and roles are identified based on a 5-phase model: awareness, organization, decision, resource mobility, and resource allocation. The procedures described should provide means for further explication of community field structure.

9454. Wilson, Harriett. **Parenting in poverty.** *British Journal of Social Work*, 1974(Fal), Vol 4(3), 241-254.—Considers that middle-class child-centered behavior, as defined by J. Newson and E. Newson, is not operable in the milieu of poverty. Recent studies completed in England are cited which show that material shortages in the home and poor environmental conditions greatly affect parental child-rearing methods. An alternative model of child-centeredness applicable to the culture of poverty is proposed, and a group of families who share a relatively happy home atmosphere and enjoy participating in children's activities is identified, although it is pointed out that this type of family does not always prevent delinquency. Effective methods of delinquency prevention are shown not to be related to family cohesiveness. It is suggested that the current controversy over preparations for parenthood should acknowledge the realities of slum life which force parents to use child-rearing methods they in fact do not approve of. A more appropriate population for education in parenthood would be a socially upwardly mobile one. It is concluded that parents and children in the slums need vast financial resources to improve their conditions before an attempt is made to change their attitudes.—*Journal abstract*.

9455. Winslow, Jens J. (Bronchitis Screening Ctr, Aalborg, Denmark) **Drug use and social integration.** *International Journal of the Addictions*, 1974, Vol 9(4), 531-540.—Administered a questionnaire to 251 Danish 9th graders to test the "diffusion approach" and "subculture theory" of drug use. According to the diffusion approach, drug users are considered innovators or introducers, while the subculture theory views drug users as deviants. Questions concerning hash use, categorizing respondents as users, triers, or nontriers; and questions concerning sociometry, categorizing respondents on "interaction," "like best" and "leadership"



dimensions, were analyzed. Although results do not lend support to either hypothesis, both approaches are still considered valuable in the study of nonmedical drug use. Problems involved with the reliability of drug studies are indicated.—F. Beyer.

9456. Young, R. E.; Schubert, E. & Jacka, M. (Monash U, Clayton, Vic, Australia) **Hopes and fears in Papua New Guinea 1972-73: A pilot study.** *New Guinea Psychologist*, 1974(Aug), Vol 6(2), 56-62.—Used an open-ended interview approach to study hopes and fears of 404 male and 144 female Papua New Guineans prior to the country's attaining self-government. Interviews were conducted by trained college students in their home villages. The volume and range of concerns were found to be similar to those of people in other countries. Results indicate a high level of concern with economic development and with potential disunity and violence. A concern with the possibility of unwanted changes in family life also appeared, and it is suggested that welfare policies be developed to cope with this concern. It is concluded that these individual concerns reflect the issues of self-government and that the government should respond appropriately to them by controlling violence and other social problems.—C. Wright.

9457. Zimmermann, Robert. [Drug abuse by high school students in a large city.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 169-179.—Reports on a survey undertaken at several high schools in Essen, West Germany, in 1968-1971. Frequency of drug abuse among students was less than expected. Only a few significant differences occurred between users and nonusers. Among the user group relations with parents were more tense, social achievement and motivation were lower, interests tended to focus on literature and music, and leisure activities were more sociable. The socialization was with their age peers and was satisfactory, but not intense emotionally. Hashish was the principal drug used.—S. D. Babcock.

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

9458. Beck, Don E. & Berg, Robert C. (North Texas State U) **Communication through confrontation: A case study in intergroup conflict reduction.** *Texas Personnel & Guidance Association Journal*, 1973(Mar), Vol 2(1), 13-22.—Defines conflict management and formulates 3 principles of conflict reduction which were successfully applied on one occasion at North Texas State University. There are 2 ways of handling conflict: that of the agitator, who seeks to create, enlarge, and perpetuate the conflict; and the method which uses the influence of an arbitrator. It is emphasized that the 3 principles cited might not work at other times and places, and that conflict management requires great skill. (16 ref)—H. Crouch.

9459. Burke, Ronald J.; Firth, John & McGrattan, Cheryl. (York U, Faculty of Administrative Studies, Downsview, Ontario, Canada) **Husband-wife compatibility and the management of stress.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 243-252.—Various types of husband-wife interpersonal compatibility de-

rived from the Fundamental Interpersonal Relations Orientation inventory (FIRO-B), were related to several measures of pair success in managing or dealing with occupational and life stresses. Types of compatibility included (a) interchange compatibility, (b) originator compatibility, and (c) reciprocal compatibility. The dependent variables were oriented towards mutual helping, open 2-way communication, and effective joint problem-solving. Data were obtained separately from a total of 189 husband-wife pairs. Results indicate that husband-wife compatibility as measured by the FIRO-B was not strongly related to measures of stress management. (20 ref)—*Journal abstract*.

## Group Dynamics & Interpersonal Communication

9460. Adler, Leonore L. & Iverson, Marvin A. (Adelphi U) **Interpersonal distance as a function of task difficulty, praise, status orientation, and sex of partner.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 683-692.—Conducted 2 experiments with undergraduates to measure interpersonal distance between Ss and confederates in the laboratory. 216 undergraduates were used in Exp I and 36 male dyads in Exp II. Ss placed themselves relatively far away from partners who flattered them and who were ascribed lower status. In turn, they sat farther from subordinates who praised them after performing a difficult in comparison with an easy task. Their spatial distance from partners of high status did not differ across conditions. Results suggest that social distance as experienced in status-oriented relationships is manifest in interpersonal physical distance. Differences in interpersonal distance were more reliable in same-sex than in male-female partners. Men tended to be more variable and more distant than women. (24 ref)—*Journal abstract*.

9461. Anderson, Alonzo B. (U California, San Diego) **Combined effects of interpersonal attraction and goal-path clarity on the cohesiveness of task oriented groups.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 68-75.—Examined possible differential effects of value similarity and goal-path clarity on the cohesiveness of small groups. 40 triads of undergraduates were formed, 20 high and 20 low in value similarity, and examined during 2 sessions. The 1st session asked Ss to get to know each other. The 2nd session presented a specific task that permitted the manipulation of goal-path clarity. Results indicate that (a) in the 1st session, reported interpersonal attraction was a function of value similarity, and (b) in the 2nd session, only goal-path clarity (and not value similarity or prior attraction level) affected cohesion. The importance of the extent of goal orientation in determining the variables that affect group cohesiveness is discussed. (17 ref)—*Journal abstract*.

9462. Andreoli, Virginia A.; Worchel, Stephen & Folger, Robert. (U North Carolina, Chapel Hill) **Implied threat to behavioral freedom.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 765-771.—Hypothesized that an individual experiences reactance when he sees another person's freedom being threatened even though the threatening act is not directed toward the observer. 110 female undergraduates initially ranked 5 topics in the order in which they desired to discuss them. Then they overheard a taped conversation in

which a person's (B) freedom was threatened by Person A (threat), threatened by A and then restored by the E (restored), or not threatened by A (no threat). The S expected to interact with either the threatener, the threatened individual, or a neutral person. Following the brief conversation, S rated the 5 topics. Results indicate that the initially most preferred topic declined in desirability in the threat condition significantly more than in the restored and no-threat conditions. This effect was obtained regardless of the individual with whom the S expected future interaction. Results support the hypothesis that reactance can be aroused by implication.

—*Journal abstract.*

9463. Ashour, Ahmed S. (U Alexandria, Faculty of Commerce, Egypt) **Individual differences in coalitional behavior.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 1-6.—Studied individual differences in coalitional behavior using 60 male undergraduates. Variables representing the choice of partner and bargaining on payoff were correlated with one another and with some personality variables (G. H. Shure and R. J. Meeker's conciliation, risk avoidance, external control, and suspiciousness scales). Findings indicate that partner power preference was significantly related to initial bargaining demands and bargaining endurance. The bargaining variables of initial demands, final demands, concessions, and endurance were significantly related to one another. External control was significantly related to partner power preference and bargaining concessions. Results suggest that differences in coalitional behavior that occur independently of situational variation have a significant systematic component. (16 ref)—*Journal abstract.*

9464. Blakar, Rolv M. (U Oslo, Norway) **An experimental method for inquiring into communication.** *European Journal of Social Psychology*, 1973, Vol 3(4), 415-425.—Describes tests of an experimental method for inquiring into the organization of an act of communication. Basically, the method creates an interactional setting where one of the basic prerequisites for successful communication is not satisfied. Test Ss interacted under the false belief that they were sharing the same psychological frame. As they tried to diagnose their communication difficulties and apply different therapeutic tools to improve communication, E observed the effects of a variety of basic phenomena on communication. Another experiment is presented which reveals differences in communication between couples with and without schizophrenic offspring. (23 ref)—*Journal abstract.*

9465. Boettinger, Henry M. **Moving mountains or The art and craft of letting others see things your way.** New York, NY: Collier, 1974. ix, 340 p. \$1.95.—Presents suggestions for improving a person's ability to communicate with others, find and develop new ideas, structure the presentation of these ideas, and get the ideas across to other people. Psychological hints for increasing personal effectiveness and for getting and sustaining other people's attention are discussed.

9466. Bond, Michael H. & Shiraishi, Daisuke. (Chinese U Hong Kong, Chung Chi Coll) **The effect of body lean and status of an interviewer on the non-verbal behavior of Japanese interviewees.** *International Journal*

*of Psychology*, 1974, Vol 9(2), 117-128.—16 male and 16 female 19- to 21-year-old Japanese student volunteers were interviewed either by a high-status or by an equal-status confederate. In the forward-lean condition (used for half the interviews) the interviewer leaned forward 20° while in the backward-lean condition he leaned backward 20°. Distance from S stayed constant for the 2 conditions. Speech and video records measured eye contact, pauses during speech, total speaking time, average response latency, physical movements, and smiling. After the interview, Ss rated the interviewer on 20 contrasting adjective pairs and on 2 interpersonal attraction measures. Factor analyses run separately for male and female Ss for the nonverbal behaviors revealed 3 factors for both sexes, only 2 of which for males and 3 out of 16 for females showed communalities of less than .40. Status manipulation had greater effects upon females than upon males. Females also showed greater responsiveness to posture manipulation. Forward-leaning interviewers appeared more polite and more flexible than backward-leaners to Ss of both sexes. (24 ref)—*E. A. Gavin.*

9467. Carlsmith, J.; Lepper, Mark & Landauer, T. K. (Stanford U) **Children's obedience to adult requests: Interactive effects of anxiety arousal and apparent punitiveness of the adult.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 822-828.—Examined the effects of (a) apparent punitive or rewarding E characteristics and (b) anxiety-provoking or relaxed experimental settings on 52 preschool children's obedience to adult requests. In the 1st session, each child saw a videotape of an unfamiliar adult interacting either positively or punitively with another child. Several days later, each child was shown either an anxiety-provoking or an innocuous film. Immediately afterwards the child was asked by the adult he had seen earlier on videotape to pick up 150 scattered tennis balls, and unobtrusive measures of the child's obedience were obtained. In the relaxed condition, a previously positive adult obtained more obedience; in the anxiety-provoking condition, a previously negative adult was obeyed more. Results support a 2-process conception of obedience and suggest a reinterpretation of earlier findings on "responsiveness to social reinforcement" in terms of compliance. (16 ref)—*Journal abstract.*

9468. Carr, Suzanne J. & Dabbs, James M. (Spelman Coll) **The effects of lighting, distance and intimacy of topic on verbal and visual behavior.** *Sociometry*, 1974(Dec), Vol 37(4), 592-600.—Examined how Ss assess degree of intimacy and how they respond to intimacy. 40 female undergraduates answered 3 nonintimate questions in a baseline interview and 3 intimate questions in an experimental interview, in which they sat far from or near to E in a brightly or dimly lit room. Dependent variables included verbal and visual behavior and questionnaire responses. Ss reduced verbal disclosure and eye contact during the intimate interview. They rated the Dim and Near conditions as more intimate and less appropriate than the Bright and Far, respectively, and they preferred the Near over the Far condition. In the Dim condition, Ss decreased eye contact and increased latency to talk, but the Near-Far distinction did not affect behavior. It is concluded that intimacy



may be independent of appropriateness and preference and may affect verbal and visual behaviors differently.

—*Journal abstract.*

9469. Chapman, Antony J. (U Wales Inst of Science & Technology, Cardiff) **Humorous laughter in children.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 42-49.—Examined the notion that the sharing of humor enhances overt expressive responses (laughter and smiling) and humor ratings. Independent groups of 70 7- and 8-yr-old children listened on headphones to amusing material. They were tested alone or in dyads or triads with confederates of the same sex. In triads, duration of laughter and smiling was inversely related to the amount that confederates looked at one another; this was the case whether confederates were thought to be listening to the same or different recordings. Laughter and smiling scores support the notion that sharing the social situation is crucial in the facilitation of "humorous laughter." A theory of socially facilitated laughter is proposed which draws upon social-facilitation drive theory and the tension-reduction aspects of humor theory. (48 ref)

—*Journal abstract.*

9470. Chertock, Sanford L. (U Montana) **Effect of music on cooperative problem solving by children.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 986.—Studied the effects of 4 different sound conditions (art music, mood music, adults reading aloud, and no sound) on cooperative behaviors in 140 6-9 yr olds. Data from a time-sampling analysis show that noncooperative behaviors were greater under no sound and adults reading aloud, and were reduced under the other 2 conditions.

9471. Davies, Ivor K. (Indiana U, Audio-Visual Ctr) **Some aspects of a theory of advice: The management of an instructional developer-client, evaluator-client relationship.** *Instructional Science*, 1975(Jan), Vol 3(4), 351-373.—Examines the special nature of the client-instructional developer and client-evaluator relationship within the broader and more general context of a theory of advice. An analysis is made of the differing sets of assumptions and expectations that may underlie the relationship, for which 3 common models are recognized. 7 successive phases through which a relationship can typically pass are described in terms of a cycle which runs parallel to the cycle of task-oriented activities more usually recognized. Both cycles, relationship-oriented and task-oriented, need to be managed in such a way that the 2 on-going sets of activity are as compatible as possible. After considering a number of general factors that contribute overall to effective relationships, it is concluded that effectiveness seems to be a product of how the relationship is actually viewed. (15 ref)—*Journal abstract.*

9472. Dovidio, John F. & Morris, William N. (U Delaware) **Effects of stress and commonality of fate on helping behavior.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 145-149.—Studied the joint effects of stress and commonality of fate on helping behavior in a 2 × 2 factorial design. 63 undergraduates were randomly assigned to 1 of 4 conditions in which (a) S and a confederate are both awaiting an experiment involving electric shock (high stress-common fate); (b) S is awaiting an experiment involving electric shock while the confederate is awaiting an innocuous word-association

experiment stress-dissimilar dissimilar fate); (c) S is awaiting the word association experiment while the confederate awaits shock (low stress-dissimilar fate); and (d) S and the confederate are both awaiting an innocuous word association experiment (low stress-common fate). Results indicate that high stress, as compared to low stress, facilitates helping if the potential recipient is in the same stressful situation but inhibits helping if the potential recipient is in a dissimilar and less stressful situation. (15 ref)—*Journal abstract.*

9473. Fischer, Donald G. & Burdeny, Terry C. (U Saskatchewan, Saskatoon, Canada) **Individual shifts and group-shift phenomenon.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 939-954.—Studied the effect of group composition on individual decisions by having 93-man groups of male undergraduates discuss caution-oriented life dilemma items chosen from the Choice Dilemmas Questionnaire (CDQ). Ss were grouped as either high, moderate, or low risk takers and completed the CDQ in isolation, in groups, and again in isolation. Results indicate that (a) there are individual changes in decision which are not reflected in an over-all group change; (b) stability of decisions is influenced by item orientation; (c) majority position exerts disproportionate influence on group decisions; (d) homogeneous groups do not shift; and (e) conformity, compromise and attitude change effects are evident. (16 ref)—*Journal abstract.*

9474. Garner, Katherine & Deutsch, Morton. (New York U) **Cooperative behavior in dyads: Effects of dissimilar goal orientations and differing expectations about the partner.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 634-645.—Investigated the nature of the interaction between cooperative and competitive persons. It was hypothesized that cooperative behavior would decrease over time in an interaction between the 2. Ss were 60 male undergraduates. Pairs, in which 1 S was competitive and the other cooperative, played 30 trials of a Prisoner's Dilemma game. 3 experimental conditions were created by varying the nature of the information each S received about his partner's orientation. A decrease in cooperative behavior was found only when Ss believed that their (dissimilarly motivated) partner had the same orientation as themselves. When Ss had veridical information about their partner's dissimilar orientation, there was a significant increase in cooperative behavior over time for both members. When Ss had no information about their partner's goal orientation, cooperative behavior remained stable over time. Data are discussed in terms of the active vs passive role taken by Ss in transforming interpersonal situations which they confront.—*Journal abstract.*

9475. Geller, Daniel M.; Goodstein, Lynne; Silver, Maury & Sternberg, Wendy C. (Richmond Coll, City U New York) **On being ignored: The effects of the violation of implicit rules of social interaction.** *Sociometry*, 1974(Dec), Vol 37(4), 541-556.—When people are ignored, their expectations as to the type and amount of attention they should receive are not fulfilled. The experience of being ignored was analyzed in terms of violations of some of the implicit rules for social interaction. A technique was developed in which 2 female confederates systematically ignored 37 female

college students in a laboratory setting. The hypothesis that ignored Ss would participate less in the conversation than the 28 Ss in the control condition was confirmed. Ss did not react to being ignored by leaving, or expressing anger, but by evaluating themselves and their confederates less favorably than did controls. When given an opportunity to reward one of the confederates, ignored Ss responded by rewarding less than did controls.

—*Journal abstract.*

9476. Goffman, Erving. (U Pennsylvania) **Frame analysis: An essay on the organization of experience.** Cambridge, MA: Harvard University Press, 1974. ix, 586 p. \$12.50.—Discusses the rationale of frame analysis, a method of studying how situations are defined and how various alternatives to ordinary activities (e.g., dreams, tests, fictional dramas, and playfulness) are developed. This type of analysis is also applied to everyday language, and its implications for a systematic sociological study of subjective experiences are examined.

9477. Halprin, Lawrence & Burns, Jim. (Lawrence Halprin & Assoc, San Francisco, CA) **Taking part: A workshop approach to collective creativity.** Cambridge, MA: MIT Press, 1974. xv, 328 p. \$9.95.—Describes an approach to the planning, "doing," and accomplishment of group projects and experiences—the Take Part Process. The workshop orientation of the process, its application to varied situations (e.g., therapy of groups and families, community activities, political planning, and teaching), detailed descriptions of specific Take Part Process workshops, and specific guidelines for designing and conducting workshops are discussed.

9478. Horai, Joann; Naccari, Nicholas & Fatoullah, Elliot. (Hofstra U) **The effects of expertise and physical attractiveness upon opinion agreement and liking.** *Sociometry*, 1974(Dec), Vol 37(4), 601-606.—Varied source characteristics of expertise (high, low, or no information) and physical attractiveness (high, low, or no photograph) in a  $3 \times 3$  factorial design to examine their effects on the opinion agreement of 80 9th-grade girls. As expected, opinion agreement was greater for the physically attractive source than for the nondiffering unattractive or unpictured sources and the high expert than for the nondiffering low expert or the source about whom no information was given. The nondiffering attractive and unpictured sources were liked more than the unattractive source.—*Journal abstract.*

9479. Howard, William & Crano, William D. (Michigan State U) **Effects of sex, conversation, location, and size of observer group on bystander intervention in a high risk situation.** *Sociometry*, 1974(Dec), Vol 37(4), 491-507.—Studied the response of naive college Ss to the apparent theft of another's books in a naturalistic field experiment. Consistent with previous laboratory research, the size of the O group had an appreciable negative influence on intervention behavior. Sex of victim, physical location of the encounter, and prior conversation between victim and bystander also proved to be significant determinants of helping in this potentially high-risk situation. Implications of these results for various predictive models of bystander intervention are discussed. (25 ref)—*Journal abstract.*

9480. Ingham, Roger. (U Southampton, England) **Preferences for seating arrangements in two countries.**

*International Journal of Psychology*, 1974, Vol 9(2), 105-115.—83 male and 62 female English Ss and 67 male and 89 female Swedish Ss who made up 3 subsamples of psychology students, nonpsychology students, and non-university Ss for each country, matched for age, education, and occupation, registered their seating arrangement preferences, using a questionnaire method introduced by R. Sommer (see PA, Vol 40:2826). Swedish Ss chose significantly more face-to-face (opposite) seating arrangements than English Ss, and Swedes avoided right-angle seating arrangements. On 10 of 17 items, Swedes showed greater consistency of choice than English Ss, with a paired-comparison test revealing a low nonsignificant *t*-value that may be related to Swedes' avoidance of right-angle seating arrangements. Evidence concerning effects of increasing intimacy on preferred choices proved inconclusive. Possible explanations based upon earlier observations of behavior in various kinds of situations in Sweden and in England lead to suggested implications for intercultural interactions. (23 ref)—E. A. Gavin.

9481. Kohn, Martin & Parnes, Barbara. (William Alanson White Inst of Psychiatry, Psychoanalysis & Psychology, New York, NY) **Social interaction in the classroom: A comparison of apathetic-withdrawn and angry-defiant children.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 165-175.—Conducted 2 studies with a total of 64 preschool children to test the hypothesis that a child's scores on 2 factor-analytically derived dimensions of social-emotional functioning are directly related to the frequency and type of his peer interactions. In study 1 3 measures of O-rated peer interaction correlated negatively and significantly with high scores on the Apathy-Withdrawal dimension. In study 2 observation-based frequency counts showed a high frequency of solitary behavior for apathetic-withdrawn Ss, as well as a number of qualitative differences between the groups in kinds of interactive behavior: angry-defiant Ss tended to be both verbal and negative-hostile, while apathetic-withdrawn children, when they did interact, were unable to cope with aggression directed at them by their peers.—*Journal abstract.*

9482. Kroeker, Larry L.; Forsyth, Douglas R. & Haase, Richard F. (U Rochester, Counseling & Special Services) **Evaluation of a police-youth human relations program.** *Professional Psychology*, 1974(May), Vol 5(2), 140-154.—Employed an encounter-group or T-group method in workshops in an attempt to increase communication between inner-city youths and policemen. 47 policemen were randomly assigned to 1 of 3 treatment or 1 of 3 control groups. 41 inner-city youths met the treatment group criterion of attending at least 4 workshops, and 30 served as a control group; mean age was 18.1 yrs. The Alienation Index Inventory and a projective test consisting of stories written in response to 4 pictures were administered to 2 of the 3 treatment groups before and after the training period. Analysis of variance indicated no significant differences which could be attributed to program effects. Significant effects of pretesting and significant differences between the police and youths in alienation and the perception of intergroup relations are discussed. It is suggested that the lack of program effects may be related to the lack of randomness in the



assignment of the youths to the experimental and control groups. (19 ref)—*B. Lindsey.*

9483. Lamm, Helmut & Trommsdorff, Gisela. (U Mannheim, W Germany) **Group versus individual performance on tasks requiring ideational proficiency (brainstorming): A review.** *European Journal of Social Psychology*, 1973, Vol 3(4), 361-388.—Reviews experiments in brainstorming, comparing individual vs group performance measures. Ss produced ideas relevant to given tasks, while refraining from evaluating the ideas. Results indicate that Ss brainstorming in small groups produced fewer ideas than Ss brainstorming individually. Factors that might be responsible for the inferiority of groups are discussed, especially the role of social inhibition because of its relevance to possible further research. (43 ref)—*Journal abstract.*

9484. Larnitz, Kinley. (U Minnesota, St Paul) **Reanalysis of Vidmar's data on the effects of decision alternatives on verdicts of simulated jurors.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 123-125.—Proposes a simple probabilistic model for explaining the effects of limiting the number of decision alternatives available to a decision maker. The model holds that the possible decisions in the restricted case are distributed in the same proportions as in the unrestricted case. N. Vidmar's data (see PA, Vol 48:7169) on juror verdicts were reanalyzed using this model and appear to be well fit by the model.—*Journal abstract.*

9485. Lynch, Denis J. (U Toledo) **A-B type and the relationship between police officers and ghetto citizens.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 434-440.—Investigated the A-B therapist-type distinction in a study in which police officers interviewed black male ghetto citizens with the goal of eliciting personal information. Analysis was based on 13 dyads, 7 with a B interviewer and 6 with an A interviewer. Police Ss were white and had a mean age of 34.4 yrs. Citizen Ss were black and had a mean age of 23.5 yrs. Contrary to predictions, As were not more successful than Bs; further, Bs were better liked by the citizens and tended to be rated as more trustworthy. In turn, Bs rated the citizens as more likable than did As. Citizens interviewed by As tended to rate themselves as less active and potent following the interview than did citizens interviewed by Bs. The value of the complementary hypothesis in interpreting the results is noted, as well as the contribution of the citizens' social class to the superior performance of the Bs.—*Journal abstract.*

9486. Monteverde, Frank J.; Paschke, Richard & Tedeschi, James T. (State U New York, Albany) **The effectiveness of honesty and deceit as influence tactics.** *Sociometry*, 1974(Dec), Vol 37(4), 583-591.—40 male undergraduates possessed a unilateral power advantage over a simulated opponent in a Prisoner's Dilemma game. In response to the Ss' threats demanding a cooperative response, the simulated target's verbally announced behavioral intentions and his subsequent responses were manipulated in a 2 × 2 factorial design: Honest-Compliant, Honest-Defiant, Dishonest-Compliant, and Dishonest-Defiant. Ss sent more threats to a compliant than a defiant target. When the target was Honest-Compliant, he converted the Ss into mutual cooperators; but when he was Dishonest-Compliant, Ss

exploited him. While behavioral defiance generally inhibited Ss from sending threats, when the defiant target used deceit in the form of announcing intentions to comply, he induced Ss to make themselves vulnerable to exploitation.—*Journal abstract.*

9487. Myers, David G. & Bach, Paul J. (Hope Coll, Holland, MI) **Discussion effects on militarism-pacifism: A test of the group polarization hypothesis.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 741-747.—Studied group-induced change processes in 2 experiments using a military decision simulation. In Exp I, 2 groups of relatively pacifistic Ss (doves) and relatively militaristic Ss (hawks) (85 undergraduates) were separated for discussion of hypothetical situations relevant to their value differences. It was predicted that discussion within the homogeneous communities of doves and hawks would increase the polarization between the 2 communities. Contrary to prediction, both communities of Ss shifted to increased pacifism following discussion. Exp II, with 117 Ss, replicated this attitude shift and explored informational and normative influence explanations of it. Results indicate that informational mechanisms were operating; support was not obtained for social comparison processes.—*Journal abstract.*

9488. Pedersen, Darhl M. & Shears, Loyda M. (Brigham Young U) **Effects of an interpersonal game and of confinement on personal space.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 838-845.—Pretested pairs of male junior college students ( $N = 170$ ) on 5 personal space measures. They were then randomly assigned to 1 of 3 treatments: game (Ss played an interpersonal game), confinement (Ss were confined in a cubicle in which they were crowded together), and control (Ss were separated). After 1 hr, Ss were posttested on the measures. Personal space was reduced from pre- to posttesting across all treatments for 6 of 8 scores. An analysis of significant Treatment Testing interactions indicated a larger personal space reduction for both experimental groups than for the control group. No difference was found between the 2 experimental groups. Finally, personal space was reduced for the control group on behavioral measures but not on simulated measures.—*Journal abstract.*

9489. Riedesel, Paul L. (U Tulsa) **Bales reconsidered: A critical analysis of popularity and leadership differentiation.** *Sociometry*, 1974(Dec), Vol 37(4), 557-564.—Shows that sociometric measures of popularity used by many students of leadership differentiation exhibit a serious bias. Unless corrected by a standardization, such measures misrepresent the popularity hierarchy and may result in faulty estimation of the differentiation of instrumental expressive leadership. Some of R. F. Bales's basic data are questioned and reinterpreted within the framework of P. Blau's theory of integration.—*Journal abstract.*

9490. Scott, W. E. & Cherrington, David J. (Indiana U, Graduate School of Business) **Effects of competitive, cooperative, and individualistic reinforcement contingencies.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 748-758.—Of 135 undergraduates, those who were told that they were in a competitive contingency produced more and reported higher levels of

arousal and less interpersonal attraction than Ss who were told they were in cooperative or individualistic contingencies. Those who were rewarded in the various conditions reported higher levels of interpersonal attraction and task attractiveness, but there was little evidence of a differential effect. It is concluded that the behavioral effects of cooperative and competitive conditions depend upon the reinforcement contingencies in effect. (33 ref) —*Journal abstract.*

9491. Shubik, Martin; Wolf, Gerrit & Poon, Byron. (Yale U) **Perception of payoff structure and opponent's behavior in related matrix games.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 646-655.—Investigated to what extent Ss would recognize similarities between payoff matrices that vary in game theoretic information conditions. Ss ( $N = 196$ ) failed to note similarities in patterns of payoffs between matrices but did recognize patterns of behavior of an opponent, demonstrating the importance of behavioral processes as opposed to a concern with structures in groups.

9492. Spoedlers-Claes, Rita. (Ghent State U, Belgium) **Small-group effectiveness on an administrative task as influenced by knowledge of results and sex composition of the group.** *European Journal of Social Psychology*, 1973, Vol 3(4), 389-401.—Conducted 2 experiments to investigate possible extensions of E. A. Locke's theory of task motivation and incentives (1968). In Exp I, using 192 Ss, the effect of knowledge of results (KR) on small-group effectiveness (SGE) was analyzed. The SGE measurements (productivity and group atmosphere) were based on a subjective operationalization of the concept "small group effectiveness." Results of analysis of variance to show the influence of KR on SGE supported Locke's theory. Exp II compared 64 Ss, in male and female groups, to determine whether sex composition of the group would have an effect on SGE. Results of  $t$  tests also supported Locke's theory. Limitations and implications of these results are discussed. (17 ref)—*Journal abstract.*

9493. Terhune, Kenneth W. (Niagara Falls Community Mental Health Ctr, NY) **"Wash-in," "wash-out," and systemic effects in extended Prisoner's Dilemma.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 656-685.—Investigated the hypothesis that a long Prisoner's Dilemma (PD) game would reveal behavioral differences among motive groups that a short game would not. A 150-trial PD game, played for money, was used to study the developmental effects of motive constellations and 1st-trial outcome on cooperation-conflict behavior. Ss were 200 18-25 yr old males. Game partners were matched for their dominance in needs for achievement, affiliation, or power, as measured by the Thematic Apperception Test. Results reveal the following: (a) Motive groups developed considerably different levels of cooperation-conflict by the end of the games. (b) Some motive groups did not behave as hypothesized. (c) 1st-trial outcomes affected subsequent behavior, but the effects "washed out" by the end of the games. The discussion emphasizes the appropriateness of the systems model for understanding personality and situational effects in social interaction. (18 ref)—*Journal abstract.*

9494. Thibaut, John; Friedland, Nehemia & Walker, Laurens. (U North Carolina, Chapel Hill) **Compliance**

**with rules: Some social determinants.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 792-801.—Studied adherence to rules as a function of patterns of interdependence inherent in rulemaker-individual interactions as well as of properties pertaining to rule enforcement procedures. Data from 96 undergraduates who played a simulated business game show that individuals observed rules more closely in correspondent than in noncorrespondent rulemaker-individual interactions. In the former, adherence to rules was positively related to the extent of individuals' participation in the rule-making procedure and negatively related to the specificity with which rules were defined. These 2 trends were reversed in a noncorrespondent rulemaker-individual interaction. Finally, an effect attributable to the presence or absence of surveillance was found in the noncorrespondent conditions but not in the correspondent conditions.—*Journal abstract.*

9495. Van de Ven, Andrew H. & Delbecq, André L. (Kent State U, Graduate School of Business Administration) **The effectiveness of nominal, delphi, and interacting group decision making processes.** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 605-621.—Conducted a formal experimental comparison of the effectiveness of alternative group decision-making processes on an applied problem that was characterized as very difficult, had no solution that would be acceptable to different interest groups, and aroused highly emotional and subjective reactions (defining job descriptions of part-time student dormitory counselors). Effectiveness was defined as the quantity of unique ideas generated by a group and the perceived level of satisfaction group participants experienced with the decision process. 20 nominal group technique (NGT), 20 delphi, and 20 interacting groups, each composed of 7 heterogeneous members (i.e., undergraduates and university administrators), were compared. Results suggest that when confronted with a fact-finding problem that requires the pooled judgment of a group of people, 2 alternative procedures can be used: (a) the Delbecq-Van de Ven NGT for situations where people are easily brought together physically and for problems requiring immediate data, and (b) the Dalkey delphi technique for problems where the cost of bringing people together is high. Both the NGT and the delphi method are more effective than the conventional group discussion process. (33 ref)—*Journal summary.*

9496. Wilson, Melvin N. & Rappaport, Julian. (U Illinois) **Personal self-disclosure: Expectancy and situational effects.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 901-908.—96 male undergraduates, selected from a pool of 169 because of their high or low scores on the Jourard Self-Disclosure Questionnaire (JSDQ), were randomly assigned to 1 of 2 conditions of specific expectancy, in which they were told that they would find it either easy or difficult to self-disclose to a stranger interviewer, and 1 of 3 conditions of interviewers' behavior (personal, impersonal, or no disclosure). The JSDQ, scored for anticipated self-disclosure but not for recalled self-disclosure, predicted observed performance. The specific expectancy manipulation and the intimacy level of topics also had significant effects on self-disclosure. A 3-way interaction between generalized



and specific expectancy and topic intimacy was also found. (28 ref)—*Journal abstract*.

### Social Perception & Motivation & Attitudes

9497. Bell, Paul A. & Baron, Robert A. (Purdue U) **Environmental influences on attraction: Effects of heat, attitude similarity, and personal evaluations.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 479-481. —80 undergraduate males received either a positive or a negative personal evaluation from an attitudinally similar or dissimilar confederate. Experimental sessions were conducted under either comfortably cool (73°F) or uncomfortably hot (92°F) environmental conditions. Attraction toward the confederate was primarily influenced by the personal evaluation and attitude similarity variables. Although high ambient temperatures markedly decreased Ss' affective state, exposure to heat did not consistently lower their attraction toward the confederate. Several procedural differences are proposed to account for the inconsistent influence of heat on attraction reported in the present and previous research. —*Journal abstract*.

9498. Braver, Sanford L. & Barnett, Bruce. (Arizona State U) **Perception of opponent's motives and cooperation in a mixed-motive game.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 686-699. —Investigated the hypothesis that the perceived goal and incentives of the other influences an S's behavior in a mixed-motive game. 2 studies were conducted using male undergraduates as Ss, 55 in Study 1 and 32 in Study 2. Study 1 used instructions to vary the perceived goal of the other, and payoff values to vary the incentive of the other to defect. Study 2 varied the other's incentive as well as the S's incentive to defect, both by payoff values. Results indicate that the perceived goal of the other strongly influenced the S's cooperation. The incentive of the other also affected cooperation, except when the other was assumed to be pursuing a benevolent goal. S's incentive did not affect his cooperation nearly as much as did his opponent's incentive. —*Journal abstract*.

9499. Brickman, Philip & Bryan, James H. (Northwestern U) **Moral judgment of theft, charity, and third-party transfers that increase or decrease equality.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 156-161. —Suggests that theft and charity are special cases of transfers within a distribution of goods in which the agent of transfer is directly affected by the transfer, either gaining (in theft) or losing (in charity). In a 3rd-party transfer the person effecting the change is one whose own resources are neither increased nor decreased. While charity may be approved and theft disapproved regardless of their distributional context, it was hypothesized that the evaluation of 3rd-party transfers would depend heavily upon their impact on equality. 60 5th graders rated a model who surreptitiously modified the distribution of rewards in a 4-person group such that the model's outcome was either augmented (by theft), reduced (by charity), or unaffected, and the entire distribution was thereby either made more equal or less equal. 3rd-party transfers were viewed more favorably if they increased equality or represented a "Robin Hood" transfer. Charitable transfers were also

viewed more favorably if they increased equality, while thefts were not. —*Journal abstract*.

9500. Brickman, Philip & Seligman, Clive. (Northwestern U) **Effects of public and private expectancies on attributions of competence and interpersonal attraction.** *Journal of Personality*, 1974(Dec), Vol 42(4), 558-568. —Explored the relative importance of public and private expectancies and possible discrepancies between them on judgments of a person's competence and attractiveness. For attributions of competence (Exp I with 20 undergraduates), private expectancies were more important than public ones, high expectancies were more advantageous than low ones, and there was no penalty for inconsistency. For ratings of attraction (Exp II with 22 undergraduates), public expectancies were more important than private ones, low expectancies were more advantageous than high ones, and there was a sharp penalty for inconsistency as well as inaccuracy. It is suggested that conflicting strategic pressures toward high, low, and accurate expectancies exist, with public expectancies that are slightly lower than private expectancies representing perhaps an optimal compromise. —*Journal summary*.

9501. Carter, Thomas M. (Albion Coll) **A comparison of the attitudes of early adolescents with the attitudes of adults in respect to patterns of behavior.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 12-17. —Compared the attitudes of 110 junior high school students with those of 90 members of a local chapter of Rotary International on a 7-point rating scale ranging from -3 (bad) to +3 (excellent). Descriptive sentences illustrated the attitudes to be rated. The 7 behavior patterns rated highest by the students were gratitude, good health, alertness, friendliness, neatness, trustworthiness, and helpfulness. Rotary members considered honesty, trustworthiness, sense of fair play, sincerity, helpfulness, punctuality, and self-reliance most important. The technique is considered ambiguous, however, as indicated by the word "courteous": should a well-adjusted person be courteous to a bandit? It is suggested that the labels should indicate the specific situations and conditions that are being rated. —A. J. Ter Keurst.

9502. Cleveland, Sidney E. (VA Hosp, Houston, TX) **Changes in human tissue donation attitudes 1969-74.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 1-3. —Studied the personal motivations of 30 human tissue donors, members of The Living Bank, and 30 matched nondonors. All Ss were given the Organ Transplant Questionnaire, the Rorschach, Rotter's Internal-External Control Scale, the MMPI, the Thematic Apperception Test, and the Allport-Vernon-Lindzey Study of Values. Results show that donors and nondonors differ sharply on basic personality factors.

9503. Cleveland, Sidney E. (VA Hosp, Houston, TX) **Personality characteristics, body image and social attitudes of organ transplant donors vs nondonors.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 3-5. —Replicates a 1969 study by S. E. Cleveland and D. L. Johnson (see PA, Vol 44:18688) of attitudes toward human tissue donation, using the Organ Transplant Questionnaire. As before, prospective donors were better educated and of higher

socioeconomic status than nondonors. Data indicate wider acceptance of human donation today by all types of S groups in the general population.

9504. Comazzi, A. & Invernizzi, G. (U Milan, Italy) [A study of students' emotional reactions regarding organ donation.] (Ital) *Medicina Psicosomatica*, 1972(Jul), Vol 17(3), 215-222.—Administered a questionnaire about giving parts of one's body after death to 82 high school students of both sexes. Ss showed hesitation about donating the heart, but not the cornea or kidney. They preferred to accept transplants of artificial organs rather than human organs. Animal organs were not viewed favorably. Willingness to donate organs seemed to be proportional to the sociocultural level. Reluctance to donate is interpreted as a transference to the rational level of the unconscious fear of mutilation. (English & French summaries)—*D. Araoz*.

9505. Deci, Edward L.; Benware, Carl & Landy, David. (U Rochester) **The attribution of motivation as a function of output and rewards.** *Journal of Personality*, 1974(Dec), Vol 42(4), 652-667.—Investigated the effects of a performer's output and level of reward on the attributions which Os make about his intrinsic motivation and extrinsic motivation. In Exp I with 104 undergraduates, the level of output (high vs low) and hourly payments (high vs low) were varied, and all the predicted main effects were obtained. Ss attributed greater intrinsic and less extrinsic motivation to performers when rewards were low than when they were high. They also attributed greater intrinsic and less extrinsic motivation to performers when output was high than when it was low. Exp II varied the nature of payment with 120 undergraduates. The contingent payments were such that the total payment, as well as output, was constant across nature of payment conditions. The predicted interactions were obtained. In the high-output-high-reward conditions, Ss attributed greater extrinsic motivation when rewards were contingent than when they were noncontingent. In the low-output-low-reward conditions, Ss attributed less extrinsic motivation when rewards were contingent than when they were noncontingent. Further, in the high-output-high-reward conditions, Ss attributed less intrinsic motivation when rewards were contingent than when they were noncontingent. In the low-output-low-reward conditions, they attributed greater intrinsic motivation when rewards were contingent than when they were noncontingent. —*Journal abstract*.

9506. Dertke, Max C.; Penner, Louis A. & Ulrich, Kathleen. (U South Florida, Criminal Justice Program) **Observer's reporting of shoplifting as a function of thief's race and sex.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 213-221.—Investigated the reporting of a clearly observed theft as a function of the race and sex of the thief and the sex of the O. 240 white male and female shoppers were given the opportunity either to spontaneously report an act of shoplifting or to confirm the fact that the theft had occurred by responding affirmatively to a direct question. Thefts were perpetrated by a white male, white female, black male, or black female confederate. Results show that blacks were reported or confirmed more often than whites. Results are discussed in terms of (a) behavioral manifestations of

race prejudice and (b) prior research on victim characteristics and helping. (17 ref)—*Journal abstract*.

9507. Enzle, Michael E.; Hansen, Randal D. & Lowe, Charles A. (U Connecticut) **Causal attribution in the mixed-motive game: Effects of facilitory and inhibitory environmental forces.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 50-54.—Studied the effects of environmental forces in a matrix game on Ss' causal attributions for a simulated other's behavior, using 124 female undergraduates in a 2 × 2 factorial design (100% cooperative vs 100% competitive strategy, competition-facilitating vs competition-inhibiting matrix). Significant Matrix × Strategy interactions for attribution measures indicate that personal attributions were made for behavior which occurred despite inhibitory environmental forces and that environmental attributions were made for behavior which occurred in line with facilitory environmental forces. There was no evidence that causal attributions produced by the procedures mediated either game behavior or trust and liking for the other.—*Journal abstract*.

9508. Etaugh, Claire & Sanders, Sharon. (Bradley U) **Evaluation of performance as a function of status and sex variables.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 237-241.—Conducted a study of 210 undergraduates to test the "contrast" hypothesis that the performance of well-known females will be overestimated. Ss were shown paintings by artists who were described as males or females, and as unknown or well-known; paintings were also described as contest entries or winners. Results indicate that well-known artists received higher ratings than unknown artists, regardless of sex. Ss applied sex-role stereotypes in judging opposite-sex, but not same-sex, artists. The "contrast" hypothesis was not supported, but another contrast effect was found—the creativity of unknown winning artists was overrated.—*Journal abstract*.

9509. Feather, N. T. & Simon, J. G. (Flinders U South Australia, School of Social Sciences, Bedford Park) **Reactions to male and female success and failure in sex-linked occupations: Impressions of personality, causal attributions, and perceived likelihood of different consequences.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 20-31.—48 female high school students responded to 3 short verbal cues in which either a male or female character succeeded or failed in an examination qualifying the male (or female) for entry into an occupation. 3 occupations were involved varying in masculine dominance (medicine, teaching, and nursing). In responding to each cue, Ss first rated the character in the cue on semantic differential scales to provide impressions of personality, then rated the importance of different possible causes of the outcome (causal attribution), and finally rated the likelihood that each of a set of possible consequences might follow the outcome. Results indicate a fairly pervasive tendency for the female Ss to upgrade successful males in relation to unsuccessful males but to downgrade successful females in relation to unsuccessful females. (19 ref)—*Journal abstract*.

9510. Fuller, Carol H. **Comparison of two experimental paradigms as tests of Heider's balance theory.** *Journal of Personality & Social Psychology*,



1974(Dec), Vol 30(6), 802-806.—Tested predictions from attitude and balance theory using 2 experimental paradigms with 64 male undergraduates. A completion task and a rating task were directly compared to investigate the relative applicability of these 2 research designs for testing F. Heider's and T. M. Newcomb's balance models. Ss completed structures in the manner predicted by Heider's theory; however, not all such structures were rated as pleasant. It is suggested that the rating method is not an appropriate method for testing a cognitive balance model. Support was found for Newcomb's concept of nonbalance in that Ss were more likely to give a neutral response to partial structures when they contained 1 or 2 negative relations than when they contained only positive relations. (25 ref)—*Journal abstract*.

9511. Garrett, Gerald R. & Bahr, Howard M. (U Massachusetts, Boston) **Comparison of self-rating and quantity-frequency measures of drinking.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1294-1306.—Compared self-reports of heavy, moderate, and light drinking to quantity-frequency classifications (Q-F) using data from interviews with 402 homeless men, 125 men from a lower-income racially mixed neighborhood, 94 upper-income men, 52 emergency women's shelter residents, and 64, 185, and 82 women from a Manhattan shopping district, the upper West Side, and the East Side of New York. More of the homeless men and women were classified as heavy drinkers regardless of the system used. More men reported themselves as lighter drinkers than the Q-F index indicated. Women were as likely to overstate as understate their drinking status. Compared with the Q-F rating, 80-84% of the women and 53-64% of the men correctly classified their own drinking status. It is concluded that there is no evidence that the Q-F index is any more valid than the self-rating measure and that variations in the 2 systems may reflect differences in self-perceived norms of alcohol consumption that are sex linked and related to the drinking milieu. (35 ref)—*Journal abstract*.

9512. Goldstein, Jeffrey H.; Davis, Roger W. & Herman, Dennis. (Temple U) **Escalation of aggression: Experimental studies.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 162-170.—A finding commonly obtained in research using the Buss "aggression machine" is a main effect for trial blocks, indicating an escalation in shock intensity over trials. Theoretical explanations for this effect were tested in a modified verbal operant-conditioning situation. In Exp I 48 male undergraduates could administer any of 10 levels of positive reinforcement to a learner for correct verbal responses or any of 10 levels of negative reinforcement to a learner for incorrect responses. 24 Ss were required to begin with weak, and 24 with strong, reinforcements. Results indicate that, regardless of condition, Ss gave more intense reinforcements as the learning trials progressed. Those who administered negative reinforcements devalued the learner relative to those who administered positive reinforcements. In Exp II a role-playing procedure was used in which 44 undergraduates administered either positive or negative reinforcements to a learner whose performance either did or did not

improve over trials. Again, in all experimental groups, Ss administered increasingly intense reinforcements over trials. Results support disinhibition theory of anti- and prosocial behavior. (39 ref)—*Journal abstract*.

9513. Harris, Mary B. & Ramsey, Sandra. (U New Mexico) **Stereotypes of athletes.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 705-706.—To ascertain whether racial and sexual stereotypes of athletes exist, 140 female junior high school students rated 6 descriptions of athletes which were presented as pertaining to a male or female black, Chicano, or Anglo athlete. No evidence for ethnic or sexual stereotyping was found, although descriptions of athletes in different sports were rated differently.

9514. Harrison, Danny E.; Bennett, Walter H.; Globetti, Gerald & Alsikafi, Majeed. (Auburn U, Montgomery) **Premarital sexual standards of rural youth.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 266-277.—Measures and evaluates premarital sexual standards of 132 adolescents in a small Mississippi community. (16 ref)

9515. Holmes, David S. & Jackson, Thomas H. (U Kansas) **Influence of locus of control on interpersonal attraction and affective reactions in situations involving reward and punishment.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 132-136.—96 undergraduates with high and low scores on Rotter's Internal-External Control Scale participated in individual discussions with an E who either (a) rewarded and then punished, (b) punished and then rewarded, or (c) gave no evaluative feedback after the S's responses. It was hypothesized (a) that the internally controlled Ss, as compared to externally controlled Ss, would be more attracted to E in the conditions involving rewards and punishments regardless of the sequencing and (b) that the reverse would be true in the nonevaluative control condition. The prediction was consistently supported, and Ss' feelings of anger and anxiety during the discussions generally complemented the attention and attraction hypotheses. Results indicate that individual differences influence attraction in situations involving rewards and punishments and they offer a prescription for developing interpersonal attraction and minimizing anger: Offer rewards to internally controlled persons and remain neutral with externally controlled persons. —*Journal abstract*.

9516. Innes, John M. (U Edinburgh, Scotland) **The semantics of asking a favour: An attempt to replicate cross-culturally.** *International Journal of Psychology*, 1974, Vol 9(1), 57-61.—Reports replication in Edinburgh, Scotland, of a field investigation originally made in the United States (New Haven, Connecticut), in which companionless female passersby were asked, under differing conditions, to post a letter. Of the 120 Scots approached, 81% complied; in the earlier study, 50% of the American Ss had complied. For both Scottish and American samples, legitimate requests brought a higher degree of compliance than illegitimate ones; i.e., asking because of a need to catch a train is more likely to elicit compliance than asking because of a need to go shopping.—E. A. Gavin.

9517. Insko, Chester A.; Turnbull, William & Yandell, Ben. (U North Carolina) **Facilitative and inhibiting**

effects of distraction on attitude change. *Sociometry*, 1974(Dec), Vol 37(4), 508-528.—218 male undergraduates listened to a persuasive communication while working on a task and were told either to attend primarily to the communication (message set) or to the task (task set). There was, in addition, a message-only condition. Relative to the message-only condition, message set increased attitude change and communication-favorable thoughts, and decreased number of counterarguments and recall. Relative to the message-set and message-only conditions, task set decreased attitude change, recall, and effort attending to the communication. It is argued that different mediational models were operating for message-set distraction and task-set distraction. (18 ref)—*Journal abstract*.

9518. Jernryd, Elisabeth. [Optimal resistance to authority and propaganda: A study of age and sex differences.] (Swed) *Pedagogisk-Psychologiska Problem*, 1974(Jun), No 239, 143 p.—Studied age and sex differences in measurement variables constructed to assess dependent-independent behavior in 5th, 7th, and 9th graders, as well as their ability to evaluate critically different types of information and to resist one-sided influence. Some aspects of personality were also investigated. Ss' evaluative ability did not seem to increase noticeably between the ages of 10 and 16 yrs. The older Ss expressed less authoritarian, dogmatic, and rigid opinions. Irrespective of age, females were more inclined to display anxiety than males. (81 ref)—*English abstract*.

9519. Jiobu, Robert M. & Knowles, Eric S. (Ohio State U) Norm strength and alms giving: An observational study. *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 205-211.—Conducted an observational study of pedestrians passing a Salvation Army kettle to examine the applicability of normative theory to helping behavior. It is suggested that temporally defined norms, such as those associated with holidays, are not subject to the criticisms applied to situationally defined norms. The charitable gift-giving norms associated with Christmas were assumed to grow stronger as Christmas Day drew nearer. Results indicate that the average donation to the kettle increased with temporal nearness to Christmas. Analysis of these data and earlier studies suggests that intensity of charitable behavior may be associated with S characteristics including strength of felt norms, whereas extensity may be associated with situational features.—*Journal abstract*.

9520. Katz, Marsha. (Michigan State U) Trivial games as predictors of a mixed-motive game. *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 700-706.—2 trivial games, one relevant to the trait of trust, the other to the trait of competition, were used to predict behavior in the mixed-motive game of Chicken. Ss were 78 female and 84 male college students. Results show that behavior in the Chicken game was related to choice in the "competition" game but not in the "trust" game. Findings suggest that competition is the dominant motive in the Chicken game, and demonstrate the utility of using trivial games to determine the relative influence of the various motives that could be salient in mixed-motive situations.—*Journal abstract*.

9521. Kleck, Robert E. & Rubenstein, Carin. (Dartmouth Coll) Physical attractiveness, perceived attitude

similarity, and interpersonal attraction in an opposite-sex encounter. *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 107-114.—Studied the effects of physical appearance (attractive-unattractive) and perceived attitude similarity (high-low) on self-report and nonverbal measures of interpersonal attraction. The physical attractiveness of female confederates, but not their perceived degree of similarity to the 48 male undergraduate Ss, resulted in a number of significant effects during the experimental session. Self-report measures taken 2-4 wks subsequent to the laboratory interaction revealed that Ss had thought more about their partner in the interim, continued to feel they liked her more, and tended to remember more details of her appearance if she had been attractive rather than unattractive. Again, no effects for perceived attitude similarity were detected. (22 ref)—*Journal abstract*.

9522. Kleinke, Chris L.; Staneski, Richard A. & Berger, Dale E. (Wheaton Coll) Evaluation of an interviewer as a function of interviewer gaze, reinforcement of subject gaze, and interviewer attractiveness. *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 115-122.—54 male undergraduates were interviewed by female interviewers who gazed constantly, intermittently, or not at all. Experimental Ss were reinforced with green light feedback whenever they gazed at the interviewers and were punished with red light feedback when they averted gaze for more than 6 sec. Control Ss received noncontingent green and red light feedback. Although gaze of experimental Ss toward the interviewers was increased significantly, their attitudes toward the interviewers remained the same. This was probably because the Ss did not discriminate that their gazing behavior had changed. Ss gave the most unfavorable reactions to the nongazing interviewers, rating them as least attractive, giving them the shortest answers, and sitting farthest from them during the debriefing session. Ss did not discriminate between high- and low-attractive interviewers, except that the latter were rated disproportionately low on attentiveness if they did not gaze. Interviewers with high rates of talking were preferred over interviewers with low rates of talking. (28 ref)—*Journal abstract*.

9523. Korten, Frances F. The influence of culture and sex on the perception of persons. *International Journal of Psychology*, 1974, Vol 9(1), 31-44.—39 male Ethiopian university students and 47 male and female American university students described persons they knew well and persons they knew very little. Ethiopians gave their descriptions orally while Americans wrote theirs. Content analysis of the open-ended descriptions, based on a 12-category system devised by L. Beach and M. Wertheimer (see PA, Vol 36:4HJ67B), revealed many highly significant differences in category usage, demonstrating that the 2 groups perceived fellow university students in very different ways. Ethiopians stressed Interpersonal Interactions and Opinions and Beliefs far more than Americans while Americans stressed Abilities and Knowledge, Cognitive-Emotional Style, and Interpersonal Style far more than the Ethiopians. Both groups used the category Interests and Activities extensively. American females differed significantly from American males in 5 of the 12 categories, although the differences



were not as dramatic as those between Ethiopians and Americans. It appears that cultural needs affect the importance of particular perceptual categories and in this way shape the interpersonal perceptions of a culture's members. (25 ref)—*E. A. Gavin.*

9524. Larsen, Knud S. (Oregon State U) **Conformity in the Asch experiment.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 303-304.—Replicated S. Asch's (1956) experiments, using 24 male and female Ss. Results show that on a total of 18 trials, 62.5% of Ss conformed on 1 or more of these trials. It is suggested that different time periods create different pressures toward conformity.

9525. Larsen, Knud S. (Oregon State U) **Social cost, belief incongruence, and race: Experiments in choice behavior.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 253-267.—Conducted 5 studies and 3 experiments with a total of 295 graduate, undergraduate, and high school students to investigate the relative importance of social cost, belief incongruence, and race in the preference for "types" of people or stooges. Ss in the studies completed a Person Preference Test which required them to state their preference for 8 person types, composed of all possible variations of the 3 variables across 6 relationships varying in intimacy. Ss ranked in order of preference the 8 person types, and 1 study asked the Ss to indicate preference for each of all possible pairs. Results show that complete congruency (same beliefs, race, and low social costs) was the most important factor. Race was particularly important for the most intimate relationship. Excluding a consideration of complete congruence, the relative importance of the variables were social cost, belief incongruence, and race. The laboratory experiments tended to support the relative importance of social cost, in the preference for stooges differing in social cost, belief incongruence, and race.—*Journal abstract.*

9526. Lefebvre, Luc M. (Catholic U Louvain, Belgium) **An experimental approach to the use of ingratiation tactics under homogeneous and heterogeneous dyads.** *European Journal of Social Psychology*, 1973, Vol 3(4), 427-445.—Investigated the occurrence of ingratiation as mediated by sex of sender and recipient in a  $2 \times 2 \times 2$  factorial design, and explored the structure and preference of ingratiation overtures. 80 male and female Ss enacted the role of interviewees and made themselves amiable or acted spontaneously to improve evaluation by the interviewer. Results support the hypothesis that ingratiation behavior would be distinguished from spontaneous behavior indicating opinion conformity, self-presentation, other-enhancement, and smiling. Modesty as an ingratiation tactic occurred more under the female homogeneous dyad, there were more ingratiation overtures under the heterogeneous than homogeneous dyads on some verbal measures, and less ingratiation smiling occurred under the male dyad. Verbal and nonverbal overtures were found to possess a different structure, and opinion conformity was the most sensitive differentiator between the verbal ingratiation overtures. (24 ref)—*Journal abstract.*

9527. Lerner, Richard M. & Frank, Phyllis. (Eastern Michigan U) **Relation of race and sex to supermarket helping behavior.** *Journal of Social Psychology*,

1974(Dec), Vol 94(2), 201-203.—Conducted a study of 66 white women and 36 white men as potential helpers to determine the relationship of the race and sex of a person in need of help to the frequency of helping behavior. Ss could help, or not help, a white or a black male or female, respectively, whose bag of groceries had just broken in front of a supermarket. Overall, the white females tended to help more than the white males, but the overall percentages of help given to males or females, or to blacks or whites, were not significantly different. The distribution of the white males' and females' helping did differ in relation to the sex and race of the person in need of help. Despite these differences, no support was found for a racial- or sexual-congruence-increased-helping-frequency relation.—*Journal abstract.*

9528. Lerner, Richard M.; Knapp, John R. & Pool, Kenneth B. (Eastern Michigan U) **Structure of body-build stereotypes: A methodological analysis.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 719-729.—Used 182 undergraduates to study the comparability of body build stereotypes depicted through the use of various response formats. Stereotypes toward endomorph and mesomorph body types, respectively, were derived through responses to (a) a traditional, forced-choice format; (b) a dimensionalized, bipolar item format requiring placement of 10 endomorphs and 10 mesomorphs along each of 10 9-point dimensions; (c) a format identical to (b) above except in the requirement of only 1 endomorph or mesomorph attribution for each dimension; and (d) a format requiring the estimation of the percentage of time an endomorph and a mesomorph, respectively, manifested the item-characteristic. Although mean responses derived from the latter 3 methods were consistent in direction with corresponding forced-choice, frequency data, the intradimensional separation of most of these means was not markedly disparate. Moreover, correlations between forced-choice responses and any and all of the latter methods were markedly low, although correlations among these latter methods were moderate.—*Journal abstract.*

9529. Maller, Allen S. (Temple Akiba, Culver City, CA) **Religious pluralism, political values and American teenagers.** *Religious Education*, 1974(Jul), Vol 69(4), 446-450.—Presents data from a nation-wide 1971 survey of 23,000 promising 11th- and 12th-grade students who were among the top 2% of students in their high schools. Answers to questions concerning moral and social issues showed differences among Protestant, Catholic, Jewish, and Black youths. Whether differences are statistically significant is not stated. Comparison of results with adult surveys reveals that adolescent responses tend to differ as much as those of adults.—*E. A. Gavin.*

9530. McComas, William C. & Noll, Mark E. (Manchester Coll, England) **Effects of seriousness of charge and punishment severity on the judgments of simulated jurors.** *Psychological Record*, 1974(Fal), Vol 24(4), 545-547.—Studies of the effects of decision alternatives on the verdict returned by simulated jurors have confounded the seriousness of the criminal charge with the severity of punishment associated with the charge. The present experiment crossed charge (1st degree murder, 2nd degree murder, and manslaughter) with punishment severity in a  $3 \times 3$  factorial design.

From a description of an attempted robbery and consequent killing of a store proprietor, 108 undergraduates rated the guilt of the defendant. Only seriousness of charge had a significant effect on guilt ratings (the lower the charge, the greater the guilt), suggesting that this factor rather than severity of associated punishment accounts for results in previous studies.—*Journal abstract.*

9531. Mishra, Bhaskar D. (M.L.K. Coll, Gonda, India) **The role of verbal description in person-perception.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 45-47.—Studied how person-perception is affected by verbal description. 40 undergraduate Ss rated a stimulus person on a 7-point semantic differential scale containing 37 bipolar traits. The ratings of the Ss who both observed the stimulus person and were given a verbal description about him differed significantly ( $p < .01$ ) from those of the Ss who observed him without an accompanying verbal description. It is concluded that the perception of a stimulus person is capable of being affected by information about him conveyed in a verbal description.—*B. Lindsey.*

9532. Morse, Stanley J.; Reis, Harry T.; Gruen, Joan & Wolff, Ellen. (Pontificia U Catolica de São Paulo, Brazil) **The "eye of the beholder": Determinants of physical attractiveness judgments in the U.S. and South Africa.** *Journal of Personality*, 1974(Dec), Vol 42(4), 528-542.—Investigated determinants of ratings made of male and female "looks" and "sex appeal." It was predicted that while male and female judges would give the same mean ratings to stimulus persons shown on color slides, these ratings would have different meanings depending upon the sex of the judge and of the stimulus person. It was further hypothesized that judges high in self-regard and those who date more frequently would rate stimulus persons more positively than judges low in self-regard and dating frequency. 58 male and 74 female university students serving as judges did give the same mean ratings to the stimulus persons. Factor analyses of self-ratings and ratings of the stimulus persons on attractiveness and other dimensions showed only slight differences in self-ratings but larger differences, across raters of both sexes, in how male and female stimulus persons were evaluated. Self-regard correlated positively with ratings made by males and females of female sex appeal. Dating frequency correlated negatively with ratings made by males of both male and female sex appeal and male looks. Findings generally parallel those found by S. J. Morse et al (1974) in South Africa, with results of both studies suggesting that (a) males and females subscribe to the same standards in judging physical attractiveness but nevertheless attach somewhat different meanings to such judgments; (b) judging a male as attractive means something quite different from judging a female as attractive regardless of the sex of the judge; and (c) self-regard and dating frequency affect a judge's assessment of another person's attractiveness, but in a complex way.—*Journal summary.*

9533. Moscovici, Serge & Néve, Patricia. (Ecole Pratique des Hautes Etudes, Paris, France) **Studies in social influence: II. Instrumental and symbolic influence.** *European Journal of Social Psychology*, 1973, Vol 3(4), 461-471.—Offers a critical analysis of information-

al influence, attempting to demonstrate that in every interaction the judgments emitted by the source (influence agent) appear to contain information about the judged object. Instrumental influence is distinguished from symbolic influence. 44 female Ss from the University of Paris participated in an experiment in which they judged the number of points appearing on slides. Results show that compliance with someone who is systematically consistent is viewed by S as an adoption of that person's judgments. Compliance with someone whose consistent behavior is contingent is viewed by S as the result of the S's influence on the other person. The psychological significance of one's behavior depends on how one perceives the behavior of the influence source and what causal attributes are imputed to it.—*M. K. Phifer.*

9534. Nelson, Carnot E. (U South Florida) **The perceived structure of social attitudes.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 449-451.—In an attempt to determine the multidimensional structure of perceived social attitudes, 45 college students described approximately 10 different persons they knew by selected attitude statements from a list which the E supplied. A measure of statement concurrence for each pair of statements was derived from these data and was used in J. B. Kruskal's (1964) multidimensional scaling program. The fit for the 3-dimensional configuration fell in the "fair" range with additional dimensions adding little to the goodness of fit. This configuration was interpreted by finding axes in the configuration which corresponded to independently measured psychological properties of the statements. These axes were located by multiple-regression techniques. Liberal-conservative and moderate-extreme provided a satisfactory description of 2 of the 3 dimensions. The 3rd dimension was uninterpretable. (16 ref)—*Journal abstract.*

9535. Newton, Darren & Czerlinsky, Thomas. (U Virginia) **Adjustment of attitude communications for contrasts by extreme audiences.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 829-837.—Conducted 4 experiments to study shifts in communications of attitude when Ss were instructed to communicate accurately their opinions to extreme audiences. In the 1st experiment, 26 moderates on the Vietnam war were asked to communicate their position to both hawks and doves; communications were significantly displaced toward the audiences. Exp II replicated this effect with a between-Ss design (96 Ss) with the issue of political liberalism-conservatism. Ss were not preselected for initial position. In Exp III, 30 Ss communicated their political position to 1 extreme audience. Expected audience perception was then assessed when (a) the communication only was shown to the opposite extreme, (b) both the communication and the original audience were shown to the opposite extreme, and (c) the original audience received the communication. Expected perception was virtually identical under (b) and (c). In Exp IV, 30 Ss were shown a communication to an extreme audience. Results indicate that perceived communicator position was significantly "corrected" away from the position of the extreme audience. It is concluded that such shifts occur through context effects on the meaning



to the communicator of his attitude expressions.  
—*Journal abstract.*

9536. **Oswalt, Robert M.** (Skidmore Coll) **Person perception: Subject-determined versus investigator-determined concepts.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 281-285.—Elicited S-determined words from 8 undergraduates with the use of 4 methods over 4 sessions. These words were compared to standard investigator-determined word lists traditionally used in person perception. Results indicate that free-response methodology was feasible in person perception research, and that this technique enabled an S to identify referents with a high degree of accuracy. Comparisons between S-determined word lists and investigator-determined word lists indicate that the median overlap was small (about 12%), and it is suggested that researchers be cautious in assuming that they are equivalent.—*Journal abstract.*

9537. **Panferov, V. N.** (Leningrad State U, USSR) **[The perception and interpretation of personal appearance.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 59-64.—Reviews 3 studies of person perception conducted between 1967 and 1969, which showed, among other things, that in tachistoscopic exposures of photographs the most discriminable feature is the hairstyle. That feature and others are used in attributing personality qualities to persons before actual personal relationships begin. The process of transition from perceptual qualities to cognition and logical inferences is described and the role of physical attributes of persons in their perception by others is discussed. (English summary)—*L. Zusne.*

9538. **Posavac, Emil J.** (Loyola U, Chicago) **Relative weighting of positive and negative information and confidence in reports of behavioral intentions.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 481-483.—Trait descriptions that varied in polarity from a neutral description were formed in order to compare the relative weights of positive and negative traits on reports of behavioral intentions (BIs). 44 college students made marital BI judgments, and 82 reported employ BIs. Negative traits were weighted more heavily than positive traits. Confidence in BI reports increased as the descriptions increased in polarity, but negative information did not consistently evoke more confidence than positive information. Hypotheses suggesting different patterns of responses to marital and employ BIs were not supported.—*Journal abstract.*

9539. **Reingen, Peter H.** (Iona Coll, Graduate School of Business) **Phenomena of shifts along a risk dimension tested with established groups.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 295-296.—Conducted a study of 35 introductory business students to investigate the negative relationship between the amount of risky shift and the degree of perceived risk. Results indicate that there were no significant shifts in either the low-risk or high-risk situation.

9540. **Scarpetti, William L.** (Florida State U) **Autonomic concomitants of aggressive behavior in repressors and sensitizers: A social learning approach.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 772-781.—20 male repressors and 20 male sensitizers (selected from 200 undergraduates who completed Byrne's Repression-Sensitization scale) were placed in a 2-person interaction paradigm with a male confederate.

They were divided into 2 groups which either met their confederate (contact condition) or did not (no-contact condition). Electrodermal and plethysmographic readings were continuously recorded. Responses were either token reward or shock. Results indicate that when reward and shock counterresponses to aggressive provocation were not systematically reinforced, repressors made fewer aggressive (shock) counterresponses than reward responses. Sensitizers preferred to respond to aggressive provocation with aggressive counterresponses. Autonomic concomitants of the interpersonal behavior were highly consistent with the behavior preferred by both sensitizers and repressors. When the nonpreferred counterresponse to aggressive provocation was systematically reinforced, a reversal of these response patterns obtained. Finally, when reward and shock counterresponses were again randomly reinforced, previous response patterns and autonomic concomitants were reestablished. A social learning explanation of cathartic reactions in repressors and sensitizers is discussed.—*Journal abstract.*

9541. **Scott, Joseph A.** (California State U, Chico) **Awareness of informal space: A longitudinal analysis.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 735-738.—Identified the grade level at which children become aware of the meaning of interpersonal distance. Photographs showing pairs of adults at intimate, personal, social, and public distances were shown to 80 elementary school children. The Ss, in kindergarten through 3rd grade, were asked which of 4 communications corresponding to the above distances were in progress: a secret, discussion of dinner, directions to a store, or a call to dinner. Success in identifying the type of communication was directly related to grade level. Kindergartners performed at chance level, but success in identification increased thereafter through 3rd grade. However, the meanings of the 4 distances were not learned all at once. Public distance was identified earliest, intimate distance next, with the intermediate distances being identified last.—*Journal abstract.*

9542. **Shaffer, David R. & Wegley, Carol.** (U Georgia) **Success orientation and sex-role congruence as determinants of the attractiveness of competent women.** *Journal of Personality*, 1974(Dec), Vol 42(4), 586-600.—Proposed that competent women are attractive to the extent that they retain a feminine sex-role perspective and are not strongly motivated to compete successfully with men in masculine activities. 48 male and 48 female undergraduates were provided information describing 1 of 4 competent female strangers. Stimulus persons (SPs) were portrayed as either success-oriented or non-success-oriented and as either masculine or feminine in their sex-role preferences. Results indicate that SPs attributes were correctly perceived, but the attraction data provided only partial support for the hypotheses. As expected, Ss viewed the feminine SP as more socially attractive and more attractive as a work partner than the masculine SP. However, when taking the role of a prospective employer, Ss showed a slight preference for the masculine SP. Contrary to expectations, the success-oriented SP was not judged less attractive in general than the non-success-oriented SP. Results suggest that the aspiring career woman might well adopt a masculine sex-role preference

to impress her employer, but that she does so at the risk of some degree of social ostracism from peers of both sexes.—*Journal summary.*

9543. Shrauger, J. Sidney & Patterson, Marion B. (State U New York, Buffalo) **Self-evaluation and the selection of dimensions for evaluating others.** *Journal of Personality*, 1974(Dec), Vol 42(4), 569-585.—Exposed relationships between 36 high and 36 low self-esteem undergraduates' (as determined by scores on a self-esteem inventory) satisfaction on certain personality dimensions, the relevance they ascribed to these dimensions for judging themselves, and the frequency with which they used these dimensions in writing free descriptions of other people. Dimensions seen as highly relevant for describing oneself were used more frequently in describing others than were dimensions seen as least relevant for self-description. There were also differences in the frequency of using high- and low-satisfaction dimensions. These differences were related to the self-esteem level of the S and the likeability of the stimulus person, however, and were not significant in covariate analyses which controlled for variations in the frequency with which people in general use different dimensions. The high self-esteem S also showed more correspondence between his ratings of the relevance of dimensions to himself and his satisfaction on those dimensions. (17 ref)—*Journal summary.*

9544. Shulghina, B. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Some characteristics of the acceptance by school children of a peer's opinion in a conflict situation.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 145-149.—Replicated the conformity experiment of Ash with 252 students. It was found that a variety of motives, rather than only one, lead to conformity or nonconformity to majority opinion.

9545. Skotko, Vincent; Langmeyer, Daniel & Lundgren, David. (U Cincinnati) **Sex differences as artifact in the Prisoner's Dilemma game.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 707-713.—Investigated the hypothesis that sex differences in the Prisoner's Dilemma (PD) game are in part a function of the sex of the E. It was noted that female S pairs have often been found to compete more than either male pairs or mixed sex pairs in the PD game. Ss were 67 male and 67 female undergraduates. 3 males and 3 females served as Es. The hypothesis was supported; although females evidenced higher competition with male Es, no sex differences were found with female Es. Female S pairs were, however, the only pairs which evidenced significant differences in level of competition under male and female Es ( $p < .05$ ). Results are discussed in terms of greater sensitivity on the part of female Ss than male Ss to characteristics of both partner and the E. Implications for the design of experimental investigation of sex differences are also considered.—*Journal abstract.*

9546. Snyder, Mark & Cunningham, Michael R. (U Minnesota, Lab for Research in Social Relations, Minneapolis) **To comply or not comply: Testing the self-perception explanation of the "foot-in-the-door" phenomenon.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 64-67.—Conducted a field experi-

ment to test the self-perception explanation of the "foot-in-the-door" phenomenon of increased compliance with a substantial request after prior compliance with a smaller demand. In this study, 30 Ss were first approached with a small request (answer 8 questions in a telephone survey) the size of which was virtually certain to guarantee compliance. 32 other Ss were first approached with a request sufficiently large to guarantee noncompliance (answer 50 questions). Ss in both of these conditions were subsequently approached with a moderately sized request (30 questions sponsored by a different public service organization). As predicted by self-perception theory, Ss in the small-initial-request condition showed a higher rate of compliance to the 2nd request (.519), whereas Ss in the large-initial-request condition showed a lower rate of compliance (.219) than Ss in the no-initial-request control condition (.333).—*Journal abstract.*

9547. Stewart, Robert A.; Powell, Graham E. & Tutton, S. Jane. (U London, Inst of Psychiatry, England) **Subjective factors in social stereotyping and impression formation.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 867-871.—Evaluated the process of stereotyping (i.e., forming judgments from limited cues) by both the coefficient of concordance ( $W$ ) and the mean intercorrelation between antonyms ( $r$ ). In the context of the study,  $W$  reflects social stereotyping while  $r$  reflects a combination of social and individual stereotyping. 50 undergraduates ranked 6 female physiques from those most-suited to those least-suited each of 15 traits. Embedded randomly within the 15 traits were 3 pairs of antonyms. In all 3 cases  $r$  was of greater magnitude than  $W$ , suggesting that  $r$  is a more accurate estimator of total stereotyping than is  $W$ . In terms of variance explained,  $r$  was approximately twice the magnitude of  $W$ , implying that measures such as  $W$ ,  $\chi^2$ , and analysis of variance, which ignore subjective factors, greatly underestimate stereotyping. The same problem exists in impression formation, where tests such as analysis of variance may, by excluding subjective factors, underestimate the potency of target-persons and traits. It is also noted that factor analysis and related techniques were potentially immune from these distortions.—*Journal abstract.*

9548. Swingle, Paul G. (U Ottawa, Ontario, Canada) **The effects of game structure and S's behavior on attitudes toward cooperative opponents.** *Journal of Conflict Resolution*, 1974(Dec), Vol 18(4), 714-725.—Examined, in 2 experiments, the effects of game structure and S's behavior on attitudes to opponents (Os). Ss were 18 male undergraduates in Exp I and 16 females against programed Os in Exp II. Highly cooperative Ss, involved in either the Prisoner's Dilemma game, the power game, or the Chicken game, against a conditionally cooperative O, rated powerful Os as having more suspicious motives and less ability as compared to Os in the other games. Os in the Chicken game were rated least attractive. In the 2nd study, a relationship was found between weak Ss' level of exploitation and the rating of the powerful Os' ability. (29 ref)—*Journal abstract.*

9549. Taylor, Shelley E. (Yale U) **On inferring one's attitudes from one's behavior: Some delimiting conditions.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 126-131.—Determined conditions



under which people infer their attitudes directly from their behavior. 72 female undergraduates were given false physiological feedback which was either consistent or inconsistent with a prior attitude. In addition, Ss either expected or did not expect the attitude to have important consequences for their future behavior. When attitudes were reassessed, type of feedback was only weakly related to use of feedback as a basis for one's attitude. However, it was clear that Ss used the feedback as a basis for their attitude only when they expected no future consequences to result from their attitudes. When future consequences were anticipated, Ss engaged in a critical, time consuming reevaluation of their attitudes in which feedback played a minimal role. It is concluded that the process outlined by D. J. Bem's (1972) self-perception theory is most likely to operate when the attitudinal issues are relatively unimportant.—*Journal abstract.*

9550. Tesser, Abraham & Johnson, Robert. (U Georgia) **Dependence and thought as determinants of interpersonal hostility.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 428-430.—Conducted a study of 48 male undergraduates to investigate the hypothesis that thought tends to make attitudes more extreme (by making relevant cognitions more consistent) and that dependence on another tends to focus one's thoughts on that other. It was predicted that attitudes toward an initially disliked other would become more negative as a function of opportunity for thought, dependence on other, and opportunity by dependence. Dissonance theory leads to an opposite prediction: Attitudes would become less negative as a function of opportunity, dependence, and opportunity by dependence. Although results are not completely consistent with either prediction, they were better accounted for by the first prediction.—*Journal abstract.*

9551. Weigel, Russell H.; Vernon, David T. & Tognacci, Louis N. (Amherst Coll) **Specificity of the attitude as a determinant of attitude-behavior congruence.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 724-728.—113 persons who had reported varying degrees of ecological concern in a survey about environmental problems were contacted 5 mo later by representatives of the Sierra Club. Respondents' subsequent level of behavioral commitment to the Sierra Club was compared to the scores that they had previously attained on 4 different attitude scales. Results lend support to the proposition that attitude-behavior congruence improves when the attitude measured is highly specific to the behavioral criterion.—*Journal abstract.*

9552. Wilke, Henk & Meertens, Roel. (State U Groningen, Netherlands) **Individual risk taking for self and others.** *European Journal of Social Psychology*, 1973, Vol 3(4), 403-413.—Conducted 3 risk-taking studies which involved 150 Ss from the State University of Groningen and used the choice-dilemma situations of Kogan and Wallach (1964), the Pruitt and Teger gambling situation (1969), and a simple 1-trial gambling game. Results suggest that an individual takes as much risk for himself as for someone else. An attempt was made to determine to what extent the results could be

explained by properties of the experimental situations. (16 ref)—*Journal abstract.*

9553. Wyer, Robert S. (U Illinois) **Direct and indirect effects of essay writing and information about other persons' opinions upon beliefs in logically related propositions.** *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 55-63.—Sets of three propositions (A, B, and C) were selected. In each set, B was more likely to be true if A was true than if A was false, and C was more apt to be true if B was true than if B was false. After receiving information that other persons either agreed or disagreed with B, 128 undergraduates wrote an essay either supporting or opposing this proposition. Both essay writing and others' opinions affected beliefs that B was true ( $P_B$ ) in the direction of the position advocated. Effects of these variables upon beliefs that C was true ( $P_C$ ) were in the same direction but less in magnitude. Essay writing affected beliefs that A was true ( $P_A$ ) only when Ss were told that other persons agreed with B. Changes in  $P_A$  and  $P_C$  did not depend upon whether A and C were mentioned in the essays about B. Changes in beliefs were attributed to a tendency for Ss to regain cognitive consistency. (26 ref)—*Journal abstract.*

9554. Zillmann, Dolf & Bryant, Jennings. (Indiana U, Inst for Communication Research) **Effect of residual excitation on the emotional response to provocation and delayed aggressive behavior.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 782-791.—In a pretest with 20 male undergraduates, the excitatory response to 2 equally liked tasks—disc threading and bike riding—was assessed in peripheral indices. Bike riding induced substantial excitatory elevation; disc threading yielded negligible changes only. Sympathetic arousal was significantly differentiated 2 min after the tasks. 6 min after the tasks, residual excitation from the bike task had decayed so that arousal from the 2 tasks no longer differed. In the main experiment, 43 Ss performed 1 of the 2 tasks, and 2 min thereafter (experiencing minimal vs high residual excitation) they were either treated in a neutral manner (no provocation) or aggressively instigated (provocation) by an opponent. 6 min after completion of the task (after decay of task-produced residues), Ss were given an opportunity to behave aggressively and/or benevolently toward their opponent. Pronounced residual excitation at the time of provocation increased delayed aggressiveness significantly. Findings are consistent with 2-factor and excitation-transfer theories of emotion. (16 ref)—*Journal abstract.*

9555. Zillmann, Dolf & Cantor, Joanne R. (Indiana U, Inst for Communication Research) **Rhetorical elicitation of concession in persuasion.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 223-236.—Conducted a study of 52 undergraduates to assess the persuasive effect of the rhetorical elicitation of concession under conditions of initially favorable and initially unfavorable attitude relative to the attitudinal position advocated; the resulting resistance to counterpersuasion was also measured. Elicitation of concession resulted in a significant increase of persuasiveness under conditions of favorable attitude, and in a significant decrease of persuasiveness under conditions of unfavorable attitude. Various rationales are developed, and their respective predictive accuracy discussed. A model based mainly on the

enhancement of cognitive involvement is evaluated as best accounting for the findings obtained.—*Journal abstract.*

## COMMUNICATION AND LANGUAGE

9556. Blankenship, Ralph L. (Virginia Commonwealth U) **Caserecords language: Toward a sociolinguistic perspective on deviance labeling.** *Sociology & Social Research*, 1974(Apr), Vol 58(3), 253-261.—Caserecords register and language choice are means by which agents of social control construct selective images of reality which, in the place of a subject person, function as bases for putting offenders into appropriate social settings for treatment and custody. Contextualization of caserecords on the situational and linguistic levels reveals (a) that linguistic variation is related to convergent influences in the social setting where caserecords are constructed and differential labeling outcomes are decided, and (b) that caserecords writers can portray functionally distinctive deviance types through common techniques of management and descriptive lexis, form, and style. Meaning, in caserecords, is affected by manipulative intent, power, and collusive agreement. (15 ref)—*Journal abstract.*

9557. Bourhis, Richard Y.; Giles, Howard & Taffel, Henri. (University Coll, Cardiff, Wales) **Language as a determinant of Welsh identity.** *European Journal of Social Psychology*, 1973, Vol 3(4), 447-460.—Carried out a study using the "matched-guise" technique to determine how different groups of Welshmen perceive members of their own national group who use various linguistic codes. 3 matched groups of adult Welsh Ss were (a) bilinguals, (b) those who were learning Welsh, and (c) those who could not speak Welsh and were not learning it. Ss were asked to evaluate on 22 scales the personalities of speakers they heard reading the same prose passage on tape in Welsh, in English with a Welsh accent, and in English with a received accent. Results show that Ss as a whole upgraded the speakers on most traits when Welsh was used. It is suggested that language serves as a symbol of Welsh identity, and the results are discussed in relation to how other ethnic groups appear to view their own linguistic codes. (28 ref)—*Journal abstract.*

9558. Carpenter, Patricia A. & Just, Marcel A. (Carnegie-Mellon U) **Sentence comprehension: A psycholinguistic processing model of verification.** *Psychological Review*, 1975(Jan), Vol 82(1), 45-73.—Presents a theoretical account of certain aspects of sentence comprehension, particularly the processes involved in deciding whether a sentence is true or false. The model proposes that (a) sentences are internally represented as an ordered set of constituents in an abstract propositional format, (b) other information sources (e.g., pictures) may be represented in a similar format in this task, and (c) the corresponding constituents from the sentence representation and the picture representation are serially compared. The predictions are made on the basis of a single parameter—the time to find and compare one pair of constituents. The model also accounts for verification of counterfactual clauses, implicit negatives, universal

and particular quantifiers, and sentence recoding. (50 ref)—*Journal abstract.*

9559. Cassis, A. F. (U Lethbridge, Alberta, Canada) **The dream as literary device in Graham Greene's novels.** *Literature & Psychology*, 1974, Vol 24(3), 99-108.—Describes the development of the usage of dreams in novels by Graham Greene. Dreams are used both as a literary device to reveal levels of his characters' unconscious and as a thought-process substitute.

9560. Chakrapani, T. K. (Aiyars Advertising & Marketing Private Ltd, Bombay, India) **Estimation of missing values and analysis of incomplete experiments in consumer behaviour research.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 89-93.—Observers that complete data often is not obtainable in certain types of psychological research. Formulas are presented for both orthogonal and nonorthogonal designs to handle situations in which the data from either 1 plot or more than 1 plot is missing. Examples are provided which illustrate application of the various formulas.—*B. Lindsey.*

9561. Cowan, James C. (U Arkansas) **Dream-work in the Quentin section of *The Sound and the Fury*.** *Literature & Psychology*, 1974, Vol 24(3), 91-98.—Describes William Faulkner's literary use of dream work in *The Sound and the Fury*. His use of the principles of dream symbols, displacement, condensation, preconscious association, Oedipal conflict, and the Freudian death wish are discussed as essential to his stream-of-consciousness writing style.

9562. Edelstein, Alex S. & Tefft, Diane P. (U Washington) **Media credibility and respondent credulity with respect to Watergate.** *Communication Research*, 1974(Oct), Vol 1(4), 426-439.—Administered an open-ended opinion questionnaire on Watergate to 575 Ss in a random sample of the Longview, Washington, household population. Results indicate a shift away from disbelief regarding Watergate-related events, and toward a focus on "actors" (officials involved and the media). The source credibility of the media was not a focus of attention; rather President Nixon was a major focus of incredulity. Data confirmed the Ss' reluctance to believe elected officials capable of unlawful acts rather than an expectation of such acts from White House officials. The study extends research on "source credibility" from an interpersonal to a mass communications setting. It stresses the need for concern with the capacity of media users to believe and disbelieve and for the nature of events creating credulity. (23 ref)—*R. Tomasko.*

9563. Faber, M. D. (U Victoria, British Columbia, Canada) **Othello: Symbolic action, ritual and myth.** *American Imago*, 1974(Sum), Vol 31(2), 159-205.—Suggests that the actions of Othello are indications of a traumatic reactivation of repressed infantile feelings of ambivalence toward his mother.

9564. Florence, Jean. [Psychoanalysis-literature.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 209-229.—The hyphen in the title has often represented a war between psychoanalysis and literature; the first has been charged with demeaning and vulgarizing the latter and of having displaced fantasy literature. However, the hyphen may represent a bond between the two. Freud saluted the poetic insights which



anticipated psychoanalysis in their comprehension of the action of heroes. He acknowledged the influence of Boerne and Goethe, and the influence of Sophocles, Shakespeare, and Dostoevsky on his work is evident. If psychoanalysis displaces fantasy literature it is because it exposes the truth about the human concern with life and death, even though the truth may not be pleasant.—S. S. Marzolf.

9565. Gajdusek, R. E. **Death, incest, and the triple bond in the later plays of Shakespeare.** *American Imago*, 1974(Sum), Vol 31(2), 109-158.—Discusses the presence of mythic female figures representing life, love, and death in Shakespeare's later plays (e.g., *Pericles*, *King Lear*, *Coriolanus*). It is suggested that Shakespeare's later works reveal symbolically his unconscious adjustment to mortality and approaching death.

9566. Gardiner, Judith K. (U Illinois, Chicago Circle) **Infantile sexuality, adult critics, and Bartholomew Fair.** *Literature & Psychology*, 1974, Vol 24(3), 124-132.—Presents a psychoanalytic interpretation of Ben Jonson's *Bartholomew Fair*. The audience's attraction to the play is explained by their unconscious association with its several Oedipal triangles.

9567. Gormley, Richard. **A note on seven brand rating scales and subsequent purchase.** *Journal of the Market Research Society*, 1974(Jul), Vol 16(3), 242-244.—Examined the relationship of ratings of a national bread brand to subsequent purchase of the bread in 4 US cities. Consumers' ratings of the brand on all 7 scales correlated positively with the number of purchases of the brand made by the same consumers, and "intent to buy" produced the highest positive correlation with subsequent number of brand purchases.

9568. Green, Paul E. & Devita, Michael T. (U Pennsylvania, Wharton School) **A complementarity model of consumer utility for item collections.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 56-67.—Describes a model that portrays certain types of interactions and main effects in consumer evaluation tasks. The model is illustrated with menu preference data, and its potential use in other types of multiattribute choice situations is described. Additive and vector models of preference data for item collections are examined, and a combination of these 2 models is proposed which emphasizes commonalities between 2 classes of items (e.g., entrees and desserts); complementarity increases or decreases monotonically with changes in each dimension. The model was tested with 30 business students who evaluated 45 combinations of 5 entrees and 9 desserts on a 9-point personal preference scale. After 1 hr, S received 15 replicate menus (of the original 45) for further rating. Results suggest that (a) contrary to expectations, most respondents did not exhibit highly interactive utilities with regard to the stimulus set used here; (b) of the few (12 of 27) Ss who did, the relative magnitude of the interaction numbers was small; and (c) the model does an adequate job in depicting positive and negative complementarities. Extensions of the model to prediction problems and multi-way matrix analysis are discussed.—L. Gorsey.

9569. Henson, Ramon. (Wayne State U) **Effects of instructions and verbal modeling in a survey interview setting.** *Social Science Research*, 1974(Dec), Vol 3(4),

323-342.—Evaluated the effects of 2 interviewing procedures, instructions and verbal modeling, on the reporting of health information in a survey interview setting. The theoretical basis for selecting these procedures was derived from a conceptualization of the cognitive requirements for effective reporting. 2 main dependent variables were used: number of health conditions reported, and number of ideas reported. An experimental sample design was employed, with the sample restricted to 18-64 yr old white females living in a large metropolitan area. Results indicate various mediating effects of educational level and subjective health rating. Implications for research on interviewing methodology, as well as on the cognitive and motivational aspects of reporting performance, are discussed. (37 ref)—*Journal abstract*.

9570. Hillman, Judith S. (Johnson State Coll) **An analysis of male and female roles in two periods of children's literature.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 84-88.—Identified and analyzed sex-role standards attributed to characters in children's books. The sample of 120 books, selected for an audience of children aged 8-13 yrs, represented 2 temporal periods (the 1930s and the mid-1960s to mid-1970s) equally. A comparison indicated that (a) males were more numerous than females in both the early period and the recent period, (b) the range of occupations for males was much broader than for females, and (c) 8 of the 17 behavioral categories remained constant while 9 changed from period to period. Specifically, males were shown to be physically aggressive and competent in both periods, and females retained the characteristics of affiliation-dependence and sadness. However, aspects of masculinity and femininity that conform to stereotypic traits were more prevalent in the early than in the recent period, thus denoting an increasing latitude of sex-role standards over the 3 decades. (18 ref)—*Journal abstract*.

9571. Holm, John; Kraus, Sidney & Bochner, Arthur P. (Cleveland State U) **Communication and opinion formation: Issues generated by the Watergate hearings.** *Communication Research*, 1974(Oct), Vol 1(4), 368-390.—A 500-person random sample was drawn from listings in the Cleveland telephone directory. 116 of these Ss were interviewed 3 times. Cross-lag analysis was used to examine the associations among the interpersonal communication variables. A contingent orientations approach was used to measure the effects of political cross-pressure, government trust, and perception of power distribution in American society on the impact of media usage. Results indicate that President Nixon's general negative image resulted in increased interpersonal communication about Watergate issues which finally led to specific negative opinions toward Nixon. Selective perception appeared most strikingly among Ss whose opinion bias was most threatened by political communication. Ss with pluralistic views of power distribution changed their opinion on presidential credibility issues to a much greater extent than Ss with elitist perspectives.—R. Tomasko.

9572. Humphrey, N. K. (U Cambridge, England) **The illusion of beauty.** *Perception*, 1973, Vol 2(4), 429-439.—Discusses fundamental questions concerned with the biology of aesthetics. An attempt is made to define the

particular quality which things of beauty have in common and to explain man's search for the essence of beauty in classifying the relations formed between the perceived elements. (16 ref)

9573. Ivie, Robert L. (Idaho State U) **Presidential motives for war.** *Quarterly Journal of Speech*, 1974(Oct), Vol 60(3), 337-345.—Examined war addresses by 7 US Presidents in 7 foreign wars with respect to the terms used. The Presidents uniformly stress the duty of Americans to protect the territorial, commercial, and neutrality rights of their country and their individual rights to freedom. America's enemies are characterized as lawless, tyrannical, uncivilized, and undemocratic. The addresses call for war only as a last resort after protest, diplomacy, and neutrality have failed, and warn that failure to act forcefully often only encourages the enemy to continue his acts of aggression. American Presidents are seen as so attached to this moralistic terminology that their perception of reality is determined by it, rather than vice versa.—H. Ruja.

9574. Kirkland, John. (U Missouri) **Interest and aesthetic pleasure: Support for the inverse-effect.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 882.—20 undergraduates viewed randomly generated polygons which varied in complexity under instructions which emphasized either the "aesthetic pleasure" or "interestingness" of the polygons. The inverse effect, in which Ss prefer complex to simple figures when instructed to view for "interestingness" but reverse this preference for "pleasingness," was supported.

9575. Kloss, Robert J. (William Paterson Coll) **Chaucer's *The Merchant's Tale*: Tender youth and stooping age.** *American Imago*, 1974(Spring), Vol 31(1), 65-79.—Discusses the symbolic expressions of the character January's infantile sexual fantasies and desires. The infantile nature of January's attitudes toward women and marriage is examined.

9576. Lackner, James R. (Brandeis U) **Speech production: Evidence for corollary-discharge stabilization of perceptual mechanisms.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 899-902.—12 Ss participated in an experiment which demonstrated that a syllable one repeats aloud to himself will remain perceptually stable; nevertheless, if one then listens to a tape-recording of his own repetitions of the syllable, then he will hear it undergo transformations. Apparently, during the self-production of a speech sound, the perceptual mechanisms involved in its reception are alerted for that particular linguistic entity, and as a consequence perceptual stability is maintained.—Journal abstract.

9577. Larson, Charles U. (Northern Illinois U) **A content analysis of media reporting of the Watergate hearings.** *Communication Research*, 1974(Oct), Vol 1(4), 440-448.—Examines 332 segments of the Watergate hearings as reported by 3 commercial television networks and 2 newspapers. Media bias, gatekeeping, intermedia relations, and the tendency of the media to cast events into dramatic episodes are considered.

9578. Leak, Gary K. (U Nebraska, Lincoln) **Effects of hostility arousal and aggressive humor on catharsis and humor preference.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 736-740.—Tested 3 hypotheses, derived from psychoanalytic theory, regard-

ing humor and catharsis following a hostility arousal manipulation. The experiment was a 2 x 2 factorial design with 2 levels of hostility arousal (high and low) and aggressive humor (presence or absence), with a group factor nested within arousal. 112 undergraduates served as Ss. As predicted, aroused Ss given aggressive humor rated the E significantly less negatively than aroused Ss not given the aggressive humor. However, contrary to expectation, aroused Ss did not show an increased preference for either hostile or racial wit jokes when compared to nonaroused controls. The evidence above for a catharsis effect is discussed with reference to the conflicting results of previous catharsis studies. (16 ref)—Journal abstract.

9579. Lehmann, Donald R.; O'Brien, Terrence V.; Farley, John U. & Howard, John A. (Columbia U, Graduate School of Business) **Some empirical contributions to buyer behavior theory.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 43-55.—Examined a comprehensive buyer-behavior model in the context of a test market study. The investigation was a longitudinal study of the introduction of a new, frequent purchase product in Argentina; data were collected by personal interviews with 200 persons in 2 cities, which were conducted in 3 waves, each 6 wks apart, 1 before and 2 after the introduction of the product. The analysis used both full-model cross-sectional and longitudinal procedures. The model, which includes 3 major components derived from the behavioral sciences information processing or perceptual, cognitive attitude formation (i.e., learning), and choice components was most reliable for equations involving attention, brand comprehension, attitude, and satisfaction. Suggested revisions for the model, detailed examinations of cross-sectional and longitudinal data, and specific implications of the model for buyer-behavior model building are discussed (31 ref)—L. Gorsey.

9580. LeRoy, David J.; Wotring, C. Edward & Lyle, Jack. (Florida State U) **The public television viewer and the Watergate hearings.** *Communication Research*, 1974(Oct), Vol 1(4), 406-425.—Investigated audience opinions and viewing patterns of those watching the gavel-to-gavel TV coverage of the Watergate hearings. 1,466 interviews were conducted in Tallahassee, Jacksonville, Miami, and Tampa St. Petersburg, Florida, to determine characteristics of the Public TV viewer. Blacks watched in greater proportion than whites and males watched more than females. A college education increased the probability of watching. Spanish-speaking Ss rarely watched the hearings. One-third of the audience were new to Public TV. Public TV viewers were the most sensitive to the positions of different political groups on Watergate, and more likely to have views themselves than non-Public TV viewers. Their opinions were less likely to remain supportive of the White House as the hearings progressed. The experiential implications of "TV of record" on the Ss are considered.—R. Tomasko.

9581. Levin, Gerald. **Swinburne's "end of the world" fantasy.** *Literature & Psychology*, 1974, Vol 24(3), 109-114.—Describes Swinburne's poetic use of the "end of the world" fantasy, first identified by Freud as a form of paranoid delusion. Poems discussed include "Laus Veneris" and "The Triumph of Time."



9582. Murray, Edward L. **Language and the integration of personality.** *Journal of Phenomenological Psychology*, 1974(Spr), Vol 4(2), 469-489.—Discusses the role of language as an integrator of human personality and describes the reflections of this language function which are apparent in the psychoanalytic process. Language serves not only as an instrument of pragmatic communication about the world but also acts to unify, structure, and give meaning to the individual's interactions with himself and with the world. The patient who seeks psychotherapy because of feelings of personal disintegration and alienation must abandon the stereotyped language of everyday discourse and attempt to unify and express his personality by using idiosyncratic forms of expression. It is suggested that metaphors, symbols, and personal myths help the psychotherapeutic patient to go beyond the finite character of ordinary language to express the uniqueness of his personality. —J. Kelly.
9583. O'Donnell, Bruce. (U Louvain, Belgium) **Language in catechetics.** *Religious Education*, 1974(Sep-Oct), Vol 69(5), 542-557.—Discusses religious language—its differences from the language of empirical knowledge, its function in certain areas and situations, its weaknesses, and its possible improvement through greater use of the language of the media.
9584. O'Keefe, Garrett J. & Mendelsohn, Harold. (U Denver) **Voter selectivity, partisanship, and the challenge of Watergate.** *Communication Research*, 1974(Oct), Vol 1(4), 345-367.—Investigated factors affecting voters' communication behavior and value orientation regarding Watergate. 2,000 Summit County, Ohio, voters were interviewed in July 1972, and monthly interviews were held with subgroups before and after the November election. Reinterviews with portions of the Ss were held in May and August 1973. Pre-election questions focused on the extent to which voters were informed about the Watergate break-in and how it was expected to affect their voting. 40% of those informed of the break-in before the election believed highly placed persons in the White House were responsible. 18% of the Nixon voters reinterviewed in May said Watergate had made them less likely to vote Republican in 1974, and 17% would be less likely to vote for a Republican presidential candidate in 1976. Results indicate that Watergate failed to surface in Summit County as an urgent issue. Voters who tended to view Nixon as untrustworthy still perceived him as expert in carrying out the presidency. (16 ref)—R. Tomasko.
9585. Pickering, J. F. & Isherwood, B. C. (Administrative Staff Coll, Henley, England) **Purchase probabilities and consumer durable buying behaviour.** *Journal of the Market Research Society*, 1974(Jul), Vol 16(3), 203-226.—Hypothesized that purchase-probability statements by respondents are more likely to be informative than dichotomous statements of buying intentions. Results of a study that investigated the predictive and explanatory performance of a purchase-probability scale suggest that the low and high probability values convey quite different kinds of information and that this varies according to the nature of the product and its ownership level. (20 ref)
9586. Quinn, James & Baldessarini, Ross. (Windham Coll) **Literary technique and psychological effect in Hawthorne's "The Minister's Black Veil."** *Literature & Psychology*, 1974, Vol 24(3), 115-123.—Describes Nathaniel Hawthorne's psychological symbolism in "The Minister's Black Veil." The analysis stresses his use of a literary style which enables the reader to project his or her psychodynamics on the protagonist.
9587. Rist, Ray C. (US DHEW, National Inst of Education, Washington, DC) **The pornography controversy: Changing moral standards in American life.** New Brunswick, NJ: Transaction Books, 1975. ix, 279 p. \$3.95.—Presents a collection of 14 essays on the legal, moral, cultural, and social problems faced by those who define, defend, criticize, or control the use of sexually explicit material in the US.
9588. Robinson, John P. (U Michigan) **Public opinion during the Watergate crisis.** *Communication Research*, 1974(Oct), Vol 1(4), 391-405.—Studied the development of public opinion trends as affected by the media presentation of Watergate. Data on political and social attitudes were obtained from a 660-person cross-sectional representation of Flint, Michigan, and Toledo, Ohio. Ss were interviewed in December 1972-January 1973 to determine a "feeling thermometer" rating of political figures and institutions, perceived fairness of media, attitudes toward societal trends, and the degree that items in the media affected their everyday conversation. 3 subsamples were then reinterviewed in May-August 1973 to measure their level of attention and response to the Watergate issue and the extent of their interpersonal conversation about Watergate. Results indicate that Watergate had a negative impact on politics in general, with McGovern's public esteem falling almost as sharply as Nixon's. Public interest in Watergate waned during the course of the hearings, and no significant increase was found in the public's trust of the media.—R. Tomasko.
9589. Rousseau, Jean-Jacques. **Rousseau's account of a psychological crisis.** (Trans R. J. Ellrich). *American Imago*, 1974(Spr), Vol 31(1), 80-94.—Presents a translation of an autobiographical account of a psychological crisis found appended to the *Dialogues* of J. J. Rousseau. It is suggested that Rousseau's introspections on separateness and autonomy anticipate modern existential writings on human identity.
9590. Russo, J. Edward. (U California, San Diego) **More information is better: A reevaluation of Jacoby, Speller and Kohn.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 68-72.—A reanalysis of the data of J. Jacoby et al (1974) shows that, in their experimental situation, consumers both wanted and benefited from more information. This analysis conflicts with the authors' conclusions.
9591. Shaw, Marvin E. & Margulis, Stephen T. (U Florida) **The power of the printed word: Its effect on the judgment of the quality of research.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 301-302.—Results of a study of 36 Ss support the hypothesis that judgments of the quality of a research report are influenced by the form of presentation.
9592. Sladen, Brenda K. (Johns Hopkins U, School of Hygiene & Public Health) **The evolution of human**

**capacity for language.** *Bulletin of the Orton Society*, 1974, Vol 24, 37-47.—Discusses the evolution of language as it relates to recent developments in anthropology, neurology, and child development. (36 ref)

9593. Smart, Reginald G. (Addiction Research Foundation, Toronto, Ontario, Canada) **Comparison of purchasing in self-service and clerk-service liquor stores.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1397-1401.—Observed purchasers of alcoholic beverages in a self-service and a clerk-service liquor store 2 days/wk, 7-9 PM, for 5 wks. The self-service store had a total of 2,101 customers (301 women) and the clerk-service store 1,888 (210 women). More bottles/customer were brought at the self-service store. The proportions of customers buying distilled spirits were similar, but significantly more of them at the clerk-service stores bought more than 1 bottle. The self-service store had more customers buying a combination of types of beverages. Interviews were obtained with a random sample of 331 customers: 18.7% said they had bought more than they had intended to. These impulse buyers did not differ from nonimpulse buyers in age, sex, or in the numbers purchasing wine and distilled spirits. Half of the impulse buyers and  $\frac{1}{4}$  of the other interviewed customers drank daily; the impulse buyers also tended to drink more on each "usual" occasion. —*Journal abstract.*

9594. Van Rooijen, Louis. (U Michigan) **Talking about the bright side . . . Pleasantness of the referent as a determinant of communication accuracy.** *European Journal of Social Psychology*, 1973, Vol 3(4), 473-478.—Investigated the pleasant-unpleasant evaluation dimension in a referential setting. Ss were 50 male and female undergraduates at the University of Michigan who read descriptions of pleasant, neutral and unpleasant facial expressions and selected from an array of photographs the one which seemed appropriate to the description. Results show that pleasantness had a strong effect on communicative accuracy. The pleasanter the facial expression, the more accurate the identification of the target of the descriptions. Women were more accurate than men in identifying pleasant facial expressions. Implications are extended to the "Pollyanna hypothesis" that there is a universal tendency to use evaluatively positive words oftener than negative ones. —*M. K. Phifer.*

9595. Westwood, Dick; Lunn, Tony & Beazley, David. **The trade-off model and its extensions.** *Journal of the Market Research Society*, 1974(Jul), Vol 16(3), 227-241.—Describes the trade-off model—a new approach to understanding and measuring consumer value systems—and illustrates ways in which it is being applied to marketing problems. The relevant literature is reviewed, and the model is discussed in terms of its use in evaluating new product ideas.

## PERSONALITY

9596. Alegre, Cecelia & Murray, Edward J. (U Miami) **Locus of control, behavioral intention, and verbal conditioning.** *Journal of Personality*, 1974(Dec), Vol 42(4), 668-681.—Selected 48 male and 48 female

undergraduates on the basis of their scores on Rotter's Internal-External Control Scale and the Marlowe-Crowne Social Desirability scale to test the relationship between locus of control and verbal conditioning with Ss who were contingency and demand aware. Verbal conditioning was greatest in external Ss, less in middle-range Ss, and least in internal Ss. Female Ss conditioned better than males. Both results were independent of social desirability. Behavioral intentions, assessed on a postexperimental questionnaire, were related to both locus of control and verbal conditioning. Results are interpreted as being consistent with J. B. Rotter's (see PA, Vol 40:2392) views about locus of control, D. E. Dulany's (1968) formulations about propositional control, and M. M. Page's (see PA, Vol 49:2366) emphasis on social compliance in the verbal conditioning paradigm. (19 ref)—*Journal summary.*

9597. Allred, G. Hugh. (Brigham Young U) **On the level: With self, family, society.** Provo, UT: Brigham Young University Press, [ND]. xvi, 358 p. \$10.95(cloth), \$6.95(paper).—Presents concepts and principles of human behavior that can be used to increase self-understanding and positive feelings towards others. Ways of relating to significant others and facilitating one's ability to work with rather than against people are described.

9598. Andrews, Rhoda & Brown, Evan. (U Nebraska, Omaha) **Firstborns, only children, sex, and three dependency measures.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 773-774.—Compared 4 groups of 7 firstborn undergraduates each (males and females with and without siblings) on versions of the Embedded Figures and rod-and-frame tests and Barron's self-endorsement test of social independence. Birth order and sex influenced field dependence, and Barron scores were not related to field dependence.

9599. Babad, Elisha Y. (Hebrew U Jerusalem, Israel) **A multi-method approach to the assessment of humor: A critical look at humor tests.** *Journal of Personality*, 1974(Dec), Vol 42(4), 618-631.—Asked all students of a women's college ( $N = 1,816$ ) to name peers who are nonhumorous, passive appreciators, active producers and/or reproducers of humor. 987 were named at least once in the Humor Categories Report, and of these 81 were selected and divided into 5 groups according to sociometric consensus of peers: Nonhumorous, Appreciators, Producers, Reproducers, and Producers-Reproducers. 77 Ss were individually administered a humor appreciation test (rating funniness of jokes and cartoons); an active humor test (producing or reproducing funny captions to cartoons); 2 creativity subtests; a self-report in humor group; a 90-item questionnaire measuring defensiveness, introversion, and anxiety; and the California Fascism Scale. Results showed the sociometric method and the humor tests to be in sharp contrast, the former invalidating the latter. Groups by self-report were closely related to grouping by sociometric consensus. The "pure type" groups were not differentiated in their scores on the humor tests. These groups differed in their anxiety and introversion in the predicted direction, but unexpectedly, the correlations between these variables and the humor test scores were positive. Creativity test scores were related only to the humor test scores. It



is argued that tests should not be used in the assessment of humor. (23 ref)—*Journal summary*.

9600. Bartlett, Maurine M. & Davis, Gary A. (U Wisconsin) **Do the Wallach and Kogan tests predict real creative behavior?** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 730.—Administered M. A. Wallach and N. Kogan's 1965 creativity test battery to 37 undergraduates. Summing across 4 tests, fluency, uniqueness, and total creativity scores correlated .33, .33, and .35 ( $P_s < .05$ ) with ratings of 4 actual creative products (poetry or a short story, artwork, ideas for 2 inventions, and a creative teaching strategy).

9601. Bleger, José [Ambiguity: A chapter from psychology and psychopathology.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 57-79.—Discusses the concept of ambivalence as used in psychoanalytic theory, and aspects of the ambivalent personality. (52 ref)

9602. Boudreaux, Ronald & Dreger, Ralph M. (Central Louisiana State Hosp, Pineville) **Item content of the Group Personality Projective Test.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 551-555.—Examined the content factors of the Group Personality Projective Test (GPPT) using factor analytic procedures based on item intercorrelations, in contrast to the published version's use of part scores from a priori groupings of items. Ss were 248 psychiatric inpatients and outpatients and high school and college students (age range 16-57 yrs). The factors extracted did not coincide with the original GPPT dimensions. Only a small portion of the GPPT items loaded significantly on the factors obtained. The proportion of variance accounted for by the factor structure was also very small. Results indicate that a position response set may be affecting scores on the Neuroticism dimension. It is concluded that the GPPT, in terms of what it proposes to measure, apparently has very limited utility.—*Journal abstract*.

9603. Brehmer, Berndt. (U Umea, Sweden) **A note on the cross-national differences in cognitive conflict found by Hammond et al.** *International Journal of Psychology*, 1974, Vol 9(1), 51-56.—Replicated, using 80 university undergraduates, a 1968 study by K. R. Hammond et al that reported differences in cognitive conflict between American and Western European Ss. Results of the replication show that subtle procedural variations, rather than nationality, produced the differences.

9604. Burdsal, C. A. & Vaughn, D. S. (Wichita State U) **A contrast of the personality structure of college students found in the questionnaire medium by items as compared to parcels.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 219-224.—Administered the 16 Personality Factor Questionnaire to 264 undergraduates to examine the item structure in the measure following the analytic procedures used by R. Cattell (1966). Item data was factor analyzed, yielding essentially the same factor structure as produced by the original parceling. It is concluded that factor analytic test construction can proceed most profitably with the use of item parcels.—*Journal abstract*.

9605. Cantor, Joanne R.; Bryant, Jennings & Zillmann, Dolf. (U Wisconsin) **Enhancement of humor appreciation by transferred excitation.** *Journal of Per-*

*sonality & Social Psychology*, 1974(Dec), Vol 30(6), 812-821.—Exposed 120 undergraduates to humorous communications after reading 1 of 4 written communications which had been chosen to effect a factorial variation in (a) hedonic tone (positive, negative) and (b) excitatory potential (low, high). The differentiation of the written communications was validated by analyses of ratings given to the experimental stimuli by the Ss. Under conditions of both positive and negative hedonic tone, prior exposure to the highly arousing communications resulted in significantly higher funniness ratings of the subsequent cartoons and jokes than prior exposure to the less-arousing stimuli. (34 ref)—*Journal abstract*.

9606. Carment, David W. (McMaster U, Hamilton, Ontario, Canada) **Internal versus external control in India and Canada.** *International Journal of Psychology*, 1974, Vol 9(1), 45-50.—Administered Rotter's Internal-External (I-E) Control Scale to 63 Indian factory workers (average age 35), 98 Indian university students (average age 19), 67 Canadian semi-skilled and unskilled workers (average age 27) and 196 Canadian university students, all males. The scale was administered in its standard form to all Ss except Indian factory workers, who were given a Hindi version. Average overall scores of Canadians were significantly more external than those of Indians ( $p < .01$  for Canadian workers and  $p < .001$  for Canadian students). Canadian students were significantly more internal than Indian students on the Personal Control factor, but more external on the Control Ideology factor and on the Systems Control factor. No difference appeared for Indian and Canadian workers on Personal Control, though Canadian workers were more external than their Indian counterparts on Control Ideology and Systems Control. Results emphasize that research involving the I-E measure should take specific components into account instead of focusing on a single general attribute. (30 ref)—*E. A. Gavin*.

9607. Caruso, Igor A. (U Salzburg, Psychologische Inst, Austria) [The rational and irrational in the "We-I."] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 122-131.—Notes that modern man identifies himself mainly with his ego and that this identification is not without problems. The socioeconomic structure of our society promotes the development of an isolated achievement-oriented ego. A "collective ego," a regressive offshoot of the symbiotic dyadic pre-ego, is developed as a reaction to this pressure. Ideologies also neglect the ego and subordinate it to the collective "we" without considering that the ego can develop itself within the social context only with the help of fellow men. Rational and irrational elements contribute to integrate the ego into the collective "we." These factors enter the treatment sessions and place a strain on the analyst's ego.—*S. D. Babcock*.

9608. Casey, Edward S. (Yale U) **Toward an archetypal imagination.** *Spring*, 1974, 1-32.—Examines Jung's theories of fantasy and imagination and his theory of "fourness," the 4-figured pattern representing the most persistent and stable of archetypal arrangements. G. Bachelard and M. Heidegger's systems are discussed as well as other archetypal patterns such as the polyadic. Progression is traced from conscious imaging to active

imagination to archetypal imagination, and the paradoxes that occur along the path are noted.—*A. de la Haba.*

9609. Chiozza, Luis A. [*Psychoanalytic study of hepatic fantasies.*] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 107-140.—Speculates on the possible existence of an hepatic erotogenic zone and discusses the analogies between hepatic fantasies and oral fantasies. (French & English summaries) (71 ref)

9610. Coan, Richard W. (U Arizona) *The optimal personality: An empirical and theoretical analysis.* New York, NY: Columbia University Press, 1974. x, 242 p. \$12.—Describes a method of analyzing both the theoretical and empirical aspects of the ideal personality. Various instruments specially developed for this study, including measures of personal consistency and the experience of control and data from their administration to different groups of Ss, are presented. The relationship between various independent components of sound functioning is also discussed. (4½ p ref)

9611. D'Andrade, Roy G. (U California, San Diego) *Father absence, identification, and identity.* *Ethos*, 1973(Win), Vol 1(4), 440-455.—Studied the effects of father absence during early and late childhood on sex role identification. A sample of 121 children ranging in age from 5 to 14.9 yrs was drawn from 58 black working class households. Households were divided for analysis into categories based on timing and length of paternal absence. Ss' patterns of sex identification and sex identity were measured by the Franck Test, by verbal self-descriptions, and by a role preference task. It was found that Ss who did not have a father present during the 1st 3 yrs of life exhibited a feminine response pattern on the Franck Test. It appeared that paternal absence influenced conscious sex role identity through the indirect processes of reciprocal role learning and perception of sex role advantages and disadvantages. It is concluded that household composition has an important effect on development of sex role identities and sex role preferences.—*J. Kelly.*

9612. Davis, Robert Wm. (Ed.). *Toward a discovery of the person: The first Bruno Klopfer Memorial Symposium & Carl G. Jung Centennial Symposium.* Burbank, CA: Society for Personality Assessment, [1973]. 83 p. \$4.50.—Presents a collection of symposium papers on contemporary issues in the psychological evaluation of individuals, emphasizing the work of Klopfer. Topics discussed include the interface of culture and the individual, the Rorschach and its relation to Jungian psychology, and the applicability of physical models to personality interpretation.

9613. Erić, Ljubomir. (U Belgrade, Medical Faculty, Yugoslavia) [*The effects of manifest neurotic anxiety on the academic achievement of Belgrade University students.*] (Ser) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(3), 39-49.—Compares two groups of undergraduate students, those with anxiety-related complaints and a control group. Measures of comparison were a psychiatric interview, the Middlesex Hospital Questionnaire, the Cornell Medical Index, and an academic achievement checklist. Results indicate an inverse relationship between neurotic anxiety and academic achievement. (English summary)—*P. Vrtunski.*

9614. Fajrajzen, Stefano. [*Differential aspects of human symbiosis in the two sexes.*] (Ital) *Rivista di Psicoanalisi*, 1973(Jan-Apr), No 19, 19-41.—Hypothesizes that in general women are more symbiotic than men, both biologically and psychologically. Biological and cultural factors encourage separation-individuation in the male, making him long for symbiotic union and causing him perennial conflict. The opposite trend appears in the female, who often has a great longing for separation-individuation. These opposite tendencies conflict in heterosexual love. (English summary) (38 ref)—*D. Araoz.*

9615. Feij, J. A. (Vrije U, Lab voor Psychodiagnostische en Bedrijfspsychologische Research, Amsterdam, Netherlands) *An investigation into the meaning of the Achievement Motivation Test: I. Questionnaire correlates.* *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(May), Vol 29(3), 171-190.—Studied the discriminant and construct validity of H. J. M. Hermans's Achievement Motivation Test (AMT), which measures achievement motivation (AM), debilitating anxiety (DA), and facilitating anxiety (FA). The AMT and other personality questionnaires were administered to 50 female and 50 male psychology students. Factor analysis identified 4 secondary factors: Emotional Stability, Introversion, Masculinity, and Lack of Persistence. AM loaded positively on masculinity and negatively on lack of persistence. DA had a negative loading on emotional stability and a positive one on introversion. FA had a negative loading on introversion and therefore did not appear to be an anxiety variable. FA was positively correlated with impulsiveness on the 16 Personality Factor Questionnaire and apparently can be interpreted correctly as a need for activation. Caution is expressed about the interpretation of the scores; the investigator must be aware of the limitations of the correlational techniques. (32 ref)—*A. J. Ter Keurst.*

9616. Florenskaya, T. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) [*The sociologizing of Freudianism in the personality theories of K. Horney and H. S. Sullivan.*] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 161-167.—Presents a critique of the neo-Freudian personality theories of Horney and Sullivan. The defects of both are seen as arising from their dualistic concept of the natural and the social worlds. Neo-Freudianism did not solve the problem that it set itself, which was to overcome Freud's biological determinism and to create a social-psychological theory of personality. The dualistic concept of the natural and the social in Freud makes it impossible, in principle, to solve the basic problems of a psychological theory of personality. (17 ref)—*L. Zuse.*

9617. Fordham, Michael. *Jungian views of the body-mind relationship.* *Spring*, 1974, 166-178.—Discusses Jung's theories of the relation between body and psyche and between psyche and soma. Other related or derivative theories are presented.

9618. Frey-Rohn, Liliane. *From Freud to Jung: A comparative study of the psychology of the unconscious.* (Trans F. E. Engreen & E. K. Engreen). New York, NY: G. P. Putnam's Sons, 1974. xiii, 345 p. \$16.—Presents a study of the basic concepts of Freud



and Jung to show how the foundations laid by Freud were accepted, broadened, and transformed by Jung—how the ideas of psychic mechanisms gave way to the idea of the total personality, how personal elements led to collective aspects of the unconscious, how a causal approach to the psyche became a prospective and finalistic one, and how sexual libido became psychic energy. (8 p ref)

9619. Garza, Raymond T. & Ames, Russell E. (Purdue U) **A comparison of Anglo- and Mexican-American college students on locus of control.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 919.—Data from 47 Anglo and 47 Mexican-American college students matched for sex and socioeconomic background show that Mexican-American Ss scored significantly less external on the full Rotter Internal-External Control Scale and on 2 of the 5 dimensional categories (respect and luck and fate). Findings not only contradict the stereotype that Mexican-Americans are fatalistic but also suggest that their culture contributes to a greater perception of internal control.

9620. Gear, Maria C. & Liendo, Ernesto C. [Toward a unified psychoanalytic theory.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 225-276.—Presents a synthesis of theoretical and clinical hypotheses aimed at the unification and systematization of psychoanalytic theories on a new level of abstraction. (English summary) (116 ref)

9621. Gupta, Ved P. (Government Bikram Coll of Commerce, Patiala, India) **The relationship between physical fitness and personality characteristics as measured by Sixteen Personality Factor Inventory.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 94-95.—Anticipated a relationship between physical fitness and personality characteristics on the assumption that the development of personality is affected by physiological factors. The Hindi version of the Sixteen Personality Factor inventory (16 PF) and the Basic Fitness Test Battery were administered in different sessions to 100 20-24 yr old college students. The correlations obtained for all 16 PF scales were nonsignificant.—B. Lindsey.

9622. Helmreich, Robert & Stapp, Joy. (U Texas, Austin) **Short forms of the Texas Social Behavior Inventory (TSBI), an objective measure of self-esteem.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 473-475.—Presents 2 short (16-item) forms of R. Helmreich et al's (1974) Texas Social Behavior Inventory, a validated, objective measure of self-esteem or social competence. Normative data and other statistics are described for 248 males and 282 females. Correlations between each short form and long (32-item) scale were .97. Factor analysis and part-whole correlations verified the similarity of the 2 forms. The utility of the scale in research is described.—Journal abstract.

9623. Hill, A. B. (U Keele, England) **Personality correlates of dream recall.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 766-773.—Used the 16 Personality Factor Questionnaire (16 PF) to discriminate between those who frequently recall dreams and those who do not and to specify which traits contributed most to accuracy of discrimination. Discriminant analysis of 16 PF measures showed an almost

perfect discrimination between 2 groups of undergraduates ( $n = 50$ ), chosen by the diary method, as frequent and infrequent recallers. This result was substantially confirmed in a cross-validation sample of 40 Ss in which an overall accuracy of discrimination of 75% was achieved. 6 primary traits (Ego Strength, Guilt Proneness, Superego Strength, Parmia, Premsia, and Radicalism) were identified and confirmed by canonical analysis as contributing most to discrimination. Results indicate that the frequent recaller experiences less and the infrequent recaller experiences more intrapsychic conflict.—Journal abstract.

9624. Hillman, James. "Anima": II. *Spring*, 1974, 113-146.—Explores extensively the notion of the anima including further perceptions that may aid in alerting the conscious to what we are saying, doing, and even experiencing. In psychology a subjective awareness is required. The theory is offered that a sense of personal identity is given not by the ego, but to the ego by the anima. The main characteristics of "depersonalization" and the integration of the anima are considered. The anima may be personified in the function of relationship to the unconscious and as the mediatrix of the unknown. The anima as uni-personality and the anima in the syzygy are also considered.—A. de La Haba.

9625. Hinrichsen, James J. & Bradley, Laurence A. (Ohio State U, Div of Clinical Psychology) **Situational determinants of personal validation of general personality interpretations.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 530-534.—Matched groups of 64 female undergraduates on the basis of their preexperimental opinions on the value of psychological tests used by trained professionals to describe personality. Ss were then given either the Rorschach Test, Thematic Apperception Test, Fundamental Interpersonal Relations—Behavior, or Marlow-Crowne Social Desirability Scale and were later given identical general personality interpretations supposedly based on the test results. An analysis of variance of Ss' ratings of the accuracy of the personality interpretation indicated that neither the type of test S took nor whether the personality interpretation was presented as being derived "for you specifically" or "for people in general" had differential effects on Ss' acceptance of the interpretation; all groups rated the interpretation as being between "good" and "excellent."—Journal abstract.

9626. Hochreich, Dorothy J. (U Connecticut) **Defensive externality and attribution of responsibility.** *Journal of Personality*, 1974(Dec), Vol 42(4), 543-557.—Attempted to use trust as a moderator variable for making differential predictions concerning the behavior of 2 subgroups of externals: defensive externals, whose externality is presumed to reflect primarily a verbal technique of defense, and true externals, whose externality reflects a genuine belief that most outcomes are determined by forces beyond one's personal control. It was predicted that defensive (low trust) externals and true (high trust) externals (as determined by Rotter's Internal-External Control Scale and the Interpersonal Trust Scale) would differ in their attribution ratings of a series of stories which varied in theme (achievement vs nonachievement) and outcome (failure vs success). Specifically, it was hypothesized that defensive externals



would attribute less responsibility to story heroes under failure conditions than would true externals and internals, and that this attribution difference would be strongest when failure occurred in achievement situations. These hypotheses were strongly confirmed for 120 undergraduates in Exp I but not for 120 female Ss in Exp II. In addition, defensive externals were expected to differ from true externals and from internals in their self-descriptive behavior as measured by the Adjective Check List (ACL). The predicted interactions were found for male Ss on 4 of the 7 ACL scales used. (17 ref)—*Journal summary*.

9627. **Huismans, Sipke E.** (Vrije U, Amsterdam, Netherlands) [Reliability and validity of the Scale of Interpersonal Values in relation to educational level.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 485-501.—Considers the reliability and validity of L. V. Gordon's 1961 Scale of Interpersonal Values (SIV) in measuring support, conformity, recognition, independence, benevolence, and leadership. 506 adult Ss, about equally divided among lower, middle, and upper levels of education, responded to the scale. The *rs* between the SIV scores and the values toward a job and the government in the areas of benevolence, conformity, and independence ranged from  $-.24$  to  $+.38$ . The low reliability may have been a result of inferior educational attainments, or of cultural differences between Americans and the Dutch. (18 ref)—*A. J. Ter Keurst*.

9628. **Jaffé, Aniela.** *The myth of meaning.* (Trans R. F. Hull). New York, NY: Penguin, 1975. 186 p. \$2.25.—Discusses how Jung's views of the interplay between consciousness and the unconscious led to his theories of the meaning of life. The nature of myth and its relation to meaning, and Jungian concepts of inner experience, individuation, and synchronicity are examined. (7 p ref)

9629. **Khatena, Joe.** (Marshall U) *Imagination and production of original verbal images.* *Art Psychotherapy*, 1973(Fal), Vol 1(2), 113-120.—Discusses measurement of creative imagination by the Onomatopoeia and Images test. Words of suggestive sound and meaning (e.g., moan, ooze, growl) are responded to with verbalized images. Ss are encouraged to find unusual responses, which are given higher scores than popular ones. Repeated use of the same stimulus words creates stress, which enhances imagination. When the time interval between words is fixed at 15 sec, adults need a longer warm-up period than children; highly creative adolescents perform best without time limit. Children's imagination slumps in the upper grades of elementary school. The stimulus words also are used for synectic analogy tests. (58 ref)—*R. Arnheim*.

9630. **Lefcourt, Herbert M.; Antrobus, Paul & Hogg, Elizabeth.** (U Waterloo, Ontario, Canada) *Humor response and humor production as a function of locus of control, field dependence and type of reinforcements.* *Journal of Personality*, 1974(Dec), Vol 42(4), 632-651.—Administered Rotter's Internal-External Control Scale and the rod-and-frame test to 64 male senior high school and university students. Ss' humor response and humor production were scored from videotapes of role-play enactments. Roles varied for reinforcement areas (academic-social), for outcomes (success-failure), and for E's

comments (serious-ludicrous). It was hypothesized that persons with an internal locus of control would be more likely than externals to use humor as a distancing device that would enable them to accept evaluative feedback. Humor responses, smiles, and laughter proved to be more determined by role characteristics than by personality variables. However, humor production—the creating of jokes—seemed to be most common among internal, field-independent Ss enacting serious failure roles, as had been predicted. (21 ref)—*Journal summary*.

9631. **Lefley, Harriet P.** (U Miami, Medical School) *Differential self-concept in American Indian children as a function of language and examiner.* *Journal of Personality & Social Psychology*, 1975(Jan), Vol 31(1), 36-41.—Investigated the hypothesis that minority self-concept may vary as a function of implicit ethnic and nonethnic evaluative criteria by testing 40 7-15 yr old Mikasuki Seminole Indian children in their native language (Mikasuki) with Indian examiners and in English with Anglo examiners. 2 reservation groups, matched for age and sex, received 4 administrations of the Piers-Harris Children's Self-Concept Scale and an Indian self-concept scale, in a repeated measures counterbalanced design, varying language and order. Significant test-retest correlations indicated response stability across languages and time. Results, homogeneous for all subgroups, show significantly higher personal self-concept in Mikasuki and significantly higher Indian self-concept in English. It is suggested that minority testing may involve culturally patterned and context-bound response tendencies.—*Journal abstract*.

9632. **LeVine, Robert A.** (U Chicago) *Patterns of personality in Africa.* *Ethos*, 1973(Sum), Vol 1(2), 123-152.—Discusses the nature of distinctively African personality patterns, variations and uniformities in African behavior, and the relationship between African personality traits and adaptation to institutional change. Sub-Saharan African populations are characterized by strict age and sex based social hierarchies, an emphasis on material transactions, functional diffusion of authority, absence of separation anxiety, and a tendency toward concreteness of thought. It is suggested that the emphasis on social distance, formality, and material obligations in African relationships facilitates personal adjustment to social change by allowing maintenance of traditional kinship organization despite increased geographical mobility. (18 ref)—*J. Kelly*.

9633. **Loesch, Larry C. & Johnson, Richard H.** (U Florida) *The NNPI: In sickness or in health.* *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 541-545.—Presents a parody of a typical personality inventory research found in professional journals, using the mythical Nonsense Personality Inventory (NNPI) and its specifications. The intent of the parody is to support criticism of the psychological testing movement.

9634. **Ludvig, Elek J. & Happ, Deborah.** (Michigan State U) *Extraversion and preferred level of sensory stimulation.* *British Journal of Psychology*, 1974(Aug), Vol 65(3), 359-365.—Conducted a study with 120 male undergraduates to test the hypothesis that a positive correlation exists between extraversion scores (as determined by scores on the Eysenck Personality Inventory) and the amount of ambient illumination and sound



necessary to provide optimum hedonic tone and to create a slightly unpleasant level of hedonic tone. Results support the existence of a positive correlation between extraversion and sensory-seeking behavior hypothesized by H. Eysenck (1967), but suggest that the relationship between the variables is due to differences between introverts and extraverts as to what constitutes an excessive level of stimulation. (19 ref)—*Journal abstract*.

9635. Many, Wesley; Ellis, Joseph & Frey, Sherman. (Northern Illinois U) **A self-concept scale for middle childhood.** *Journal of the Association for the Study of Perception*, 1974(Fal), Vol 9(2), 14-35.—Following the theory of R. J. Havighurst (1972), it is assumed that an individual must accomplish certain tasks during each of the 6 stages of his development in order to form and maintain a positive self-image. An inventory scale designed to enable the 6-12 yr old child to give reports of his self-concept is presented. The child indicates his conception of his ability to accomplish each of the 9 developmental tasks specified by Havighurst as being proper to his age period. He is asked to give these indications in terms of what he is capable of doing, what he does in relation to others, and how what he does compares to what he must do in order to succeed at the task. The word difficulty of the inventory scale has been adjusted to the age period by means of the application of a readability formula.—*B. Lindsey*.

9636. Marwit, Samuel J.; Bostwick, Gerald & Well, Marsha B. (U Missouri, St Louis) **Effects of task orientation on sexual bias in TAT administration.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 547-550.—64 male and 64 female undergraduates chose Thematic Apperception Test cards expecting to test same- and cross-sexed clients under achievement-oriented and control conditions. The hypotheses that females would select more task-oriented cards than males, regardless of client sex, and that males would select more sexually oriented cards, especially when testing female clients, were not supported. Both males and females selected more achievement-related cards under achievement-oriented conditions, and no differences occurred in either experimental or control conditions in their selection of sexual-romantic cards.—*Journal abstract*.

9637. Mohan, Vidhu. (Panjab U, Chandigarh, India) **Raven's Standard Progressive Matrices and a verbal test of general mental ability.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 67-69.—Anticipated a positive relationship between scores on the nonverbal Standard Progressive Matrices test (SPM) and scores on the verbal General Mental Ability test (GMA) on the assumption that both tests measure a general factor of intelligence. The tests were administered to 145 male and 165 female 18-25 yr old students. Results show significant positive correlations between SPM and GMA for both the male and the female Ss ( $P < .001$ ). The hypothesis is considered to be confirmed, and sex differences on both SPM and GMA favoring the male Ss are discussed.—*B. Lindsey*.

9638. Ohlson, E. Lamonte & Wilson, Marilyn. (Ohio State U) **Differentiating female homosexuals from female heterosexuals by use of the MMPI.** *Journal of Sex Research*, 1974(Nov), Vol 10(4), 308-315.—Administered the MMPI to 64 overt female homosexuals and 64

overt female heterosexuals. The 2 groups were significantly differentiated on 3 of the 13 scales (*Hs*, *Hy*, and *Pr*) and on 57 of the items. Results indicate that a personality scale could be developed using items from the MMPI to detect female homosexuality. (21 ref)

9639. Ojha, Hardeo. (Bhagalpur U, India) **The relation of prestige suggestion to rigidity and dependence proneness.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 70-73.—Explored the possibility of relationships between prestige suggestion (PS) and the personality factors of rigidity (R) and dependence proneness (DP). 120 male students (mean age = 19.1 yrs) and 120 female students (mean age = 18.2 yrs) were given a Hindi version of Wesley's Short Form Rigidity Scale and Sinha's Dependence Proneness Scale. A measure of prestige suggestion was obtained from differences in the ranking of slogans before and after their attribution to various political leaders. Significant positive correlations between PS and DP were obtained for both the male ( $p < .01$ ) and female Ss ( $p < .05$ ), and a significant negative correlation between PS and R was obtained for the male Ss ( $p < .05$ ). A further analysis based on a division of scores into high and low groups is presented. (19 ref)—*B. Lindsey*.

9640. Phares, E. Jerry & Lamiell, James T. (Kansas State U) **Relationship of internal-external control of defensive preferences.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 872-878.—Described 4 tests (Rotter Level of Aspiration Board, a symbol substitution test, a geometric recall test, and the Stromberg Dexterity Test), ostensibly designed to measure IQ, to 67 undergraduates classified as either internal or external on Rotter's Internal-External Control Scale. For 2 tests, E's descriptions of the tests included built-in rationalizations to provide Ss with potential explanations for any test failures. The other 2 tests were described without such rationalizations. As predicted, externals demonstrated a significantly greater preference for the so-called rationalized tests than did internals. Differences were also observed between internals and externals in expectancy for success. Potential relationships among locus of control, defensive preferences, and expectancies for success are discussed. (24 ref)—*Journal abstract*.

9641. Prasad Singh, Kedar. (Bhagalpur U, India) **Anxiety and birth order.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 64-66.—Considered whether a relationship between anxiety and birth order could be obtained in Indian culture. 72 firstborn, 63 middle-born, and 65 last-born 21-24 yr old male students were given a Hindi version of the Sinha Anxiety Scale. The mean anxiety score of the firstborn was significantly higher than that of the middle-born ( $p < .01$ ) and that of the last-born ( $p < .05$ ) Ss. Environmental factors pertaining to the greater anxiety shown by the firstborn are discussed. (16 ref)—*B. Lindsey*.

9642. Ramamurti, P. V. & Gnanakannan, I. (Sri Venkateswara U, Tirupati, India) **Rigidity-flexibility characteristics of secure and insecure individuals.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 54-55.—Hypothesized a positive relationship between rigidity and feelings of insecurity. 300 students (mean age = 18.4 yrs) were scored for Rigidity-Flexibility by using the Test of Behavioural Rigidity and for



Security-Insecurity by using the Security-Insecurity Inventory (SI). The mean Personality-Perceptual Rigidity score of the bottom quartile (insecure group) of the distribution of SI scores was significantly lower ( $p < .01$ ) than the mean of the top quartile (secure group); the higher scores were in the direction of flexibility. The mean Motor-Cognitive Rigidity scores of the 2 groups were not significantly different. The positive finding indicates that the rigidity of insecure individuals is greater than that of secure individuals.—B. Lindsey.

9643. Reinking, Richard; Goldstein, Gerald & Houston, B. Kent. (Washington State U) **Cognitive style, proprioceptive skills, task set, stress, and the Rod-and-Frame Test of field orientation.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 807-811.—Data from 181 female undergraduates indicate that (a) performance on the rod-and-frame test (RFT) in a condition in which Ss took the test in a tilted position was more adversely affected for field-dependent than field-independent Ss; (b) inducing a set in Ss to focus on internal cues while performing the RFT led to better performance than inducing a set to focus on external cues; and (c) under stress, performance on the RFT for field-dependent Ss appeared more extremely field dependent than in the absence of stress, and under stress, performance on the RFT for field-independent Ss appeared more extremely field independent than in the absence of stress.—*Journal abstract*.

9644. Riester, Robert W. & Irvine, LaVerne F. (Auburn U) **A methodological inquiry into the F scale.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 287-288.—Results of a study examining the nature of free responses to R. Lee and P. Warr's Balanced F Scale items seem contradictory to expectations that authoritarians are rigid and stereotyped in thinking while nonauthoritarians are open and flexible. Questions are raised about the authoritarian personality as measured by this F scale.

9645. Schoenfeld, C. G. (Private practice, New York, NY) **International law, nationalism, and the sense of self: A psychoanalytic inquiry.** *Journal of Psychiatry & Law*, 1974(Fal), Vol 2(3), 303-318.—Analyzes 2 basic elements of nationalism—the tendency to view one's nation as an enlargement of one's self, and the tendency to distinguish sharply between the members of one's nation and other persons. It is suggested that nationalism may help many individuals (at least on an unconscious level) to bolster a less-than-secure sense of self and that to the extent that nationalism plays this role, it is likely to continue to inhibit the growth and development of international law. (37 ref)—*Journal abstract*.

9646. Shedletsky, Ralph & Endler, Norman S. (Queen St Mental Health Ctr, Toronto, Ontario, Canada) **Anxiety: The state-trait model and the interaction model.** *Journal of Personality*, 1974(Dec), Vol 42(4), 511-527.—Examines the state-trait anxiety theory proposed by C. D. Spielberger (1966, 1972) as a conceptual frame of reference for integrating differing viewpoints of anxiety. Because of limitations in the state-trait theory, N. S. Endler and J. M. Hunt's (1966, 1968, 1969) Person  $\times$  Situation interaction model of anxiety is examined, and an attempt is made to integrate the 2 approaches. Specifically, the interaction model of anxiety

supports the belief that trait anxiety is multidimensional rather than unidimensional and that one must take into account the specific nature of the threat situation confronting the individual. It is proposed that the construct of trait anxiety appears to be more complex than originally formulated by Spielberger and that a comprehensive approach to the investigation of anxiety-trait, anxiety-state, and their relationship may be found in the Person  $\times$  Situation interaction model of anxiety. (50 ref)—*Journal summary*.

9647. Simon, William E.; Primavera, Louis H.; Simon, Marilyn G. & Orndoff, Robert K. (Southampton Coll) **A comparison of marijuana users and nonusers on a number of personality variables.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 917-918.—Compared 27 female undergraduate marijuana users and 147 nonusers on psychological needs, self-descriptions, self-esteem, academic achievement, birth position, and attitudes toward the legalization of various items. Among others, significant differences between the users and nonusers were found on high school averages, 6 scales of the Edwards Personal Preference Schedule, and on 5 bipolar adjective scales assessing carefulness, honesty, politeness, reliability, and ambition.

9648. Smithers, A. G. & Child, D. (U Bradford, School of Research in Education, England) **Convergers and divergers: Different forms of neuroticism?** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 304-306.—Results of a study of 306 undergraduates support L. Hudson's (1966) contention that convergence-divergence is linked to arts and science specialism, and that convergers and divergers differ in subject interest, occupational interests and attainment, and degree of syllabus-boundness.

9649. Soifer, Raquel. [Incorporation of the analysis of external reality and its relation to the internal world: A personal experience.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 439-458.—Presents an analysis and extension of Freud's insights into the interaction of the internal and external world. A method of studying the development of the narcissistic libido is suggested. (English summary) (24 ref)

9650. Swan, Jim. **Mater and Nannie: Freud's two mothers and the discovery of the Oedipus complex.** *American Imago*, 1974(Spring), Vol 31(1), 1-64.—Discusses some personal, cultural, and historical factors contributing to Freud's discovery of the Oedipus complex. The contradictions of late 19th century European bourgeois society are reflected in Freud's theoretical concerns with unresolved conflicts over masculine and feminine identification. An analysis of dreams reported by Freud in correspondence with M. Fliess reveals his personal preoccupation with mother dependence, incestuous sexual wishes, and oral aggression. It is suggested that the discovery of the Oedipus complex grew from an attempt by Freud to solve his own neurosis, which resulted from the childrearing conditions in 19th century Vienna.—J. Kelly.

9651. Tellenbach, Hubert. **On the nature of jealousy.** *Journal of Phenomenological Psychology*, 1974(Spring), Vol 4(2), 461-468.—Defines jealousy as the anticipatory fear of the loss of a loved object which is felt to be necessary to self-fulfillment. It is suggested that jealousy becomes



pathological when the individual's attitude changes from fear of possible loss to an obsessive certainty that the loved object will be lost.

9652. Tribich, David & Messer, Stanley. (Rutgers State U, New Brunswick) **Psychoanalytic character type and status of authority as determiners of suggestibility.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 842-848.—Predicted that oral character types selected by the Blacky Pictures would report a similar amount of movement of a light as an authority figure when viewing the autokinetic phenomenon in his presence, while anal character types would remain independent of his influence or would even respond oppositionally. Data from 107 male undergraduates support the hypothesis: orals were much more suggestible in the presence of either a high-status authority figure or a peer than were anals or members of a neutral control group. While professing to be unaware of any influence, orals moved away from their baseline responses in the direction of the authority figure, while anals moved away from their baseline in opposition to the authority figure.—*Journal abstract*.

9653. Verma, S. K. (Postgraduate Inst of Medical Education & Research, Chandigarh, India) **The difficulty levels of some personality tests in Hindi.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 15-18.—Examines the difficulty level of 17 personality and adjustment inventories in Hindi. The 2 criteria for difficulty level are average sentence length and percentage of "hard" words. Results indicate that only 4 tests were acceptable in terms of both criteria. Although the average sentence length of most tests was satisfactory, the percentage of "hard" words was excessive. Thus, difficulty level must be a prime consideration in test construction and adaptation. Test results are meaningless if the difficulty level of the language is beyond the level of comprehension of the majority of the population.—*F. S. Beyer*.

9654. Veszy-Wagner, Lilla. [Destructiveness against individuals and groups.] (Germ) *Dynamische Psychiatrie*, 1973, Vol 6(6), 414-426.—Suggests that neither the development of the child nor the development of mankind provide any evidence for the existence of an innate primary instinct of destruction, not even in the circumstances of manifest aggression. A theory of a secondary destructive instinct is developed and explained on the basis of examples of mass behavior, differing family constellations, historic and anthropological studies. The principal difference between aggression and destruction is that aggression is goal-oriented. (English summary)—*T. Fisher*.

9655. Wallace, Edith. **Conventional boundaries or protective temenos.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 91-99.—Employs Jungian concepts to distinguish between the boundaries built by the anxious ego as a protection of conventional safeguards and the sacred precinct, the "temenos," within which the search for the unconscious center of the self can be carried out. Examples from the dreams of patients and the novels of J. Conrad illustrate the struggle for transcendence. Creativity requires this liberation from limiting convention and serves as an instrument for achieving it. The

organic order of the self replaces the order superimposed by the ego.—*R. Arnheim*.

9656. Wessman, Alden E. et al. (City Coll, City U New York) **Personality and linear representation of temporal location.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 914-90 undergraduates completed 3 personality tests and a task in which Ss located 1 wk, 7 mo, 3 yrs, and 9 yrs past and future on 2 time lines labeled "birth to now" and "now to death." Data fit commonsense expectations that self-control, responsibility, and cognitive caution go along with subjective locations of the past and future close to the present and suggest that performance on a simple time line reflects some intimate relationships between temporal experience and personality.

9657. Wiesenbütter, Eckart. [Compulsive gambling.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 147-160.—Contends that compulsive gambling and not problem drinking is the original addiction. The use and the psychological meaning of hands is discussed. Animal games underlie and are supported by the mother's hand contact with the child. The child plays with his hands and play grows into work activity. Play is immaturity, work is maturity. Addictive states and compulsive mechanisms—kleptomania, heavy smoking, alcoholism, etc.—are seen as a breakdown in the maturing process where development stops at the level of handplay, short of handwork, and displays tangential behavior.—*S. D. Babcock*.

9658. Witkin, Herman A. et al. (Educational Testing Service, Princeton, NJ) **Social conformity and psychological differentiation.** *International Journal of Psychology*, 1974, Vol 9(1), 11-29.—200 male and female Ss of 2 age groups (approximately 10 and 13 yrs) from each of 3 countries—Holland, Italy, and Mexico—and from 1 village in each country that was noted for social conformity and 1 village that was not, took field dependence tests, including the rod-and-frame test, the Children's Embedded Figures Test or the regular Embedded Figures Test, and the block design subtest of the WISC or the WAIS. Each S also made drawings of a male and female, to which the articulation-of-body-concept scale was applied, and took the Vocabulary subtest of the WISC. Analysis of variance of results on all differentiation measures gave strong and significant support to the hypothesis that Ss from villages low in social conformity would perform in a more field-independent fashion than Ss from villages of high social conformity. The hypothesis that older children would differ more than younger children also received significant support. Consistent sex differences did not appear, though significantly higher vocabulary scores occurred for children from villages marked by lesser social conformity. (56 ref)—*E. A. Gavin*.

9659. Wucherer-Huldenfeld, Augustinus. [Freud's genealogy of morality.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 132-146.—Notes that Freud believed infantile helplessness to be a prerequisite to any kind of morality. Unpleasant events were viewed as educators. It is possible to apply his theories to F. Nietzsche's *The Genealogy of Morality*.

## PROFESSIONAL PERSONNEL

9660. Anthony, William A.; Gormally, James & Miller, Henry. (Boston U) **Prediction of human relations training outcome by traditional and nontraditional selection indices.** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 105-111.—Used a variety of traditional and nontraditional selection indices to predict the outcome of a graduate-level course in counseling designed to improve human relations skills. Ss were 21 graduate counseling students. Multiple correlations of .75-.80 were found between a measure of training outcome and various combinations of predictors. A series of multiple linear regression analyses indicated that the traditional selection indices—grade point average, Graduate Record Examination scores (both Verbal and Quantitative scales), and the Miller Analogies Test—accounted for a very minor amount of the variance in ratings of the final taped interview. In contrast, a newly developed selection measure (trainability index) accounted for almost all of the predictable variance. The need for a new and more efficient predictive model for graduate-level counselor training is discussed.—*Journal abstract.*

9661. Arieti, Silvano. (New York Medical Coll, NY) **Psychiatric controversy: Man's ethical dimension.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 39-42.—Considers that although determinism may permeate human existence, man's moral values raise him above the level of an animal and enable him to direct his own life. It is suggested that psychiatrists should influence the patient to exert his will, make conscious choices, and, above all, assume a sense of responsibility for his own actions. In order to free the patient from whatever conditions hinder his will and to help him make choices, psychiatric treatment must consider man's ethical dimension.—*Journal abstract.*

9662. Armstrong, Renate G. (VA Hosp, Northport, NY) **A comparison between group therapists and members of the desired degree of self-disclosure by therapists.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 20-21.—The Group Therapist Orientation Scale (GTOS), which measures extent and type of self-disclosure was self-administered by several group therapists, and then given to 2 outpatient groups who indicated what self-disclosing behavior they desired from their therapists. Different results from therapists and patients are interpreted to mean that therapists may be "ahead" of the needs of group members. Therapists who believe in participating self-disclosure may not practice it effectively, and the group thus responds to older behavior patterns observed in therapists rather than to newer covert ideal patterns.

9663. Autor, Sherry B. & Zide, Ellen D. (Massachusetts General Hosp, Boston) **Master's-level professional training in clinical psychology and community mental health.** *Professional Psychology*, 1974(May), Vol 5(2), 115-121.—Describes a 2-yr master's level training program which has the development of clinical competence for community practice as its primary goal. Training takes place in a community mental health facility under the guidance of a clinician who practices there. A broad range of diagnostic techniques, therapeutic

modalities, and preventive interventions are taught in seminars and in supervision by introducing theoretical material when it can best clarify the clinical process in which the trainee is engaged. There is a progressive increase in field experience throughout the training period in which the trainee works with people who present a variety of psychological and social problems and thus learns which techniques are most realistic and relevant.—*B. Lindsey.*

9664. Ballis, George U.; Weintraub, Walter & Mackie, James. (U Maryland, Medical School, Baltimore) **A four-year behavioral science-psychiatry track in undergraduate medical education.** *Journal of Medical Education*, 1974(Nov), Vol 49(11), 1051-1056.—Describes a program in which students complete specialty offerings in addition to the requirements of a standard 4-yr medical curriculum. The program provides, from the 1st mo of the freshman year, a progression of combined didactic and clinical experiences in the behavioral sciences and in clinical psychiatry. Students completing the program are expected to have acquired a foundation of knowledge and skills that is envisioned as equivalent to that provided by 1 yr of traditional residency training in psychiatry.—*Journal abstract.*

9665. Barnat, Michael R. (Livingston Community Mental Health Ctr, Howell, MI) **Some characteristics of supervisory identification in psychotherapy.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 189-192.—Gives examples of the spontaneous stylistic characteristics of supervisors and how these increase the competence and professional identity of trainee therapists.

9666. Bazelon, David L. (US Court of Appeals for the District of Columbia Circuit, Washington) **The perils of wizardry.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1317-1322.—Considers that as biobehavioral scientists, psychiatrists bear a major responsibility in the current revolution involving the understanding of the brain and human behavior. Based on the author's experience in the courtroom, psychiatry's primary focus on treatment and its penchant for diagnostic labeling is viewed as dangerous; the field may lose sight of the social determinants of behavior. Psychiatrists are urged to acknowledge and respond to the ethical challenges posed by their great power, their "wizardry" in the use of behavior modification, psychosurgery, and chemotherapy.—*Journal abstract.*

9667. Bentkover, Stuart H. et al. (Mt Sinai School of Medicine, City U New York) **Student perspectives on learning in a prepaid group practice: A manpower training program in an HMO.** *Health Services Research*, 1974(May), Vol 89(3), 225-229.—Describes the opportunities for medical education in a prepaid group practice setting.

9668. Bernstein, Arnold. (Queens Coll, City U New York) **The genital psychoanalyst.** *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 257-267.—Describes the genital analyst as one free from sexual disturbance and not obsessed by infantile moral imperatives. An analogy is drawn between the genital mother who accepts sensual pleasure connected with meeting her child's needs and the analyst responding to the sensual countertransference reactions within analysis. The mature analyst can



enjoy genital feelings, talk about them, know the difference between word and deed, and so show the way for the patient's growth.—*B. Smith.*

9669. **Berry, Patricia.** *An approach to the dream.* *Spring*, 1974, 58-79.—Discusses means in dream analysis for interpretive self-awareness, a method enabling the analyst to examine his actual interpretation process or to interpret his own interpretations. Some of the components of the dream image (sensuality, texture, emotion, simultaneity, intrarelations, value, and structure) are examined, as are the implications of the image. The narrative or dramatic structure of dreams is considered together with a third category, supposition, under which causality, evaluation, generalization, and specification operate. Analysts are urged to learn the psychology of the image proceeding from a recognition of unsuitable interpretive moves vis-a-vis dreams.—*A. de la Haba.*

9670. **Brokowski, Anthony & Schulberg, Herbert C.** (United Community Planning Corp, Boston, MA) *A model training program for clinical research and development.* *Professional Psychology*, 1974(May), Vol 5(2), 133-139.—Outlines a graduate-level program designed to enable students to function as specialists in clinical research and development through the acquisition of the capacity both to understand basic research and to develop practical applications. Breadth rather than depth of knowledge is stressed. The curriculum includes courses in the relevant basic sciences, and all courses in psychology are oriented toward the application of research findings to solve personal and social problems. There is formal training in research technology, with exposure to concepts such as utility theory and systems analysis. The research training focuses upon the acquisition of program evaluation skills and emphasizes the future role of the student as a change agent.—*B. Lindsey.*

9671. **Chartoff, Marvin B. & Bardon, Jack I.** *The relationship between position title and where one receives his doctorate in school psychology.* *Professional Psychology*, 1974(May), Vol 5(2), 175-177.—Obtained evidence from a questionnaire survey of all known graduates ( $N = 328$ , or 78% of those surveyed) of doctoral programs in school psychology in the US indicating the existence of a relationship between the graduate school attended and the type of subsequent professional functioning. The 7 largest doctoral programs were compared. Among the programs the percentage of graduates varied from 16.8 to 64.3 working in school positions, varied from .0 to 30.0 working in clinical positions, varied from 15.0 to 66.6 working in college teaching or administrative positions, and varied from .0 to 14.3 working in research positions. It is concluded that each program somehow tends to shape its students in certain directions.—*B. Lindsey.*

9672. **Cormier, L. Sheryllyn; Hackney, Harold & Segrist, Allen.** (West Virginia U) *Three counselor training models: A comparative study.* *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 95-104.—Investigated the effects of 3 prepracticum counselor training approaches on counselor performance: T group, behavioral skills, and discussion control. Pre- and postmeasures consisting of 30-min video-recorded counseling interviews were administered to 18 student counselors.

Counselor performance was evaluated by client completion of the Counseling Evaluation Inventory (CEI) and by 3 trained judges' ratings of 4 5-min interview segments using the Counseling Strategies Checklist (CSC). Data from each instrument were subjected to a  $3 \times 2$  factorial analysis of variance. A significant Group  $\times$  Time interaction occurred for the CEI. Significant time effects occurred on 4 of the 7 dependent variables of the CSC. Results have implications for both the length and type of training approach used in effective counselor education practices. (18 ref)—*Journal abstract.*

9673. **Counte, Michael A. & Kimberly, John R.** (Indiana U, Ft Wayne) *Organizational innovation in a professionally dominated system: Responses of physicians to a new program in medical education.* *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 188-198.—Discusses the importance of understanding factors which influence variability in the responses of professionals to organizational innovation efforts. Results of a study which explored this issue in the context of the health care system are reported. Variability in the responses of 332 practicing physicians to an organizational innovation (a new medical education program) was examined in light of a number of hypotheses derived from the literature on the adoption of innovation. Findings support 5 of the 6 hypotheses tested, and suggest that receptivity to organizational innovation in professionally dominated systems is influenced by factors similar to those in other systems (e.g., local or cosmopolitan orientation, age, and amount of influence attributed to the change agent). (36 ref)—*Journal abstract.*

9674. **Dickerson, Larry R. & Roberts, Ralph R.** (Arkansas Rehabilitation Research & Training Ctr, Ctr for Continuing Education in Rehabilitation) *The effectiveness of prepackaged instructions for the inservice training of rehabilitation counselors.* *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 133-139.—Evaluation of 30 learning units (tape recordings and supplementary readings) indicates that a voluntary packaged instructional approach to the conceptual training of rehabilitation counselors is promising, but that greater effort is needed in developing the actual content of the training materials and insuring the motivation of the package users.

9675. **Engs, Ruth C. & Kirk, Robert H.** (Indiana U) *The characteristics of volunteers in crisis intervention centers.* *Public Health Reports*, 1974(Sep-Oct), Vol 89(5), 459-464.—Presents demographic characteristics and California Psychological Inventory scores of 74 volunteers in 5 crisis intervention centers.

9676. **Gentry, W. Doyle.** (Duke U, Medical Ctr) *Three models of training and utilization.* *Professional Psychology*, 1974(May), Vol 5(2), 207-214.—Describes the employment of psychological technicians in 3 somewhat different clinical settings, focusing on the details of technician selection, training, and duties. A specification of the degree and type of service demand and the number and type of psychological staff are given for each clinical setting. The selection criteria in all settings include a bachelor's degree and an ability to relate easily on an interpersonal level. An apprenticeship model is used for training in all settings, with a stress on close

supervision and working relationships. The technician is employed in each setting primarily to administer and score psychometric tests and report on relevant patient behaviors. Some differences in technician employment in the 3 settings are noted, and the lack of male technicians is queried. (21 ref)—*B. Lindsey.*

9677. Gentry, W. Doyle. (Duke U, Medical Ctr) **Technicians' views of training and function.** *Professional Psychology*, 1974(May), Vol 5(2), 219-221.—Summarized the responses to an open-ended questionnaire, sent to all current and past psychological technicians of 3 medical centers, that requested a self-evaluation of training and functioning. The types of comments, mostly positive, made by the respondents regarding their respective training programs, their functioning in the role of technician, and their work relationships are presented. Changes in attitude or behavior ascribed by the respondents to training and work as a technician are classified according to changes within the self, changes in attitudes toward sick and disturbed individuals, and changes in life goals or career plans. Suggestions about ways in which the technician's role should be extended included training in interview techniques and interpretation of assessment protocols.—*B. Lindsey.*

9678. Gerber, Lane A. (Medical Coll Ohio, Toledo) **An approach to teaching the psychotherapy systems and techniques seminar.** *Professional Psychology*, 1974(May), Vol 5(2), 231-233.—Presents a method for arousing and sustaining intellectual curiosity and emotional-personal involvement employed in a seminar on psychotherapy systems and techniques. Each participant was asked to choose a therapist, present his life data and his theory, demonstrate his technique, and answer questions as if he were that therapist. Several apparent advantages of the method are discussed.—*B. Lindsey.*

9679. Geyman, John P. & Guyton, Rick. (U California, Medical School, Davis) **Evaluation of multimedia self teaching programs for medical students taking community preceptorships.** *Journal of Medical Education*, 1974(Nov), Vol 49(11), 1062-1063.—Describes an evaluation of 12 programs comprising 6 types of media—audiocassette, and audiocassette-slides, 16 mm film, 16 mm film-monograph, slides-handout, and printed information—used to supplement the learning of senior medical students taking elective family practice preceptorships.

9680. Gibson, Beryl S. & Reed, John C. (Texas Women's U, Pediatric Nurse Practitioner Program) **Training nurses in MR.** *Mental Retardation*, 1974(Dec), Vol 12(6), 19-22.—Compared the behavior, knowledge, and attitudes of a total of 667 student nurses, faculty, and staff to determine reactions to a nursing program which incorporated theory and supervised clinical practice in mental retardation. Ss showed a positive shift in attitudes toward the mentally retarded.

9681. Gilmartin, Kevin M. & MacKinnon, William J. (Norfolk Regional Ctr, NB) **The effects of staff retraining and SPAN decision making on group problem solving.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 9-11.—17 Behavioral Sciences, 1974(May), Vol 16(2), 9-11.—17 groups of staff members (7-13 members each) utilized either the Social Participatory Allocative Network (SPAN) method of group decision making or the

conventional group discussion format. SPAN surpassed conventional methods in producing group problem solving superior to the best individual solutions.

9682. Goldman, Lee. (U California, San Francisco) **Factors related to physicians' medical and political attitudes: A documentation of intraprofessional variations.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 177-187.—Surveyed attitudes of medical students and graduates toward possible changes in the organization and delivery of medical care in the US. The best predictors of a respondent's score on the attitude scale were his political ideology, the organization of his medical practice, and whether he was still in medical school. Data document the heterogeneity of American doctors. (27 ref)

9683. Grossman, Herbert J. & Rowitz, Louis. (Illinois State Pediatric Inst, Chicago) **Program accountability in mental retardation.** *Mental Retardation*, 1974(Dec), Vol 12(6), 8-11.—Reviews from a historical perspective developments in accountability on clinical and research activities of mental retardation programs. The relationship between program accountability and evaluation is also discussed.

9684. Haase, Richard F. (U Massachusetts, Student Development Ctr, Amherst) **Power analysis of research in counselor education.** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 124-132.—Discusses statistical power analysis as a necessary and desirable activity in counselor education research. Power of counseling research is discussed with respect to alpha levels, sample size, and size of effect. 4 yrs of counselor education research are reviewed and analyzed according to the criteria of statistical power. Recommendations for increasing the power of research in counselor education are made.—*Journal abstract.*

9685. Hance, Gloria E.; Riach, Margaret J. & Fenster, Charles B. (VA Hosp, Clinical Training Program, Phoenix, AZ) **Evaluating students' clinical skills.** *Psychological Record*, 1974(Fal), Vol 24(4), 481-489.—12 undergraduates conducted informational interviews with applicants to the Psychology Learning Center, a college level educational program. (a) to determine the reliability of a newly developed rating instrument and (b) to evaluate the effects of the center on Ss' acquisition of practical clinical skills. The Ss' performances as interviewers were rated by 3 expert clinicians using the new rating instrument. The raters achieved unusually high agreement on the definition of clinical skills due to a combination of (a) behavioral definitions of characteristics useful in interviews with (b) previously developed clinical judgments. Learning center Ss consistently were rated more skillful in conducting these interviews than matched controls and were rated higher on awareness of their mistakes and abilities. (17 ref)—*Journal abstract.*

9686. Hanson, Philip G. & Peck, Cecil P. (VA Hosp, Houston, TX) **Training for individual and group effectiveness and resourcefulness (TIGER).** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 1-3.—Reorganization of the admissions units of Veterans Administration hospitals includes a new systematic training program for personnel who have initial contacts with applicants for medical care. The TIGER program, designed to help personnel



develop interpersonal communicative skills, is described in detail.

9687. Hauss, K.; Neidenbach, N.; Stegemann, H. & Völkel, H. [Planning and realization of a course in medical psychology.] (Germ) *Zeitschrift für Psychotherapie und medizinische Psychologie*, 1974(Jan), Vol 24(1), 13-21.—Describes the content and method of a course in medical psychology which is compulsory in the preclinical curriculum under the new Certification Regulation for Physicians. The course was developed during the summer of 1972 and was offered in the fall semester 1972 to 120 1st-term medical students at the Keil University Mental Hospital. The difficulties in choosing course content and goals are described, and the problems of implementing the program are discussed, with its advantages and disadvantages. Conclusions and experiences will be taken into consideration for further planning of the course.—S. D. Babcock.

9688. Jones, Lawrence K. (North Carolina State U, Raleigh) **The Counselor Evaluation Rating Scale: A valid criterion of counselor effectiveness?** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 112-116.—Studied whether the Counselor Evaluation Rating Scale (CERS) should be used as a criterion measure of counselor effectiveness in studies attempting to identify correlates of counselor effectiveness. The validity of recent recommendations regarding the use of certain factors of the 16 Personality Factor Questionnaire to select persons for counselor training programs, where the CERS was the criterion measure, is challenged. Relationships between the 3 scales of the CERS and levels of empathy, respect, and empathy offered in a counseling relationship were investigated with 19 graduate students. Only 1 of the hypothesized relationships was found ( $p < .05$ ). (16 ref)—*Journal abstract*.

9689. Jones, Richard D. & Neil, Thomas C. (San Diego State U, Drug Rehabilitation Project) **A study on maintaining workshop impact for employment counselors.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 160-165.—Used a modified intermittent reinforcement program in an attempt to maintain the heightened skills of employment counselors after they returned from a workshop setting to their work environment. The participants in the applied communication training workshop were assigned to a control group ( $n = 24$ ) and an experimental group ( $n = 12$ ). Contact by the trainer was established for the experimental group 1 wk after the close of the workshop and maintained for 3 mo. Contact with the control group was not made until the 3-mo follow-up test was administered. Comparison of pre- and posttest responses indicate that both groups improved their interpersonal communication skills as a result of the workshop. However, the 3-mo follow-up indicated that Ss who were not provided intermittent reinforcement showed a deterioration in skills, whereas Ss who were provided reinforcement maintained or improved their skills. The gain by the experimental group and loss by the control group were significant ( $p = .05$ ). It is suggested that educators should not assume that once a counselor is produced he will continue to function at the same or higher level. New approaches to maintaining skill effectiveness are recommended.—P. O'Brien.

9690. Klaus, Hanna. (St Louis U, Medical School) **The menopause in gynecology: A focus for teaching the comprehensive care of women.** *Journal of Medical Education*, 1974(Dec), Vol 49(12), 1186-1189.—Suggests that discussion of the meanings of loss of reproductive capacity (menopause) by natural and surgical means can be used to integrate several aspects of womanhood in a gynecologic teaching program for medical students. Hormonal and emotional aspects of menopause are discussed briefly, and attitudes toward surgical sterilization are noted.

9691. Knaggs, Sara J.; Barnes, Alan J. & Maclean, Charles B. (Emergency Dept Nurses Assn, East Lansing, MI) **The decision tree for teaching management of uncertainty.** *Journal of Medical Education*, 1974(Dec), Vol 49(12), 1184-1186.—Describes the "decision tree," (an outline of presenting symptoms and a reproducible logic for decision and action) which was developed for drug-misusing populations. The decision tree is recommended as an effective tool for helping diverse learners in health-care occupations choose the right course of action when diagnosis is uncertain.

9692. Left, J. P. (MRC Social Psychiatry Unit, Inst of Psychiatry, U London, England) **Transcultural influences on psychiatrists' rating of verbally expressed emotion.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 336-340.—Used reliability data from the International Pilot Study of Schizophrenia to explore differences in the way psychiatrists from the various centers perceived patients' verbal expression of emotion. Data was collected from psychiatrists' ratings on the Present State Examination (Depression, Anxiety, and Irritability scales). Psychiatrists from developed centers agreed with psychiatrists from developing centers in their perception of the degree of emotional differentiation shown by patients from developed centers. However, psychiatrists from developing centers saw their patients as exhibiting a relatively low degree of emotional differentiation, whereas their colleagues from developed centers rated them significantly higher in this respect. It is concluded that the assessment by the developing center psychiatrists is likely to be more accurate.—*Journal summary*.

9693. Levine, Frederic M. & Tilker, Harvey A. (State U New York, Stony Brook) **A behavior modification approach to supervision of psychotherapy.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 182-188.—Describes an approach in which supervision is geared towards developing a growing repertoire of effective therapeutic responses by the therapy trainee. Specific techniques are discussed. It is recommended that the supervisor initially attend therapy sessions with the trainee, and provide direct and unambiguous feedback regarding the trainee's therapeutic functioning. The supervisor should also help provide alternative ways for the trainee to deal with problem situations. Supervision should decrease as the trainee demonstrates increased competence.—C. P. McCreary.

9694. Lucena, José [Limits of the psychiatrist's function.] (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 33-53.—Defines 3 major functions of the psychiatrist: (a) conceptual—to develop new knowledge in his field; (b) professional—to train new psychiatrists and manage relations with allied profession-

al groups; and (c) ethical—to study the moral and philosophical implications of his discipline. It is suggested that psychiatry must avoid 2 errors: reductionism, an excessive focus on the organic aspects of mental illness, and expansionism, an effort to take over too many functions belonging to other disciplines. It is considered difficult but not impossible to establish criteria for deciding when and to what extent other mental health disciplines may be given treatment responsibilities. Some further ethical problems inherent in the "new psychiatry" are noted. (English summary) (83 ref)—*D. J. Clair.*

9695. McCandless, Charles E. & Hicks, Rose. (Texas A&M U) **Counselors' perception of the legal implications of guidance services.** *Texas Personnel & Guidance Association Journal*, 1973(Mar), Vol 2(1), 31-38.—Attempted to determine how Texas counselors perceive the law in relation to counseling. A survey form was sent to 65 counselors in 13 counties, with 66% returns. Age of respondents was 40-49 yrs. The instrument presented 12 situations to which only 2 answers were possible. It is concluded that counselors responded in a legally appropriate manner. However, it is recommended that counselor education programs include or strengthen coverage of the legal implications of counseling.—*H. Crouch.*

9696. Mensh, Ivan N. (U California, Ctr for the Health Sciences, Los Angeles) **Consulting in medical, educational, and training settings.** *Professional Psychology*, 1974(May), Vol 5(2), 129-132.—Summarizes the curricula of programs in internship training, forensic psychiatry and psychology, advanced psychiatric residency, and community psychiatry as examples of concepts and practices in the education of health professionals. The principle objective of these programs is to increase the ability of the professionals to serve consultation and related functions in work with both other professionals and nonprofessionals. The role of the consultant is to assist the inquiring individual to define his consultation needs by asking the appropriate questions and to suggest solutions to the problems he poses, specifying the probable outcomes of the various options.—*B. Lindsey.*

9697. Musante, Gerard J. (Duke U, Medical Ctr) **Staff evaluations of the technician role.** *Professional Psychology*, 1974(May), Vol 5(2), 214-216.—Obtained evaluations of the functioning of psychological technicians, using questionnaire data from 21 psychology faculty and staff, all of whom had extensive contact with their respective technicians. The respondents rated the performance of the technicians on a 5-point scale, ranging from very poor (1) to very good (5). The mean ratings were 4.31 for test administration and 3.75 for behavioral observation. The respondents claimed that they used the behavioral observations of the technicians extensively to understand patient pathology and to write their reports, and that the availability of technician services enabled them to spend more time interviewing each patient. It was the opinion of 70% of the respondents that diagnostic testing by the technicians could and should be supplemented by the performance of other functions. In general, the respondents were quite pleased to have psychological technicians added to their work settings.—*B. Lindsey.*

9698. Naftulin, Donald H.; Donnelly, Frank A. & Wolkon, George H. (U Southern California, Medical School) **Selections of nuns for training as mental health counselors.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 366-369.—Conducted 2 surveys of Catholic nuns to determine the relationship between attitudes toward the use of authority-in-interviewing and rigidity in everyday life and the involvement of persons in training as primary counselors. 2 questionnaires mailed 3 yrs apart, elicited responses from 140 nuns. A 14-item scale, originally devised to measure the use of authority by physicians and now modified, was used. The 2nd instrument was the Gough Stanford Rigidity Scale. Relationships were found between authority scores and number of counseling courses taken and respondents actually counseling. It appears scales such as the ones described, although not especially useful for selection of counselors, are useful for placement of persons into the most appropriate type of counseling course and for course development.—*Journal summary.*

9699. Neufeld, Victor R. & Barrows, Howard S. (McMaster U, Hamilton, Ontario, Canada) **The "McMaster Philosophy": An approach to medical education.** *Journal of Medical Education*, 1974(Nov), Vol 49(11), 1040-1050.—Describes a university's approach to medical education which includes self-directed, problem-based, and small-group tutorial learning. The program also emphasizes diagnostic evaluation, the selective use of learning resources, and integrated learning and educational planning.

9700. Novak, David W. & Busko, Betty P. (Duke U) **Teaching old dogs new tricks: Issues in the training of family therapists.** *Psychiatric Forum*, 1974(Fal), Vol 4(2), 14-20.—Discusses basic issues and philosophies relevant to the training of family therapists. An efficient training model is presented along with alternatives for individuals not having access to a structured training program.

9701. Pankratz, Loren & Pankratz, Deanna. (VA Hosp, Portland, OR) **Nursing autonomy and patients' rights: Development of a nursing attitude scale.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 211-216.—Constructed a 69-item attitude scale which was administered to 702 nurses in 5 different settings. A principal components factor analysis results in 3 subscales that adequately represented the intent of the study: nursing autonomy and advocacy, patients' rights, and rejection of traditional rule limitations. The subscales clearly differentiated between the different samples of nurses. Higher scores were associated with education, leadership, academic setting, and nontraditional social climate. (22 ref)—*Journal abstract.*

9702. Patterson, Daniel Y. (Group Health Assn, Washington, DC) **How to avoid taking the boards but still save face.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 79-80.—Notes that position appointments for psychiatrists, as well as their eligibility to practice (or be paid for practice) may soon depend on certification or recertification. Several options are presented for psychiatrists who wish to avoid taking board examinations and still save face.—*Journal abstract.*

9703. Ramsden, Elsa L. (U Pennsylvania, School of Allied Medical Professions, Philadelphia) **Behavioral science in medical education: A learning model.** *Journal*



of *Medical Education*, 1974(Dec), Vol 49(12), 1182-1183. —Presents a new learning model for the study of behavioral science in medical education. The model emphasizes (a) observation of the work of practicing physicians and (b) a "self-critical process" which utilizes videotaped transactions between the medical student and patient.

9704. **Randolph, Daniel L.** (U Southern Mississippi) **Training the counselor as a behavioral consultant: A workshop model.** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 147-150. —Describes a workshop model for training counselors to serve as behavioral consultants to teachers who use behavior modification techniques in the classroom. The 3-phase program, which involves simulated classes and videotaping, is outlined, and evidence of its effectiveness is noted.

9705. **Rezler, Agnes G.** (U Illinois, Medical School, Chicago) **Attitude changes during medical school: A review of the literature.** *Journal of Medical Education*, 1974(Nov), Vol 49(11), 1023-1030. —Reviews relevant literature to determine whether (a) medical students' interpersonal attitudes change from the first to the last year of medical school and (b) special teaching programs are capable of changing student attitudes in a specified direction. Findings suggest that the medical school environment fosters cynicism in medical students and that attitude changes induced by participation in special programs are temporary at best unless supported and reinforced by the total medical school environment. Implications of these findings for the selection of medical students and faculty are discussed. (21 ref) —*Journal abstract.*

9706. **Rhoads, John M.; Gallemore, Johnnie L.; Gianturco, Daniel T. & Osterhout, Suydam.** (Duke U, Medical Ctr) **Motivation, medical school admissions, and student performance.** *Journal of Medical Education*, 1974(Dec), Vol 49(12), 1119-1127. —Notes that admissions to medical school are based on selecting those students who excel in the physical and biological sciences. Whether such students will make the best physicians is a supposition that has been a major concern for admissions committees. In a follow-up study on 728 medical school admissions, medical students' basic science grades were compared with those from clinical rotations. It was ascertained that only about half of the students who excelled in the basic science portion of the curriculum did so in the clinical portion, while roughly 70% of students who excelled in the clinical sciences had not done so in the basic science area. Comparison of students in terms of admission data revealed minimal differences. Other findings suggest that motivation is the determining factor. Concern is expressed that present admission policies are likely to result in admissions committees' overlooking the "applied science" type of student. Possible solutions are offered, including the selection of students from schools of nursing. —*Journal abstract.*

9707. **Roazen, Paul.** (York U, Div of Social Science, Toronto, Ontario, Canada) **Reflections on ethos and authenticity in psychoanalysis.** *Human Context*, 1972(Fal), Vol 4(3), 577-587. —Replies in detail to criticisms by K. R. Eissler (see PA, Vol 49:7) of a book concerning Freud and V. Tausk (see PA, Vol 44:13564).

Rebuttal emphasizes the human and professional relationships between Freud and Tausk, based on testimony of witnesses who were actively involved.

9708. **Ross, Alan O.** (State U New York, Stony Brook) **Continuing professional development in psychology.** *Professional Psychology*, 1974(May), Vol 5(2), 122-128. —Proposes the development of continuing postdoctoral education facilities as a solution to the problem of professional obsolescence that has resulted from the recent marked increase in the number of new psychological techniques, methods, and orientations. The initial steps in this direction taken by the recently formed National Academy of Professional Psychologists are specified. It is observed that the universities have shown little interest in continuing professional education in psychology, raising issues of its format, staffing, and cost. In view of the likelihood that continuing professional education will become compulsory, it is recommended that particular attention be given to the meaningfulness of the courses to be required and to the unique needs of the student. —*B. Lindsey.*

9709. **Schwartz, Steven H. & Simon, Roger I.** (Wayne State U) **Differences in the organization of medical knowledge among physicians, residents, students.** *Journal of Structural Learning*, 1972, Vol 3(3), 37-50. —Asked 13 senior medical students, 13 residents and 13 physicians to sort cards containing symptoms (diseases) associated with shortness of breath into clusters that were "of diagnostic utility" to them. Hierarchical trees were constructed for each S's symptom and disease sorts and a number of quantitative measures were derived from these trees. In general, physicians' trees showed more vertical differentiation (levels) while residents exhibited more horizontal differentiation (branches per level). A 9-level classification scheme was developed to characterize the particular types of organizations used by Ss in sorting the symptoms (diseases). Considerable agreement was found between types of organizational schemes used on the 2 tasks, while a number of differences appeared between groups with differing experience. Physicians and residents seemed to use more types and more specific organizational schemes than did students. Possible implications for medical education are mentioned. (17 ref) —*Journal abstract.*

9710. **Sloop, E. Wayne & Quarrick, Eugene.** (Lynchburg Training School & Hosp, VA) **Technician performance: Reliability and validity.** *Professional Psychology*, 1974(May), Vol 5(2), 216-218. —Assessed technician functioning from an uninvolved, objective point of view. 2 psychological technicians and a number of graduate student trainees tested the same children with academic and emotional disorders and/or retested children on the same instruments after intervals ranging from 4 to 48 mo, producing a total of 124 test-retest comparisons. Only slight differences were found in the overall testing behavior of the 2 types of examiners. With regard to validity, technicians and students correlated .90 on the Stanford-Binet Intelligence Scale and .83 on the WISC. The test-retest reliability coefficients for technician-technician and technician-student comparisons were .82 on the Stanford-Binet, .87 on the WISC Verbal scale and .84 on the WISC Performance Scale ( $P < .01$ ). It is concluded that both the technicians and the students

demonstrated a capability for obtaining valid and reliable data from test administration.—*B. Lindsey.*

9711. **Small, S. Mouchly.** (State U New York, Medical School, Buffalo) **Limitations and values of evaluation techniques in psychiatric education.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 52-55.—Summarizes the major evaluation techniques now available in psychiatric education and discusses the values and limitations of each. It is concluded that only by the use of many evaluation instruments during the resident's training can some estimate of clinical competence be approached. Even with this multiplicity of testing instruments, the validity of predictions of a psychiatrist's performance can be determined only in terms of probabilities.—*Journal abstract.*

9712. **Smith, Darrell.** (State University Coll New York, Oneonta) **Integrating humanism and behaviorism: Toward performance.** *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 513-519.—Current emphasis on performance criteria in counselor training programs and in professional services poses a serious threat to the professional and paraprofessional whose orientation is humanistic. Training in the self-actualizing psychologies of A. Maslow and C. Rogers has led many psychologists to equate competency-based education and psychology with behaviorism, and therefore to resist the demand for performance criteria and the adjunct behavioral principles. A behavioral humanism is suggested as the solution to the dilemma, and guidelines are proposed for formulating and implementing such a synthetic system without jeopardizing personal-professional integrity.—*J. F. McIlwaine.*

9713. **Suinn, Richard M.** (Colorado State U) **Traits for selection of paraprofessionals for behavior-modification consultation training.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 441-449.—Attempted to specify the characteristics associated with success in behavior-modification consultation. Ss were 34 undergraduates recommended for training on the basis of their being academically solid enough to learn and apply principles, responsible, mature, capable of thinking analytically, and aware of their own limitations. 20 were accepted following the screening interview and administered psychometric tests (e.g., the Edwards Personal Preference Schedule). The training procedures, the psychometric and other selection measures, and statistical results when comparing the selection tools with different criteria are discussed. (15 ref)—*Journal abstract.*

9714. **Tageson, Carroll W. & Corazzini, John G.** (U Notre Dame) **A collaborative model for consultation and paraprofessional development.** *Professional Psychology*, 1974(May), Vol 5(2), 191-197.—Describes an in-service training program for Head Start social worker aides (paraprofessionals) who had been originally recruited from the target populations they were slated to serve. A nonauthoritarian, group-centered approach was utilized with the 17 trainees, and the training sessions immediately assumed a case-work orientation. Leader interventions were directed toward enabling the trainees to become more aware of their inherent advantages for effective communication with their target populations and to make fuller use of their own resources for problem resolution. 5 general movements and outcomes of the

training sessions are specified. It is concluded that the professional and the paraprofessional can engage in a mutually consultative relationship which allows the paraprofessional to perform tasks appropriate to his unique competencies.—*B. Lindsey.*

9715. **Todd, Thomas W.; Rossiaky, Pamela B. & Ballou, Brynn.** (University Affiliated Cincinnati Ctr for Developmental Disorders, OH) **Survey of need for a new professional: The clinic liaison educator.** *Health Services Reports*, 1974(May), Vol 89(3), 230-235.—Presents data from a survey of the directors of 32 mental retardation and 32 psychiatric clinics, regarding the need for an educator to work in clinics and provide liaison with schools.

9716. **Uhlman, Gerald E.** (Haile Selassie I U, Faculty of Medicine, Addis Ababa, Ethiopia) **Incidence of vasectomies refused and reasons for refusal.** *Public Health Reports*, 1974(Sep-Oct), Vol 89(5), 447-450.—Surveys refusals by 108 private physicians and 77 vasectomy clinics to perform vasectomies, with the reasons given for contraindications.

9717. **Vockell, Edward L. & Asher, William.** (Purdue U, Calumet Campus) **Perceptions of document quality and use by educational decision makers and researchers.** *American Educational Research Journal*, 1974(Sum), Vol 11(3), 249-258.—Selected 102 documents containing empirical research from the 1971 entries in the *Research in Education* dissemination service of the Educational Resources Information Center. These reports were presented to a group of educational research specialists and to a group of educational decision makers for an assessment of their quality. The decision makers perceived the reports to be of significantly higher quality than did the research specialists. The 2 groups gave divergent reasons for acceptance or rejection of a report.—*Journal abstract.*

9718. **Wagenfeld, Morton O.; Robin, Stanley S. & Jones, James D.** (Western Michigan U) **Structural and professional correlates of ideologies of community mental health workers.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 199-210.—Examined (a) community mental health ideological variations among 893 staff members in a national sample of community mental health centers, (b) Ss' perceptions of their organization's position on a social service-medical continuum, and (c) relationships between ideology and organizational structures. Results indicate highest ideological adherence within rural areas, under agency-board structures, among social workers and psychologists, and among those positioning their organizations closer to social than medical services. Ideological adherence appeared to be more a function of professional association than of organizational affiliation. Theoretical and policy implications of these findings are discussed. (34 ref)—*Journal abstract.*

9719. **Walker, Harry A.; Gerjuoy, Herbert & Burstein, George.** (Rockland Children's Psychiatric Ctr, Orangeburg, NY) **Occupational therapy: Job analysis of tasks of certified assistants and registered therapists.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 907-914.

9720. **Ward, G. Robert.** (U Houston) **Theoretical orientation influences the assessment of counselor effectiveness.** *Counselor Education & Supervision*,



1974(Dec), Vol 14(2), 150-154.—3 professional counselors with psychoanalytic, behavioral, or goal orientations rated video- and audiotapes of practicum counseling sessions. Data support the suggestion that experienced counselor educators with different counseling orientations evaluate counselor effectiveness differently, and that the philosophical viewpoint of professional counselors may be more salient than previously recognized.

9721. Wise, Thomas N. (Johns Hopkins Hosp, Baltimore, MD) **Utilization of a nurse consultant in teaching liaison psychiatry.** *Journal of Medical Education*, 1974(Nov), Vol 49(11), 1067-1068.—Presents clinical experiences of liaison nurses to illustrate the effectiveness of such a practice in supporting the proper care of patients. It is suggested that, by having a consultant nurse within a liaison service working in a role parallel to that of a medical staff member and not as a substitute or surrogate physician, the responsibilities and difficulties of nursing in the management of emotional reactions to illness can be eased.—*M. Pounsel.*

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

9722. Hynle, J. (U Karlova, Fakulta všeobecného lékařství, Prague, Czechoslovakia) **[Factors of sexual differentiation.]** (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 72-79.—Discusses the influence of chromosome sets, sex hormones, cerebral centers governing hormonal delivery, and early life experiences on pathological sexual development. Studies of imprinting in birds are quoted as relevant to psychoanalytical claims that dispositions toward some interpersonal and sexual patterns originate in infancy. How patients feel about their sexual problems is important, and the therapist is asked to be sensitive, tactful, and compassionate. (Russian & English summaries) (24 ref)—*V. Fischmann.*

9723. Meyer, Jon K. (Johns Hopkins Medical Inst, Psychiatric Liaison Service, Baltimore, MD) **Clinical variants among applicants for sex reassignment.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 527-558.—Considers that loose usage of the term "transsexualism" and limitations of the diagnostic categories transsexualism, transvestism, and homosexuality as applied to applicants for sex reassignment have created difficulties in evaluation, disposition, and follow-up. Patients falling into the gray areas between diagnostic categories are more common than those fitting existing typologies. A description of 87 patients from 1 series and a broader diagnostic scheme for their classification are offered. It is suggested that the condition of sufficient gender discomfort, skew, or unease to request sex reassignment be recognized as the "gender dysphoria syndrome"; advantages and characteristics of this category are examined. (25 ref)—*Journal abstract.*

9724. Nedoma, K. (Sexuologický ústav Fakulty Všeobecného lékařství, Prague, Czechoslovakia) **[Psychosexual infantilism and PPG diagnostics.]** (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 96-101.—Revives the diagnostic concept of "psychosexual infantilism," originated 50 yrs ago in writings of A. Kronfeld, M. Hirschfeld, W. Stekel, and others. The

clinical picture is described and the syndrome classified as a nosological entity whose principal feature is the lack of differentiation in the choice of sexual objects and activities. Based on phalloplethysmographic tests of 100 patients, 4 kinds of psychosexual infantilism are identified. (Russian & English summaries)—*V. Fischmann.*

9725. Pauly, Ira B. (U Oregon, Medical School, Portland) **Female transsexualism: II.** *Archives of Sexual Behavior*, 1974(Nov), Vol 3(6), 509-526.—Discusses the psychological and psychiatric evaluation, biological data, and treatment of females who wish to become men, using data from 80 cases of female transsexualism reported in the world's literature. Characteristics of the female transsexualism syndrome are outlined, emphasizing the family background and natural history of the disorder. Findings suggest that, in female transsexualism, there is an identification with a masculine but abusive father, while the mother is perceived as weak, less admirable, emotionally unavailable, and in need of protection from the father. A protective attitude develops toward the mother, which has all the dynamics of the oedipal relationship between father and son. The decision to treat the transsexual by offering sex reassignment surgery and other hormonal and psychiatric treatment is still controversial. It is concluded that transsexualism would be far better prevented than treated and that parents should be made more aware of the need to positively reinforce behaviors and gender characteristics consistent with biological sex of the infant. (3½ p ref)—*Journal abstract.*

9726. Sandgrund, Alice; Gaines, Richard W. & Green, Arthur H. (State U New York, Downstate Medical Ctr, Div of Child & Adolescent Psychiatry, Brooklyn) **Child abuse and mental retardation: A problem of cause and effect.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 327-330.—Investigated the impact of child abuse on cognitive development by comparing 60 physically abused, 30 neglected, and 30 nonabused (control) children who were matched for age, sex, and socioeconomic status. Both the abused and neglected Ss were found to have significantly lower IQs than control Ss with substantial percentages in the mentally defective range; however, the hypothesis that the abused children would manifest the greatest impairment was not supported.—*Journal abstract.*

9727. Sturm, I. E. (VA Hosp, East Orange, NJ) **Toward a composite psychodiagnostic report outline.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 6-7.—Presents a standard outline for psychodiagnostic reports including both psychodynamic and behavioral components.

## Mental Disorders

9728. Abrams, Richard; Taylor, Michael A. & Gaztanaga, Pedro. (State U New York, Stony Brook) **Manic-depressive illness and paranoid schizophrenia: A phenomenologic, family history, and treatment-response study.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 640-642.—In a prospective study to assess the validity of paranoid schizophrenia as a diagnostic subtype, an admission diagnosis of paranoid schizophrenia was noted in 41 of 247 consecutive admissions to an acute-treatment psychiatric inpatient unit. Only 2 of

these 41 satisfied research criteria for schizophrenia, whereas half satisfied research criteria for mania. The group whose conditions were rediagnosed as manic was compared with a group of 33 schizophrenic and manic patients for whom admission and research diagnoses concurred. Noticeable differences from the former group and almost no differences from the latter group were found for demographic, genetic, phenomenologic, and treatment-response variables. Data suggest that many patients whose conditions are diagnosed as paranoid schizophrenia actually suffer from an affective illness and rarely satisfy rigorous criteria for schizophrenia.

—*Journal abstract.*

9729. Adair, Bill. (Ministry of Community & Social Services, Province of Ontario, Toronto, Canada) **The role of recreation in assessing the needs of emotionally disturbed youth.** *Journal of Leisureability*, 1974(Oct), Vol 1(4), 25-33.—Proposes the use of recreational activities in the evaluation of personality and social attributes of emotionally disturbed youth. Techniques include (a) observation—use of choice situations in play to observe social skills, interactional patterns, and play habits; (b) interviews to elicit the child's assessment of situations that have arisen in play; and (c) skill testing which measures perceptual-motor ability. Information gained is used to identify the child's needs and to develop treatment plans and goals. It is noted that this assessment should be an ongoing, recorded process which interacts with other aspects of therapy.—*C. Wright.*

9730. Ammon, Günter. [The psychodynamics of the psychoses, the symbiosis-complex and the spectrum of the archaic ego-illnesses.] (Germ) *Dynamische Psychiatrie*, 1973, Vol 6(6), 355-372.—Contends that the decisive factor in the pathogenesis of psychoses and other archaic illnesses of the ego lies in a disturbance of the early symbiotic stage of mother and child relationship in a primary group which is unable to communicate and experience. Archaic ego-disturbances are viewed as 1 pole of a gliding spectrum of psychic diseases, the other pole of which is represented by oedipal neuroses. The possible existence of etiological somatic factors is acknowledged but considered inaccessible and of no appreciable value for therapeutic purposes. The development of ego boundaries and the ego require the mother's experiential capacity and the protection and assistance of the primary group. Without help from a primary group, the child protects the weak ego-boundaries by splitting off experiential areas in the ego, thus creating an ego deficit, a hole in the ego, and developing a compensatory specific symptomatology which is determined by the time and duration of the trauma and the pathogenic type of the mother. The goal of the therapy must be to reintegrate the deficient ego. (English summary) (45 ref)—*T. Fisher.*

9731. Arieti, Silvano. **Acting out and unusual behavior in schizophrenia.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 333-342.—Views acting out among schizophrenic patients as being connected with special cognitive processes such as active concretization, delusional thinking, and hallucinations. The patient is still capable of conceiving abstract ideation but cannot sustain it; it is too anxiety-provoking. The schizophrenic is seen as similar to the dreamer,

the painter, and the poet, all of whom transform abstract concepts into concrete representations or perceptual images. Contrary to what happens in artistic productions, however, the schizophrenic's abstract level is lost or completely replaced by the concrete form. Case examples of how active concretizations appear in actions are presented. Schizophrenics are classified into 3 categories according to the dominant psychopathology: (a) disinhibition of masochistic trends; (b) part of a depressive syndrome; and (c) acting out of commands or ideas suggested by the delusional ideas, hallucinations, etc. Suicide among these 3 types of patients is discussed. Other recurring symptoms are also cited. Suggestions are made for treatment. (17 ref)—*R. S. Albin.*

9732. Balestrieri, A.; Zimmermann-Tansella, C.; Tansella, M. & Scitiliani, O. (U Padova, Istituto di Clinica Psichiatrica di Verona, Italy) [Hysterical amnesia.] (Germ) *Psychiatria Clinica*, 1974, Vol 7(1), 16-25.—Discusses a nosographical collection of hysterical amnesias, their phenomenology, and their psychodynamic pathogenesis. A case of general amnesia, with special reference to similar cases in the literature, is described. (24 ref)—*English abstract.*

9733. Barocas, Ralph & Black, Harvey K. (U Rochester) **Referral rate and physical attractiveness in third-grade children.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 731-734.—Studied rates of referrals for psychological assessment, speech, reading, and learning disability in 54 male and 46 female 3rd-grade children. Boys were referred more than girls, and children judged by 50 undergraduates as physically attractive by ratings of photographs received significantly more referrals than their less attractive classmates. Differential consequences of appearance on interpersonal responsiveness are discussed with emphasis upon access to intervention programs as a function of appearance.—*Journal abstract.*

9734. Basu, Asit K. & Sen Mazumdar, D. P. **A study of the objective scoring system of Kahn Test of Symbol Arrangement (KTSA) for screening effectiveness.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 23-28.—Examined 18 objective scoring criteria of the KTSA to determine the test's validity in discriminating between pathological groups. 20 male chronic schizophrenics, 20 male epileptics, and 20 male controls were administered the KTSA. Results indicate that 7 criteria achieved statistical significance. While all 7 criteria significantly differentiated between schizophrenic and control groups, 4 criteria significantly differentiated between the epileptic and control groups, and only 1 criterion significantly differentiated between the schizophrenic and epileptic groups. Because of the limited usefulness of these objective criteria, it is recommended that they serve as a supplementary scoring system.—*F. S. Beyer.*

9735. Beck, Aaron T.; Weissman, Arlene; Lester, David & Trexler, Larry. (U Pennsylvania) **The measurement of pessimism: The Hopelessness Scale.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 861-865.—Administered a scale designed to quantify hopelessness to 294 hospitalized suicide attempters, 23 general medical outpatients, 62 additional hospitalized suicide attempters, and 59 depressed psychiatric patients. The scale had a Kuder-Richardson-20 internal consistency



cy coefficient of .93 and correlated well with the Stuart Future Test (SFT) and the pessimism item of the Beck Depression Inventory (BDI; .60 and .63, respectively). The scale was also sensitive to changes in the patient's state of depression over time, as evidenced by a correlation of .49 with change scores on the SFT and .49 with the change scores on the BDI. Findings also indicate that depressed patients have an unrealistically negative attitude toward the future and that seriousness of suicidal intent is more highly correlated with negative expectancies than with depression. A principal-components factor analysis revealed 3 factors which tapped affective, motivational, and cognitive aspects of hopelessness. (16 ref)—*L. Gorsey.*

9736. **Benedetti, Gaetano.** (U Basel, Psychiatric Clinic, Switzerland) **Intrapsychic aspects of schizophrenic psychopathology.** *Dynamische Psychiatrie*, 1973, Vol 6(6), 391-404.—Examines pathology of the ego, in particular the splitting of the ego as the starting point for the understanding of those psychodynamic mechanisms that distinguish schizophrenia from neurosis. Schizophrenia is interpreted as a defect of intrapsychic integration brought about by unknown causes, presumably both psychogenetic and biohereditary. The defect manifests itself as psychopathology only after having passed through psychodynamic mechanisms in which the reaction of the ego and the environment to the disease constitute an essential part of the disease itself. (German summary) (1 p ref)—*T. Fisher.*

9737. **Berg, Ian et al.** (U Leeds, England) **Bipolar manic-depressive psychosis in early adolescence: A case report.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 416-417.—Describes the case of a girl who had typical bipolar manic-depressive psychosis beginning unusually early at age 14 yrs. Treatment with lithium, the course of the illness, and the fact that the patient's father also had bipolar manic-depressive illness are briefly discussed.

9738. **Binder, Jeffrey & Krohn, Alan.** (U Michigan, Medical Ctr) **Sexual acting out as an abortive mourning process in female adolescent inpatients.** *Psychiatric Quarterly*, 1974, Vol 48(2), 193-208.—Discusses one of the clearly definable psychodynamic constellations that underlie sexual acting-out—an abortive mourning process in response to separations or losses suffered by female adolescent inpatients. J. Bowlby's theory (see PA, Vol 39:1933) of the mourning process is emphasized in understanding the immediate reaction to loss. Case material is presented in support of the hypothesis that with some disturbed female adolescents, heterosexual acting-out wards off a regressive wish, kindled by object loss, to reunite symbiotically with the pre-oedipal mother. (25 ref)—*Journal abstract.*

9739. **Blum, Alexander.** (Free U, Psychiatric & Neurological Clinic, Berlin, W Germany) **[An epidemic of attacks in a group of Yugoslav workers.]** (Germ) *Nervenarzt*, 1972(Apr), Vol 43(4), 192-197.—Investigated the causes and triggering mechanisms of an epidemic of psychic disturbances of various types among 76 residents of a Berlin home for female guest workers. Ss were 15 affected women and 15 nonaffected controls, all 18-38 yrs old and physically healthy who had arrived only a few months earlier from a small town in Yugoslavia. The

observed phenomena were analyzed with particular attention to the effects of sudden changes in the environment of Ss. The backgrounds of both groups were examined and compared for relevant, possibly determining factors (home, school, heredity, family, health, social adjustment, etc). From the "soft" data obtained, a global comparison of the groups was made which indicated 70% more relevant factors in the group of affected Ss, although the number of relevant factors also was high in the control group. Yugoslav guest workers appear to include many who work abroad because of maladjustment at home; for some of these persons the new environment may trigger a previously latent symptom, while in others it is beneficial and healing.—*T. Fisher.*

9740. **Broekma, Victor & Rosenbaum, Gerald.** (U Wisconsin) **Cutaneous sensitivity in schizophrenics and normals under two levels of proprioceptive arousal.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 30-35.—Compared the cutaneous sensitivity of 20 normals and 20 schizophrenics (mean ages—30.5 and 30.2 yrs, respectively) under conditions of relaxation and of muscle tension. Schizophrenics were less sensitive than normals to cutaneous cues. Schizophrenic-normal differences were maximized at the most peripheral, least cortically represented of the physical locations sampled. No significant effects on cutaneous sensitivity were produced by muscle tension as opposed to relaxation. (28 ref)—*Journal abstract.*

9741. **Buck, Carol.** (U Western Ontario, London, Canada) **One gene vs. two genes in schizophrenia.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 348-349.—Compared the frequencies of schizophrenia in the parents and siblings of schizophrenics predicted by E. Slater's (1971) single-gene model with those predicted by J. L. Karlsson's (1966) 2-gene model. Statistical analysis suggests that the frequencies predicted by Slater's model are appreciably closer to the observed frequencies than those derived from Karlsson's model, and justify the rejection of the 2-gene theory in favor of a single gene with modified dominance.—*L. Gorsey.*

9742. **Bull, H. C. & Venables, P. H.** (Birkbeck Coll, U London, England) **Speech perception in schizophrenia.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 350-354.—Presented standard lists of phonetically balanced words and lists of low-pass filtered speech (i.e., words from which all sounds above 500 Hz had been filtered out) at 80 and 60 db to a total of 90 male paranoid and nonparanoid schizophrenics and normal controls in 2 experiments. Each S was tested for auditory acuity, and no significant differences were found in either these results, or in age and Mill Hill Vocabulary Scale scores. Results suggest that schizophrenics show an impairment in perception of speech sounds compared with controls and that this difference is more marked in filtered than in unfiltered speech and at low rather than high intensities. No support was obtained for the prediction that this impairment would be associated with the presentation of stimuli to the left rather than to the right cerebral hemisphere.—*L. Gorsey.*

9743. **Cattell, Raymond B.** **An analysis of state and trait change factors in pathology by dR-technique on the CAQ.** *Indian Journal of Clinical Psychology*,

1974(Mar), Vol 1(1), 34-40.—administered the Clinical Analysis Questionnaire (CAQ) to 179 normal and clinical patients to investigate the nature of state change. The CAQ consists of 16 normal scales and 12 pathological scales, 5 representing the MMPI and 7 representing depressive and hypochondriacal pathology. Ss were retested after 1 mo. The 28 factors were split into 56 variables in order to test the hypothesis of 28 primary factors. Difference scores were factored using dR (differential R) technique. Results indicate that the number and nature of states corresponds to results previously found for traits, using the 16 normal and 12 pathological dimensions. One exception was 2 depression dimensions which indicated more common factors.—F. S. Beyer.

9744. Cellesi, M. & Giordano, D. (U Genoa, Istituto di Psicologia della Facoltà Medica, Italy) [Nervous vomiting.] (Ital) *Medicina Psicosomatica*, 1972(Jul), Vol 17(3), 229-239.—Studied 4 5-10 yr old victims of nervous vomiting and identified similar psychodynamic factors, family situations, and personalities in each case. (English & French summaries)

9745. Clum, George A. (U Virginia, Medical School) **Relations between biographical data and patient symptomatology.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 80-83.—Performed a correlational analysis of the relation between item clusters derived from a biographical inventory, the MMPI, and the factors derived from the Katz Adjustment Scales. Ss were 117 psychiatric inpatients, 18-65 yrs of age. Data confirm the expected relations between life history clusters and symptomatology. The factor of Social and Familial Alienation was related to both affective symptoms and more stable personality characteristics. A history of acting out was related to a tendency to emphasize Psychopathology, Masculine Interests, and the character disorder dyad of Psychopathic Deviancy and Hypomania. Age and social status also yielded expectable results, although they tended to be less consistently related to personality variables.—*Journal abstract.*

9746. Cohen, Donald J.; Shaywitz, Bennett A.; Johnson, Warren T. & Bowers, Malcolm. (Yale U, Child Study Ctr) **Biogenic amines in autistic and atypical children.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 845-853.—Studied central nervous system biogenic amine metabolism in 35 3-11 yr old children suffering from autism, atypical development, epilepsy, and movement disorders. After oral administration of probenecid, a membrane blocking compound, a cerebrospinal fluid (CSF) sample was obtained for assay of homovanillic acid (HVA), 5-hydroxyindoleacetic acid (5HIAA), and probenecid. The concentrations of HVA and 5HIAA in the CSF were thought to reflect the rate of formation in the brain of their parent amines, dopamine and serotonin, respectively. There were statistically significant differences in CSF HVA and 5HIAA levels between the psychotic and epileptic children. The HVA and 5HIAA were significantly correlated with each other. Each of these acid metabolites covaried with the CSF levels of probenecid. Interpretation of the significance of CSF HVA and 5HIAA requires simultaneous measurement of probenecid concentration. (29 ref)—*Journal abstract.*

9747. Croughan, Jack L.; Weiner, Amos & Robins, Ell. **The group of schizoaffective and related psychoses—critique, record, follow-up, and family studies: II. Record studies.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 632-637.—Describes a record study on the group of schizoaffective and related psychoses. Data were presented for 2 groups of 204 inpatients. Both manifested at least 2 types of thought and behavior disorders, but only the 1st group had, at the same time, sufficient affective symptoms to meet clinical research criteria for depression or mania. The most important similarities for both groups were the high frequencies of chronic illness, delusions of persecution, and auditory hallucinations. There was little doubt that patients in the 2nd group had paranoid schizophrenia. On the other hand, patients in the 1st group cannot be regarded as having typical paranoid schizophrenia because of having met criteria for affective disorder, and because the chronic course was manifested substantially more by affective symptoms than the 2nd group. (24 ref)—*Journal abstract.*

9748. Cytryn, Leon; McKnew, Donald H.; Logue, Mayada & Desai, Ramesh B. (Children's Hosp of the District of Columbia) **Biochemical correlates of affective disorders in children.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 659-661.—In a preliminary study, 9 6-12 yr old children with affective disorders were studied during a 2-3 wk hospitalization. Biochemical as well as behavioral data were collected. The urinary metabolites studied were norepinephrine, vanillylmandelic acid, and 3-methoxy-4-hydroxyphenylethyl glycol. Deviations from values in normal controls were found in all the Ss but were most apparent in those with chronic affective disorders. This suggests that clinical investigation of the biology of such childhood disorders may be relevant for issues of cause or treatment as they have been in adult affective disorders. (18 ref)—*Journal abstract.*

9749. Daun, H. (U Erlangen, Neuro & Polyclinic, W Germany) [About the formal genesis of psychoses.] (Germ) *Fortschritte der Neurologie, Psychiatrie und ihrer Grenzgebiete*, 1973(Jan), Vol 41(1), 1-52.—Discusses the theoretical concept that mental activity proceeds in an orderly and systematic fashion, a rigid framework in which defined and special mental functions have to follow certain described sequences and are connected in such a way that in each case an afferent and an efferent function are paired. Psychopathological disorders, therefore, must be a manifestation of irregular and disturbed psychic functions. A model is developed which is based on both psychological and psychopathological experience and data showing the mutual correspondence between normal mental processes and the formal genesis of psychoses. (English summary) (37 ref)—T. Fisher.

9750. de Freitas, Otavio & Soriano Wanderley, Nelson. (U Federal do Rio de Janeiro, Faculdade de Medicina, Brazil) **An inventory of psychiatric symptoms (IPS).** (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 55-80.—Presents the initial version of a 140-item (14-scale) personality inventory, empirical validation type, for individual and group use. The validation group included 179 normals, 58 neurotics, 32 schizophrenics, and 42 epileptics. Total scores of all the groups are



compared, and 9 selected individual profiles are reproduced and analyzed.—D. J. Clair.

9751. Depue, Richard A. & Woodburn, Larry. (Southern Illinois U, Carbondale) **Disappearance of paranoid symptoms with chronicity.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 84-86.—Investigated the finding of a reduced proportion of paranoids in chronic samples. Whether this change is due to the disappearance of paranoid patients or of paranoid symptomatology is unclear. Data from 50 multi-admitted paranoid schizophrenics firmly support the notion that paranoid symptomatology disappears. Although half of the patients remained paranoid across 10 yrs of illness, the other half changed to nonparanoid status around the 3rd hospitalization and about 6 yrs after 1st admission.—*Journal abstract*.

9752. Dettmerring, Peter. [The patient and his relatives: Family problems in a social psychiatric class.] (Germ) *Praxis der Psychotherapie*, 1973(Jun), Vol 18(3), 114-117.—Reviews 4 case histories to illustrate family problems of psychiatric patients.

9753. Dobrzański, Tadeusz. (State Jan-Mazurkiewicz Hosp, Warsaw, Poland) **Endocrine alterations in delirium tremens.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1205-1211.—Studied endocrine function in 128 23-67 yr old men with delirium tremens after an overnight fast and again 7 days later. None had a history of endocrinological disorders. From their initial plasma hormone levels, the patients were categorized into 3 groups. According to the classification of alcohol withdrawal syndromes by M. M. Gross et al, 32 Ss were rated at 3+ or more clouding of sensorium and at 3+ or more hallucinations (disoriented for time by more than 2 days and with auditory and visual hallucinations both present but not fused); 39 at 3+ or less clouding of sensorium and at 2+ hallucinations; and 49 at 2+ clouding of sensorium and 3+ or less hallucinations. Results indicate a relationship between the psychopathological syndrome in delirium tremens and endocrine alterations. It is suggested that the alterations are a consequence of the effects of stress in these patients and that they are not a primary cause of the psychosis. (26 ref)—*Journal abstract*.

9754. Doležal, V. & Hausner, M. (U Karlova, Fakulta všeobecného lékařství, Prague, Czechoslovakia) [Key-structure of the N-5 questionnaire from the psychopharmacological and psychotherapeutic point of view.] (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 88-95.—Examined the N-5 questionnaire, designed by 2 Czech psychiatrists for the study of neurotic symptomatology. Factor analysis of questionnaire results from 240 patients before and after psycho- and pharmacotherapy, indicates 5 basic clusters of symptoms: 1 key factor referring to disturbances of self-evaluation and 4 peripheral factors identified as Anxiety-Depression-Neurasthenia, Psychophysiologic Cluster, Obsession-Compulsion-Phobia, and Aggression-Hostility. Findings support M. Ostow's 1962 concept of psychoenergetics and psychodynamics. Revision of the N-5 or construction of a new questionnaire is recommended. (Russian & English summaries) (17 ref)—V. Fischmann.

9755. Dornič, Stanislav & Birbaumer, Niels. (U Stockholm, Inst of Applied Psychology, Sweden) **Inform-**

**ation overload and perceived difficulty in "neurotics."** *Reports from the Institute of Applied Psychology, University of Stockholm*, 1974, No 49, 5 p.—Investigated the perception of difficulty of a task involving high information load, in which Ss had to determine whether or not a series of complex visual items contained a given code. The experimental variable was the rate of presentation of the task (i.e., the amount of "time-stress"). The performance of a group of 28 neurotic outpatients was compared with that of 31 normal, matched controls. Results show that in the control group perceived difficulty was a linear function of the rate of presentation, while in the experimental group perceived difficulty increased as a positively accelerated function of the time available to solve a task.—*Journal abstract*.

9756. Draguns, Juris G. (Pennsylvania State U) **Values reflected in psychopathology: The case of the Protestant ethic.** *Ethos*, 1974(Sum), Vol 2(2), 115-136.—Discusses the influence of the Protestant ethic on the nature of manifestations of psychopathology and on social responses to psychopathology. It is suggested that distinctive cultural values are expressed in psychopathological behavior as well as in socially appropriate and desirable behaviors. (5 p ref)

9757. Drietomsky, Eugen & Brunecker, Georgina. (Simmelweis Medizinischen U, Lab für Psychiatrie, Budapest, Hungary) [The question of the nosological entity of endogenic psychoses.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Apr), Vol 26(4), 217-222.—Reports successful application of K. Leonhard's differential classification of manic-depressive illness. The conjecture is offered that the nosological autonomy of atypical forms of endogenous psychoses can be delimited on the basis of the course of a particular symptomatology.

9758. du Pasquier, J. [Handwriting and fantasy: Death of the father and handwriting.] (Fren) *Pratique des Mots*, 1974(Mar), No 15, 7-15.—Presents a psychoanalytic analysis of handwriting difficulties. Paper, writing instrument, and code (language) are seen as potential symbols for the child, who is thought to fear mutilation and frustration from a symbolic father.

9759. Faltus, F. (U Karlova, Prague, Czechoslovakia) [Fear of obesity and of growing up.] (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 124-127.—Discusses the significance of fear of obesity and fear of physical maturation, found in 29 women having anorexia nervosa. The clinical impression is that fear of obesity is common in both sick and healthy women. Negative feelings about developing breasts and hips, menstruation, and the feminine look and role in general seem to occur more frequently in sexually maturing young patients with anorexia nervosa. It is concluded that fear of growing up is a significant etiopathogenic factor of functional anorexia. (Russian & English summaries) (23 ref)—V. Fischmann.

9760. Fenz, Walter D.; Young, Michael J. & Fenz, Hans G. (U Waterloo, Ontario, Canada) **Differences in the modulation of cardiac activity between psychopaths and normal controls.** *Psychosomatic Medicine*, 1974(Nov-Dec), Vol 36(6), 488-502.—Conducted a study of 15 primary and 15 secondary psychopaths to investigate the prediction that psychopaths would show a

deficit in developing an adaptive modulation of autonomic and, more specifically, heart rate activity in relation to a source of stress. When presented with a series of signals warning of a forthcoming noxious event, Ss showed resistance to develop anticipatory cardiac responses to them; having developed a conditioned response pattern, they then showed resistance to extinction. This delay in responding to changes in the environment, especially to anxiety-relevant cues, was attributed to a selective deficit in attention. Findings are related to studies on "real-life" stress in which the development of anticipatory emotional responses had adaptive effects on performance. (24 ref)—*Journal abstract*.

9761. Fischer, Paul; Laass, Wolfgang; Starke, Gunter & di Poi, Gerhard. (Karl-Marx-U, Medizinisch-Poliklinisches Inst, Leipzig, E Germany) [The importance of psychic disorders in students.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(May), Vol 26(5), 302-313.—Reports on diagnosis and treatment of 133 students during the 1972-1973 academic year at Karl Marx University, Leipzig. Students with psychic disorders usually consulted an internist or general practitioner rather than a psychiatrist. Psychological tests were helpful in diagnosing those cases where organic disorders had been ruled out. Since as many as 5% of the students may develop psychic disorders during their years of study, establishment of a student health center for such disorders is recommended.—K. J. Hartman.

9762. Friedman, Eitan; Shopsin, Baron; Sathananthan, Gregory & Gershon, Samuel. (New York U, Medical Ctr, Neuropsychopharmacology Research Unit) Blood platelet monoamine oxidase activity in psychiatric patients. *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1392-1394.—Measured monoamine oxidase (MAO) activity in blood platelets of 13 male and 10 female normal control Ss and 23 male and 15 female patients with schizophrenia or other psychiatric diagnoses. No differences were found among the groups as a whole. However, in the control group, women had significantly higher enzyme activity than men. Female schizophrenic patients showed a trend toward lower activity than did female control Ss, but did not differ from the male schizophrenic patients. It is suggested that platelet MAO activity may be related to hormonal, dietary, or genetic factors but not to psychiatric diagnosis. (23 ref)—*Journal abstract*.

9763. Frith, Uta & Frith, Christopher D. (MRC Developmental Psychology Unit, London, England) Specific motor disabilities in Down's Syndrome. *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 293-301.—Compared 17 children with Down's syndrome with 19 severely subnormal autistic children and with 23 normal children on 2 simple motor tasks (pursuit rotor tracking and finger tapping). It was hypothesized that Down's syndrome is associated with specific difficulties in using long-term motor programs and that mongoloid children may, therefore, be dependent on simple feedback processes to perform motor tasks. Results show that although the groups were matched on initial tracking performance, Down's syndrome children failed to show any improvement after a 5-min rest, while both comparison groups showed a very

marked improvement. On the finger tapping task, Down's syndrome children were abnormally slow compared to the other groups. Neither the level of mental development nor the degree of general mental retardation can account for these deficits. (26 ref)—*Journal summary*.

9764. Gabel, Peter. (U California, Ctr for the Study of Law & Society, Berkeley) Freud's death instinct and Sartre's fundamental project. *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 217-227.—Discusses a correspondence between Freud's death instinct and Sartre's fundamental project. Although divergent assumptions of the 2 thinkers are recognized, Freud's death instinct is seen to make man's life a futile passion, with happiness as the satisfaction of instinct forever out of reach. For Sartre, Being-in-itself-for-itself is unattainable. Both concepts seek the inanimateness of a thing, understood as For-itself or instinct. Contradictions are considered in terms of differences in methodology.—B. Smith.

9765. Gediman, Helen K. (Albert Einstein Coll of Medicine, Yeshiva U) Narcissistic trauma, object loss, and the family romance. *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 203-215.—Describes 2 cases of the family-romance fantasy, one of a man with a noticeable birth defect, the other of a woman adopted into an aristocratic family who suffered traumatic object losses. The fantasies served to restore self-esteem after disillusionment. The effect of the fantasy on transference and countertransference in the psychoanalytic training situation is discussed.—B. Smith.

9766. Glantrapani, Duilio. (Duke U, Medical Ctr, Asheville) Electroencephalographic findings in deaf psychotic patients. *Journal of Rehabilitation of the Deaf*, 1974(Apr), Vol 7(4), 14-21.—Studied the relationship between psychosis among deaf patients and EEG recordings. 26 Ss were selected from Chicago and the adjoining areas including the state hospitals. Criteria for inclusion were based on previous audiologic and psychiatric examinations. The most common EEG abnormality found in these records was excessive slow activity, proportionately distributed throughout the various deafness etiologies (unknown, rubella, hereditary, and other) except for scarlet fever which showed no EEG abnormality. The asymmetries noted occurred primarily in the temporal areas, while sharp wave activity was prevalent in the parietal areas. The 6 normal EEGs were observed among patients with a diagnosis of schizophrenia. Due to the small size of the sample, statistical tests were not carried out. It is concluded that there is a high percentage of organic involvement in patients with deaf psychotic symptomatology.—R. S. Albin.

9767. Goetzl, Ugo; Green, Ronald; Whybrow, Peter & Jackson, Rebecca. (Pennsylvania State U, Milton S. Hershey Medical Ctr) X linkage revisited: A further family study of manic-depressive illness. *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 665-672.—Conducted a family study of 39 individuals with proven manic-depressive disorder. Among the affected first-degree relatives of these probands, an overall parity of the male-female ratio was found. In addition, there were 4 instances of father-son transmission of affective illness involving probands of the sample. Results suggest that any gene locus that exists on the X chromosome is



not of itself a sufficient or necessary condition for the transmission of manic-depressive illness. Hence, any implication that X linkage is the primary mode of transmission in manic-depressive illness is premature. (27 ref)—*Journal abstract*.

9768. González, José L. & Quevedo, Gustavo. (Assn of Psychotherapy, Mexico City, MX) **Referential design of psychoses.** *Dynamische Psychiatrie*, 1973, Vol 6(6), 405-413.—Presents 3 theoretical models designed to conceptualize regressive phenomena and processes. They are based on Freud's theory of antithetic instincts, O. Rank's ideas on the trauma of birth, and M. Klein's school hypotheses on prenatal psychism and theories of "position." The psychotic reaction is understood as a regression which extends back into prenatal psychic life, a phase defined as fetal or manic position. 3 graphic illustrations show the importance of the fetal, depressive, and schizophrenic position for normal and pathological ego development. (German summary)—*T. Fisher*.

9769. Gunderson, John G. & Singer, Margaret T. (Harvard U, Medical School, Boston) **Defining borderline patients: An overview.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 1-10.—Reviews the literature, noting that accounts of borderline patients vary depending upon who is describing them and in what context, how the samples are selected, and what data are collected. 6 features are identified that provide a rational means for diagnosing borderline patients during an initial interview: the presence of intense affect, usually depressive or hostile; a history of impulsive behavior; a certain social adaptiveness; brief psychotic experiences; loose thinking in unstructured situations; and relationships that vacillate between transient superficiality and intense dependency. Reliable identification of these patients will permit better treatment planning and clinical research. (87 ref)—*Journal abstract*.

9770. Hartmann, Wolfgang & Pauls, Edlef. (U Göttingen, Psychiatrische Klinik, W Germany) **[A comparison between long term hospitalized and discharged schizophrenic patients regarding conditions on admission.]** (Germ) *Psychiatria Clinica*, 1974, Vol 7(1), 5-15.—Compared the case records of discharged and long-term hospitalized schizophrenic patients. It was found that the latter tended to be older, had been ill longer, had been isolated more often, were disadvantaged socially, and had been admitted to hospital compulsorily; they had been more frequently diagnosed as defect schizophrenics and less rarely had adequate physical treatment. It is concluded that long-term hospitalization is the final outcome of a long, drawn-out process which is decisively influenced by social factors. (26 ref)—*English abstract*.

9771. Häfner, H. & Böker, W. (U Heidelberg, Sozialpsychiatrische Klinik, W Germany) **[Mentally deranged persons committing acts of violence in the German Federal Republic: An epidemiological investigation.]** (Germ) *Nervenarzt*, 1972(Jun), Vol 43(6), 285-291.

9772. Horowitz, Mardil. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Stress response syndromes: Character style and dynamic psychotherapy.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 768-781.—Suggests that one way to organize clinical knowledge of psychopathology is to circumscribe a

limited area and describe within it the interactions between personality dispositions, states of disorder, and treatment techniques. This report models such an approach by limiting disorder to stress response syndromes, personality to obsessional and hysterical neurotic styles, and treatment to focal dynamic psychotherapy. Within this domain, an information processing approach to working through conflicted ideas and feeling is developed. The result is a series of assertions about observable behavior and nuances of technique. Since these assertions are localized conceptually, they can be checked, revised, refuted, compared, or extended into other disorders, dispositions, and treatments. (45 ref)—*Journal abstract*.

9773. Howard, James S. (Eastern State Hosp, Williamsburg, VA) **The anatomy of madness: Psychosis as functional hippocampal afterdischarge.** *Pavlovian Journal of Biological Science*, 1974(Oct-Dec), Vol 9(4), 208-214.—Presents a theoretical view of psychosis as hippocampal seizure and afterdischarge resulting from conditions of stressful stimulation and/or inhibitory disinhibition. Key anatomical structures involved and their dynamic interrelationships in health and psychosis are discussed. Several pathological physical conditions and certain types of autostimulatory behavior are seen as contributing to this condition or perpetuating it.—*Journal abstract*.

9774. Jacob, Theodore. (U Pittsburgh) **Family interaction in disturbed and normal families: A methodological and substantive review.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 33-65.—Evaluated 57 direct observation studies comparing family interaction in disturbed (schizophrenic and nonschizophrenic) and normal families. Major sections of the review include (a) a critical evaluation of the methodological adequacy of reviewed studies in terms of various design standards and controls; (b) an extensive review of substantive findings relevant to the content domains of dominance, conflict, affect, and communication clarity; and (c) a discussion of difficulties involved in comparison of results because of cross-study differences in diagnostic status of experimental groups, measurement techniques, type of analyses, and demographic factors. It was found that both social class status and age of child were significantly associated with various measures of conflict and dominance, and in many cases, obtained relationships were influenced considerably as a function of a Social Class  $\times$  Child's Age interaction. (110 ref)—*Journal abstract*.

9775. Jha, B. K. (Hosp for Mental Diseases, Ranchi, India) **Institutional neurosis: Its causes and remedy.** *Indian Journal of Psychiatric Social Work*, 1972(Jul), Vol 1(1), 5-19.—Describes the clinical features of institutional neurosis and its diagnosis, etiology, treatment, and prevention in a mental hospital. Characterized by apathy, lack of initiative, loss of interest in things and events, submissiveness, and deterioration of personal habits and standards, the disease develops and exists independently of the syndrome for which the patient was hospitalized. It is caused by lack of contact with relatives, friends and the outside world, enforced idleness, and a depressing atmosphere. Treatment and prevention consist of improving hospital conditions and

policies to allow for outside contact, in-hospital rehabilitative employment, maintenance of family relationships, and a cheerful, attractive environment. It is suggested that an aftercare program for dismissed patients should be provided. (23 ref)—*A. de la Haba.*

9776. Jordan, J. M. & Whitlock, F. A. (U Queensland, Brisbane, Australia) **Atopic dermatitis anxiety and conditioned scratch responses.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 297-299.—Tested the hypothesis that patients suffering from atopic dermatitis form a conditioned scratch response more rapidly than a matched control group, the main concern being anxiety level. 6 male and 12 female patients with a diagnosis of atopic dermatitis and a matched control group were presented an itch stimulus paired with a neutral stimulus (a tone). Previous differences in number of trials required to condition a scratch response to the tone disappeared when the groups were matched on the Welsh Anxiety Scale.—*W. G. Shipman.*

9777. Kaplan, Linda J. (Private practice, New York, NY) **The concept of the family romance.** *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 169-202.—Discusses the family-romance fantasy, the fantasy of being the child of other parents usually of higher standing, as manifested developmentally and sublimated in everyday life. Precipitated by inevitable disillusionment with real parents, the family-romance fantasy is an attempt to regulate self-esteem. In the pre-oedipal phase, the child feels that his affection for his parents is not fully reciprocated; during the oedipal phase, the threat of retaliation for incestuous wishes is relieved through fantasized substitute parents; during latency and adolescence, rescue fantasies develop. Pathological manifestations are related to etiology, symptomatology, affectual correlates, and defensive character structure. Special forms of the family-romance fantasy in the artist and imposter are discussed. (53 ref)—*B. Smith.*

9778. Koh, Soon D.; Kayton, Lawrence & Schwarz, Carolyn. (Michael Reese Hosp, Psychosomatic & Psychiatric Inst, Chicago, IL) **The structure of word storage in the permanent memory of nonpsychotic schizophrenics.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 879-887.—Conducted 2 experiments to assess the storage structure of common English words in the memory of young nonpsychotic schizophrenics. 37 schizophrenic and 12 nonschizophrenic psychiatric patients and 36 normals were Ss in the 2 experiments. Ss in both experiments sorted words on the basis of the similarity of relatedness they perceived, but Ss in Exp II performed this task under time pressure. Assuming that the structure underlying these sortings reflects the storage structure of memory, a method of cluster analysis was applied to the data. The structural features extracted for all Ss were very similar to each other. A group difference was found in the S's sorting strategy, but its effect on the main findings was minimal. It is concluded that the storage structure of words in the memory of schizophrenics is probably intact. (19 ref)—*Journal abstract.*

9779. Kurtz, Helen & Davidson, Samai. (Kupat Cholim Mental Health Clinic, Haifa, Israel) **Psychic trauma in an Israeli child: Relationship to environmental security.** *American Journal of Psychotherapy*,

1974(Jul), Vol 28(3), 438-444.—Describes the etiology, dynamics, and therapy of a case of somnambulism in an 11-yr-old child who underwent a trauma following the injury of his father in an Israeli security operation. Implications of this case for the theory of the "constructive trauma" are discussed.

9780. Larson, C. A. & Nyman, G. E. (U Lund, Inst of Genetics, Sweden) **Schizophrenia: Outcome in a birth year cohort.** *Psychiatry Clinica*, 1974, Vol 7(1), 50-55.—Studied a birth year cohort of 153 schizophrenic men for the original purpose of securing the unbiased age of onset of the disease. Secondly, data on 748 full siblings of the Ss were collected. Ss were from southern Sweden, had been hospitalized for schizophrenia, and were born between 1881 and 1900. All available hospital records of siblings, parents, and Ss were examined to assess type, course, and outcome of disease. Findings indicate that poor prognosis was significantly more common in men with early onset of schizophrenic symptoms than in men with late manifestations. 90 Ss not observed to be demented had a mean age of onset of schizophrenia of 38.7  $\pm$  12.9 yrs, while 63 Ss who became demented had a mean age of onset of 31.2  $\pm$  10.8 yrs. Homotypy for outcome was not observed within schizophrenic families. Results indicate that Ss experienced poor or favorable outcome independently of presence or absence of regressive schizophrenia in siblings or parents.—*Journal abstract.*

9781. Lehrman, Samuel R. (Private practice, Hewlett, NY) **Varieties of depression in one patient.** *Psychiatric Quarterly*, 1974, Vol 48(2), 283-294.—Presents the case history of a 28-yr-old woman who, during 25 yrs, presented various types of depression. It is theorized that all depressions are overdetermined psychosomatic diseases with both psychic and organic causes, and that different varieties of depression necessitating different therapeutic approaches may occur in a single patient under different conditions.—*Journal abstract.*

9782. Lesse, Stanley. **Depression masked by acting-out behavior patterns.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 352-361.—Discusses masked depression which may be revealed by probing behind psychosomatic disorders, hypochondriacal syndromes, or various other behavior problems. In this type of pattern, the psychosomatic or hypochondriacal symptoms or behavioral disturbances are masking an active depression with the depressive core being just beneath the surface. In addition, patients with these symptoms relatively early in life are most likely to develop depressions, particularly from age 40 on. Acting-out patterns masking depression in infants, children, adolescents, and adults are discussed. Patients with masked depression are almost without exception extremely angry persons. The treatment of these problems is briefly discussed. (18 ref)—*R. S. Albin.*

9783. Letourneau, Jacques E. (U Montréal, Ecole d'Optométrie, Québec, Canada) **The Oppel-Kundt and the Müller-Lyer illusions among schizophrenics.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 775-778.—Compared errors of 5 paranoid schizophrenics (age range, 40-57 yrs) and 5 simple schizophrenics (age range, 31-60 yrs) on Oppel-Kundt and Müller-Lyer illusions. Significant differences between groups were found on



the Oppel-Kundt but not on the Müller-Lyer. Results are discussed in terms of Piaget's theory and defensiveness. —*Journal abstract.*

9784. Markson, Elizabeth W. (Massachusetts Dept of Mental Health, Boston) **A touch of class? A case study of geriatric screening process.** *International Journal of Aging & Human Development*, 1974(Spr), Vol 5(2), 187-196.—Examined 174 diagnoses and geriatric screening decisions for mental disorders made at a New York State institution over a 7-mo period. The geriatric screening team established criteria for admission which defined hospitalization as appropriate for treatment of acute episodes of mental illness or emotional disturbance, for exacerbations of psychiatric illness unrelated to the normal course of aging, and for temporary relief of a social problem within the family. Patients were banned from admission whose prime reason for referral was physical illness, senility with no psychiatric illness other than that associated with the aging process, and for social reasons, such as a lack of housing. Analysis of decisions indicates rejection of a higher proportion of patients with functional illness and of a lesser proportion of those with organic illness. More old people of the same ethnic origin and sex as the screening examiner were designated as suitable for inpatient care than applicants of a different sex and ethnic origin. Implications of these findings for the control of persons needing mental health care are discussed. (16 ref)—*A. J. Traxler.*

9785. Masciangelo, Pier. ["Ethical perversion": A view of the masochistic complex.] (Ital) *Rivista di Psicoanalisi*, 1973(Jan-Apr), No 19, 65-84.—Explains the origins of masochistic attitudes—ethical perversion—by which the individual finds satisfaction in depriving himself of pleasure. (23 ref)

9786. McLaughlin, Thomas J.; Solomon, Leonard & Harrison, Robert. (VA Hosp, Psychophysiology Lab, Bedford, MA) **The use of feedback electroencephalography to assess levels of attention and motivated interests in paranoid and nonparanoid schizophrenics.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 422-432.—Presents a report of a preliminary evaluation of the method of feedback EEG to assess levels of attention and motivated interests in schizophrenics. The alpha-blocking component of the orienting response was the main dependent variable used to define interest and motivation. Presentation of the pictorial stimuli was regulated by the presence of alpha in the EEG (negative feedback). 2 hypotheses of the motivational conflicts responsible for the paranoid's illness are examined—the traditional Freudian explanation of repressed homosexuality, and the psychosocial view of an unstable sense of autonomy and need for power and control. Data from 24 paranoid and nonparanoid 18-45 yr old schizophrenics indicate that poor premorbid nonparanoids engaged in less spontaneous attentiveness than good premorbid paranoids. This finding supports Freud's thesis that the regressed nonparanoid has withdrawn his interest from the environment. Data do not confirm the vigilance hypothesis of paranoid schizophrenia, although a trend for poor premorbid to be more attentive than good premorbid suggests the need for more study of attentional differences. Results also do not support hypotheses of the specific motiva-

tional conflicts responsible for the paranoid's illness. (32 ref)—*Journal abstract.*

9787. Micklem, Niel. **On hysteria: The mythical syndrome.** *Spring*, 1974, 147-165.—Discusses various aspects of hysteria as it has been regarded throughout the centuries from the earliest mythology when Dionysus was thought to be the archetype of hysteria, through the feasts called "the Hysteria" honoring the mother-Goddess to present times. It was believed for a long time to be exclusively a feminine illness, but later it was discovered that men also suffer from this syndrome. Physicians have differed on its definition, and in 1952 eliminated it from the American classification of illness, substituting "conversion symptom." Some reasons for re-examining the concept "hysteria" are suggested.—*A. de La Haba.*

9788. Morrison, James K. (Capital District Psychiatric Ctr, Cohoes, NY) **Labeling: A study of an "autistic" child.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 71-80.—Describes the case of a 10-yr-old autistic boy to demonstrate the drastic effects of "psychiatric labeling" on the social status of and behavior toward a child, which inevitably results in negative behavioral changes. It is suggested that the use of such labels (i.e., "autistic") by the parents to significant others in the child's environment influences these persons to view the child in a similar framework of ignorance. How dramatic behavioral changes were induced in the child after introducing his parents and significant others to the principles of cognitive learning theory is outlined. (Spanish & French abstracts)—*Journal abstract.*

9789. Munroe, Robert L. & Munroe, Ruth H. (Pitzer Coll) **Psychological interpretation of male initiation rites: The case of male pregnancy symptoms.** *Ethos*, 1973(Win), Vol 1(4), 490-498.—Studied the incidence of sympathetic pregnancy symptoms among males in societies with and without initiation rites. It is suggested that the absence of male initiation rites in cultures in which primary infantile identification is with the female role can have serious psychological consequences for the individual. (2 p ref)

9790. Mura, Elaine L. (Pahlavi U, Shiraz, Iran) **Perinatal differences: A comparison of child psychiatric patients and their siblings.** *Psychiatric Quarterly*, 1974, Vol 48(2), 239-255.—Results of a comparison study of 74 child psychiatric inpatients and their own nonpsychiatrically disturbed siblings ( $n = 74$ ), shows that the mothers had experienced more pregnancy and delivery complications with the patients than with the siblings. Analyses of groups by sex suggest that most of these differences were contributed by the male patients rather than by the female patients. No perinatal differences among the patients were found when patients were divided by diagnoses. (25 ref)—*Journal abstract.*

9791. Murphy, Dennis L. & Beigel, Allen. (NIMH, Bethesda, MD) **Depression, elation, and lithium carbonate responses in manic patient subgroups.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 643-648.—Depressive elements were observed on a quantitative behavioral rating scale (the Manic-State Rating Scale) during manic episodes in 28 of 30 patients, suggesting that most manic patients manifest a "mixed" manic-depressive picture. A factor analysis of the scale

confirmed a "core" group of manic symptoms as well as a dichotomous grouping of elated-grandiose (E-G) and paranoid-destructive (P-D) patients. It also suggested a close relationship between the presence of rated depression during mania and the particular symptomatic complex found in the P-D subgroup of manic patients. Elation ratings were significantly correlated with total mania scale ratings only in the E-G patients. These differences had apparent relationships to therapeutic responses to lithium carbonate; manic patients in the E-G subgroup responded more frequently than did patients in the P-D subgroup. (22 ref)—*Journal abstract*.

9792. Murphy, Dennis L.; Donnelly, Cynthia & Moskowitz, Jay. (NIMH, Section of Clinical Neuropharmacology, Bethesda, MD) **Catecholamine receptor function in depressed patients.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1389-1391.—Compared the effects of norepinephrine on catecholamine alpha receptors in platelets obtained from 17 bipolar and unipolar depressed patients and from 11 normal Ss. No differences were found, although reduced catecholamine receptor function has been suggested as one specific mechanism to account for a deficit in catecholamine function in depression. (26 ref)—*Journal abstract*.

9793. Müller, E. (U Vienna, Psychological Inst, Div of Experimental & Applied Psychology, Austria) **[On the objectivization of the symptom "impaired facial recognition": An experimental-psychological study of psychiatric-neurological groups of patients.]** (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(2), 126-144.—Investigated impairment of facial recognition in 60 right-handed Ss 16-60 yrs old, none affected by any kind of drugs. Ss were tested in 4 groups: 15 with paraphrenic and 15 with predelirant syndromes, 15 with lesions in the right hemisphere and 15 normal controls. Ss were shown 102 photographs and asked to match a given photograph to 1 out of a group of 16. Each S with a lesion in the nondominant right hemisphere was also tested for self-recognition by being shown his own photograph in the test series. In "Identi-Kit" tests, Ss were required to construct a phantom likeness of themselves and of a person well known to them—usually one of the participating physicians. Several other tests were also administered. Results indicate the following: (a) Ss with paraphrenic and predelirant syndromes performed significantly worse than normal controls in tasks of facial recognition. (b) Performance of Ss with lesions in the right hemisphere was as poor as that of the psychotics. (c) Ss with brain lesions and healthy controls were able to construct phantom pictures of their own faces, while Ss in the 2 psychotic groups were not. Findings suggest that agnosia for faces in psychotics cannot be ascribed to memory disorders but is caused by a perceptual deficiency. (English summary)—*T. Fisher*.

9794. Müller, Ilse. (Fachkrankenhaus für Neurologie und Psychiatrie, Berlin, E Germany) **[False evaluation of the personality with questionnaire investigations.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Apr), Vol 26(4), 223-230.—Reports that neurotic patients show a tendency for their overt behavior to contradict their positive opinions of themselves as revealed by medical questionnaires.

9795. Müller, Karl. **[Remarks on the so-called pure defect.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Apr), Vol 26(4), 202-210.—Discusses G. Huber's attempted differentiation of schizophrenic defects in his search for a "pure defect" which is to represent the essence of all genuine schizophrenic defective syndromes.

9796. Naditch, Murray P.; Gargan, Margaret A. & Michael, Laurie B. (Cornell U) **Denial, anxiety, locus of control, and discrepancy between aspirations and achievements as components of depression.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 1-9.—Reformulated a number of clinical observations about depression to test them empirically, using multiple regression equations. Ss were 547 men in Army basic training. Psychological measures included the Depression subscale of the Cornell Medical Index, Rotter's Internal-External Control Scale, the Institute for Personality and Ability Testing Anxiety Scale, N. Hahn's denial measure, and the Cantril Self-Anchoring Striving Scale. Depression was negatively correlated with denial and positively correlated with anxiety, locus of control, and the discrepancy between aspirations and achievements (discontent). Locus of control was positively correlated with discontent and anxiety and negatively correlated with denial. There were interaction effects between locus of control and discontent, between locus of control and anxiety, and between anxiety and denial when these terms were regressed on depression. (34 ref)—*Journal abstract*.

9797. Nastović, Ivan. (Neuropsychiatric Clinic, Belgrade, Yugoslavia) **[Psychodynamic aspects of neurotic depersonalization.]** (Serb) *Anali Zavoda za Mentalnu Zdravlje*, 1972, Vol 4(3), 75-83.

9798. Newmark, Charles S.; Newmark, Linda & Faschingbauer, Thomas R. (U North Carolina, Medical School, Chapel Hill) **Utility of three abbreviated MMPIs with psychiatric outpatients.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 438-443.—Presents evidence substantiating the need for an abbreviated form of the MMPI and reports a study of the comparative utility of 3 recently developed abbreviated MMPIs with data from the records of 65 male and 65 female 17-58 yr old psychiatric outpatients. The similarity of the group profiles within each sex as well as the highly significant scale correlations suggest that each of the 3 abbreviated MMPIs corresponds fairly accurately to the standard form for these Ss as a group. However, investigations of the profile pairs for individual Ss consistently found that T. R. Faschingbauer's abbreviated MMPI permitted the most accurate conclusions concerning the validity, high points, and general elevation of the corresponding standard MMPI. Numerous deficiencies were evident when using either the Mid-Mult or J. A. Hugo's abbreviated MMPI, especially with regard to classification analysis concerning validity.—*Journal abstract*.

9799. Niskanen, Pekka & Rath, Fredrich. (Helsingin Yliopistollinen Keskussairaala, Psykiatrian Klinika, Lapinlahdentie, Helsinki, Finland) **[Changes in the forms of depressive psychoses: Investigation of 90 years of cases (1880-1971) at the psychiatric clinic of the University of Helsinki.]** (Germ) *Psychiatrie, Neurologie*



und medizinische Psychologie, 1974(Jun), Vol 26(6), 332-343.—Analysis of medical records shows that the specific primary criteria of diagnosis of depressive psychosis changed only slightly from 1880 to 1971, but the secondary criteria have changed considerably. Average duration of hospitalized treatment has been reduced from 142 to 52 days. Religious hallucinations and feelings of guilt usually accompanied depressive psychosis until about 1930. However, suicidal tendencies and attempted suicides have doubled since 1900. Further relations between Zeitgeist and psychic ills are noted.—K. J. Hartman.

9800. Öhman, Arne; Erixon, Gösta & Löfberg, Ingrid. (Uppsala, Sweden) **Phobias and preparedness: Phobic versus neutral pictures as conditioned stimuli for human autonomic responses.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 41-45.—Exposed 64 undergraduates to pictures of phobic (snakes) and supposedly neutral (human faces or houses) objects as conditioned stimuli (CSs) in a classical conditioning experiment with shock as the unconditioned stimulus (UCS) and skin conductance responses as the dependent variable. One group was shocked on the phobic and another on one of the neutral sets of pictures. During 10 acquisition trials both groups showed equal conditioning on CS and pre-UCS responses. During extinction, however, there were lasting conditioning effects in CS and, to a lesser extent, post-UCS responses to phobic but not to neutral stimuli. Instructions that no more shocks would be given seemed ineffective in modifying CS, but not post-UCS, responses. It is concluded that the present experimental situation may serve as an experimental analog of phobias.—*Journal abstract.*

9801. Odegard, Ornulf. **Season of birth in the general population and in patients with mental disorders in Norway.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 397-405.—Compared the monthly distribution of births in 62,190 psychiatric hospital patients with the corresponding pattern in the general population of Norway. The number of births per day varied in a sinusoidal curve between a maximum in January-May and a minimum in October-December. There was an additional, more sharply defined peak in September which was interpreted as corresponding to a maximum of conceptions during traditional midwinter festivals. Data from a controlled comparison of the years of birth are presented which show that schizophrenic patients had significantly higher monthly birth fluctuations than either the general population or other psychiatric diagnostic groups. The September maximum, however, was the same in all patient groups and in the general population. Findings are consistent with the existence of complex sociobiological differences between schizophrenics and the general population which are dependent on seasonal variations. Subclinical brain damage is suggested as the most likely pathological mechanism.—*Journal summary.*

9802. Pasricha, S. **Pattern of personality in normals, anxiety neurotics and schizophrenics on Guilford's STDCR.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 29-33.—Administered the Yatabe-Guilford Personality Inventory to 30 anxiety neurotics, 30 schizophrenics, and 30 controls to investigate patterns of personality traits among groups. The inventory is a

modification of Guilford's An Inventory of Factors STDCR, consisting of 120 items measuring 12 factors. Ss were males, matched for age and education levels. Results indicate that factors S, T, D, C, R, I, N, O, Ag, and Co significantly differentiate between neurotics and controls; factors D, C, A, I, N, O, Ag, and Co differentiate between schizophrenics and controls; and factors C, G, A, and N significantly differentiate between neurotics and schizophrenics. The resulting patterns are considered useful in differential diagnosis.—F. S. Beyer.

9803. Pershad, D.; Kaushal, P. & Verma, S. K. (Postgraduate Inst of Medical Education & Research, Chandigarh, India) **Neuroticism scores of mothers of mentally retarded and of neurotic children.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 24-27.—Administered a 38-item Hindi Health Questionnaire to the mothers of 25 mentally retarded children and of 21 emotionally disturbed children attending a child guidance clinic. The mothers of mentally retarded children were found to be more emotionally disturbed—i.e., more neurotic—than the mothers of emotionally disturbed children ( $p < .05$ ).

9804. Pethő, Bertalan. (Oberarzt und Leiter des Psychopathologischen Lab, Budapest, Hungary) [Some significant aspects of the nosology of the schizophrenia question: Contributions I, II, and III.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 321-331.—Discusses contrasting historical developments in the classification of schizophrenia. The prevailing psychogenetic interpretation has enlarged symptomatology until schizophrenia can be found everywhere. A minority opinion is that a clear-cut and unmistakable definition of the disease is possible.

9805. Pethő, Bertalan. (Psychopathologischen Lab, Budapest, Hungary) [Significant nosological aspects of the schizophrenia problem: Report on the development and role of psychiatric diagnoses oriented toward brain pathology.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Apr), Vol 26(4), 211-216.—Traces development of classificatory systems related to brain pathology and schizophrenia. Contributions of C. Wernicke, K. Leonhard, and others are reviewed. Search for an ideal system of ordering symptomatology in schizophrenia has been actively pursued in German psychiatry for 70 yrs.—K. J. Hartman.

9806. Platt, Jerome J. et al. (Hahnemann Medical Coll & Hosp, Philadelphia, PA) **Adolescent problem-solving thinking.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 787-793.—Tested the hypothesis that adolescent psychiatric patients would be deficient with respect to normal controls in their interpersonal problem-solving skills by comparing 33 patients and 53 high school student controls on 7 tasks reflecting different aspects of problem solving. With IQ covaried out, controls obtained significantly higher scores on the tasks evaluating optional thinking, social means-ends thinking, and role taking, but not on the tasks measuring problem recognition, causal thinking, emotional means-ends thinking, and consequential thinking. Findings are interpreted within a developmental framework of interpersonal problem-solving thinking. (27 ref)—*Journal abstract.*

9807. **Resta, Giorgio.** (U Genoa, Medical School, Inst of Psychology, Italy) [The problem of classifying the interactions which condition human development.] (Ital) *Medicina Psicosomatica*, 1972(Oct), Vol 17(4), 353-366.—Emphasizes the importance of various interactions during early developmental stages. Interactions are both pre- and postnatal, organic and inorganic. It is suggested that psychosomatic phenomena may originate in such interactions. (English & French summaries)

9808. **Rutter, Michael et al.** (Inst of Psychiatry, London, England) **Children of West Indian immigrants: I. Rates of behavioural deviance and of psychiatric disorder.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 241-262.—Conducted a survey of all 10-yr-old children in an inner London borough. Teachers' questionnaires were completed on all children, and teachers and parents of a representative subsample of 383 children were interviewed using standardized and previously tested methods. Comparisons were also made between children born to West Indian migrants and children from nonimmigrant families, and within the West Indian group between children born abroad and those born in the country. It was found that West Indian children showed more behavioral difficulties at school, but they did not differ from other children in terms of disorder shown at home, nor did they differ in terms of emotional disturbance in any setting. (30 ref)—*Journal summary.*

9809. **Sargent, Douglas A.** (Grosse Pointe Farms, MI) **Confinement and ego regression: Some consequences of enforced passivity.** *International Journal of Psychiatry in Medicine*, 1974(Spring), Vol 5(2), 143-151.—Notes that imprisonment and enforced passivity cause ego regression which may persist even after release from confinement. Steps are suggested to diminish the apparent antagonism between confinement and rehabilitation. Clinical examples are drawn from cases seen in the federal prisons, juvenile courts, and hospitals.—*Journal summary.*

9810. **Schless, Arthur P.; Schwartz, L.; Goetz, Christopher & Mendels, J.** (U Pennsylvania) **How depressives view the significance of life events.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 406-410.—Administered the Social Readjustment Rating Scale (SRRS) by T. H. Holmes and R. H. Rahe and the Beck Depression Inventory to 76 patients consecutively admitted to a hospital with diagnoses of depression. All Ss were tested on admission and again at discharge. Neurotic depressed patients viewed life events as uniformly more stressful than a comparison group of nondepressed Ss. The weights assigned to the 43 individual life events in the SRRS were independent of the patient's age, sex, severity of depression, whether S had actually experienced the event, and symptomatic improvement.—*Journal summary.*

9811. **Sen, N. N.** (National Inst of Education, New Delhi, India) **Behavior therapy in depressions: I. Experimental analysis.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 53-58.—Discusses the experimental analysis of depression in terms of classical conditioning, operant conditioning, and learning theory models. Relevant experimental findings of each model and resulting views of clinical depression are presented,

emphasizing their significance for the behavior therapist. It is suggested that although these approaches do not provide a comprehensive theory of depression, since many issues are neglected, they do provide a useful framework for the analysis and treatment of depressive behavior. (15 ref)—*F. S. Beyer.*

9812. **Serban, George.** **The process of neurotic thinking.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 418-429.—Discusses neurotic conflict on a cognitive level as resulting from a selective faulty system of reasoning based on magical convictions and beliefs. The neurotic modifies his thinking based on inferential assumptions. The roots of this problem are traced back to childhood when judgment is magical and self-centered. Several case examples are presented. The content of consciousness in the general state of anxiety neurosis is also discussed. In this state, the neurotic feels the constant threat of some impending, perhaps fatal catastrophe. Unable to assess the gap between existing realities and wishful possibilities, he mistakes the physical dysfunctions produced by his anxiety for the cause of his suffering. The therapeutic approach is based on the correction of the thinking process by a reformulation and reorganization of it according to adult reality.—*R. S. Albin.*

9813. **Sermet, O.** (Welsh National School of Medicine, Cardiff) **Emotional and medical factors in child dental anxiety.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 313-321.—Studied 100 dentally anxious and 100 dentally nonanxious 5-12 yr old children to examine the etiology of child dental anxiety, particularly the role of emotional and medical factors in this respect. Information was obtained about Ss through a semistructured interview with the mother and by her completion of Rutter's Child Scale A Questionnaire. Results show significant differences between the 2 groups of children in their emotional disorders and their medical experiences. Since the scale provided information only on the child's behavior as seen by the parent and since it has been shown that a child's behavior at home and at school differ strikingly, it is suggested that it would also have been valuable to have the teacher's independent ratings.—*Journal summary.*

9814. **Shapiro, Theodore.** (New York U. Medical School) **Language development in young schizophrenic children: Direct observation as a constraint on constructions in analysis.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 175-187.—Compared the speech of 8 schizophrenic children ranging in age from 2 to 7 yrs with the speech of control groups of normally developing 4, 3, and 2 yr olds. 2 dimensions of speech, morphology (e.g., babbling, jargon, words, phrases) and function (communicative or noncommunicative), were analyzed. It was found that the schizophrenic Ss produced as many utterances as normal Ss, but that each utterance was shorter, and that a sizeable proportion of the schizophrenic Ss' speech was out of context. Schizophrenic Ss produced rigidly congruent imitative speech, while control Ss produced structurally creative imitations. It is concluded that the rigidity and nonadaptiveness of the schizophrenic child's speech are behavioral reflections of a rigid, poorly integrated ego. It is suggested that



therapeutic interpretations should be given to schizophrenic children only in short, simple, and repetitive phonetic and syntactic forms. (1 p ref)—*J. Kelly.*

9815. **Sharma, R. G.** (Hosp for Mental Diseases, Ranchi, India) **Psycho-sexual hazards of I.U.C.D. insertion.** *Indian Journal of Psychiatric Social Work*, 1972(Jul), Vol 1(1), 36-41.—Investigated the psychosexual complications following intrauterine contraceptive loop insertion in 72 women. Psychosomatic symptoms including abdominal pain, nausea, vomiting, and backache were observed as well as mild psychological symptoms. A decrease in sexual desire occurred in 36% of Ss.

9816. **Smythies, J. R.** **The biochemical basis of schizophrenia.** *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 5-8.—Proposes that "real" schizophrenia must have some genetic biochemical abnormality or, more probably, a collection of different inborn errors of metabolism, since "schizophrenia" is probably a group of diseases with different etiologies. 2 "established facts" are discussed: (a) the acutely psychotic reaction, experienced by 40% of chronic schizophrenics, to 20 g/day levomethionine—involving a transmethylation effect of levomethionine on dimethyltryptamine; and (b) the antipsychotic action of the phenothiazines and pimozide suggesting overactivity of adrenergic or dopamine systems in schizophrenia.—*D. J. Clair.*

9817. **Sollini, Adriano.** **[A clinical contribution to the study of the role of the scopophilic impulse in the psychopathology of the sense of identity.]** (Ital) *Rivista di Psicoanalisi*, 1973(Jan-Apr), No 19, 43-64.—Notes that the frustration of oral needs, responsible for the disturbance in early object relations, constitutes a hindrance to the development of the identification process and to reality orientation. In defensive reaction to oral anxiety, the relationship with the object develops by using the psychosensory visual area. The use of pathological identifications and/or of regressive imitations produces a false identity with unbalanced perception of environmental elements. This dynamic magnifies the visual value in the internalization process. (19 ref)—*D. Araoz.*

9818. **Spitzer, Robert L. & Fleiss, Joseph L.** (New York State Dept of Mental Hygiene at the Psychiatric Inst, Biometrics Research, New York) **A re-analysis of the reliability of psychiatric diagnosis.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 341-347.—Discusses some of the difficulties in evaluating diagnostic reliability, presents a reanalysis of available data from the literature, and suggests possible actions that can be taken to increase the accuracy of psychiatric diagnosis. Methods of calculating the degree of interjudge agreement are described, and the validity of the resulting statistic, kappa, an intraclass correlation coefficient which contrasts the observed proportion of agreement with the proportion expected by chance, is discussed. The calculation of kappa, chance corrected agreement, is performed for 6 major studies of diagnostic reliability. Data suggest that there are no diagnostic categories for which reliability is uniformly high; reliability appears to be satisfactory only for 3 categories—mental deficiency, organic brain syndrome (not its subtypes), and alcoholism. 2 new procedures which may improve the reliability of diagnosis, structured interview schedules and specifi-

cations of all diagnostic criteria, are described. (28 ref)—*L. Gorsey.*

9819. **Sternberg, E.** (USSR Academy of Medical Sciences, Inst of Psychiatry, Moscow) **[On the present state of research into schizophrenia and some of its current tasks.]** (Germ) *Fortschritte der Neurologie, Psychiatrie und ihrer Grenzgebiete*, 1973(Mar), Vol 41(3), 123-140.—Surveys and discusses recent developments and trends in the field of schizophrenia research, particularly those which are of interest and importance for the research projects of the Psychiatric Institute of the Soviet Academy of Medical Sciences in Moscow. (1 p ref)—*T. Fisher.*

9820. **Stettner, John W.** (McCormick Theological Seminary, Chicago, IL) **What to do with visions.** *Journal of Religion & Health*, 1974(Oct), Vol 13(4), 229-238.—Discusses reports about visions (psychoses?) that A. Boisen and Jung experienced and compares them to Biblical records of similar experiences. It is suggested that hallucinatory ideas arise primarily from the unconscious and that they be integrated into other life experiences.

9821. **Symonds, Martin.** (American Inst for Psychoanalysis, New York, NY) **Therapeutic approaches to acting out.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 362-368.—Presents a theoretical framework for acting-out behavior that specifies the history of the usage of the term, the psychoanalytic view of such behavior, and current sociological usage. Both the dynamics and therapeutic approaches to adolescents whose acting out is characterized as delinquent and antisocial are discussed. Individuals who act out are viewed as totally absorbed in their own needs; to them the behavior appears totally unrelated to other individuals or to feelings toward them. Illustrative case examples are cited. Profoundly defective parenting seems to be a significant factor in the development of the acting-out youngster. In a climate of hopelessness and despair, a youngster begins to live only in the immediate present with no thought of the future. He becomes egocentric and unrelated to other individuals and their needs. It is stressed that the therapist needs to be firm and to make his attitudes, values, and particularly his boundaries known to the youngster.—*R. S. Albin.*

9822. **Thuwe, Inga.** (U Göteborg, Psychiatric Research Ctr, St Jörgen's Hosp, Sweden) **Genetic factors in puerperal psychosis.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 378-385.—Reports data obtained for the period from 1872-1926 which show that a record of mental illness or psychiatric treatment was significantly more common among children of women who had been treated for puerperal psychosis than among controls selected from the population register in Sweden. The same tendency was also evident in the grandchild generation, but the differences did not reach statistical significance. Social-class, suicide-rate, and cause-of-death data are also presented. Findings support the existence of genetic factors in the general category of puerperal psychoses. No particular pattern of major genes could be identified; however, the fairly high risk of mental illness in the 1st filial generation suggests that dominant transmission plays some part in the operation of the genetic factors.—*L. Gorsey.*

9823. Todd, N. A. (Leverndale Hosp, Glasgow, Scotland) **Patterns of admission in schizophrenia.** *British Journal of Psychiatry*, 1974(Dec), Vol 125, 588-592.—Presents data on long-term male patients admitted, readmitted, or recruited to a 1,036-bed psychiatric hospital during 1967-1970. Results show that 83% of the male schizophrenics were readmissions suffering from relapses or continuing illnesses. Follow-up of the first admissions indicated that there were approximately equal numbers of patients in 3 clinical categories (social recovery, mild or moderate disability, and moderate or severe disability) living outside the hospital, and smaller numbers who were long-term inpatients. A majority of the patients showing the highest degrees of clinical and social recoveries were not receiving treatment, while a majority of those who were most deteriorated were receiving or at least being prescribed medication. Findings emphasize the strong influence of the "natural course" of the illness on which physical and psychological treatment and social manipulations attempt to operate with varying degrees of success. (15 ref)—*Journal summary*.

9824. Tucker, Gary J.; Campion, Edward W. & Silberfarb, Peter M. (Dartmouth Coll, Medical School) **Sensorimotor functions and cognitive disturbance in psychiatric hospitals.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 17-21.—Studied 109 consecutive admissions to an acute psychiatric unit in a general hospital to determine the relationship of specific sensorimotor impairments to cognitive disturbance. Ss were assessed on results of the Goldstein-Scheerer Object Sorting Test and the Halstead Tactual Performance Test, a battery of symptom and diagnostic scales, routine and neurological history, and clinical interviews. Results indicate a strong but not exclusive correlation between neurological impairment and thought disorder as well as between neurological impairment and schizophrenia. Theoretical and etiological implications are discussed, as well as the relationship of these findings to other variables. (32 ref)—*Journal abstract*.

9825. Tuteur, Werner. (Loyola U, Chicago) **Dialogue in Dallas: Psychiatric examination of Jack Ruby.** *MH*, 1974(Spring), Vol 58(2), 6-10.—Presents findings and conclusions of a psychiatric examination of Jack Ruby, defendant in the death of Lee Harvey Oswald, assassin of the late President Kennedy. Diagnosis was that Ruby was suffering from schizophrenic reaction, paranoid type, could not differentiate between friend and foe and was judged to be incompetent to stand trial.

9826. Uhlenhuth, Eberhard H.; Lipman, Ronald S.; Balter, Mitchell B. & Stern, Martin. (U Chicago) **Symptom intensity and life stress in the city.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 759-764.—Studied relationships among self-rated symptom intensity, life stress of recent undesirable events, and demographic characteristics in a probability sample of 735 18-65 yr old urban adults. Symptom levels were assessed with the Hopkins Symptom Checklist, and life stress was measured with a questionnaire by E. S. Paykel et al. Higher symptom intensities were reported by women, the unmarried, whites, persons under medical care, the youthful, persons of lower social class, and those who experienced more life stress. Higher stress was

experienced by the unmarried, whites, persons under medical care, and the youthful. With effects controlled for one another, symptom intensity was associated only with sex, health care status, social class, and life stress. Results suggest higher life stress accounts partly for the higher symptom intensities among the unmarried, white, and youthful. Higher symptom intensities reported by women and persons of lower social class may be reflections and instruments of a life style. (25 ref)—*Journal abstract*.

9827. Welner, Amos; Croughan, Jack L. & Robins, E.L. (Washington U, Medical School) **The group of schizoaffective and related psychoses—critique, record, follow-up, and family studies: I. A persistent enigma.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 628-631.—A review of the literature indicates a considerable divergence of opinion regarding the nature of the group of schizoaffective and related psychoses. To resolve some of these controversies, record, follow-up, and family studies are described that will test the hypotheses that the schizoaffective and related psychoses are (a) a variant of schizophrenia; (b) a variant of affective disorder; (c) a third psychosis distinct from both schizophrenia and affective disorder; or (d) a group of psychoses that at first cannot be diagnosed and that eventually at follow-up are recognizable by the clinical picture, course, and family studies as schizophrenia or affective disorder. (76 ref)—*Journal abstract*.

9828. Wright, David M. (State U New York, Upstate Medical Ctr, Syracuse) **Impairment in abstract conceptualization in schizophrenia.** *Psychological Bulletin*, 1975(Jan), Vol 82(1), 120-127.—Discusses investigators' disagreements with K. Goldstein's (1940) and L. Vigotsky's (1934) notion that schizophrenics are impaired in abstract conceptualization. Following a review of terminological and theoretical issues, the evidence derived from investigations employing sorting test methods and principles is critically examined. Research findings are interpreted as strongly supporting the Goldstein-Vigotsky position. Critics' dissatisfaction with the early theorists' proposals appears to be based on a misunderstanding of Goldstein's and Vigotsky's ideas and a faulty assessment of the available evidence. (42 ref)—*Journal abstract*.

9829. Youkalis, Hildreth D. & DeWolfe, Alan S. (Northwestern U) **The regression hypothesis and sub-classifications of schizophrenia.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 36-40.—Evaluated regression as a descriptive concept in schizophrenia using L. E. Gottesman's 1964 forced-choice word association technique. Gottesman's finding (see PA, Vol 39:8487) that schizophrenics chose more children's associations than normals was extended. Diagnostic subtypes and premorbid adjustment within schizophrenics were compared using both male and female patients. A 40-item, forced-choice word association test was administered to 74 paranoid, nonparanoid, process, and reactive schizophrenics. The total number of responses typical of children, minus irrelevant responses, was analyzed. Paranoid schizophrenics gave significantly fewer responses of the type that children produce than nonparanoid schizophrenics, which was interpreted as



supporting the regression theory. (23 ref)—*Journal abstract*.

9830. Zern, David; Kenney, Helen J. & Kvaraceus, William C. (Clark U) **Cognitive style and overt behavior in emotionally disturbed adolescents.** *Exceptional Children*, 1974(Nov), Vol 41(3), 194-195.—A study of 42 middle-class adolescent residents and outpatients of a private mental hospital shows a significant mean difference on the cognitive style dimension between Ss classified as internalizers and those classified as externalizers; results are almost identical for males and females.

### Behavior Disorders

9831. Apfeldorf, Max. (VA Ctr, Martinsburg, WV) **Contrasting assumptions and directions in MMPI research on alcoholism.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1375-1379.—A review of 11 studies indicates that research on alcoholism using the MMPI can be divided into 2 groups: the first holds that alcoholism is a major category of disorder, derives special MMPI alcoholism scales, and finds that alcoholics have substantive personality characteristics different from those of other psychiatric patients. The 2nd group accepts a nosological system containing similar neurotic, psychotic, and psychopathic disorders and generally applies the usual clinical scales, excluding or underemphasizing special alcoholism scales. Guidelines are required to select the relevant nosology and MMPI scales in investigating alcoholics, which should stem from the original empirical emphasis of the MMPI. A classification system is needed which would separate alcoholics from other groups.—*Journal abstract*.

9832. Baekeland, Frederick; Lundwall, Lawrence; Shanahan, Thomas J. & Kissin, Benjamin. (State U New York, Downstate Medical Ctr, Brooklyn) **Clinical correlates of reported sleep disturbance in alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1230-1241.—The association between clinical and drinking history variables in 294 alcoholic outpatients indicated that current alcohol intake was more closely related to sleep disturbance than to physician ratings of anxiety or depression. When patients were classified according to drinking patterns (daily or periodic), abstinence at admission, and a history of black-outs and delirium tremens, the strength of the relationships between the variables differed (e.g., patients not abstinent at admission were younger, had higher levels of habitual alcohol intake, were more anxious and depressed, slept worse, and had been hospitalized more than patients who were abstinent at admission). Results are discussed in terms of the effect of alcohol on sleep and the relations between alcohol intake, sleep disturbances, and anxiety and depression. (25 ref)—*Journal abstract*.

9833. Barraclough, B.; Bunch, J.; Nelson, B. & Sainsbury, P. (MRC Clinical Psychiatry Unit, Graylingwell Hosp, Chichester, England) **A hundred cases of suicide: Clinical aspects.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 355-373.—Presents data on 100 suicides obtained retrospectively by interviewing surviving relatives. 93% of the suicides were diagnosed mentally ill, with 85% suffering from depression or alcoholism. 80% were seeing a doctor, and 80% had been prescribed psychotropic drugs. Over 50% had given

warnings of suicidal thinking. Some suicides may be preventable with modern psychiatric treatment, but the findings suggest that these methods are not always effectively deployed. (23 ref)—*Journal summary*.

9834. Bergman, Hans & Agren, Gunnar. (U Stockholm, Sweden) **Cognitive style and intellectual performance in relation to the progress of alcoholism.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1242-1255.—Used data on drinking patterns and symptoms of excessive drinking of 90 Swedish hospitalized alcoholics, 30 men each in the 18-30, 31-44, and 45-60 yr old age groups, to construct an "index of alcoholism" which was correlated with the results of psychometric tests administered after the patients were free from alcohol withdrawal symptoms. Performance on a general intelligence scale was similar to that of the general population; 42 men showed signs of impairment on the Trail Making Test and 14 on the Grassi Block Substitution Test; 13 men scored within the borderline area on the Memory for Designs Test; 60 men were classified as field dependent by the rod-and-frame test. There was no relationship between the severity of alcoholism and cognitive abilities or intellectual deterioration. The 24 patients with a history of delirium tremens or alcoholic hallucinosis were significantly more field dependent than the other patients. It is concluded that the clinical course of alcoholism does not lead to general intellectual impairment. (52 ref)—*Journal abstract*.

9835. Birtchnell, John & Floyd, Sandra. (MRC Clinical Psychiatry Unit, Graylingwell Hosp, Chichester, England) **Attempted suicide and the menstrual cycle: A negative conclusion.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 361-369.—Compared the observed distribution of suicide attempts with a calculated expected distribution which took into account the variability of menstrual cycle length. Data collected from 107 women included age and marital status, method of attempt, period of contemplation of attempt, regularity of menstrual periods, whether taking an oral contraceptive, and whether S believed she was pregnant. Analysis was restricted to 76 women with regular cycles. Results show no significant relationship between attempted suicide and phase of the menstrual cycle. It is pointed out that the menstrual function itself may be influenced by emotional disturbance, thus presenting methodological difficulties in the study. (16 ref)—*W. G. Shipman*.

9836. Burke, Aggrey W. (U Birmingham, Queen Elizabeth Hosp, England) **Socio-cultural aspects of attempted suicide among women in Trinidad and Tobago.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 374-377.—Studied differences in the distribution of female attempted suicides among East Indian and African populations in Trinidad and Tobago. Data from 90 admissions show that (a) there was a similar attempted suicide rate among all persons in each subcultural group; (b) East Indians were older (over 25 yrs) compared to the Africans; and (c) East Indians used more domestic substances in their suicide attempts (e.g., bleach) than Africans, although both groups gave similar reasons for their actions. Results support the view that sociocultural factors are important determinants of attempted suicide.—*Journal summary*.

9837. Clarke, Sandra K. (Akron Health Dept, Alcoholism Program, OH) **Self-esteem in men and women alcoholics.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1380-1381.—Compared self-esteem, as measured by a modified SIO Q-Sort, of 20 female alcoholics (mean age 37.2) with that of 20 male alcoholics (mean age 40.7). Both groups had been abstinent a mean of 3 mo and did not differ in education, number married, or IQ. No comparisons of mean correlations between real-self-ideal-self, real-self-adjustment, or ideal-self-adjustment were significant.—*Journal abstract*.

9838. Crowe, Raymond R. (U Iowa, Coll of Medicine) **An adoption study of antisocial personality.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 785-791.—To test the hypothesis that heredity contributes to the development of antisocial personality a group of offspring born to female offenders and given up for adoption in infancy was examined. 46 probands and an equal number of control adoptees over 18 yrs old were followed up and interviewed using the MMPI and other measures of psychopathology. A significantly higher rate of antisocial personality was found among the probands than among the controls. The nonantisocial probands were not more deviant than the controls. The antisocial probands experienced certain unfavorable conditions in infancy that may be related to the development of antisocial personality, the most notable being the length of time spent in temporary care prior to final placement. Although the control group was equally exposed to the same conditions, they did not develop a high rate of the disorder. Findings point to the importance of interactions between genetic and environmental factors in the development of antisocial personality. (23 ref)—*Journal abstract*.

9839. Diaz, Shri S. **Institutional and after-care programmes for juvenile delinquents.** *Social Defence*, 1973(Oct), Vol 9(34), 9-17.—Discusses the incidence, causation, identification, and treatment of juvenile delinquency in India, as well as the various kinds of preventive programs such as boys' clubs. Aftercare programs and the adjustment of the rehabilitated offenders to a normal life are considered.

9840. Driver, M. V.; West, L. R. & Faulk, M. (Bethlem Royal Hosp, London, England) **Clinical and EEG studies of prisoners charged with murder.** *British Journal of Psychiatry*, 1974(Dec), Vol 125, 583-587.—Reports EEG data for 150 16-70 yr old male prisoners charged with murder, of whom 97 came to trial on that charge. The incidence of EEG abnormality was approximately equal to that found in a normal control group (10%). Relevant literature is discussed, and it is concluded that there is no strong case for routine EEG examination of all those being assessed prior to trial for murder.—*Journal summary*.

9841. Dudley, Donald L.; Roszell, Douglas K.; Mules, Janet E. & Hague, William H. (U Washington) **Heroin vs alcohol addiction: Quantifiable psychosocial similarities and differences.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 327-335.—After admission but before treatment, male veterans—66 alcohol addicts and 50 heroin addicts—were administered the Social Readjustment Rating Questionnaire, the Seriousness of Illness

Rating Questionnaire, and the Schedule of Recent Experience. High rates of life change were found for the 2 yrs before hospitalization of both groups. When using marriage as a standard, the alcoholics rated the other 42 life events as much less disturbing than did normals, while the drug addicts rated them as more disturbing than did normals.—W. G. Shipman.

9842. Ehrenkranz, Joel; Bliss, Eugene & Sheard, Michael H. (Yale U, Medical School) **Plasma testosterone: Correlation with aggressive behavior and social dominance in man.** *Psychosomatic Medicine*, 1974(Nov-Dec), Vol 36(6), 469-475.—Determined plasma testosterone in 36 male prisoners—12 with chronic aggressive behavior, 12 socially dominant without physical aggressiveness, and 12 who were not physically aggressive or socially dominant. Ss were administered the Scale of Susceptibility to Annoyances, the California Personality Inventory, the Adjective Check List, the Garabedian Index of Prison Socialization, the Lykken Measure of Anxiety, and the Buss-Durkee Hostility Inventory over the same time period. Results show that there was a significantly higher level of plasma testosterone in the aggressive group as compared with the nonaggressive group or with the other 2 groups combined. The socially dominant group also had a significantly higher level of testosterone than the nonaggressive group. (26 ref)—*Journal abstract*.

9843. Evenson, Richard C.; Sletten, Ivan W.; Altman, Harold & Brown, Marjorie L. (U Missouri, Medical School, Inst of Psychiatry, St Louis) **Disturbing behavior: A study of incident reports.** *Psychiatric Quarterly*, 1974, Vol 48(2), 266-275.—Factor-analyzed more than 5,000 incident reports (i.e., reports of disturbing patient behaviors) from a large state hospital and calculated actuarial risk-rates for the resulting 9 factors. Incident risk-rates are presented for sex, race, marital status, and diagnosis. Findings indicate that young, single males with deferred diagnosis were high incident risk, and that schizophrenic incident rates, when corrected for length of stay, were relatively low. (16 ref)—*Journal abstract*.

9844. Flores, J. R.; Garcia Trovato, M. & Salazar, H. (Hosp Docente Cayetano Heredia, Unidad de Psiquiatria, Lima, Peru) **[Male sexual dysfunction: I. Impotence.]** *(Span) Revista de Neuro-psiquiatria*, 1973(Sep), Vol 36(3), 191-200.—Reviews present knowledge about impotence. Its clinical, etiological, diagnostic, prognostic, and treatment aspects are described. The necessity of an integrated understanding and a practical approach to this disorder, mainly for general practitioners, is emphasized. (French & German summaries) (37 ref)

9845. Fox, Richard P. (U California, Irvine) **Narcissistic rage and the problem of combat aggression.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 807-811.—Makes a distinction between the aggression of combat soldiers reacting adaptively to situations of real danger and a type of combat aggression that is personally motivated by a quest for revenge. 3 case reports indicate that in contrast to the adaptive aggression that posed few postcombat difficulties, the latter type of aggression resulted in regressive ego (and superego) functioning and led to uncontrolled rages, combat atrocities, and post-combat difficulties in the handling of hostility and aggression. This latter type of aggression was traced to



narcissistic injuries and subsequent narcissistic rage, often the consequence of the death of a combat buddy (loss of a mirror relationship).—*Journal abstract.*

9846. Garitano, William W. & Ronall, Ruth E. (New Jersey Coll of Medicine, Newark) **Concepts of life style in the treatment of alcoholism.** *International Journal of the Addictions*, 1974, Vol 9(4), 585-592.—Discusses the alcoholic syndrome and its treatment in terms of the interaction of individual and cultural life styles. In terms of individual life style, the most common character traits of alcoholics are inadequacy, hypersensitivity, and immaturity. This preexisting individual life style is seen by the alcoholic as compatible with the accepted cultural life style of drinking. In terms of treatment, this model views alcoholism as the essential problem rather than as a symptom. The stages of therapy which focus on individual and cultural life styles are included.—*F. Beyer.*

9847. Gomberg, Edith S. (VA Hosp, Ann Arbor, MI) **Women and alcoholism.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

9848. Goppinger, H. (Tübingen U, Inst of Criminology, W Germany) **Socio-psychological inquiries into the behaviour of men in the group 20-30 years: Differences between an average and a criminal population.** *Social Defence*, 1973(Oct), Vol 9(34), 3-8.—Compared a group of prison inmates with a control group of normal persons of the same age. Studies were carried out by a team of lawyers, psychologists, psychiatrists, sociologists, and social workers. Findings indicate that the prisoners were poor in school and often were dropouts, discontinued vocational training, lacked interest in work, and changed jobs frequently. Little parental control was given and their interests lay outside the home. Leisure-time activities were unstructured and often were associated with drinking. The control group exhibited strong family ties, orienting leisure-time activities toward the home. They had good work and school records. Relevant bindings appeared to be stable for nonprisoners, with the emphasis on family harmony and security and a regular result-oriented occupation. The successful rehabilitation of prisoners apparently depends on substituting social nondeviant bindings for the bindings that lead to criminality.—*A. de la Haba.*

9849. Green, Richard. (State U New York, Stony Brook) **Sexual identity conflict in children and adults.** Baltimore, MD: Penguin, 1975. xxii, 327 p. \$3.95.—Discusses the historical, cross-cultural, biological, psychological, and treatment aspects of transsexuality. Interviews with adult transsexuals who discuss their childhoods and adjustments to life as members of the opposite sex, and the treatment, causative factors, behavior, stories, and parental descriptions of children who already want to change their sex at age 5 or 6 are presented in detail. (8 p ref)

9850. Hess, Allen K. & Briniger, James R. (Oakland U) **Self-described anxiety and mood in juvenile delinquents.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 389-391.—Investigated whether the distinction between primary and neurotic psychopathy is reflected in different self-descriptions of mood. Ss were 24 13-17

yr old male incarcerated delinquents. The Personal Opinion Study (POS), Marlowe-Crowne Social Desirability scale (MCSD), Anxiety Differential (A-D), and Psychiatric Outpatient Mood Scale (POMS) were administered. Findings indicate that correlations of the mood and anxiety scales with the POS Primary and Neurotic scales were similar. The only differences were found on the POMS Confusion scale (which correlated .35 with Primary and .52 with Neurotic), the A-D (.41 with Primary and .27 with Neurotic), and MCSD (-.28 with Primary and -.55 with Neurotic). Thus a higher Primary score was not correlated with self-reported lack of anxiety and lowered emotional states, contrary to the hypothesis.—*P. O'Brien.*

9851. Hogenson, Dennis L. **Reading failure and juvenile delinquency.** *Bulletin of the Orton Society*, 1974, Vol 24, 164-169.—Studied reading failure and the history of aggression of confined juvenile delinquent males. 2 groups of 48 each were randomly selected from state training schools in Lansing, Michigan, and Red Wing, Minnesota. Data were collected on social and behavioral history, the WISC, reading achievement score on the Stanford Achievement Test (SAT), the Minnesota Attitude Inventory (MAI), the Dogmatism Scale, and on each S's family, community, economic, and ethnic background. Spearman rank order correlations yielded significant results between reading and aggression (Lansing  $r = .33$ ,  $p < .025$ ; Red Wing  $r = .40$ ,  $p < .005$ ). The MAI was also correlated with aggression. IQ was related to reading success. It is concluded that reading failure may be the single most significant factor in antisocial aggressive delinquents. 5 suggestions are offered to prevent frustration stemming from reading failure. (28 ref)—*G. R. Alley.*

9852. Jovčević, Milanko et al. (Military Medical Academy, Belgrade, Yugoslavia) **[Pre-army delinquency and resocialization in the army.]** (Srcr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(3), 51-60.—Compares several parameters of adaptive behavior in Army inductees with and without juvenile delinquency records. (English summary)

9853. Kurtines, William; Hogan, Robert & Weiss, Daniel. (Florida International U, Miami) **Personality dynamics of heroin use.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 87-89.—Compared 59 white male heroin addicts with 26 psychiatric patients, 142 incarcerated delinquents, 37 undergraduate marijuana users, and 108 police officers using the California Psychological Inventory. Results suggest that the heroin users were relatively normal in terms of social poise and self-esteem; however, they were significantly more hostile, rebellious, and irresponsible than any of the comparison groups. The addicts seemed relatively well adjusted, suggesting that their drug use is symptomatic not of neurosis but of a generalized antisocial disposition.—*Journal abstract.*

9854. Lester, David & Lester, Gene. (Richard Stockton State Coll) **Crime of passion: Murder and the murderer.** Chicago, IL: Nelson-Hall, 1975. x, 306 p. \$10.—Presents a comprehensive analysis of the incidence, types, and possible causes of murder using data obtained from government agencies, the Uniform Crime Reports, and major sociological and psychological concepts and

theories of human aggression. Patterns that apply to the victims and murderers are identified, and philosophical, legal, and moral factors in murder are examined. (11/ p ref)

9855. Linder, Helen; Zambrowsky, J. & Cormier, Bruno-M. (McGill U, Montréal, Québec, Canada) [Pathologic cohesion in multidelinquent families.] (Fren) *Vie Médicale au Canada Français*, 1974(Jun), Vol 3(6), 593-597.—Studied 100 "mature" families with a number of persistent or incidental delinquents ranging from 2 to all their boys. It was found that 75% of the families had 5-12 children, 26% were voluntarily broken, 41% had placed children in reform schools, and 90% of the delinquents always returned home. Broken and intact homes produced about the same number of delinquents, and in 77% of the families the younger generation lived on a social level lower than their parents. It is concluded that a certain cohesion does exist beyond the formative years in such cases, but that psychologists ought to look more conscientiously to the needs of the underprivileged. —L. Klinkon.

9856. Long, J. Alan & McLachlan, John F. (St Michael's Hosp, Toronto, Ontario, Canada) Abstract reasoning and perceptual-motor efficiency in alcoholics: Impairment and reversibility. *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1220-1229.—Administered a battery of IQ and neurological tests to a total of 39 upper social class male alcoholics (mean IQ = 125.9) in 2 studies. Compared with controls matched for age, sex, education and verbal IQ, alcoholics were significantly impaired on the WAIS Block Design, Object Assembly, and Digit Symbol subtests, the Trail Making Test, the Halstead Category Test, Tapping Right and Left Hand, and according to a modified index based on scores from the Halstead Neuropsychological Battery and the Trail Making Test. In Study II, an additional 17 alcoholics, whose initial scores were not different from those in Study I, were retested after 1 yr's abstinence: significant improvement was found in all Study I indicators except the Trail Making Test. Impairment was found as often in the present Ss as it was in groups of alcoholics of average intelligence and of lower social class in other similar studies. It is concluded that peripheral and central nervous system recovery is possible with prolonged abstinence from alcohol. (16 ref) —Journal abstract.

9857. Masterson, James F. (Cornell U, Medical Coll, New York) The acting-out adolescent: A point of view. *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 343-351.—Examines the etiology and treatment of acting-out adolescents. Definitions of acting out are discussed and illustrated with case examples. The therapeutic relationship formed between patient and therapist is reviewed. Differential diagnosis of the sources of acting out are offered and the therapeutic management of the acting-out borderline adolescent is described. In this case, acting out is viewed as a defense against abandonment depression and as a means of testing the therapist. The patient is attempting to restore the pathologic relationship with the mother. He is also afraid that if he allows a relationship with the therapist to develop he will again be abandoned. The difference to develop he will again be abandoned. The difference between inpatient and outpatient management of acting

out is discussed. It is suggested that limits on behavior, more difficult for outpatient therapy, can be set prior to the formation of a therapeutic relationship. To illustrate, the case of a 16-yr-old male patient is presented.—R. S. Albin.

9858. McKissack, Ian J. (U Waikato, New Zealand) A less delinquent cohort. *British Journal of Criminology*, 1974(Apr), Vol 14(2), 158-164.—Reports that adolescent delinquency rates were considerably below expectation among children born in Scotland in 1946-1947. The finding is discussed in relation to the above-average proportion of 1st-born children in the period and parental attitudes immediately after World War II.

9859. Mintz, Jim; O'Hare, Kate; O'Brien, Charles P. & Goldschmidt, Jean. (U Pennsylvania) Sexual problems of heroin addicts. *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 700-703.—Surveyed 136 19-52 yr old heroin-addicted veterans for problems of impotence, premature ejaculation, and retarded ejaculation when the Ss were drug free and when they were using heroin 45 were in methadone treatment and also reported on methadone effects. Premature ejaculation was a surprisingly common complaint when Ss were drug free, but it remains unclear whether this finding represents true base line levels or subtle abstinence reactions. Heroin and methadone both increased the frequency of impotence and retardation, though the effects of heroin were substantially more dramatic.—Journal abstract.

9860. Moser, Joy. (World Health Organization, Office of Mental Health, Geneva, Switzerland) Problems and programmes related to alcohol and drug dependence in 33 countries. Geneva, Switzerland: World Health Organization, Offset Pub No 6, 1974. iii, 106 p. Presents an analysis of the discussions and findings of 2 seminars on the problems associated with alcohol and drug dependence which were sponsored by the World Health Organization in 1971 and 1972. Examples of preventive and treatment services in 6 countries are presented, and legal and penal aspects of addiction and research and program planning issues are discussed. (3/ p ref)

9861. Moullembé, Ariette et al. (U Paris X-Nanterre, France) [Essay on suicide: A theoretical and a clinical approach.] (Fren) *Bulletin de Psychologie*, 1973 1974, Vol 27(15-18), 804-943.—Presents a theoretical discussion of suicide based on historical and statistical data. Among the aspects considered are the possibility of a psychopathological structure of suicide, factors in suicide, types of suicide, causative behavior, and characteristics of suicide in children and adolescents. A clinical study is reported in detail which compared 11 male and 17 female 6-16 yr olds who had attempted suicide with a group of children and adolescents presenting psychosomatic problems. Members of both groups exhibited similar characteristics but Ss in the suicide group did so to a much greater degree. These Ss came from disturbed families and had experienced severe and prolonged losses of support, affection, and parental image. Alcoholism and conflicts were frequent among parents. Ss experienced difficulties in parental and sibling relations. IQs were normal but there was evidence of academic failures. Ss were aggressive, depressed, anxious, guilty, and demanding of attention. The theoretical and clinical



data presented indicate that (a) suicides are found in various nosological categories and (b) although the characteristics of suicides appear in other groups, records of the groups studied seem to point to a "suicide syndrome." (77 ref)—*Z. M. Cantwell*.

9862. Nail, Richard L.; Gunderson, E. K. & Kolb, Douglas. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Family characteristics associated with heroin dependence among Navy men in Vietnam.** *Military Medicine*, 1974(Dec), Vol 139(12), 967-970.—Compared family characteristics of 240 US Navy men diagnosed as dependent upon heroin with a control group of men who had not used heroin. The hypothesis was tested that heroin-dependent individuals would exhibit specific family characteristics (low socioeconomic status, broken home, and poor relationships with parents and siblings) compared with other Navy men who used drugs but not heroin. Differences between the 2 groups were small but generally in the opposite direction to that predicted. No evidence was found for the specificity hypothesis among heroin addicts who principally used inhaling (smoking or sniffing) as the method of administration. Those who injected heroin, however, did show family differences and represent a different type of drug abuser than those who only inhale heroin.—*Journal abstract*.

9863. Neuringer, Charles. (U Kansas) **Suicide and the Rorschach: A rueful postscript.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 535-539.—A review of the Rorschach suicide literature written 10 yrs ago called for cross-validation studies and the use of refined methodology to enhance the usefulness of the test as a device for the identification, prediction, and understanding of suicidal ideation and behavior. The present follow-up review indicates that careful and refined research methodology can somewhat enhance sensitivity of the Rorschach to suicidal activity. It is concluded that the replicative research has not supported previously promising Rorschach suicide indicators, suggesting that the Rorschach may be an inappropriate technique for assessing suicidal activity. (19 ref)—*Journal abstract*.

9864. O'Leary, Michael R.; Donovan, Dennis M. & Hague, William H. (VA Hosp, Seattle, WA) **Interpersonal differentiation, locus of control and cognitive style among alcoholics.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 997-998.—Investigated the relationship between Rotter's Internal-External Control Scale (I-E) and 2 measures of cognitive style, the Group Embedded Figures Test (EFT), and the Interpersonal Discrimination Test, for 50 alcoholics (mean age = 47.7 yrs). The I-E scale did not correlate significantly with either the EFT or the discrimination test. The latter 2 scales correlated significantly with each other. It is concluded that perceived locus of control and cognitive style are independent constructs.—*Journal abstract*.

9865. Prokupek, J. (Inst Lékařů a Farmaceutů, Prague, Czechoslovakia) **[Esquirol's concepts of suicide.]** (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 133-138.—Discusses E. Esquirol's background, work, and ideas about the psychopathology of suicide, first published in his 1836 textbook of psychiatry. The conclusion is presented that although many of Esquirol's views are still valid, they cannot be accepted as a whole

because since his time the theory and practice of psychiatry, and our whole society, have reached a higher level of development. (Russian & English summaries)—*V. Fischmann*.

9866. Roberts, Alan H.; Erikson, Robert V.; Riddle, Mary & Bacon, Jane G. (U Minnesota, Minneapolis) **Demographic variables, base rates, and personality characteristics associated with recidivism in male delinquents.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 833-841.—Studied demographic variables, base rates, and personality characteristics of 455 adolescent male delinquents in 3 studies. The total population discharged from a treatment-oriented facility was followed, and data were recovered from 98%. The recidivism rate was 37.5%, which compares to the recidivism base rates found in similar rehabilitation facilities. Significantly higher rates of recidivism were found among the younger delinquents, delinquents with prior institutional experience, and delinquents who had previously run away from an institution. Measures of impulse control and foresight and planning ability derived from the Porteus Maze Test differentiated 10 recidivists from 10 nonrecidivists. A follow-up study of 68 consecutively discharged Ss from the same institution replicated the findings with respect to impulse control but not foresight and planning ability. One measure of future time perspective and some staff ratings were also related to recidivism. (20 ref)—*Journal abstract*.

9867. Romildo Bueno, J. (U Federal do Rio de Janeiro, Faculdade de Medicina, Brazil) **[Drug dependency as a disease.]** (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 127-137.—Argues that drug dependency should be studied and treated independently of its intrapsychic and social aspects. The usual phases of developing and stabilizing drug dependency are reviewed. Continuing medical treatment, rather than imprisonment, is indicated.

9868. Rosén, Anne-Sofie & Schalling, Daisy. (U Stockholm, Sweden) **On the validity of the California Psychological Inventory Socialization Scale: A multivariate approach.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 757-765.—Isolated groups homogeneous in role-taking ability and described them on dimensions of the California Psychological Inventory (CPI) Socialization (So) scale. Ss were 189 Swedish delinquent and nondelinquent 19-31 yr old males. 6 subscales were constructed by factor analysis. A latent profile analysis of responses to 18 items, selected from the subscales, yielded a low ( $n = 78$ ) and a high ( $n = 106$ ) socialization group. 75% of the delinquents were classified as the low group. In a discriminant analysis of subscale scores, the latent profile analysis groups were significantly separated. 5 subscale means were significantly different. Results support the validity of some of the subscales as indicators of the role-taking construct underlying the So scale. (38 ref)—*Journal abstract*.

9869. Rotenberg, Mordecai. (Hebrew U Jerusalem, Paul Baerwald School of Social Work, Israel) **Conceptual and methodological notes on affective and cognitive role taking (sympathy and empathy): An illustrative experiment with delinquent and nondelinquent boys.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2),

177-185.—Reviews the ambiguity and inconsistency found in operational definitions and empirical measures of empathy and sympathy. The terms "affective role taking" and "cognitive role taking" are offered as substitute operational concepts. Affective and cognitive role-taking dispositions are assessed separately on the same Ss. Preliminary findings comparing 37 delinquents and 36 nondelinquents suggest that the delinquents were in no way deficient in cognitive role-taking skills, while they were significantly lower than nondelinquents in affective role taking. Unexpected findings indicate that black delinquents perceived their past relations with home and peers in significantly warmer terms than did white delinquents. The generality of theoretical formulations concerning the relation between socialization processes and aggression or delinquency are seriously questioned. (37 ref)—*Journal abstract*.

9870. Schindler, Sepp. (U Salzburg, Psychologisches Inst, Austria) [Family constellation and aggressive conduct.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1974(Jan), Vol 22(2), 180-182.—Obtained data on the number of siblings in the families of 317 male juveniles who had been convicted of assault and battery, and investigated characteristics of familial socialization and manifest aggressive behavior. Families with more children provide a better opportunity for learning conflict solution through aggressive behavior than families with only 1 child. There is a direct relationship between number of siblings and percentage of aggressive male offenders, only children showing the lowest percentage.—S. D. Babcock.

9871. Schuckit, Marc A. & Gunderson, E. Eric. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **Suicide in the naval service.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1328-1331.—Analyzed records of all suicides in the naval service between July 1965 and January 1972 by officer/enlisted-man status. Officer suicides were demographically similar to civilian suicides, but enlisted men were relatively younger. Data on this sample were compared with demographic data on men in the naval service who attempted or threatened suicide and with the general service population. A relatively small proportion of the suicide sample (10%) had had inservice psychiatric hospitalizations. Findings in relation to possibilities for increased detection of the potential for suicide are discussed. (17 ref)—*Journal abstract*.

9872. Shaffer, David. (Inst of Psychiatry, London, England) **Suicide in childhood and early adolescence.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 275-291.—Conducted a survey on all reported childhood suicides in England and Wales over a 7-yr-period ( $N = 30$ ). Results show that there were no deaths reported before the age of 12. All the cases studied were aged 12-14 and more than twice as many boys as girls; the group included more tall children and more children of superior intelligence than was expected in the general population. Antisocial behavior had been reported in most of the children before death. Suicide was most often precipitated by a disciplinary crisis and often took place after a period away from school. Previous suicidal behavior was noted in 40% of the cases. There was a high incidence of

depression and suicidal behavior among the children's parents and siblings. (56 ref)—*Journal summary*.

9873. Shukla, T. R. (Hosp for Mental Diseases, Ranchi, India) **A study of some of the socio-psychological factors among adolescent criminals.** *Indian Journal of Psychiatric Social Work*, 1972(Jul), Vol 1(1), 31-35.

9874. Singer, Melvin. (Inst of the Pennsylvania Hosp, Adolescent Treatment Ctr, Philadelphia) **Delinquency and family disciplinary configurations: An elaboration of the superego lacunae concept.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 795-798.—Used the combination of observations of the total family together and an elaborate rating form to analyze disciplinary patterns in middle-class families with an antisocial offspring. Discipline was divided into 3 sequential dimensions: policy making, policing, and punishing. Each dimension had specific interactional characteristics that could be compared. A disciplinary configuration quite different from the usually described patterns of "permissiveness" and "inconsistency" arrived at from more global observations of dyadic processes was revealed by this method. Instead the disciplinary configuration in these families with an antisocial offspring was very restrictive policy making, loose policing, and very lenient punishing. This configuration, on its own, seemed to create a powerful antisocial channel that had to be considered as an additional dynamic in the understanding of delinquent events by these antisocial offspring. (27 ref)—*Journal abstract*.

9875. Smith, Selwyn M.; Hanson, Ruth & Noble, Sheila. (U Birmingham, Queen Elizabeth Hosp, England) **Social aspects of the battered baby syndrome.** *British Journal of Psychiatry*, 1974(Dec), Vol 125, 568-582.—Presents data on demographic, social, and family characteristics of the parents of 134 battered children under 5 yrs of age and 53 control children who were emergency admissions and showed no evidence of battering. All parents of the battered children had either confessed to the injuries or could give no adequate explanation for the child's condition. Descriptive data on marital status, illegitimacy rates, attitudes to pregnancy and abortion, contraceptive practices, family size, extent of family disharmony, religion, social isolation, worries, income and socioeconomic status, and father's occupation are presented. Overall findings suggest that a lack of family cohesiveness is an important factor in the battered-child syndrome. In over one-third of the cases, the biological father was absent, and in half the cases, the mother was living with another man. Premarital pregnancy and illegitimacy, marital discord, and rejecting attitudes toward the child were also related to child battering. (73 ref)—L. Gorsey.

9876. Stein, Marvin; Levy, Michael T. & Glasberg, H. Mark. (Mt Sinai School of Medicine, City U New York) **Separations in black and white suicide attempters.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 815-821.—Studied childhood and antecedent separations in 330 white and black suicide attempters and matched control nonsuicidal psychiatric patients. There were more white and female suicide attempters with a history of childhood and antecedent separations than controls. Social class did not account for this finding. The number of black male and female patients with early



childhood separations was greater in the suicide attempt groups than in the control groups. There was also no significant interaction between childhood and antecedent separation and suicide attempt in the white and black female and male patients. (23 ref)—*Journal abstract.*

9877. Toler, Curt. (VA Hosp, Vancouver, WA) **The personal values of alcoholics and addicts.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 17-20.—Investigated the personal values of 43 male drug addicts and 42 alcoholics using the Rokeach Value Survey. The 2 groups did not differ from each other, but did differ from the general population in preferring personal goals rather than societal ones.

9878. Virkkunen, Matti. (Helsinki U, Central Hosp, Psychiatric Clinic, Finland) **Suicide linked to homicide.** *Psychiatric Quarterly*, 1974, Vol 48(2), 276-282.—Conducted a 15-yr study in Finland of 126 cases of suicides directly linked to homicide. Results indicate that during that period, the rate of suicide directly linked to homicide was the same in rural and urban areas. The rate proved to be no higher in underdeveloped areas than elsewhere. Only 17.5% of the offenders had undergone psychiatric hospital care. Schizophrenia and other paranoid psychoses appeared most frequently in the diagnoses.—*Journal abstract.*

9879. Warren, Carol A. (U Southern California) **The use of stigmatizing social labels in conventionalizing deviant behavior.** *Sociology & Social Research*, 1974(Apr), Vol 58(3), 303-311.—Points out that labeling theory has thus far focused on a 1-way relationship between negative social labels and behavior: the application of such labels facilitates further deviant behavior. On the basis of empirical evidence from 6 behavior-changing groups of various types, it is suggested that the application of negative labels may under certain conditions conventionalize deviant behavior; e.g., when the labels lead to voluntary membership in the group or to counseling by previously stigmatized persons. It is further contended that the direction of change may be different for behavior and for identity. An individual may develop a stigmatized identity as a precondition for conventionalized behavior, or a normalized identity and conventionalized behavior, as well as the stigmatized identity and escalated deviant behavior described by labeling theory. (21 ref)—*R. V. Heckel.*

9880. Wax, Douglas E. (U Michigan, Medical Ctr) **Self-concept in Negro and white pre-adolescent delinquent boys.** *British Journal of Criminology*, 1974(Apr), Vol 14(2), 165-171.—Studied differences in self-concept between black and white preadolescent delinquent boys. 20 black and 35 white preadolescent delinquents completed 10 semantic differential scales on each of 8 concepts. Only one concept attained a significant level of difference between the 2 groups. "Boys who get into trouble" was perceived by the black group as generally a more positive concept. Results are discussed in relation to current social forces within the urban black community. (21 ref)—*Journal summary.*

9881. Weiner, Sheldon & Weaver, Lelon. (U Vermont, Coll of Medicine) **Begging and social deviance on Skid Row.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec),

Vol 35(4), 1307-1315.—Examined various aspects of street begging by comparing questionnaire responses of 100 Skid Row alcoholics who admitted to panhandling (PH) with those of 100 alcoholics who denied it (NPH). Findings suggest that (a) panhandling is found in a relatively small proportion of alcoholics (e.g., the present Ss were drawn from the very bottom of the alcoholic population, yet only 41% reported that they had ever begged for money); (b) PH's behavior clearly deviated further from the social norm than the NPH's on almost all measures; (c) the fact that the PHs were 10 yrs younger than the NPHs suggests that the panhandling is not the result of alcoholic deterioration over time; and (d) a number of social and behavioral characteristics related to alcoholism differentiated the 2 groups (e.g., the PH group had more men who had been arrested for felonies and fewer who had no records of arrests, the NPH preferred whisky while the PH group had less rigid alcohol preferences, and over 50% of the PH group drank nonbeverage alcohol compared with only 25% of the NPH group). Implications of the findings for alcoholic prognosis in terms of the level of self-respect are noted.—*Journal abstract.*

#### Learning Disorders & Mental Retardation

9882. Aitaksinen, E. M. & Kauko, K. (U Helsinki, Finland) **Effect of probenecid on 5-hydroxyindoles in cerebrospinal fluid in Down's syndrome.** *Annals of Clinical Research*, 1973(Dec), Vol 5(6), 392-394.—Measured total 5-hydroxyindoles in the cerebrospinal fluid (CSF) of 6 7-14 yr old patients with Down's syndrome (DS) and 6 mentally retarded controls before and after probenecid administration (40 and 80 mg/kg/day for 2 days). In both groups the values were similar before the probenecid, but after both doses of probenecid they were lower in the patients with DS than in the controls. This result was related, at least partly, to the lower concentration of probenecid in the CSF. (19 ref)—*Journal abstract.*

9883. Aitaksinen, E. M.; Aitaksinen, M. M. & Penttinen, P. (U Helsinki, Finland) **Fate of <sup>14</sup>C-labelled tryptophan and 5-hydroxytryptophan in Down's syndrome.** *Annals of Clinical Research*, 1973(Dec), Vol 5(6), 385-391.—Administered <sup>14</sup>C-tryptophan with carrier to 4 Down's syndrome (DS) patients and to 5 mentally retarded controls, and <sup>14</sup>C-5-hydroxytryptophan (5HTP) to 3 DS patients and 3 controls. Radioactivity was measured in samples of blood, spinal fluid (CSF), urine, and feces. The level of radioactivity in the plasma 1 hr after tryptophan as well as after 5HTP was similar in the DS patients and controls, but the 4 hrs' activity after tryptophan was higher in DS patients. The rate of elimination of plasma radioactivity was very slow after tryptophan but fast after 5HTP in both groups. The CSF of all Ss contained considerable radioactivity after <sup>14</sup>C-tryptophan, but was hardly detectable after <sup>14</sup>C-5HTP. The major urinary metabolites of tryptophan and 5HTP did not show gross differences between the DS and control patients. The increase in the concentration of plasma tryptophan after tryptophan loading (100 mg/kg) was smaller in the DS patients than in the controls. Results, together with those using labelled tryptophan, suggest that there are no gross abnormalities in the absorption of tryptophan, but that disturbances in its

metabolism and/or transport occur. (25 ref)—*Journal abstract*.

9884. Brekke, Beverly & Williams, John D. (U North Dakota, Ctr for Teaching & Learning) **Conservation of weight with the mentally retarded.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 225-231.—Institutionalized retardates ( $N = 54$ ), public school retardates ( $N = 65$ ), and a group of normal Ss ( $N = 112$ ) were compared at several mental age levels on 3 conservation of weight tasks. Results show that the functioning of normal Ss was higher at each mental age level. An analysis of covariance was performed on the number of correct responses on the 3 tasks, covarying mental age, and not including any normal Ss above 13 yrs in mental age ( $N = 82$ ). Normal Ss conserved significantly more often than either retardate group in the covariance analysis.—*Journal abstract*.

9885. Browder, J. Albert; Ellis, LuAnn & Neal, Judith. (U Oregon, Medical School, Portland) **Foster homes: Alternatives to institutions?** *Mental Retardation*, 1974(Dec), Vol 12(6), 33-36.—Examined 36 foster home child units to examine factors which may be related to the outcome of most foster care programs for retarded and handicapped children. Over half of the children resided in foster homes which needed substantial improvement.

9886. Bryan, Tanis H. (U Illinois, Coll of Education, Chicago Circle) **Peer popularity of learning disabled children.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 621-625.—Administered a combination of 2 sociometric measures to 62 Ss in 3rd-, 4th-, and 5th-grade classrooms in which there was at least 1 learning-disabled child. An analysis of variance was computed for votes received on scales of social attraction and social rejection by learning-disabled and comparison Ss matched on variables of sex, race, and classroom. Results indicate that learning-disabled children, particularly white and female, were significantly less attractive and more rejected than comparison children.—*Journal abstract*.

9887. Burcham, Temmie et al. **Effects of auditory reception on auditory and visual learning tasks.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 56-61.—Studied the effect of auditory reception on the learning of auditory and visual paired associate learning tasks in 72 educable retarded 9-13 yr old males. The 1st hypothesis was that high auditory receivers will perform significantly better than low auditory receivers on the auditory paired associate learning task. The 2nd hypothesis was that there will not be a significant difference between high auditory receivers and low auditory receivers on the visual paired associate learning tasks. Results indicate that auditory discrimination, as measured by the Wepman Auditory Discrimination Test, was a significant factor in auditory learning. High auditors performed significantly better than low auditors on the auditory paired associate learning task. There was no significant difference between high auditors and low auditors on the visual paired associate learning task.—*Journal abstract*.

9888. Byrne, Brian M.; Willerman, Lee & Ashmore, Lear L. (U Texas) **Severe and moderate language impairment: Evidence for distinctive etiologies.** *Behav-*

*ior Genetics*, 1974(Dec), Vol 4(4), 331-345.—42 3-8 yr old children with at least normal nonverbal intelligence and a diagnosis of "delayed speech" were subdivided into those having "moderate" and those having "severe" speech difficulties on the basis of the Illinois Test of Psycholinguistic Abilities. It was found that (a) parents of Ss with severe speech difficulties were of higher social class than those of Ss with moderate speech difficulties and (b) Ss with severe speech difficulties were more likely to have been exposed to potentially traumatic environmental influences and less likely to have relatives with speech disturbances than moderately affected Ss. Data indicate the heterogeneity of the diagnosis of "delayed speech" and suggest parallels to findings in the area of mental retardation, namely, that moderate deficiencies represent the lower end of the normal curve distribution from either a genetic or an environmental perspective, while severe deficiencies are the result of single genes or of serious environmental traumas. (16 ref)—*Journal abstract*.

9889. Carter, John L. (U Houston) **The educable mentally retarded choose their art activities: Two-dimensional or three-dimensional.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 141-144.—28 educable mentally retarded children (mean chronological age 11 yrs, mean mental age 6 yrs) were given the choice of 4 art activities: 3-dimensional (assemblage of colored blocks or paper sculpture) and 2-dimensional (tempera painting or collage of colored papers). Tested individually, 24 Ss chose painting, 2 chose paper cutting, and only 2 chose block assemblage. The choice was related neither to sex nor to IQ. A rigid clinging to familiar objects and techniques may account for the preference for 2-dimensional media.—*R. Arnheim*.

9890. Clark, D. F. & Johnston, A. W. (Ladysbridge Hosp, Banff, Scotland) **XYX individuals in a special school.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 390-396.—Presents psychological and anthropometric data on 5 12-, 16-, and 21-yr-old XYX Ss in a special school for the retarded in Scotland. The 5 Ss were all of borderline intelligence, with a mean IQ approximately 2 standard deviations below the general population mean. There was some evidence of a tendency toward performance rather than verbal dominance in cognitive skills, but also evidence of motor carelessness and impulsivity. Social maturity was also below normal. Data support the idea that additional XYX Ss will be found in normal as well as institutional or "mental-penal" situations, and also support the likelihood of finding such individuals among low intelligence, borderline, and retarded populations. (33 ref)—*Journal summary*.

9891. Fenton, Thomas R.; Alley, Gordon R. & Smith, Kenneth. **Effects of white noise on short-term memory of learning disabled boys.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 903-906.—5 levels of white noise (22-72 db) introduced during the performance of a short-term memory task (repeating 4-digit numbers) did not differentiate scores of 10 normally achieving 9-11 yr old boys from 10 boys with learning disabilities. For all boys together, increasing noise levels decreased performance of younger Ss relative to that of older Ss.—*Journal abstract*.



9892. Frankel, Fred & Tymchuk, Alexander J. (U California, Medical School, Los Angeles) **Digit recall of mentally retarded and nonretarded children under three presentation rates.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 311-319.—2 groups of nonretarded children were matched on chronological age (CA) mean of 10 yrs and on Peabody Picture Vocabulary Test mental age (MA) with 27 mildly retarded children. The 3 groups were presented with a serial recall task similar to the forward series of the Digit Span subtest of the WISC. Digit strings of systematically increasing length were presented aurally at each of 3 presentation rates. The maximum length of digits Ss were able to recall correctly was found to be related to IQ, but not to MA or CA. The fastest rate of presentation produced significant increases in the accuracy of recall for all groups. Separate serial position analyses for strings containing different types of errors revealed strikingly different serial position functions for each error type. (38 ref)—*Journal abstract*.

9893. Gottlieb, Jay. (Research Inst for Educational Problems, Cambridge, MA) **Attitudes toward retarded children: Effects of labeling and academic performance.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 268-273.—The influence of the label "mentally retarded" on the attitudes of peers was investigated in 2 experiments—one with a middle-class sample and the other with a low-socioeconomic status (SES) sample. 48 middle-class and 40 low-SES 4th graders were shown 1 of 2 video tapes of 2 children taking a spelling bee. Half of the Ss saw the target actor as being a competent speller while the remaining half saw him as an incompetent speller. Half of each group was told that the target actor was either a 5th-grade pupil or a mentally retarded boy in a special class. Data from the 2 sets of  $2 \times 2$  (Label  $\times$  Competence) replications indicate that the label did not significantly affect attitude scores. For the middle-class sample, academic performance was a significant influence on expressed attitudes, with incompetent performance resulting in more negative evaluations. Academic performance did not affect attitude scores among the low-SES sample. Data indicate that labels do not adversely influence the attitudes of peers toward labeled children. (23 ref)—*Journal abstract*.

9894. Guskin, Samuel L. (Indiana U) **Research on labeling retarded persons: Where do we go from here? A reaction to MacMillan, Jones, and Aloia.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 262-264.—Suggests that D. L. MacMillan et al's review and analysis (see PA, Vol 53:Issue 5) leads to little optimism about further research in the area, and that research and evaluation activities should be developed for modifying labeling effects.

9895. Hill, A. Lewis. (New York State Inst for Basic Research in Mental Retardation, Staten Island) **Idiot savants: A categorization of abilities.** *Mental Retardation*, 1974(Dec), Vol 12(6), 12-13.—Presents 7 general categories of special abilities of idiot savants—fine sensory discriminations; artistic talent; unusual mechanical, musical, and mathematical abilities; memorization of obscure facts; and calendar calculating. (52 ref)

9896. Jacobs, Patricia A. (MRC Clinical & Population Cytogenetics Unit, Western General Hosp, Edinburgh, Scotland) **Correlation between euploid structural chro-**

**mosome rearrangements and mental subnormality in humans.** *Nature*, 1974(May), Vol 249(5453), 164-165.—Describes data obtained from examination of blood leukocyte chromosomes of 33,533 people in an Edinburgh clinic between 1959 and 1972. 94 euploid structural rearrangements were found. The relationship between this abnormality and mental retardation in this group is discussed.

9897. Lowe, James D.; Roberts, Margaret & Whidden, Michael. (U Southern Mississippi) **WISC scores vs full scale and abbreviated WAIS scores for retarded adolescents.** *Southern Journal of Educational Research*, 1974(Sum), Vol 8(3), 326-331.—Investigated differences between WISC Full Scale IQs obtained on 13 16-20 yr old mentally retarded adolescents during their 15th yr of age and WAIS Full Scale IQs obtained after their 16th birthday using both the 11-subtest WAIS and several abbreviated forms of the WAIS. WAIS scores were constantly higher than WISC scores. Implications for the use of these tests with retarded adolescents are discussed.—*Journal abstract*.

9898. MacDonald, James D. et al. (Nisonger Ctr, Columbus, OH) **An experimental parent-assisted treatment program for preschool language-delayed children.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 395-415.—Used parents as the primary language trainers for 6 preschool children with Down's syndrome. The program applied the environmental language intervention strategy to effect a generalized functional language in children who primarily were capable of only single-word utterances. The 5-mo program ran in 2 stages—2 mo with professionals and mothers as language trainers and 3 mo in the home with parents as the sole language trainers. Results from the 2-mo stage indicate marked increases in utterance length and grammatical complexity in imitation and conversation for all 3 experimental Ss but negligible changes for the 3 controls. Follow-up assessment indicates continued language increments for the experimental Ss over 3 mo of home programing with parents as the sole language trainers. The experimental language growth in the mean length of utterance over 3 mo of home programing for the retarded children was comparable to growth for normally developing children.—*Journal abstract*.

9899. MacMillan, Donald L.; Jones, Reginald L. & Aloia, Gregory F. (U California, Riverside) **The mentally retarded label: A theoretical analysis and review of research.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 241-261.—Reviewed literature on the effect of the mentally retarded label. Few studies were found in which labeling was isolated, thus enabling differences between labeled and unlabeled groups to be attributed to the label, per se. The evidence failed to provide support for the notion that labeling has long-lasting and devastating effects on those labeled. It is concluded that while there may be detrimental effects of labeling, the research to date does not reflect sufficient appreciation for the complexity of the dynamics of how the label operates. Factors hypothesized to alter the effect of the label are also discussed. (119 ref)—*Journal abstract*.

9900. Radlbeck, Kurt G. (Kreiskrankenhaus/Kreispoliklinik, Borna, E Germany) **[The sexual**

behavior of mentally retarded adolescents.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 344-352.—Sexual experiences of 682 mental retardates were not significantly different from those of 147 normal juveniles. Heterosexual experiences were common for both sexes and cohabitation was frequently reported by retarded females.

9901. Rawson, Margaret B. **The self-concept and the cycle of growth.** *Bulletin of the Orton Society*, 1974, Vol 24, 63-76.—Presents a comprehensive discussion of E. Erickson's 8 psychosocial stages of man as they are related to general development, and their effects upon language-disordered children. For such a child Erickson's 4th stage, competence, is crucial in later development. His incompetence in cognitive skills seriously affects his identity, i.e., his self-concept; and a feeling of self-worth is important to life-long psychosocial development. (28 ref)—G. R. Alley.

9902. Roeher, Allan; Flynn, Robert; Hartnell, Frances & Harshman, Fred. (National Inst on Mental Retardation, York U, Downsview, Ontario, Canada) **Assessing the national recreation study.** *Journal of Leisureability*, 1974(Oct), Vol 1(4), 34-41.—Critiques a report entitled *Recreation Services for the Handicapped* by P. Witt by presenting the viewpoint of the Canadian National Institute on Mental Retardation (NIMR). It is stated that the report describes past and present problems and failures without analyzing them or providing proposals for the future. Deficiencies in research methodology and a lack of philosophical commitment are cited. The NIMR stresses the normalization approach in treating the retarded, an approach not stressed in the report. The NIMR also concludes that the report's suggestion of voluntary coordination of services is unrealistic and that there should be more emphasis on citizens' roles in planning services for the retarded.—C. Wright.

9903. Rowitz, Louis. (Illinois Inst for Developmental Disabilities, Chicago) **Sociological perspective on labeling: A reaction to MacMillan, Jones, and Aloia.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 265-267.—Presents a suggestion in response to D. L. MacMillan et al (see PA, Vol 53:Issue 5) that in order to develop better care programs for the mentally retarded, the work of psychologists and educators should be combined for a complete conceptual orientation to the study of labeling.

9904. Rugel, Robert. (Virginia Polytechnic Inst & State U) **The factor structure of the WISC in two populations of disabled readers.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 581-585.—Factor-analyzed WISC subtest scores from 2 populations of disabled readers. Population 1, reported by G. Schiffman and R. L. Clemmens (1966), consisted of 240 public school children (mean age = 12 yrs); Population 2, reported by J. F. Beck (1955), comprised 71 children aged 9-10.11 yrs, who were referred to a university reading clinic; Population 3 was Wechsler's (1949) standardization sample of 200 males and 200 females, age 10½ yrs. Subtests included in A. Bannatyne's Spatial and Conceptual categories were each found to comprise separate factors. Subtests in Bannatyne's Sequential category, particularly Digit Span and Coding, comprised a separate factor in only 1 of the 2 populations. This

suggests that the lowered scores of disabled readers on Digit Span and Coding cannot be accounted for in terms of a single underlying short-term memory ability. It is concluded that the study provides support for regrouping the WISC into Spatial, Conceptual, and Sequential categories. (16 ref)—*Journal abstract*.

9905. Schmitz, Klaus-Wilhelm et al. [Investigations of the tryptophan metabolism in oligophrenic children: II. Vitamin-dependent enzyme patterns (B<sub>1</sub>, B<sub>2</sub>, B<sub>6</sub>) and excretion of the tryptophan metabolites kynurenine, xanthurenic acid, trigonellinamide, and N-methylpyridone.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 353-357.

—Reports finding statistically significant differences between normal and oligophrenic children in vitamin-dependent patterns and in the excretion of specific metabolites. These disturbances may be significantly related to pyridine nucleotide formation. Related kynurenase activity in the liver is also being examined.

9906. Shukla, T. R. & Pershad, Dwarka. (Hosp for Mental Diseases, Postgraduate Training Ctr, Ranchi, India) **Rehabilitation of mentally retarded children.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 28-32.—Notes that of those who visit child guidance clinics, 60% come with the problem of mental retardation (MR). Parents hope that a drug will cure their child and bring him to a normal range of intelligence. It is suggested that parents must learn to accept MR and to train the child with consistency, allowing and encouraging him to develop self-help skills when possible.

9907. Spencer, Douglas A. (Meanwood Park Hosp, Leeds, England) **The use of W.H.O. International Classification of Diseases (mental retardation) in a hospital for mentally handicapped.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 333-335.—In 1969 consultants in British hospitals for the mentally handicapped were asked to use the booklet *A Glossary of Mental Disorders* published by the General Register Office in the completion of Mental Health Inquiry Index Cards. 600 long-term mentally handicapped inpatients were classified according to the section on "mental retardation" in the glossary. The numbers of patients in each of the intellectual and etiological subdivisions of this classification were tabulated with respect to the wards in the hospital. The glossary is a useful instrument for the classification of the residents in a hospital for the mentally handicapped. The classification provides a convenient means of presenting the intellectual levels and diagnostic categories of the patients. Some of the difficulties encountered in the etiological categorization of patients are described.—*Journal summary*.

9908. Steinheiser, Rick & Guthrie, John T. (Johns Hopkins U, Kennedy Inst) **Scanning time through prose and word strings for various targets by normal and disabled readers.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 931-938.—Administered a target-scanning task to 12 10-yr-old disabled readers, 12 10-yr-olds matched for age, and 12 matched for reading level. While reading a simple 5-sentence passage, S searched for a certain type of target: words of a given category, the letter or the phoneme /ae/. All 3 groups were fastest in finding the word targets and slowest in finding the phoneme. The disabled readers were slower than the age-



matched group for all targets. It is concluded that the phonological coding occurred at different rates after graphemic and semantic coding for all 3 groups. —*Journal abstract.*

9909. Striefel, Sebastian & Eberl, Dieter. (U Kansas) **Imitation of live and videotaped models.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 83-88.—Compared the imitative performance of retarded children when the behaviors were presented by live vs videotaped models. Ss were 3 male and 3 female institutionalized adolescents with a mean age of 12.10 yrs and a mean IQ of 58.5. Ss were given an opportunity to respond after each behavior was modeled; each S was exposed to a variety of behaviors and to all experimental conditions. Models of different ages were used. Results show that the videotaped models exerted a great deal of control over the imitative behavior of 50% of the Ss. Such a degree of control by videotape models whose behavior was sterile and unreal suggests that, especially when behaviors were not reinforced, videotape models could be used for the economic training of populations deficient in basic social and language skills. (23 ref)—*P. O'Brien.*

9910. Tarver, Sara G. & Hallahan, Daniel P. (U Virginia) **Attention deficits in children with learning disabilities: A review.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 560-569.—Reviews 21 experimental studies of attention deficits in children with learning disabilities. Included in the review are studies of distractibility, hyperactivity, impulsivity, vigilance, and intersensory integration. From the accumulated evidence, the following conclusions were drawn: (a) Children with learning disabilities exhibit more distractibility than controls on tasks involving embedded contexts (figure-ground perception tasks) and on tests of incidental vs central learning. They are not differentially distracted by other types of distractors such as flashing lights and extraneous color cues. (b) Hyperactivity of children with learning disabilities may be situational-specific, with higher levels of activity being exhibited in the structured situation. (c) Children with learning disabilities are more impulsive, i.e., less reflective, than controls. (d) Children with learning disabilities are deficient in their ability to maintain attention over prolonged periods of time. Studies of attention within a standardized testing framework are also discussed. (35 ref)—*Journal abstract.*

9911. Weller, Leonard; Costeff, Chanan; Cohen, Bernard & Rahman, Dalyah. (Bar-Ilan U, Ramat-Gan, Israel) **Social variables in the perception and acceptance of retardation.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 274-278.—In Israel, the effects of country of origin (Jews of European or Eastern descent), social class of the parents, and level of retardation of the child on parental guilt feelings, perception of the retardation, and acceptance of the child were studied. 76 mothers of retarded children were interviewed. Results show no effect for country of origin. Middle-class parents and parents of severely retarded children more accurately perceived the retardation than lower-class parents or parents whose children were less severely retarded. There were no differences by social class or level of retardation for parental guilt feelings or acceptance of the child. (24 ref)—*Journal abstract.*

9912. Welsandt, Roy F. & Meyer, Philip A. (Wisconsin State U) **Visual masking, mental age, and retardation.** *Journal of Experimental Child Psychology*, 1974(Dec), Vol 18(3), 512-519.—In a recognition task involving both forward and backward visual masking, performance of 20 mildly retarded adolescents was less accurate than that of 20 normal Ss matched for chronological age and 20 matched for mental age. It is suggested that the iconic memory impairment of retarded Ss is attributable in part to mental retardation and not simply to low mental age. (17 ref)—*Journal abstract.*

9913. Wilton, Kerl M. & Boersma, Frederic J. (U Canterbury, Christchurch, New Zealand) **Eye movements and conservation development in mildly retarded and nonretarded children.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 285-291.—Tested 30 nonretarded and 30 mildly retarded elementary-school children (mean ages = 86-123 mo) on 4 Piagetian conservation tasks (number, length, and continuous quantity solid-liquid). Eye movements were recorded during the response period for each task. Comparisons were made between nonretarded conservers and nonconservers and between mildly retarded conservers and nonconservers. Eye movements clearly differentiated conservers and nonconservers in nonretarded and, to a slightly lesser degree, mildly retarded groups. Results indicate that conservation acquisition was accompanied by 2 discernible changes in perceptual activity. Visual exploratory behavior appeared to increase and centration effects to decrease following conservation acquisition. Results are discussed in terms of Piaget's theoretical position and possible cognitive structural differences between nonretarded and mildly retarded children. (19 ref)—*Journal abstract.*

### Speech Disorders

9914. Bloodstein, Oliver. (Brooklyn Coll, City U New York) **The rules of early stuttering.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 379-394.—Analyzed samples of the speech of 6 stuttering 3-6 yr olds on the basis of a conceptual model of stuttering as tension and fragmentation in speech. It was hypothesized that while the older stutterer tends to fragment words, the early phase of stuttering is characterized chiefly by fragmentation of whole syntactic structures such as sentences, coordinate and subordinate clauses, verb phrases, noun phrases, and prepositional phrases. The young stutterer's frequent tendency to stutter on pronouns and conjunctions was related to the model. It is predicted that the loci of early stuttering will not prove to be influenced directly by word-bound factors such as initial sound, word length, or word frequency. (17 ref)—*Journal abstract.*

9915. Tsunoda, Tadanobu & Moriyama, Haruyuki. (Tokyo Medical-Dental U, Japan) **Specific patterns of cerebral dominance for various sounds in adult stutterers.** *Journal of Auditory Research*, 1972(Jul), Vol 12(3), 216-227.—Performed T. Tsunoda's cerebral dominance test (1968) and standard audiometry on 57 adult Japanese stutterers to examine the central auditory mechanism of the speech perception of stutterers. Of the 57 Ss, 11 had conductive hearing losses and 19 had sensorineural losses over 15 db, of which they were

unaware. 54.6% of the Ss showed unusual patterns of cerebral dominance: 29.6% showed dominance for vowel sounds in the left ear and for nonverbal sounds in the right ear (converse of the normal pattern); 25% showed dominance for both vowel and nonverbal sound in the same ear. Results are discussed in relation to cerebral dominance patterns of aphasics. (44 ref)—*M. B. Meikle.*

### Physical & Toxic Disorders

9916. Akesson, Hans O.; Forssman, Hans; Wahlström, Jan & Wallin, Leif. (U Göteborg, Lillhagen Hosp, Sweden) Sex chromosome aneuploidy among men in three Swedish hospitals for the mentally retarded and maladjusted. *British Journal of Psychiatry*, 1974(Oct), Vol 125, 386-389.—Performed chromosome determinations of 117 male patients in 3 hospitals for the mentally retarded and maladjusted who had a body length measurement of 180 cm or more. The finding of 13 patients with gonosomal aneuploidy was overrepresented compared with the general population and suggests that both excess X-chromosomes and Y-chromosomes may produce a predisposition for social deviant behavior in maladjusted mentally retarded persons.

9917. Andreassen, N. J. (U Iowa, Medical School) Neuropsychiatric complications in burn patients. *International Journal of Psychiatry in Medicine*, 1974(Spring), Vol 5(2), 161-171.—Compares typical and pathological reactions to burn. The former include anxiety, mild depression, fear of deformity, and a steadily decreasing pain threshold, while the latter include severe depression, severe regression, and delirium. Data from a 1-yr follow-up and data referring particularly to children are presented. (24 ref)—*Journal abstract.*

9918. Barry, S. Joseph & Larson, Vernon D. (U Oklahoma, Health Sciences Ctr, Oklahoma City) Brief-tone audiometry with normal and deaf school-age children. *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 457-464.—Tested 10 normal and 10 deaf 6-14 yr olds with cochlear losses on a brief-tone audiometric task at 500, 1000, 2000, and 4000 Hz using a modified method of limits. The normal children yielded similar values of temporal integration at all test frequencies, and the results approached closely the theoretical values anticipated on the basis of J. Zwislöck's (see PA, Vol 35:5666) theory. With the exception of the data obtained at 500 Hz, the mean values of temporal integration associated with the deaf group were only about 1/2 the magnitude of those yielded by their normal counterparts. Results conform to what is considered to be typical of the performance of a group of individuals exhibiting cochlear pathology. There was little or no overlap between the distributions of the individual values of temporal integration recorded for the normal and the deaf groups. (26 ref)—*Journal abstract.*

9919. Becerra García, O. & León Barúa, R. (U Peruana Cayetano Heredia, Lima, Peru) [Personality profile and flatulent dyspepsia.] (Span) *Revista de Neuro-psiquiatria*, 1973(Sep), Vol 36(3), 162-168.—Used the Eysenck Personality Inventory (Form B) to study the personality characteristics of 53 patients suffering from flatulent dyspepsia and 53 healthy controls matched for age, sex, and social class. Each group consisted of 16 men and 37 women 18-65 yrs old. Dyspeptic Ss showed

significantly higher neuroticism ( $p < .01$ ) and significantly lower extraversion ( $p < .001$ ) than the controls, whose scores were close to the Eysenck norms. Since the personality of neurotic and introverted individuals corresponds (according to Eysenck) to the ancient melancholic temperament described by Galen, the temperament of patients suffering from flatulent dyspepsia could be considered as melancholic. (French & German summaries) (16 ref)—*English summary.*

9920. Bennett, P. B.; Blenkarn, G. D.; Roby, J. & Youngblood, D. (Duke U, Medical Ctr) Suppression of the high pressure nervous syndrome in human deep dives by He-N<sub>2</sub>-O<sub>2</sub>. *Undersea Biomedical Research*, 1974, Vol 1(3), 221-237.—4 male Ss were compressed to 720 fsw (23 ATA) in 20 min for 1 hr breathing 5.6 N<sub>2</sub>-16.9 He ATA with .5 ATA O<sub>2</sub> (i.e., N<sub>2</sub> = 25%) and the result compared with exposures to 22.5 He-5 O<sub>2</sub> ATA or 7 ATA (200 fsw) compressed air (5.6 ATA N<sub>2</sub>). Measurements were made of EEG, tremor, psychomotor, and intellectual performance, subjective appreciation, and pulmonary function. Decompression using .8 ATA O<sub>2</sub> required 3 days. Ss were also compressed in 33 min to 1000 fsw (31 ATA) breathing N<sub>2</sub>-He-O<sub>2</sub> (5.6 ATA N<sub>2</sub>, = 18%) or He-O<sub>2</sub> or air at 200 fsw (7 ATA). Decompression took 4 days. At both depths with the trimix, N<sub>2</sub> suppressed completely the tremors noted when diving with He-O<sub>2</sub> alone. Psychomotor tests improved markedly, and the nausea and dizziness associated with high pressure nervous syndrome did not occur. Some decrement in intellectual function remained. EEG results showed little change. It is concluded that nitrogen will suppress the high pressure nervous syndrome, but the present partial pressure was too high, causing narcosis and, therefore, needs to be reduced. (30 ref)—*Journal abstract.*

9921. Brown, J. K.; Purvis, R. J.; Forfar, J. O. & Cockburn, F. (U Edinburgh, Scotland) Neurological aspects of perinatal asphyxia. *Developmental Medicine & Child Neurology*, 1974(Oct), Vol 16(5), 567-580.—Studied to a mean age of 21 mo 93 infants who had been asphyxiated at birth. 20 died and 24 had a significant handicap, the severity of which was related to muscle tone: infants with hypotonia or with hypotonia progressing to extensor hypertonus had a bad prognosis, while those with normal flexor tone had a very good prognosis. (French & German summaries)—*P. W. Fruyser.*

9922. Burnam, M. Audrey; Pennebaker, James W. & Glass, David C. (U Texas, Austin) Time consciousness, achievement striving, and the Type A coronary-prone behavior pattern. *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 76-79.—Investigated some behavioral consequences of a coronary-prone behavior pattern called Type A, which is characterized by excessive achievement striving and a sense of time urgency. Ss were 62 undergraduates who were classified by the Jenkins Activity Survey for Health Prediction. The impatient tendencies of 1 type A Ss led them to judge the lapse of 1 min sooner than non-coronary-prone Type B Ss. Results also indicate that Type As worked on a task at near maximum capacity, irrespective of the presence or absence of a time deadline. Type Bs, by contrast, exerted more effort only when the task had an explicit deadline. Both time-estimation and performance find-



ings are discussed in terms of Pattern A as a coping strategy for maintaining control over the physical and social environment.—*Journal abstract.*

9923. Caviness, W. F.; Merritt, H. Houston & Gallup, G. H. (NIH, National Inst of Neurological Diseases & Stroke, Bethesda, MD) **A survey of public attitudes toward epilepsy in 1974 with an indication of trends over the past twenty-five years.** *Epilepsia*, 1974(Dec), Vol 15(4), 523-536.—Reports data from surveys conducted at 5-yr intervals for the past 25 yrs by the American Institute of Public Opinion on attitudes toward epilepsy held by 2,682 American adults. 90-95% of those interviewed knew about epilepsy. When those familiar with epilepsy were asked if they would object to their children playing with epileptics, there was an upward trend in the percentages of respondents who had no objections (during 1949-1974, the percentages increased from 57% to 84%). A similar upward trend in the percentages of respondents who did not view epilepsy as a form of insanity was also reported. In each of the 6 surveys, the most favorable opinions were expressed by the better educated respondents. States in the eastern, midwestern, and western regions showed less prejudice than those in the southern region. (French, Spanish, & German summaries)—*Journal summary.*

9924. Chapman, Sedwell. (Guy's Hosp, Newcomen Ctr, London, England) **Sensori-motor stimulation for the young handicapped child.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 546-547.—Uses J. Piaget's developmental ideas in pointing out the restricted opportunities for sensorimotor stimulation in handicapped children. It is suggested that parents be trained to provide a special stimulation program.

9925. Collen, F. Bobbie & Soghikian, Krikor. (Kaiser-Permanente Health Education Research Ctr, Oakland, CA) **A health education library for patients.** *Health Services Reports*, 1974(May), Vol 89(3), 236-243.—Describes the operation, staffing, and use of a library for medical patients. The library is designed to help patients understand and manage their problems and as an educational resource for the community.

9926. Collignon, R. & Rondeaux, J. (U Catholique Louvain, Service de Neurologie-Neurochirurgie, Belgium) [Clinical approach to the modalities of constructional apraxia secondary to left and right hemispherical cortical lesions.] (Fren) *Acta Neurologica Belgica*, 1974(May-Jun), Vol 74(3), 137-146.—Studied the visuo-constructive functions of 40 right-handed patients with hemispheric lesions to define the type of defects characterized by the laterality of the lesion. Results are discussed in terms of previous findings. (22 ref)

9927. Craig, Thomas J. & Abeloff, Martin D. (Johns Hopkins U, Medical School) **Psychiatric symptomatology among hospitalized cancer patients.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1323-1327.—Administered a 90-item symptom checklist (SCL-90) to 30 patients admitted consecutively to an oncology research unit. More than half of the patients showed moderate to high levels of depression, and 30% had elevated levels of anxiety. Nearly 1/3 had overall symptom patterns virtually identical to those seen in patients admitted to an emergency psychiatric service. The use of this kind of self-administered symptom inventory can be

a valuable adjunct to the identification and management of psychiatric pathology in cancer patients. (30 ref)—*Journal abstract.*

9928. Davies, Lynn & Witt, Peter A. (U Ottawa, Ontario, Canada) **Camping and the handicapped in Canada.** *Journal of Leisureability*, 1974(Jul), Vol 1(3), 9-14.—Surveyed the availability of camping opportunities for handicapped children in Canada, noting the desirability and difficulties of integrating facilities for normal and handicapped children. Staffing and financial needs are cited, and the necessity for specially trained counselors in such integrated camps is stressed.

9929. Dawley, Harold H. & Wingfield, Cecil W. (VA Hosp, New Orleans, LA) **Smoking behavior among hospitalized veterans.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 14-17.—Surveyed 110 hospitalized veterans to determine how much they smoked and their attitudes toward smoking. Results are interpreted to indicate a need for treatment programs to eliminate smoking.

9930. Dietz, V.; Hillesheimer, W. & Freund, H.-J. (U Freiburg, Neurology Clinic, W Germany) **Correlation between tremor, voluntary contraction, and firing pattern of motor units in Parkinson's disease.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Aug), Vol 37(8), 927-937.—11 patients with tremor of parkinsonism showed 3 characteristics of motor unit activity—rhythmic spontaneous resting discharge, abnormally low firing rates during voluntary contraction, and consistent differences in firing pattern between small and large motor units. Smaller units discharged once per tremor beat at weak contractions but changed into bursts of 2 or 3 spikes/beat at stronger forces. Large units were later recruited and fired preferentially once per beat. It was also found that tremor was strongly influenced by the force of voluntary contraction; it was strongest at rest or during weak muscular effort and with increasing force became continuously of higher frequency and smaller amplitude. It is suggested that both changes were the consequence of increasing discharge rates of motoneurons at stronger contractions. (21 ref)—*Journal abstract.*

9931. Dikmen, Sureyya & Reitan, Ralph M. (U Wisconsin, Neuropsychology Lab) **MMPI correlates of localized cerebral lesions.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 831-840.—Administered the MMPI to 59 Ss (mean age range = 36.8-44.6 yrs) with lateralized lesions principally involving anterior or posterior cerebral areas. Results indicate that people with cerebral lesions show evidence of some degree of emotional disturbance, characterized particularly by neurotic-like manifestations. In contrast to a number of previous research reports, differential findings did not emerge in association with the location of cerebral lesions. Based on the present results as well as review of the literature, it is concluded that laterality or caudality of lesion, per se, as the criterion for group composition based upon pathoanatomical information does not have a major differential influence on MMPI variables when groups of patients with mixed lesion types, as those represented in the present sample, are considered. (26 ref)—*Journal abstract.*

9932. Dobrokhotova, T. A. & Braghina, N. N. (Ministry of Health, Scientific Research Inst of Psychiatry, Moscow, Russian SFSR) **[Functional asymmetry of the cerebral hemispheres in psychopathological cases due to brain lesions.]** (Russ) *Voprosy Psikhologii*, 1974(Mar-Apr), No 2, 95-103.—Reviews research on the differential effect on psychopathological manifestations of lesions in the 2 cerebral hemispheres. Midline lesions are accompanied by an increase or decrease in the intensity of all mental functions, while lesions in 1 hemisphere or the other lead to more differentiated disturbances. These differ also for symmetric loci in the 2 hemispheres. Disturbances of speech and speech-related functions occur most frequently with lesions in the left hemisphere, whereas right hemisphere lesions lead to problems in the perception of the environment, oneself, space, and time. With the exception of the frontal regions, lesions in the left hemisphere lead to an arousal of personality functions as well as to depressive states, whereas lesions in the right hemisphere, with the exception of the temporal regions, lead to passivity, a drop in arousal level, and inadequate emotional responses, such as euphoria or nonchalant attitudes. (English summary) (38 ref)—L. Zusne.

9933. Duane, Drake D. (Mayo Medical School, Rochester, MN) **A neurologic overview of specific language disability for the non-neurologist.** *Bulletin of the Orton Society*, 1974, Vol 24, 5-36.—Presents a comprehensive review of the literature of neurology, anatomy, linguistics, and psychology relating to language disabilities, in the following 5 sections: (a) definition; (b) functional neuroanatomy; (c) neurophysiology and neurochemistry; (d) etiologic factors; and (e) language acquisition. The directions of future research are delineated with possible implications regarding language disabilities. A model is described from which the etiology, characteristics, remediation, and philosophy of language disabilities are determined. (2½ p ref)—G. R. Alley.

9934. Field, Michael A. & Faed, Michael J. (Royal Hosp for Sick Children, Edinburgh, Scotland) **47, XYY chromosome constitution, physical growth and psychological disturbance: A case study.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 323-327.—Presents a case of a 13-yr-old male in which factors, among them an XYY chromosome constitution, may have contributed to disturbed behavior. These factors were interrelated and included rate of growth, emotional immaturity, school difficulties, and family illness. Social responses to the patient's appearance and behavior made management difficult. The patient responded in part to psychiatric and social intervention.—*Journal summary*.

9935. Gough, Harrison G. (U California, Inst of Personality Assessment & Research, Berkeley) **Personality factors related to reported severity of menstrual distress.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 59-65.—Administered the Moos Menstrual Distress Questionnaire, reporting menstrual, premenstrual, and intermenstrual reactions, to 201 women (116 undergraduates). Factor analysis of a 24 × 24 matrix (8 scales for each period) identified symptoms at menstruation as the principal component. Estimates of scores on

this criterion were attempted by means of regression, typological, and decision-tree analyses, using scales from the California Psychological Inventory and the Personal Values Abstract as predictors. Correlations between estimated and reported distress were .36 for the typology, .38 for the decision tree, and .41 for the regression equation. Although the 3 methods did not differ greatly in accuracy, they did appear to emphasize somewhat different configurations of personality variables. (23 ref)—*Journal abstract*.

9936. Gross, Mortimer D. & Wilson, William C. (U Illinois, Medical Ctr, Chicago) **Minimal brain dysfunction.** New York, NY: Brunner/Mazel, 1974. xv, 206 p. \$10.95.—Reports findings from diagnostic, neurological, psychological, and statistical evaluations of 1,056 children with minimal brain dysfunction (MBD). The natural history of MBD is examined, and a detailed description of the treatment program, case studies, and theoretical considerations related to the pathogenesis and etiology of MBD are presented. (9½ p ref)

9937. Guarniero, G. (New York U) **Experience of tactile vision.** *Perception*, 1974, Vol 3(1), 101-104.—The author, who is a doctoral candidate in philosophy and who is congenitally blind, describes his experiences during a 3-wk training course with the Tactile Vision Substitution System, undertaken to give him some access to the concept of visual space. The technique of transmitting an image picked up by a TV camera to the skin of the back is detailed, as well as the author's gradual development of the ability to "see" or interpret the sensory inputs to the somatosensory cortex. The acquisition of such skills as recognizing the orientation of straight lines, inferring familiar objects from their proximal size, differentiating between objects and "noise" (patterns of light), understanding the concept of perspective (apparent convergence of parallel lines) and of size with respect to distance, correlating distance with elevation in the "visual field," and developing the rudiments of hand-eye coordination are discussed.—B. McLean.

9938. Heinen, James R.; Stock, William A. & Tharinger, Deborah. (Old Dominion U) **Modality-specific imagery and associative learning in the deaf and hearing.** *Bulletin of the Psychonomic Society*, 1974(Nov), Vol 4(5-A), 462-464.—Previous research has shown that recall performance of blind Ss is affected by auditory, but not visual word imagery, whereas the reverse is true for sighted Ss. The present study explored the possibility of a parallel effect with deaf Ss. 14 congenitally deaf and 14 hearing high school students learned lists of paired associates that were either high visual and low auditory imagery words or vice versa. It was predicted that deaf Ss would perform similar to hearing Ss with pairs of high visual imagery but worse with materials of high auditory imagery. Results fail to demonstrate the expected interaction. Instead, performance was uniformly superior for the visual materials, and there was no significant difference between deaf and hearing Ss. Possible reasons for this outcome are discussed.—*Journal abstract*.

9939. Hécaen, H.; Goldblum, M. C.; Masure, M. C. & Ramier, A. M. (Unité de Recherches Neuropsychologiques et Neurolinguistiques, Paris, France) **[A new observation of object agnosia: Is the specific deficit for**



the visual modality one of association or of categorization?]) (Fren) *Neuropsychologia*, 1974(Oct), Vol 12(4), 447-464.—Reports the case of a 43-yr-old male with visual object agnosia, associated with pure alexia and color agnosia but with no impairment on recognition of shapes, faces, or spatial data. The S showed no sign of general intellectual deterioration, his speech was unimpaired, and his visual acuity excellent. The symptom appeared following a large occipital left lobectomy. From the results on a series of tests it is concluded that this visual agnosia is of associative type but that the basic disorder represents a specific categorization deficit for visual inputs. (German summary) (26 ref)—*English abstract*.

9940. Imperato-McGinley, Julianne; Guerrero, Luis; Gautier, Teofilo & Peterson, Ralph E. (Cornell U, Medical Coll, New York) **Steroid 5 $\alpha$ -reductase deficiency in man: An inherited form of male pseudohermaphroditism.** *Science*, 1974(Dec), Vol 186(4170), 1213-1215.—In a study of 24 male pseudohermaphrodites born with ambiguity of the external genitalia, and raised as girls, Ss showed marked virilization at puberty and unequivocally male psychosexual orientation. Biochemical evaluation revealed a marked decrease in plasma dihydrotestosterone secondary to a decrease in steroid 5 $\alpha$ -reductase activity. It is concluded that, in utero, the decrease in dihydrotestosterone resulted in incomplete masculinization of the external genitalia. Inheritance was autosomal recessive.—*Journal abstract*.

9941. Jones, Reginald L. (U California, Berkeley) **Correlates of orthopedically disabled children's school achievement and interpersonal relationships.** *Exceptional Children*, 1974(Nov), Vol 41(3), 191-192.—A study of 102 children (6-16 yr olds) shows that Ss of all degrees of mobility showed the full range of achievement, pupil-teacher relationships, and peer relationships, and both internal and external locus of control. Rated physical dependency was also statistically independent of achievement or relationships with teachers and peers.

9942. Kaplan, Bert L. & Kaplan, Theadora. (Queens Coll, City U New York) **Developmental psychology and the visually handicapped.** *Clinical Social Work Journal*, 1974(Sum), Vol 2(2), 113-119.—Presents 4 brief case histories describing blind students' behavior. All students are reported to exhibit extreme anxiety when something is expected of them. Their behavior is interpreted in the light of M. Mahler's separation-individuation concept.

9943. Keith, Ronald M. **High activity and hyperactivity.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 543-544.—Stresses the need for carefully differentiating between the 2 disorders in diagnosis.

9944. Kendall, Norman. (Temple U, Health Sciences Ctr) **The challenge of neonatal mortality in an urban hospital.** *Health Services Reports*, 1974(May), Vol 89(3), 263-266.—Compares 1960-1964 neonatal mortality rates in 1 hospital with the 1965-1969 rates, with Swedish rates in 1965, and with US rates in 1960 and 1968.

9945. Kogan, Kate L.; Tyler, Nancy & Turner, Patricia. (U Washington) **The process of interpersonal adaptation between mothers and their cerebral palsied children.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 518-527.—Studied the interaction

between mothers and their cerebral palsied children (all under 5 yrs old) in 3 play and therapy sessions held at 10-mo intervals. Affection and positive acceptance by the mother decreased gradually, especially toward children who did not walk by the end of the study. This may be an iatrogenic effect stemming from heightened optimism at the beginning of a new treatment program. (French, German, & Spanish summaries)—*P. W. Pruyser*.

9946. Korten, J. J. & Ketterings, K. (U Nijmegen, Neurological Clinic, Netherlands) **[Anthropological aspects of Parkinson's disease.]** (Germ) *Nervenarzt*, 1972(Apr), Vol 43(4), 201-205.—Presents a theoretical discussion of Parkinson's disease, its symptoms, syndromes, development, etc. The characteristics of the patients, determinant factors, manifestations and course of the disease are analyzed chiefly in terms of anthropology but also from psychological, psychiatric, and psychosomatic viewpoints.—*T. Fisher*.

9947. Koskineniemi, M. (U Helsinki, Children's Hosp, Finland) **Psychological findings in progressive myoclonus epilepsy without Lafora bodies.** *Epilepsia*, 1974(Dec), Vol 15(4), 537-545.—Administered either the WAIS, WISC, or A. Lehtovaara's version of the Stanford-Binet Intelligence Scale to 65 patients with progressive myoclonus epilepsy without Lafora bodies. 25 Ss were reevaluated after a mean of 6 yrs. Intelligence was relatively intact after this period in contrast with the patients' poor physical conditions. The estimated IQ at onset was 92 and decreased by about 10 points in 10 yrs. This diminution began before the appearance of clear clinical symptoms. Low test scores correlated significantly ( $p < .01$ ) with duration of the disease and with age. Subtests dealing with similarities, information, and comprehension were least affected; those dealing with digit span and arithmetic were most affected. The surprisingly high IQ of these patients in comparison with those having progressive myoclonus epilepsy with Lafora bodies suggests that the 2 diseases are distinct clinical and histopathological entities. (French, Spanish, & German summaries) (20 ref)—*Journal summary*.

9948. Krankenhagen, B. & Köhler, G. K. (U Bonn, Neuroclinic, W Germany) **[Alzheimer's disease.]** (Germ) *Fortschritte der Neurologie, Psychiatrie und ihrer Grenzgebiete*, 1973(Mar), Vol 41(3), 141-165.—Studied the course of Alzheimer's disease in 16 female and 5 male 46-65 yr old patients with anamneses of 4-120 mo duration prior to admission at a clinic. Ss also were examined in order to investigate the connections between pneumoencephalographic, EEG, and psychopathological findings, especially brain-electric-psychopathological correlations. Ss underwent neurological and psychopathological examinations and cerebrospinal fluid tests. Results are presented in several graphs and tables and discussed in detail. The observations and findings of the Es are described and discussed. (English summary) (1 p ref)—*T. Fisher*.

9949. Lievens, Paul. (U Louvain, Belgium) **The organic psychosyndrome of early childhood and its effects on learning.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 626-631.—A psychological and pedagogic study of 22 7-12 yr old children in whom the only abnormal feature in the case history was neonatal cerebral effects, indicates that there were various

anomalies of function which caused learning deficits in 3 specific areas—inadequacy of attention, inadequacy of motor control, and inadequacy of emotional and thymic control.

9950. Maghazaji, H. I. (Baghdad U, Medical Coll, Iraq) **Psychiatric aspects of methylmercury poisoning.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Aug), Vol 37(8), 954-958.—Studied 43 patients with methylmercury poisoning. Results indicate that 74.4% of the patients showed some degree of depression; their blood levels of mercury were higher than the average values for the whole group, and considerably higher than the blood levels of the nondepressed patients. Irritability was observed in 44.2% of the patients, all except 1 of the 19 being under 30 yrs old. There was general improvement in the mental states of the patients who were hospitalized. Mercury binding compounds did not seem to have a significant effect in enhancing recovery from the depressive state. The possibility of there being 2 distinct syndromes, due to organic and inorganic mercury poisoning, is discussed.—*Journal abstract*.

9951. Martin, M. C. (Royal National Inst for the Deaf, London, England) **Critical bands in sensori-neural hearing loss.** *Scandinavian Audiology*, 1974, Vol 3(3), 133-140.—Evaluated the relative loudness of a pair of tones as compared with a 2-kHz single tone for 10 normal-hearing Ss and 10 with cochlea deafness. A loudness balancing technique was used. Deaf Ss showed a reduced loudness effect which might suggest an extensive widening of the critical band mechanism. Consideration is given to the implications of objective measurements where a much wider critical bandwidth is found in normal-hearing Ss, and to an explanation in terms of a deranged loudness function only.—*Journal abstract*.

9952. Mellan, J.; Raboch, J. & Kohlček, J. (U Karlova, Fakulta všeobecného lékařství, Prague, Czechoslovakia) **[The problem of prostatic neurosis.]** (Czech) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 112-117.—Studied 175 cases of chronic prostatitis, using a directed interview and 2 questionnaires. A significant relation was found between concomitant sexual disorders and high neuroticism and low dominance. The patients generally came from socially weaker families and were laborers working under bad climatic conditions. Half of them reported objective difficulties in their marital life. Complaints about lack of understanding shown by their wives were common. Findings confirm the experience of psychosomatic medicine that physical symptoms are more frequent in patients with low education, while mental difficulties predominate among university students. (Russian & English summaries)—*V. Fischmann*.

9953. Merskey, H. (National Hosp for Nervous Diseases, London, England) **A case of multiple tics with vocalisation (partial syndrome of Gilles de la Tourette) and XYY karyotype.** *British Journal of Psychiatry*, 1974(Dec), Vol 125, 593-594.—Reports the case of a 19-yr-old male with XYY sex chromosomes who suffered from Gilles de la Tourette syndrome with vocalization. The occurrence of multiple tics and vocalization in this patient strongly suggests that the extra chromosome promotes neurological abnormality.

9954. Metzke, Hermann. (Universitäts-Kinderklinik, Halle/Saale, E Germany) **[Intrafamilial similarity and interfamilial differences in the course of diffuse infantile familial brain sclerosis (Type Krabbe).]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 364-368.—Reports a striking uniformity in the intrafamilial course of a fatal degenerative brain disease in children. Positive diagnosis of diffuse infantile brain sclerosis can be made at birth, and death seems certain within the 1st 2 yrs of life. Siblings born within a short time seem to inherit the same disease and also die in infancy. Positive diagnosis is made through pneumoencephalograms even before a generalized hydrocephalic condition develops.—*K. J. Hariman*.

9955. Moore, W. H. & Weidner, William E. (Auburn U) **Bilateral tachistoscopic word perception in aphasic and normal subjects.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 1003-1011.—Examined the role of the right cerebral hemisphere in linguistic perception following left cerebral insult which produced aphasia. Bilateral tachistoscopic procedures, employing a central fixation mark, were utilized to investigate the visual half-field preferences of 30 aphasic Ss, grouped relative to the amount of time since the onset of left cerebral insult, and a group of 10 normal, control Ss. Statistical analyses indicated a significant left visual half-field preference for the aphasic Ss. In contrast, a significant right visual half-field preference was revealed for the normal group. (46 ref)—*Journal abstract*.

9956. Orbach, Charles E. (Westfield Massachusetts Mental Health Clinic) **Ideas of contamination in postoperative colostomy patients.** *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 269-282.—Discusses ideas of contamination reported in men and women having colostomies. Rituals of cleanliness control are performed to prevent contamination. Anxiety about contamination appears primarily during irrigation and relates to the toxic poisoning of their own body interiors, the exterior of the body, and the immediate surroundings. Historically, contamination ideas have been related to sexual anxieties, but case material presented extends the anxiety to anal and oral functions.—*B. Smith*.

9957. Owen, David R.; Baker, Eugene A. & Oikawa, Kiyoshi. (Brooklyn Coll, City U New York) **Search for 47, XYY among emotionally disturbed boys.** *Behavior Genetics*, 1974(Dec), Vol 4(4), 411-413.—Cytogenetic examinations of 55 "tall," emotionally disturbed, culturally disadvantaged 5-14 yr old boys failed to reveal any chromosome anomalies.

9958. Palmblad, Jan et al. **Stressor exposure and human interferon production. Reports from the Laboratory for Clinical Stress Research**, 1974(Apr), No 35, 8 p.—8 women conducted a 77-hr vigil with performance on an electronic rifle range, interrupted by 15-min periods for answering questionnaires and for physical maintenance. The experiment continued for the 3 days without any rest or sleep and with a ban on stimulants or smoking. Blood and urine sampling suggested hormonal changes compatible with a stress reaction. Interferon production induced by adding Sendai virus to blood rose during the stress exposures, suggesting that in man as in lower animals psychosocial stimuli may affect the ability of certain cells to produce



interferon. It is suggested that stress may play a part in the complex defense system against viral infections.—*R. L. Sulzer.*

9959. **Pasquinucci, Paolo J.** (U Florence, Medical School, Inst of Psychology, Italy) [**Amenorrhea of psychosomatic nature: A clinical-psychological study.**] (Ital) *Medicina Psicomatica*, 1972(Oct), Vol 17(4), 325-351.—Interviewed 14 Ss affected by psychogenic amenorrhea and administered the Rorschach test and the MMPI. Study of the results indicates that amenorrhea must be considered in a broad perspective. Treatment must include analysis of the self-image and restructuring of the whole personality. (English & French summaries) (29 ref)

9960. **Patterson, C. D.; Erdberg, Philip & Stofac, Robert.** (U Missouri, Medical School, Inst of Psychiatry, St Louis) **Psychiatric and MMPI studies of patients with foveomacular retinitis.** *Military Medicine*, 1974(Dec), Vol 139(12), 972-977.—Studied, through psychiatric interviews and MMPIs, 10 consecutive male military patients with foveomacular retinitis (FMR). The psychiatric interviews revealed considerable premorbid maladjustments in their school, family, and military life and a high degree of premorbid emotional stress. The MMPIs were analyzed alone, compared with a normal group of MMPIs, and finally compared with an inpatient psychiatric groups' MMPIs. The analysis of the FMR MMPIs showed them to be clearly pathologic. The comparison between the FMR and normal MMPIs indicated the former to have significantly more pathological findings on every clinical scale, and to appear very similar to the group of inpatient psychiatric MMPIs.—*Journal abstract.*

9961. **Pech, Karel.** (U Prague, Czechoslovakia) **Psychological factors in cancer.** *International Mental Health Research Newsletter*, 1974(Sum), Vol 16(2), 1, 12.—Hypothesizes that growing entropy, or increasing disorder in the life of the individual, is a major determinant of cancer. Referring to earlier findings that cancer victims have often experienced traumatic and lasting life changes, the argument describes how the body's resistance to outside influences decreases progressively after birth, and if the severity or number of changes exceeds the individual's tolerance, a defensive reaction may take place in the form of tissue growth for which the body no longer has effective control mechanisms. Several specific types of crucial changes occurring between the ages of 40 and 50 are described.—*C. A. Heikkinen.*

9962. **Perino, Joseph & Ernhart, Claire B.** (Half Hollow Hills Public Schools, Dix Hills, NY) **The relation of subclinical lead level to cognitive and sensorimotor impairment in black preschoolers.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 616-620.—Studied 80 3-5 yr old black preschool children to determine the relation of blood lead levels to cognitive and perceptual-performance functioning. Results show that Ss' lead levels were below the criteria set for lead poisoning, but a regression formula revealed that the relationship was significant, and as lead level increased general cognitive, verbal, and perceptual abilities decreased. Lead levels were not related significantly to parental intelligence, birth order, birth weight, and number of siblings. It was, however, related to the educational level of the parents.

It is concluded that the criteria set for lead poisoning warrant reexamination. (15 ref)—*Journal abstract.*

9963. **Peuser, G. & Leischner, A.** (Rheinische Landes-klinik für Sprachgestörte, Bonn, W Germany) [**Disturbance of phonetic writing in an aphasic patient.**] (Germ) *Neuropsychologia*, 1974(Oct), Vol 12(4), 557-560.—Results of testing a male philologist with sensory-amnesic aphasia show that, although both the S's normal orthographic and phonetic transcriptions of dictation were affected by his disorder, the phonetic transcription was superior to the orthographic. It is inferred that the S's receptive defect was due to faulty semantic rather than phonetic decoding.

9964. **Polzien, P. & Roggenkämper, R.** (Medizinische Universitäts-Poliklinik Würzburg, W Germany) [**An approach to somatic analysis of neuroses: Urinary excretion of vanillin-mandelic acid under stress in patients with high neuroticism.**] (Germ) *Nervenarzt*, 1972(Jun), Vol 43(6), 305-308.—Administered 2 versions of Maudsley-Eysenck inventories to 24 male and 7 female patients with medical indications for biopsy of the liver (blind puncture). Rectal temperatures and urine samples were obtained hourly starting at noon (8 hrs before biopsy) and continuing until 24 hrs after biopsy. Excretion of vanillin-mandelic acid (VMA) for 24 hrs correlated positively with basal metabolic rate. Sex differences in VMA excretion exist, but VMA excretion relative to basal metabolic rate did not vary with sex. Body temperature and VMA excretion per minute were correlated. Before biopsy (stress), highly neurotic Ss excreted more VMA than "normally" neurotic Ss. After biopsy, the mean increase in VMA excretion was 28% among the highly neurotic Ss, and 87% in the normal Ss. Elevated VMA excretion persisted during the night in the highly neurotic Ss. It is suggested that increased VMA excretion may correlate with anxious expectation.—*J. Rutschmann.*

9965. **Pulos, Steven M.; Wollitzer, Alison O. & Vitale, John H.** (York U, Downsview, Ontario, Canada) **Body image alterations in adults due to cerebrovascular insufficiency.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 540-546.—Studied changes in body-image boundary in 81 male patients (mean age—63 yrs) with cerebrovascular insufficiency having varying degrees and sites of impairment. Barrier and Penetration scores were derived from the Rorschach Test according to the S. Fisher and S. E. Cleveland (1968) technique and were correlated with several indices of impairment and analyzed for changes over a 2-yr period. Penetration scores were associated with 3 measures of intellectual ability, including WAIS scores. Barrier scores were correlated with verbal ability and vertebrobasilar angiogram. Barrier changed over time with a quadratic trend, while Penetration did not change. (29 ref)—*Journal abstract.*

9966. **Remschmidt, H.** (Phillips U Marburg, Psychiatric Clinic for Children & Juveniles, W Germany) [**Prejudices towards epileptics.**] (Germ) *Nervenarzt*, 1972(Apr), Vol 43(4), 197-200.—Studied hetero-stereotypes towards epileptics in 300 Ss from different strata of the population and auto-stereotypes in 53 epileptic patients. The discrimination scores of Ss were computed on the basis of data obtained by a 55-item, 5-step scale

list of adjectives divided into 3 categories—positive, negative, and neutral—but listed in random sequence. The questionnaire was tested for consistency by item and cluster analysis and produced high reliability coefficients. Results indicate that (a) most of the 300 Ss had negative prejudices, scored high on negative qualities and very low on positive ones; (b) the self-reports of the 53 epileptic Ss revealed much more favorable and positive attitudes and higher scores on positive qualities; and (c) the difference between hetero- and auto-stereotypes manifested itself significantly in regard to positive ( $p = .05$ ) and negative ( $p = .01$ ) qualities, while there was no difference in regard to the neutral ones. (17 ref) —T. Fisher.

9967. Robbins, Paul R.; Meyersburg, Herman A. & Tanck, Roland H. (George Washington U, Medical School) **Interpersonal stress and physical complaints.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 578-585.—Studied the relationship between a measure of interpersonal stress and report of physical symptoms in 85 undergraduates who kept a structured diary for 1 wk. A positive relationship was found between the diary measure of interpersonal stress and an overall tendency to report physical complaints. Positive relationships were also found between the measure of interpersonal stress and report of specific symptoms (e.g., dizziness and back problems). Interpersonal stress appeared higher on symptom days than nonsymptom days, but little evidence was found for higher stress on days immediately preceding symptoms.—*Journal abstract*.

9968. Rodda, Michael. (Dept of Health & Social Security, London, England) **Behavioral disorders in deaf clients.** *Journal of Rehabilitation of the Deaf*, 1974(Apr), Vol 7(4), 1-13.—Describes experiences in working with a rehabilitation program for deaf clients and discusses the etiology, classification, and remediation of behavioral problems with deaf adolescents and young adults.

9969. Rosner, Fred. (Long Island Jewish—Hillside Medical Ctr, Queens Hosp Ctr, NY) **Emotional care of cancer patient: To tell or not to tell.** *New York State Journal of Medicine*, 1974(Jul), Vol 74(8), 1467-1469.—Discusses psychological and ethical considerations involved in informing the terminally ill cancer patient about his disease. It is suggested that the patient should be informed of the nature of his illness unless the physician and family decide that frankness would cause the patient physical or mental harm.

9970. Satterfield, James H.; Cantwell, Dennis P. & Satterfield, Breana T. (Gateways Hosp, Los Angeles, CA) **Pathophysiology of the hyperactive child syndrome.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 839-844.—Presents results from 4 previously reported studies of 6-9 yr old boys which suggest that some hyperactive children may be characterized as having a low central nervous system (CNS) arousal level. Evidence from animal and human neurophysiological studies suggests that this low arousal level may be accompanied by low levels of inhibition in the CNS. A neurophysiological model of low CNS arousal and inhibition explains in part the hyperactive child's disorganized and disruptive behavior. The essence of this model is lack of inner controls over motor output and sensory input, resulting in behavioral and learning

problems. Stimulant medications are viewed as restoring both CNS arousal and inhibitory levels to normal, providing the child with better controls and permitting a wider range of behavioral patterns. (57 ref)—*Journal abstract*.

9971. Schachter, Joseph; Kerr, Joyce L.; Wimberly, Francis C. & Lachin, John M. (U Pittsburgh, Medical School) **Heart rate levels of black and white newborns.** *Psychosomatic Medicine*, 1974(Nov-Dec), Vol 36(6), 513-524.—Suggests that the higher heart-rate levels found among 78 black newborns (compared to 68 white newborns) may be a precursor of hypertensive disease. (79 ref)

9972. Schwartz, Ellen R. (Children's Hosp of Philadelphia, PA) **Characteristics of speech and language development in the child with myelomeningocele and hydrocephalus.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 465-468.—Notes that children with myelomeningocele and shunted hydrocephalus typically acquire language normally but also develop a characteristic language usage that has been labeled "cocktail party speech." This pattern is described and some explanations of its decreasing occurrence are proposed. The speech clinician's role in managing the child with myelomeningocele and hydrocephalus is described.—*Journal abstract*.

9973. Segers, M. J.; Graulich, P. & Mertens, C. (U Louvain, Belgium) **[Psycho-bioclinal relationships in a group of coronary patients: Preliminary study.]** (Fren) *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 307-313.—Of 1,695 males who volunteered for a coronary heart disease (CHD) screening test, 176 showed clinical or EKG symptoms of coronary disease. Comparisons were made on the Anxiety Scale of the Institute for Personality and Attitude Testing and on the Zung Depression Scale, and the CHD bioclinal risk factors were compared for (a) the coronary patients and the whole sample, (b) the younger and older Ss in the coronary sample, and (c) Ss who had previously seen a doctor about their cardiac complaints and those who had not. Significant differences appeared between the groups for psychological but not physical variables. Ss with coronary symptoms had more overt and covert anxiety. Those who had seen a physician about their symptoms were more depressed and anxious than those who had not. Diastolic blood pressure correlated significantly with anxiety measures among the coronary Ss.—W. G. Shipman.

9974. Shallice, Tim & Warrington, Elizabeth K. (National Hosp, London, England) **The dissociation between short term retention of meaningful sounds and verbal material.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 553-555.—2 patients (30 and 36 yrs old, respectively) with a specific deficit of auditory verbal short-term memory were tested on 2 tasks of short-term retention, one involving verbal material—letters—and the other nonverbal material—meaningful sounds. 10 extracerebral-lesioned patients served as matched controls. There was a striking dissociation between Ss' performance on the 2 tasks, only their performance on the verbal tasks being impaired. Results are discussed in the context of the function of this short-term memory system. (French & German summaries)—*Journal abstract*.



9975. Simpson, Michael T. et al. (Medical Coll Georgia, Augusta) **Exercise-induced catecholamines and platelet aggregation in the coronary-prone behavior pattern.** *Psychosomatic Medicine*, 1974(Nov-Dec), Vol 36(6), 476-487.—Studied catecholamines and platelet aggregation in relation to physical fitness and psychological traits of 48 male college students at rest and after exercise challenge. Test scores were significantly associated with variables derived from the in vitro reactivity of blood platelets. Men characterized by high time urgency, impatience, haste, and irritability had higher platelet counts in their whole blood. They also had less of a decrease in percent of platelet aggregation in response to noradrenaline after exercise, a shorter duration of platelet aggregation time in response to adenosine diphosphate (ADP), and a greater likelihood of irreversible "2nd slope" aggregation than the less hurried, more calm men. Men scoring high on C. Jenkins's (1969) Type A or coronary-prone behavior scale also failed to show a decrease in percent of platelet aggregation in response to noradrenaline after the challenge of exercise. In addition, the duration of the aggregation to ADP was much shorter in Type A's at rest and relatively unaffected by exercise. (20 ref)—*Journal abstract*.

9976. Sipos, Jörg & Tägert, Jochen. (Hannover U of Medicine, Neurological Clinic, W Germany) [Short procedure for the diagnosis of aphasic disturbances.] (Germ) *Nervenarzt*, 1972(Apr), Vol 43(4), 207-211.—Discusses the Token-Test of De Renzi, Vignolo, and Boller for diagnosing aphasic disturbances (left-side brain lesions) and reports on the use of a shortened version administered to 28 patients with left-side lesions, 28 with right-side lesions, 3 with diffuse brain atrophies, and 31 healthy controls. The goal of the investigation was to supplement the routine topical diagnostic examination of organic brain diseases by tests of psychic functions. The short test can be given by personnel without any medical training and takes only a few minutes. The methods and results of the experiment are described in detail. It is believed that the test could be of great value in selecting aphasics for rehabilitation treatment, in controlling the course of treatment, and in evaluating methods of treating cerebral diseases.—*T. Fisher*.

9977. Speiser, Abraham M. (Fairleigh Dickinson U, School of Dentistry) **Another culture, another time.** *Journal of the American Geriatrics Society*, 1974(Dec), Vol 22(12), 551-552.—3 experiences with geriatric Navajo Indians are presented. They illustrate cultural and physical differences which affected dental and other treatment.

9978. Spinetta, John J.; Rigler, David & Karon, Myron. (San Diego State U) **Personal space as a measure of a dying child's sense of isolation.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 751-756.—Used interpersonal distance measures to objectify the sense of isolation said to be present in a child with fatal illness as he nears death. When asked to place each of 4 significant figures (nurse, doctor, mother, father) at their usual place in a 3-dimensional hospital-room replica, 25 6-10 yr old leukemic children placed the figures at a distance significantly greater than did the matched control group of 25 chronically ill hospitalized children. Although the distance of placement increased

with both groups in subsequent admissions, the leukemic children increased the distance significantly more than did the chronically ill, lending strong support to the hypothesis that the sense of isolation grows stronger as the child nears death. A final placement of preferred distance leads to the conclusion that the 6-10 yr old fatally ill child not only perceives a growing psychological distance from those around him but for whatever reason prefers it that way. (22 ref)—*Journal abstract*.

9979. Strupp, Hans H. et al. **Effects of suggestion on total respiratory resistance in mild asthmatics.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 337-346.—Gave 13 mild asthmatics inhalations of saline—described as either a neutral substance or a bronchoconstrictor—and Isuprel (isoproterenol)—described as either a bronchodilator or a bronchoconstrictor. Measurements of total respiratory resistance were taken before and after each inhalation. All suggestions except saline-neutral had a significant effect on the 1st inhalation. Analysis of individual data revealed 2 groups: reactors and nonreactors.—*W. G. Shipman*.

9980. Tew, Brian; Laurence, K. M. & Samuel, P. (Welsh National School of Medicine, Heath Park, Cardiff) **Parental estimates of the intelligence of their physically handicapped child.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 494-500.—Converted parents' estimates of the intelligence of 57 spina bifida children 9-15 yrs old into IQ scores and 53:Issue 5) them against obtained WISC scores. Parents tended to slightly overestimate their children's intelligence; considerable distortion occurred in the 60-80 IQ range. (French & German summaries) (28 ref)—*P. W. Pruyser*.

9981. Tew, Brian; Payne, Helly; Laurence, K. M. & Rawnsley, K. (Welsh National School of Medicine, Heath Park, Cardiff) **Psychological testing: Reactions of parents of physically handicapped and normal children.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 501-506.—Studied reaction of Cardiff parents to testing of a group of 56 spina bifida children (see PA, Vol 53:Issue 5) and a control group of 56 normal children matched for sex, social class, family size, and area of residence. Parents of the handicapped children significantly distorted the test results in the direction of normality, especially for children in the 60-80 IQ range. (French, German, & Spanish summaries)—*P. W. Pruyser*.

9982. Warrington, Elizabeth K. & Weiskrantz, L. (National Hosp, London, England) **The effect of prior learning on subsequent retention in amnesic patients.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 419-428.—Conducted 5 experiments in which the properties and limits of cued recall were explored in 4 58-64 yr old amnesics. Certain qualitative differences in the performance of amnesic Ss compared with a total of 41 extracerebral-lesioned matched controls were obtained. First, the phenomenon of differential efficacy of cued recall in amnesic Ss was replicated. Second, restricting the number of response alternatives was more effective in amnesic than normal Ss. Third, some evidence for enhanced effects of prior learning on retention was shown in amnesic Ss. Findings are incompatible with an interpretation in terms of a failure of consolidation, but are compatible with one that attaches importance to

interference phenomena in the amnesic syndrome. (French & German summaries)—*Journal abstract*.

9983. Wax, Douglas E. (U Michigan, Medical School) **Clinical-medical issues for the health professional who is also a leukemic.** *International Journal of Psychiatry in Medicine*, 1974(Spr), Vol 5(2), 135-141.—Discusses the fact that the health professional is in a unique but often awkward role when he falls victim to life-threatening illness and becomes a patient. Accustomed to the role of caretaker, he experiences an abrupt role reversal accompanied by depression, loss of self-esteem, and the continual operation of defenses designed to protect himself in a period of acute distress. Personal experience is used as the starting point for a discussion of these and allied psychological issues concerning patient care in general.—*Journal abstract*.

## TREATMENT AND PREVENTION

9984. Banerji, B. S. **Prevention of mental retardation.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 33-42.—Reports that there are almost 16½ million mentally retarded (MR) persons in India, 3,500 institutionalized in 68 institutions. It is recommended that MR be in part prevented by (a) early testing and treatment for phenylketonuria, (b) prevention of prenatal infections, (c) professional assistance (e.g., from a midwife) at time of delivery of infant, and (d) family planning to reduce family size. Preventive measures must be directed toward the Indians who live in small villages and constitute most of the population.—*J. H. Pflaum*.

9985. Bankston, William B. & Cramer, James A. (U New Orleans) **Toward a macro-sociological interpretation of general deterrence.** *Criminology: An Interdisciplinary Journal*, 1974(Nov), Vol 12(3), 251-280.—Noting that there is little systematic theoretical and empirical knowledge about general deterrence, an attempt was made to integrate existing literature into a set of testable hypotheses. 3 perspectives on general deterrence are examined, including the classical school of criminology and the positions of E. Durkheim (1964) and W. Sumner (1940). The variables of certainty and severity, type of threatened behavior, latent deterrent functions of legal threats, and normative structure are discussed. It is suggested that compliance rates may be used as an empirical index of general deterrence. (72 ref)—*Journal abstract*.

9986. Boudewyns, Patrick A. & Borkovec, Thomas D. (VA Hosp, Iowa City, IA) **Credibility of psychotherapy and placebo therapy rationales.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 15-18.—Obtained from 120 psychiatric inpatients ratings of the credibility and promise of improvement of 5 types of therapy. Significant differences in the ratings were found. Psychoanalysis and drug therapy were generally rated higher than implosive therapy, attention-placebo, and desensitization, which are less well known.

9987. Carpenter, James O. & Wylie, Charles M. (U Michigan, School of Public Health) **On aging, dying, and denying: Delivering care to older dying patients.** *Public Health Reports*, 1974(Sep-Oct), Vol 89(5), 403-407.—Discusses the improvement of health care for older,

dying people. The effects of social climate, bereavement, and hospitalization are presented. It is recommended that comprehensive humane health care should be provided the elderly even if this cannot be justified by a cost-benefit analysis.

9988. Davis, William E.; Dehnel, Luther L. & Kremer, Patricia M. (VA Hosp, St Cloud, MN) **Outcome research comparing brief treatment with unlimited treatment: A pilot study.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 10-11.—Tested the relative effectiveness of brief vs long-term treatment with 2 matched groups of patients. Readmission percentages were the same in both groups, indicating that brief treatment is effective with a wide range of patient types.

9989. de Oliveira Queiroz, Amaury. [Thoughts about psychosomatic medicine.] (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 163-169.—Reviews historical antecedents of psychosomatic medicine. Broader medical training in this field, and the incorporation of psychiatry within general hospital services, are recommended for Brazil.

9990. Heyes, Anthony D. (U Nottingham, Blind Mobility Research Unit, England) **Blindness and yoga.** *New Outlook for the Blind*, 1974(Nov), Vol 68(9), 385-393.—Presents evidence from the literature to highlight 2 aspects of blindness—physical inactivity leading to poor physical fitness, and the state of anxiety which accompanies unguided blind mobility. Evidence is further presented to show that physical fitness may be achieved painlessly by means of Hatha Yoga and that anxiety may be reduced and the lasting effects of anxiety moderated by the practice of meditation. It is the author's suggestion that, given these 2 findings, it would be appropriate to encourage blind people in Yogic practices. An attempt is made, on behalf of the blind population, to extract from the storehouse of Yogic knowledge those aspects which are likely to be beneficial—an application of pragmatic eclecticism. (21 ref)—*Journal abstract*.

9991. Hirsch, Sherry et al (Eds.). **Madness Network News reader.** San Francisco, CA: Glide, 1974. 192 p. \$5.95.—Includes articles, poems, graphics, and letters on issues surrounding mental health, (e.g., treatments used for mental patients and the movement to change the system of treating these patients). (165 ref)

9992. Hogarty, Gerard E. et al. (U Pittsburgh, Medical School) **Drug and sociotherapy in the aftercare of schizophrenic patients: III. Adjustment of nonrelapsed patients.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 609-618.—Examined the effects of chlorpromazine and major role therapy (MRT) on the quality of community adjustment of 374 18-55 yr old schizophrenic patients during a 2-yr period following hospital discharge. Among patients in the community, those treated with combined drug and sociotherapy adjusted better than those taking the drug alone; to a greater extent, those receiving placebo alone adjusted better than those receiving placebo and sociotherapy. However, only 20% of those in the placebo group had not relapsed after 2 yrs while the comparable percentage for the drug group was 52%. Effects found on assessments made by psychiatrists, social workers, family ratings, and self-reports



were replicated at 3 clinics. It is concluded that maximum restorative benefits require both maintenance phenothiazine and psychologic treatment beyond a single year following hospital discharge.—*Journal abstract.*

9993. Hogarty, Gerard E. et al. (U Pittsburgh, Medical School) **Drug and sociotherapy in the aftercare of schizophrenic patients: II. Two-year relapse rates.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 603-608.—Examined the effects of maintenance chlorpromazine and major role therapy (MRT) in forestalling the relapse of 374 schizophrenic patients recently discharged from the hospital. Chlorpromazine was significantly more effective than placebo in forestalling relapses ( $P < .001$ ). By 24 mo, 80% of placebo-treated patients relapsed compared to 48% of those drug-treated. Further, although drug therapy was more effective than placebo in both sexes, the size of the difference was significantly greater for women than men. There was no sex difference with placebo treatment. There was no significant effect of MRT during the entire treatment period. However, MRT did reduce relapses among those who survive in the community for 6 mo after hospital discharge. Results were replicated at 3 clinics.—*Journal abstract.*

9994. Korbar, Ksenija. (Vrapče Psychiatric Hosp, Zagreb, Yugoslavia) [Some forensic aspects of social psychiatry.] (Srscr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(3), 67-73.

9995. Levinson, Peritz. (Mount Sinai School of Medicine, City U New York) **Obstacles in the treatment of dying patients.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 28-32.—Reviews the literature, showing that theory and practice in the management of the dying patient have moved forward in the past 2 decades. However, it is believed that the benefits of this progress have not reached a large segment of the population of dying patients—those individuals who have a higher level of psychopathology or are from a lower socioeconomic group. Obstacles in the treatment of such patients are illustrated by 4 case histories. Specific recommendations related to the care of these more difficult cases are presented. (22 ref)—*Journal abstract.*

9996. Nias, D. K. & Shapiro, M. B. (Inst of Psychiatry, U London, England) **The effects of small electrical currents upon depressive symptoms.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 414-415.—Conducted 2 20-trial experiments with 2 depressed male patients using 400 and 500  $\mu$ A in negative current and placebo conditions. Results suggest that small direct currents passed through the brain have temporary effects on depressive symptomatology.

9997. Rabin, Albert I. (Ed.). (Michigan State U) **Clinical psychology: Issues of the seventies.** East Lansing, MI: Michigan State University Press, 1974. xi, 243 p. \$10.—Presents a collection of 16 essays on broad issues in clinical psychology (e.g., the relationship between assessment and therapy, psychology and the law); roles, models, and settings of the practicing clinician; recent psychotherapeutic approaches and innovations; and issues in the training of future clinical psychologists.

9998. Sharfstein, Steven S.; Taube, Carl A. & Goldberg, Irving D. (NIMH, Alcohol, Drug Abuse, & Mental Health Administration, Rockville, MD) **Private psychiatry and accountability: A response to the APA task force report on private practice.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 43-47.—Notes that the imminence of national health insurance makes it very important to determine the roles, efficiency, and effectiveness of both the private and the public sectors of mental health care. The difficulties in distinguishing public from private care are examined. Estimated distributions of care by type of provider are presented that differ from those of an American Psychiatric Association task force report on private practice. The need for objective research on the quality of care in both sectors and on the effectiveness of alternative mental health systems is noted, and it is suggested that public choices should be made on the basis of correct interpretations of reliable data and accountability to those being served. (21 ref)—*Journal abstract.*

9999. Śluta, Jerzy. (Jagiellonian U, Psychological Inst, Cracow, Poland) [Problems of memory disorders caused by electroconvulsive treatment.] (Polh) *Przegląd Psychologiczny*, 1973, Vol 16(1), 29-48.

10000. Waxler, Nancy E. (Harvard U, Medical School, Boston) **Culture and mental illness: A social labeling perspective.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 379-395.—Observations made by the author in Ceylon and by other practitioners in Africa suggest that the serious psychoses seen in these peasant systems are of short duration with an excellent prognosis. Data from a study that followed treated schizophrenics in Mauritius are reviewed which show that clinical symptoms and social performance after 12 yrs were significantly better than a comparable group of patients in Great Britain even though the Mauritian treatment was more limited. Several theories which have been developed to explain cross-cultural variations in types, rates, and outcomes of mental illness are examined. An alternate theory is proposed which argues that societies do not cause different rates of mental disorder or tolerate varying degrees of deviance; instead they respond differently to illness once it occurs. Differences in societal response, in turn, account for differences in rates and outcome. The social labeling theory of deviance is used to present concepts and hypotheses to explain how different societies mold the mentally ill person to match societal expectations. The role of belief systems of the society in this process is emphasized. (35 ref)—*Journal abstract.*

10001. Winkelman, N. William & Saul, Steven D. (Private practice, Philadelphia, PA) **The return of suggestion.** *Psychiatric Quarterly*, 1974, Vol 48(2), 230-238.—Discusses the use of suggestion in general medicine and contemporary psychotherapies. Considered an outmoded form of treatment at the end of the 19th century, suggestion is now used in community mental health centers. These centers dispense brief therapy, help, and advice to large portions of the population previously considered unreachable. (29 ref)—*Journal abstract.*

# Psychotherapy & Psychotherapeutic Processes

10002. Arazo, Daniel L. Marital transference. *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 55-63.—Suggests that marital transference embraces the unconscious elements in the marriage itself and in the process of marital therapy. In marriage, transference distortions have developmental or perceptual origins. In the former, a distinction must be made between character object relations (COR) and symptom object relations (SOR). COR implies deep pathology in both spouses, whereas SOR suggests neurotic interaction at one level of the 2 personalities. The perceptually originated distortions have reification as a common element. The ambivalence of the wife as a person and as a symbol is rejected so that the husband identifies with the ideal to which the wife or the marriage must conform. In the process of marital therapy, the distortions of the therapist also must be given special attention. (Spanish & French abstracts) (22 ref)—*Journal abstract*.

10003. Bach, George R. (Inst of Group Psychotherapy, Los Angeles, CA) **Creative exits: Fight-therapy for divorcees.** In V. Franks & V. Burt (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10004. Beck, Aaron T. & Greenberg, Ruth L. (U Pennsylvania) **Cognitive therapy with depressed women.** In V. Franks & V. Burt (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10005. Bernstein, Douglas A. (Western Washington State Coll) **Manipulation of avoidance behavior as a function of increased or decreased demand on repeated behavioral tests.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 896-900.—5 groups of 15 female undergraduates reporting fear of snakes participated in 2 behavioral avoidance tests employing a snake as the target object. 4 groups were first tested under low demand for approach and then under the same conditions or under 1 of 3 conditions of demand increase, mediated by instructions, mode of administration, or both. The 5th group was tested under high, then low demand. Ss first tested under low demand showed significantly more fear than those first tested under high demand. In addition, Ss in the demand-increase groups showed significant increases in approach at the 2nd behavior avoidance test, while Ss in the demand-decrease group showed a significant reduction in approach. Ss in the repeated-measure control group showed no significant changes. (16 ref)—*Journal abstract*.

10006. Berzins, Juris I.; Bednar, Richard L. & Severy, Lawrence J. (U Kentucky) **The problems of intersource consensus in measuring therapeutic outcomes: New data and multivariate perspectives.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 10-19.—Contrasted the results yielded by several multivariate techniques (component analysis, canonical correlation, typological analysis) to examine intersource agreement and disagreement in a nationwide sample of 79 therapist-patient dyads across pre-post data (converted to residualized gain scores) generated by patients, therapists, and psychometrists on a total of 22 measures (e.g., MMPI Current Adjustment Rating Scale, and Psychiatric Status Schedule). 4 factors emerged from a principal compo-

nents analysis—changes in (a) patient-experienced distress, (b) observable maladjustment, (c) impulse expression, and (d) self-acceptance. It is suggested that large-scale collaborative studies are needed to clarify further the types of intersource agreement and disagreement isolated in this study. The development of consensual measures of outcome is imperative for the systematic evaluation of the effects of diverse therapeutic interventions. (26 ref) self-acceptance. (26 ref)—*Journal abstract*.

10007. Betensky, Mala. **Patterns of visual expression in art psychotherapy.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 121-129.—Describes the identification of cues and tracing of patterns in art work by patients in art psychotherapy. Patients choose their medium for spontaneous line drawings and also the size of the paper. Drawings are evaluated according to overall pattern, which may change characteristically over time, and persistent details or cues (e.g., a boy representing himself as a small dot). A pattern of visual complexity may express the S's personal complexity. The patient's response to his art work may be threefold: physical (e.g., a change of heartbeat); rational, as an integration of piecemeal thoughts about the self; and emotional, as strong and clear feelings evoked by the new rational insight.—R. Arnheim.

10008. Bloch, Gottfried R. & Bloch, Noretta H. **[Psychotherapeutic interventions in post-traumatic reactions.]** (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(5), 277-290.—Contends that the aim of therapy with patients who have suffered a traumatic experience is to help them tolerate drastic emotional and physical impairments and to master as fast as possible the psychological effects. Lack of motivation for treatment, resistance, difficulty in gaining insight, and disheartening actual situations may discourage both patient and therapist. The focal problem is to restore the shaken narcissistic equilibrium and its stability prior to the insult. Ego-mechanisms supporting development towards the adaptation to the post-traumatic condition are utilized; directive intervention and adaptational coaching are integrated in the total approach.—H. Bruml.

10009. Bras, Stanislav. **[Treatment of resistance in analytic psychotherapy: I.]** (Slov) *Anthropos*, 1972, No 1-2, 123-140.—Discusses the phenomenon of resistance, defined as the set of all those psychodynamic factors in the therapeutic process which prevent subconscious tendencies from reaching the conscious level. Types of resistance are classified into 12 categories and described in detail: (a) resistance in the form of suppression or repression, (b) compulsive withdrawal into health, (c) resistance through intensification of neurotic symptoms, (d) resistance by means of mental inhibitions, (e) willful disqualification of self, (f) resistance in the disguise of irrationality, (g) superficial verbal communication, (h) insight as a form of resistance, (i) unwillingness to give up the comforts of therapy, (j) dissociation of therapeutic situation from real life, (k) resistance in the form of underestimation of reality, and (l) transference resistance. Techniques for coping with various types of resistance are discussed.—S. Slak.

10010. Caetano, Donald F. (California State Coll, San Bernardino) **Labeling theory and the presumption of mental illness in diagnosis: An experimental design.**



*Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 253-260.—Videotaped psychiatric interviews of a mental patient and a student were diagnosed by 36 psychiatrists and 77 college students in an abnormal psychology class. Each sample was experimentally assigned to 2 groups. In one group it was suggested that both Ss were mental patients. In the other it was suggested that both were paid participants. It was hypothesized that the suggestion of illness and the increased clinical experience of psychiatrists would lead to an increase in diagnostic scores. Results partially support this hypothesis, in that suggestion and clinical experience led to significantly higher scores in all but 1 case. Also discussed are the effects of the appearances of the Ss in the tapes. (19 ref) —*Journal abstract.*

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precise operations of "cognitive restructuring" are illustrated by a case dialogue.—C. P. McCreary.

10033. Ládgero Pires, Luiz. [Reactions of patients to psychiatric diagnosis and treatment.] (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 147-156.—Summarizes the cases of 5 adult female inpatients. Cultural and treatment factors which are viewed as the chief causes of change in the behavior of these patients are discussed.

10034. Leedy, Jack J. & Rapp, Elaine. (Poetry Therapy Ctr, New York, NY) *Poetry therapy and some links to art therapy*. *Art Psychotherapy*, 1973(Fal), Vol 1(2), 145-151.—As a supplement to therapy, patients are asked to write and read poetry. Poems from English and American literature are selected for the relief of insomnia, anxiety, or depression. Rhythm as well as content contribute to the effect. Poems written by patients can serve diagnostically (e.g., to indicate suicidal tendencies), or therapeutically to help diffuse and sometimes resolve conflicts. In art workshops for creative growth, art activity has been found to trigger spontaneous poetry writing by some participants, indicating a link between verbal and visual media.—R. Arnheim.

10035. Leigh, Hoyle. (Yale U, Medical School) *Psychotherapy of a suicidal, terminal cancer patient*. *International Journal of Psychiatry in Medicine*, 1974(Spr), Vol 5(2), 173-182.—Presents the case history and psychotherapeutic course of a terminal cancer patient from her suicide attempt to her eventual death from cancer. The discussion is focused on the therapy which opened the communication barrier that had caused the suicide attempt. The role of the therapist as facilitator of communication in the family and educator of the family regarding the illness is described, and the psychological needs of the terminal patient are considered.—R. M. Cohen.

10036. Liegner, Evelyn. (Private practice, Great Neck, NY) *The silent patient*. *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 229-245.—Discusses the multiple purposes of silence for the patient, as a resistance and as a communication. While initially considered by Freud as a resistance to transference, a broader understanding of silence suggests a variety of techniques suited to the particular needs of the patient. 3 case presentations illustrate a variety of ways for treating the silent patient. (27 ref)—B. Smith.

10037. Longin, Harold E. (Weston State Hosp, WV) *Perception of symptomatic behaviors*. *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 812-818.—Used a multidimensional scaling technique, INDSCAL, to investigate the underlying structure 18 behavioral and 18 nonbehavioral clinical psychologists gave to 73 symptomatic behaviors descriptive of a wide range of psychopathology. 2 partially related dimensions seemed to account for the obtained configuration: Dimension 1 was labeled psychotic-neurotic, and Dimension 2 was labeled turning within oneself—turning to others. These dimensions were similar to those found in other studies. Only limited differences between behavioral and nonbehavioral raters in the structure they provided the diagnostic cues were observed, suggesting that the clinician's theoretical persuasion is not a critical

discriminator of the way he or she views symptoms. (21 ref)—*Journal abstract*.

10038. Lorian, Raymond P. (Temple U) *Social class, treatment attitudes, and expectations*. *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 920.—Administered the Mental Health Attitude Survey (MHAS) to 90 white outpatient psychotherapy clinic applicants from middle, working, and unskilled socioeconomic status (SES) levels. Findings suggest that prior assumptions about differences in help-seeking attitudes and treatment expectations among SES groups must be carefully reevaluated, since no significant effects for sex, SES, or interactions were found on any MHAS dimension.

10039. Loveless, Eugene J. & Brody, Helen M. (William Paterson Coll) *The cognitive base of psychotherapy*. *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 133-137.—Discusses the role of information and the cognitive elaboration of problem-solving skills as the basis of patient gains in psychotherapy. It is suggested that the proper approach in therapy is an active, problem-oriented, cognitive restructuring of the client's difficulties. Techniques for such an intervention are outlined. The role of pertinent cognitive analysis as described by A. Ellis and G. Kelly is suggested as the basis of an intelligent psychotherapeutic paradigm.—C. P. McCreary.

10040. Maduro, Renaldo J. & Martinez, Carlos F. (U California, Medical Ctr, Langley Porter Neuropsychiatric Inst, San Francisco) *Latino dream analysis: Opportunity for confrontation*. *Social Casework*, 1974(Oct), Vol 55(8), 461-469.—Reports that in clinical work with Latinos, aspects of Jungian dream theory and analytic technique have been found especially useful. Dream analysis is 1 aspect of the work of self-actualization and Jung's humanistic growth-oriented psychology. 3 types of dreams by Latinos are described. When therapeutic modalities are made culturally relevant, strong working alliances and intense commitment to growth often follow.—M. W. Linn.

10041. Malageli-Tegliatti, M. et al. (U Rome, Italy) *[Family psychotherapy and the work of denial.]* (Ital) *Rivista di Psichiatria*, 1974(Spr), Vol 9(3), 161-172.—Contents that much of the strange, incomprehensible, and pathological behavior observed in family psychotherapy can be understood as the workings of denial.

10042. Margolin, Michael H. & Goldman, Susan B. (Travelers Aid Society of Metropolitan Detroit, MI) *Beyond reinforcement: Integrating relationship and behavior therapy*. *Clinical Social Work Journal*, 1974(Sum), Vol 2(2), 96-104.—Discusses similarities and differences between relationship therapy and behavioral therapy in terms of reinforcement and relationship. The 2 methods are shown to involve both aspects in treatment, though the emphasis differs.

10043. Marlin, William. (Camden County Coll) *A portrait through poetry and drawing*. *American Journal of Art Therapy*, 1974(Apr), Vol 13(3), 237-249.—Reports on the case of a 39-yr-old terminal cancer patient who attempted to deal with the emotional problems of her situation through her poetry and drawings. The work of the Creative Arts Rehabilitation Center in New York City is also described.

10044. Marshall, Robert J. (Westchester Psychiatric Group, Yorktown Heights, NY) **Meeting the resistances of delinquents.** *Psychoanalytic Review*, 1974(Sum), Vol 61(2), 295-304.—Describes interventions in individual therapy that do not rely on interpretation or confrontation. Techniques of joining the patient's resistance facilitated treatment. Joining with the defense is explained as siding with the parental covert message in a double-bind situation. Making this covert message overt, in the transference, allows the confusion and anxiety of the patient to be lifted. Total milieu involvement in playing out planned roles is discussed. (20 ref)—B. Smith.

10045. Martin, Fred W. (U Waterloo, Ontario, Canada) **Therapeutic recreation practice: A philosophic overview.** *Journal of Leisureability*, 1974(Jan), Vol 1(1), 20-26.—Reviews the relatively recent development of recreation therapy as a field in the treatment of the ill and disabled. 4 basic approaches ranging from "fun and games" to education are described. It is suggested that the field should strive for a coherent therapeutic philosophy at this stage in its development.

10046. Masnik, Ruth. (Metropolitan Hosp, New York, NY) **Telling a schizophrenic patient his diagnosis.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 452-457.—Discusses the effect on the patient of acknowledging to him that he has been diagnosed as schizophrenic. An illustrative case is presented to show how this knowledge and understanding helped a 26-yr-old male patient mobilize himself and begin to lead a more productive and satisfying life.

10047. McLean, Peter D. & Miles, James W. (U British Columbia, Vancouver, Canada) **Evaluation and the problem-oriented record in psychiatry.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 622-625.—Considers that both evaluation of treatment programs and the problem-oriented record (POR) are in vogue in psychiatry. Although the POR in its present form can enhance communication and organization, it is unlikely that it will contribute greatly to teaching, research, or to the development of treatment efficacy, since these enterprises require evaluative information available only from patient follow-up, which is the cardinal feature missing from the POR. The inclusion of a follow-up component in the POR represents a natural extension of progress notes and is pragmatic enough to be considered as part of routine practice. (28 ref)—*Journal abstract*.

10048. Menaker, Esther. (New York U) **The therapy of women in the light of psychoanalytic theory and the emergence of a new view.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10049. Montagnes, James M. (Mental Health Ctr, Penetanguishene, Ontario, Canada) **Theory or the man.** *Journal of Leisureability*, 1974(Oct), Vol 1(4), 42-45.—Summarizes evidence indicating that approximately equal rates of improvement result from widely different psychotherapeutic approaches. The importance of both the therapist and client's expectations, and their interaction, is stressed. The therapist's personality is seen as an influential factor in outcome. It is stated that not all therapists can effectively use all techniques, and that not

all techniques are appropriate for use with all patients. The importance of the fit of therapist, client, and theory and its potential effect on outcome is stressed.—C. Wright.

10050. Mundy, Jean. (Long Island U) **Feminist therapy with lesbians and other women.** *Homosexual Counseling Journal*, 1974(Oct), Vol 1(4), 154-159.—Examines differential approaches to problems of identity in lesbians and other women from a feminist point of view. It is suggested that women should self-define themselves rather than be defined in terms of their relationships with other people. Feminist therapy is presented as a means of advancing the aims of the feminist social movement to the benefit of all.—*Journal abstract*.

10051. Neki, J. S. (All-India Inst of Medical Sciences, New Delhi) **A reappraisal of the guru-chela relationship as a therapeutic paradigm.** *International Mental Health Research Newsletter*, 1974(Sum), Vol 16(2), 2-7. Describes the guru-chela (master-disciple) relationship in terms of its similarities with and differences from the classical Western therapist-patient relationship. Both are voluntary associations wherein a master enables a change-seeker to dispel ignorance and the effects of undesirable social conditioning. They differ mainly in that the guru-chela relationship encourages permanent dependency, since the guru assumes total responsibility for leading the chela toward self-mastery through the disciplines of persistence and silence. As a therapeutic paradigm, the guru-chela relationship appears most suited to cultures valuing self-discipline rather than self-expression, and creative harmony between individual and society.—C. A. Heikkinen.

10052. Neto, Bernardo B. (Catholic U São Paulo, Faculty of Psychology, Brazil) **Some considerations of negative therapeutic reactions.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 445-451. Describes the characteristics of a negative therapeutic reaction shown by a male actor during psychotherapy. As long as envy was interpreted as the cause of this reaction, analysis did not progress. However, interpretation of the reaction as a communication of the patient's anxiety helped to crystallize the therapeutic evolution.

10053. Polster, Miriam. (Gestalt Training Ctr, San Diego, CA) **Women in therapy: A Gestalt therapist's view.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10054. Price-Williams, Douglass. (U California, Los Angeles) **Psychological experiment and anthropology: The problem of categories.** *Ethos*, 1974(Sum), Vol 2(2), 95-114.—Discusses problems caused by the application of logical categories which govern Western psychological investigations to the study of other cultures. It is suggested that the conventional psychological distinctions between intellect and emotion, abstract and concrete, and metaphor and fact are not universally viewed as important to the understanding of behavior. (2 p ref)

10055. Raymond, Margaret E.; Slaby, Andrew E. & Lieb, Julian. (Connecticut Mental Health Ctr, New Haven) **The healing alliance.** New York, NY: W. W. Norton, 1975. 287 p. \$8.95.—Outlines an approach to the treatment of patients with emotional problems which



involves an active collaboration between professional, patient, and family to form a healing alliance. 14 case histories are included to illustrate and clarify the psychiatric process and show how various forms of treatment affect family dynamics and relationships, how the family can participate in the planning of treatment goals, and how the family's attitude influences the outcome of treatment. (6½ p ref)

10056. Rice, David G.; Gurman, Alan S. & Razin, Andrew M. (U Wisconsin, Medical School, Madison) **Therapist sex, style, and theoretical orientation.** *Journal of Nervous & Mental Disease*, 1974(Dec), Vol 159(6), 413-421.—Analyzed the self-report questionnaires of rated in-therapy behaviors, demographic characteristics, and theoretical ascriptions of 86 therapists (47 males and 39 females) with diverse backgrounds and experience levels. "Style" factors obtained for this sample were compared with those from a previous sample of predominantly male therapists. Results indicate (a) a relatively consistent set of style factors relating to self-reported in-therapy behaviors emerging from the 2 therapist samples; (b) significant style differences between male and female therapists—women therapists reported themselves to be more varying in their therapy behavior, less "anonymous" in therapy, and more judgmental; (c) experienced therapists were more oriented toward historical material, showed more varied in-therapy behavior, and placed more emphasis on feelings than inexperienced therapists; and (d) the theoretical orientation of the therapist was related to differences in self-reported in-therapy behaviors, along somewhat stereotyped lines. Evidence for the generalizability of self-reported to other-described behaviors was obtained. (24 ref)—*Journal abstract*.

10057. Rosenfeld, David. [Drug addiction, narcissistic omnipotence, skin disorders, and corporal outline: Notes on group dialectics.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 365-402.—Presents a synthesis of concepts related to psychoanalytic aspects of these problems, including transference and countertransference. (18 ref)

10058. Rubin, Judith A. (Point Park Coll) **Mother-child art sessions: II. Education in the community.** *American Journal of Art Therapy*, 1974(Apr), Vol 13(3), 219-227.—Presents the 2nd part of a 2-part article dealing with mother-child relations during sessions of intensive art therapy. It is concluded that shared art experiences are a useful tool in patient education and are particularly important for the preschool child.

10059. Škoda, C. & Gregová, L. (Výzkumný ústav psychiatrický, Prague, Czechoslovakia) [Some of the models used in the assessment of therapeutic results in psychiatry.] (Czech) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 65-71.—Presents a theoretical scheme in which psychopathologies are conceptualized and their treatment assessed from psychiatric, psychological, and sociological perspectives. Differences between the etiopathogenetic diagnoses used in medicine and the psychiatric nosology of syndromes, and between the psychodynamic approach and H. J. Eysenck's 3-dimensional model in psychology are discussed. The preventive, therapeutic, and predictive effectiveness of each

model is viewed as the criterion of its validity. (Russian & English summaries)—*V. Fischmann*.

10060. Saffer, Jerry B. & Kelly, Gretchen L. (U Virginia, Medical Ctr) **Treating the obese adolescent.** *Psychiatric Forum*, 1974(Fal), Vol 4(2), 27-32.—Describes the theory and implementation of a treatment program at a clinic for obese adolescents. Because of its extreme dependency and social isolation, adolescence is considered a traumatic stage for obese youngsters. The program concentrated on 3 areas—nutrition, physical exercise, and psychotherapy. Psychotherapy was considered an appropriate technique because it fosters the development of interpersonal skills, independence, and the sharing of common negative feelings, and because it has proved successful with adult obesity groups. The most salient initial finding was the absence of social and verbal skills among the adolescents. However, after 6 mo of participation, there was marked improvement in the development of these skills in addition to a significant weight loss. (16 ref)—*F. Beyer*.

10061. Shor, Joel & Sanville, Jean. (Inst of the Los Angeles Society for Psychoanalytic Psychology, CA) **Erotic provocations and dalliances in psychotherapeutic practice: Some clinical cues for preventing and repairing therapist-patient collusion.** *Clinical Social Work Journal*, 1974(Sum), Vol 2(2), 83-95.—Presents 4 types of case material for discussion: (a) patients who report intercourse with a previous therapist; (b) patients who report that a previous therapist recommended intercourse with him; (c) patients who report seductive gestures by a previous therapist; and (d) patients who request or demand intercourse during therapy. Treatment approaches are offered which help deal with these issues.—*S. R. Stein*.

10062. Slassi, Iradj. (Rutgers State U) **Psychotherapy with women and men of lower classes.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10063. Steinmann, Anne. (Maferr Foundation, Male-Female Role Research, New York, NY) **Cultural values, female role expectancies and therapeutic goals: Research and Interpretation.** In V. Franks & V. Burtie (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10064. Suedfeld, Peter & Ikard, Frederick F. (U British Columbia, Vancouver, Canada) **Use of sensory deprivation in facilitating the reduction of cigarette smoking.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 888-895.—12 mo after a 24-hr period in a socially isolated, monotonous environment, 37 smokers aged 25-55 had reduced their rate of cigarette smoking by an average of 48%, compared with 16% for 35 control Ss. A smaller sample reported similar results at the end of 24 mo. A set of antismoking messages had no permanent effect. Sensory deprivation can apparently be used as a powerful facilitator of long-term behavioral change in human beings. (37 ref)—*Journal abstract*.

10065. Uemura, Akira. (Fukuoka U, Faculty of Medicine, Japan) **A case of the transient psychotic breakdown of a depersonalized patient during the**

**psychotherapeutic process.]** (Japn) *Kyushu Neuro-psychiatry*, 1973(Dec), Vol 19(3-4), 213-218.—Reports the case of a male patient from April 1971 to October 1973. S was first diagnosed as suffering from chronic depersonalization. The symptoms were thought to be based on 2 defense mechanisms—defense of the oedipal feeling and transference of pre-oedipal feelings—and the development of these mechanisms was thought to be closely related to the patient's experience with his parents. The goals of the initial phase of therapy were the patient's acceptance of the emotional support of the therapist and his realization of the defense mechanism. These goals, however, were not achieved until later, because early in the treatment the patient experienced ego-splitting and a transient psychotic breakdown. But as he recovered from his psychotic state, his depersonalization symptoms disappeared; current progress in therapy and potential for recovery from his mental illness were shown. (English summary)—*S. Ashida*.

10066. **Vaccaro, V. Michael.** (Hahnemann Community Mental Health Ctr, Philadelphia, PA) **Specific aspects of the psychology of art therapy.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 81-89.—Art products, like dreams, externalize intrapsychic remnants, memory traces, or somatic excitations. The more intense the patient's pathology, the stronger is the urge to discharge excitation by art production. Relevant spontaneous associations of the patients to their art work, although helpful in interpretation, are difficult to obtain and may carry the risk of further regression through threatening insight. When the patient does not recognize the latent content of his art, he may use it as mere projective stimulus material. Therefore, standard Freudian interpretation of sexual symbols is recommended to gauge the patient's psychosexual development. Improvement obtained by interpreting 2 drawings is reported in the case of a 29-year-old schizophrenic man.—*R. Arnheim*.

10067. **Van Krevelen, D. Arn.** [Judo in the framework of movement therapy: Results of an inquiry.] (Germ) *Acta Paedopsychiatrica*, 1974, Vol 40(6), 221-229.—Homes for morons do not reject judo as advisable movement training, but institutions for the feeble-minded do so because their patients lack self-insight and self-control, making them dangerous to their environment. The advantages—motor control, improvement of self-defense and self-esteem—can be acquired by other and better means.

10068. **Vymětal, J.** (Krajský ústav národního zdraví, Sadská, Czechoslovakia) [Nondirective "Gesprächpsychotherapie" according to Prof. R. Tausche.] (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 128-132.—Summarizes a 1971 lecture given at the regular working session of the Psychiatric Association in Prague. R. Tausche's team in Hamburg bases its work in C. Roger's client-centered therapy. They emphasize verbalization of emotional experiences, unconditionally positive regard for the client, and emotional warmth on the part of the therapist. The nondirective method is considered more optimistic, constructive, scientific, successful, and rapid than other psychotherapeutic systems. (Russian & English summaries)—*V. Fischmann*.

10069. **Wadeson, Harriet.** (NIMH, Adult Psychiatry Branch, Psychiatric Assessment Section, Bethesda, MD)

**Separateness.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 131-133.—Presents an elaborate symbolic drawing by a young hospitalized schizophrenic as an example of how a patient's sense of separateness can be overcome by the sharing of imagery. The picture of his inner world, experienced at different times as a delusion and as reality, represents the patient's "way of being in a safe place at the time of judgment." It is dominated by the eye of God and represents the marihuana plant as a nude female figure rooted in the ground. By communicating his complex delusional system to the therapist, he experienced the interest of another in his private world.—*R. Arnheim*.

10070. **Wilkins, Wallace.** (U Maine, Orono) **Parameters of therapeutic imagery: Directions from case studies.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 163-171.—Reviews and systematizes case studies describing psychotherapeutic imagery techniques. Imagined scenes are classified in relation to presenting symptoms; symptoms are classified as covert behaviors, overt avoidance behaviors, or overt approach behaviors. Imagery techniques are classified as involving attention shifts from symptom-related scenes toward overt stimuli or toward other covert events. Trends are described that show how techniques involving attention shifts toward other covert events are applied to reduce overt behaviors. Instructed attention shift toward and from symptom-related scenes appears to be the only necessary element in psychotherapeutic imagery.—*C. P. McCreary*.

10071. **Wise, Thomas N.** (Johns Hopkins Hosp. Psychiatric Liaison Service) **Psychiatric management of patients who threaten to sign out against medical advice.** *International Journal of Psychiatry in Medicine*, 1974(Spr), Vol 5(2), 153-160.—Presents case examples to show how communication problems, issues of control, and the use of denial can precipitate a crisis which may lead to premature hospital discharge. Suggestions for consultative intervention are offered.

10072. **Worthen, Valerie.** (Fuller Theological Seminary) **Psychotherapy and Catholic confession.** *Journal of Religion & Health*, 1974(Oct), Vol 13(4), 275-284.—Maintains that psychotherapy and Roman Catholic penance are similar, both dealing with guilt and change of behavior. While confession is more ritualized and psychotherapy more objective than its counterpart method, psychotherapy could become more effective if it were perceived as part of "a total restoration process of man toward truth." It is suggested that for Catholic constituents at least, confession combined with psychotherapy promises a more effective ordering of their lives than either method alone.—*F. A. Hardt*.

10073. **Yalom, Irvin D. & Elkin, Ginny.** (Stanford U. Medical School) **Every day gets a little closer: A twice-told therapy.** New York, NY: Basic Books, 1974. xxiv, 244 p. \$8.95.—Presents an account, in the form of journals, of the treatment of a young woman, labeled as "schizoid," by her psychiatrist. The woman's experiences in all types of therapy, the dual reflections of psychiatrist and patient, and the psychiatrist's perception of his professional and personal roles are described in an effort to examine the nature of the psychotherapeutic experience.



10074. Young, Gregory G. **Programmed psychotherapy.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 369-382.—Discusses programmed psychotherapy (PPT)—a psychotherapeutic technique that presents to the patient a series of personally significant problems and appropriate solutions from among alternatives for his consideration and response. The problems are derived from the patient's own diagnostic interviews and from a library of like problems gleaned from the treatment of similar patients. It is emphasized that this is only a tool, a component of the total psychotherapeutic process. Clinical impressions of its value and helpfulness are presented through case examples. In PPT the earliest prescription produces an understandable rationale concerning the etiology of the patient's problems. The fact of alternatives being presented in addition to the usual insight is another significant aspect of this method. Resistances or defensive mechanisms encountered in other types of psychotherapy are also present in this method. Observations, results of ratings, and follow-up on 100 patients are presented.—R. S. Albin.

10075. Yustin, Alvin S. (U Southern California, Medical School) **Analysis of crises using a stress-motivation-response model.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 409-417.—Describes a model to analyze situations which disrupt the equilibrium between individuals and their environment. Responses used in interpersonal interactions are neutralizing behaviors and conceptualizations of reassuring ideas. This kind of analysis of stress clearly defines the patient's life situation and responses to it, thereby allowing the therapist to focus more easily on the crisis in the patient's life. The usual adaptive mechanisms which maintain equilibrium between patient and environment are defined. Interventions in the areas of defined stresses, motivations, and responses that can be used to restore the individual to his previous level of functioning are suggested. Case examples of 16 patients are presented to demonstrate the usefulness of this model.—R. S. Albin.

10076. Zierer, Edith. **Creative analysis: A projective technique and structured therapeutic method.** *Art Psychotherapy*, 1973(Fal), Vol 1(2), 101-108.—Describes a method of examining and interpreting spontaneous paintings by patients as to the integration and disintegration of color organization, which discloses a corresponding state of ego integration. Asked to name verbally an experience relevant to a personal conflict, patients then represent their theme pictorially. Relations between the consciously named problem and the unconsciously created color compositions are discussed with the patients and lead to diagnosis and suggestions for therapy. The chronological sequence of paintings is scored on the basis of a roster of 105 stress situations. Intensity of feeling tone for each level of color integration serves as an index of the patient's capacity to cope with his problem. Brief examples illustrate the procedure. (36 ref)—R. Arnheim.

10077. Zunin, Leonard. (Glasser Inst of Reality Therapy, Los Angeles, CA) **Reality therapy and campus prisons.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender*. I. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

## Drug Therapy & Drug Rehabilitation

10078. Adler, Sheldon. (U Pittsburgh, Medical School, Montefiore Hosp) **Methyldopa-induced decrease in mental activity.** *JAMA: Journal of the American Medical Association*, 1974(Dec), Vol 230(10), 1428-1429.—Reports the cases of 5 professional people, including 3 physicians, an engineer, and an accountant, who experienced severe changes in mental acuity. These changes included lack of concentrating ability, amnesia-like episodes, difficulty in simple calculations, and problems in reading. Each was taking methyldopa at normal dosages, and when treatment with this drug was discontinued the mental symptoms disappeared within 96 hrs. These cases emphasize the importance of questioning patients taking methyldopa about difficulties in mentation.—*Journal abstract*.

10079. Alraksinen, E. M. (U Helsinki, Finland) **Tryptophan treatment of infants with Down's syndrome.** *Annals of Clinical Research*, 1974(Feb), Vol 6(1), 33-39.—5-hydroxytryptophan (5HTP) has been reported to increase the muscle tone and the blood 5-hydroxytryptamine (5HT) content in infants with Down's syndrome (DS). In this study levotryptophan (10-50 mg/kg/day) was given chronically for up to 2 yrs to 9 newborn infants with DS. 14 untreated infants with DS served as controls. The muscle tone of tryptophan-treated Ss with DS improved most clearly during the 1st half year of life. During the 1st yr the mean level of 5HT in the platelet-rich plasma of treated Ss was significantly higher than that in untreated controls but did not reach the level found in 22 healthy infants. Side-effects resembling those of 5HTP occurred, and 1 of the 9 patients developed an infantile spasm syndrome. (25 ref)—*Journal abstract*.

10080. Altman, Harold; Evenson, Richard C.; Sletten, Ivan W. & Cho, Dong Won. (U Missouri, Medical School) **Computer prediction of psychotropic drug assignment in state mental facilities: Effect of eliminating alcoholics from the study sample.** *Diseases of the Nervous System*, 1974(Nov), Vol 35(11), 505-508.—Studied utilization of a computer to assign psychotropic drugs based on statistical models. A sample of 3,314 inpatients from 8 state institutions were analyzed and all those diagnosed as alcoholic were excluded. This resulted in a final sample size of 2,092 patients. Data available for analysis consisted of the 11-item Automated Mental Status checklist filled out within a few days of admission, 73 demographic variables collected as admission face sheet information, and an admission diagnosis. A stepwise discriminant analysis was performed. Results confirmed the hypothesis that patients assigned minor tranquilizers consisted of 2 distinct subgroups, one of which consisted of diagnosed alcoholics. It was found that minor tranquilizer assignment to nonalcoholic inpatients was a virtually random procedure. The general ability of predicting psychotropic drug assignment with a statistical model was nevertheless supported.—R. S. Albin.

10081. Ballinger, B. R.; Presly, A.; Reid, A. H. & Stevenson, I. H. (Royal Dundee Liff Hosp, Scotland) **The effects of hypnotics on imipramine treatment.** *Psychopharmacologia*, 1974, Vol 39(3), 267-274.—Measured plasma imipramine (IMI) and desmethylinipramine concentrations and depression ratings over a 3-wk

period in 3 groups of depressed inpatients ( $N = 34$ ) given standard doses of IMI. The 1st group received IMI alone, and the others either amylobarbitone or nitrazepam in addition as a night sedative. Plasma antidepressant levels were consistently higher in the group receiving no hypnotic but only significantly so in the case of total IMI in the IMI-alone group compared to the group receiving IMI plus amylobarbitone. The interindividual differences in plasma levels were large. There was no difference between the groups with regard to changes in depression, sleep, or side effects. From a clinical point of view, there is no evidence from this study of adverse effects of these drugs given in combination nor any evidence to suggest that the dosage of IMI given should be adjusted when administered along with either of the hypnotics studied.—*Journal abstract.*

10082. Ban, T. A. et al. (World Health Organization Training Program in Biological Psychiatry, McGill U, Montreal, Quebec, Canada) **New drug developments in the Latin Americas: Argentina, Costa Rica, Mexico and Panama.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 33-36.—Describes the geography, population, psychiatric treatment, use of psychoactive drugs, and pharmacological research in Argentina, Costa Rica, Mexico, and Panama. The lack of sophistication of psychiatric treatment, the difficulties of carrying out drug trials, and the lack of government interference in this research are documented.

10083. Ban, Thomas A. (McGill U, Montreal, Quebec, Canada) **Negative findings with nicotinic acid in the treatment of schizophrenias.** *International Pharmacopsychiatry*, 1974, Vol 9(3), 172-187.—In view of the controversy regarding the effectiveness of nicotinic acid therapy in schizophrenic patients a series of systematic studies was designed to obtain relevant information on this treatment. Since the initiation of these collaborative studies approximately 6 yrs ago, 5 of the 12 originally designed clinical trials have been completed. Findings in these studies are reviewed and strongly suggest that the administration of nicotinic acid in the dosage of 3,000 mg/day has no therapeutic effect. Such administration may even have a negative therapeutic effect in unselected groups of schizophrenic patients. (59 ref)—*Journal abstract.*

10084. Bourne, Peter G. **Approaches to drug abuse prevention and treatment in rural areas.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 285-289.—Discusses drug abuse treatment strategies appropriate for small urban and rural communities. 4 stages of community response to drug abuse are described: denial, panic, fragmentation of effort, and cohesion. A progression of intervention approaches is suggested (hotline, drug abuse council, drug turn-in project, crisis intervention center, physician back-up, and a formal narcotic treatment program). Drug usage is viewed as symptomatic of a broader societal problems, and the possibility of a community's concern for drug abuse being channeled into concern for alcohol and tobacco abuse is suggested.—*R. Tomasko.*

10085. Bruck, J. & Guss, H. (Psychiatrischen Universitätsklinik Wien, Austria) **Aspects of treatment with long-acting neuroleptics with special consideration of clinical experiences gained with the peroral long-acting**

**agent penfluridol (R 16342-Janssen).]** (Germ) *International Pharmacopsychiatry*, 1974, Vol 9(3), 152-165.

—Presents a discussion of clinico-pharmacological, pharmacopsychiatric, psychological, and social aspects of treatment with long-acting neuroleptics. Previous experiences have confirmed the importance of repository preparations for secondary prevention and their economic value. An open clinical study is reported of the long-acting agent penfluridol, perorally administered to 50 patients suffering from schizophrenia. The predominantly antipsychotic substance remained effective for approximately 1 wk after application of a single dose ranging from 20 to 120 mg. Apart from extrapyramidal side effects penfluridol was well tolerated. No serious incidents were observed. (17 ref)—*English summary.*

10086. Burdock, Eugene I.; Gershon, Samuel; Hardesty, Anne S. & Linden, Karl J. **Problems and profits of cross-national collaborative studies.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 31-32.—Describes preliminary and incomplete data from a pilot study conducted in the US, Germany, and Switzerland to determine the feasibility of cross-cultural drug trials. Loxapine and chlorpromazine were tested on recently admitted schizophrenic inpatients. Problems and benefits of this approach are discussed.

10087. Burks, Jack S.; Walker, Jonathan E.; Rumack, Barry H. & Ott, John E. (U Colorado, Medical Ctr, Denver) **Tricyclic antidepressant poisoning: Reversal of coma, choreoathetosis, and myoclonus by physostigmine.** *JAMA: Journal of the American Medical Association*, 1974(Dec), Vol 230(10), 1405-1407.—One 2½-yr-old male and 1 36-yr-old female with coma, choreoathetoid movements, and myoclonus were found to be poisoned with tricyclic antidepressants. Physostigmine salicylate promptly reversed the neurologic abnormalities. These cases support the cholinergic deficiency-dopaminergic excess hypothesis of chorea. (20 ref)

10088. Carpenter, Robert L. & Sells, Clifford J. (U Washington, Child Development & Mental Retardation Ctr, Div of Speech Pathology & Audiology) **Measuring effects of psychoactive medication in a child with a learning disability.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 545-550.—Notes that there is little information showing that specific psychoactive medications generally have predictable effects on children with learning disabilities. Thus, the need often arises to have a simple, but objective, method for determining whether a drug has effected a desired behavior change. 3 types of behavioral measurement are presented—direct measurement of behaviors, formal psychometric testing, and rating scales. The results of these techniques, when applied to a 4½-yr-old female on psychoactive medication, are also presented. The data do not demonstrate any drug effects on the behaviors for which the medication was prescribed.—*Journal abstract.*

10089. Chapman, Loren J.; Cameron, Richard; Cocke, Joseph G. & Pritchett, Thomas. (U Wisconsin) **Effects of phenothiazine withdrawal on proverb interpretation by chronic schizophrenics.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 24-29.—Administered 1 of the clinical forms of the Gorham Proverbs Test to 42 chronic schizophrenics while they were receiving antipsychotic medication and 2 forms 4 wks after drug withdrawal. 21



patients were tested first on drugs and then off, and 21 were tested first off drugs, then on. Some patients improved with drug withdrawal and some worsened. Scores of autism in proverb interpretation and ratings of clinical status agreed ( $p < .05$ ) on which patients improved or worsened. (19 ref)—*Journal abstract*.

10090. Charalampous, K. D.; Johnson, Philip C. & Estevez, Vincent. (Baylor Coll of Medicine, Houston, TX) Absorption and excretion of thioridazine and mesoridazine in man. *Diseases of the Nervous System*, 1974(Nov), Vol 35(11), 494-496.—Studied the relationship between clinical potency and rates of absorption and excretion of tritium labeled thioridazine and mesoridazine. Ss were 4 male schizophrenic inpatients in remission who had not received any drug treatment for at least 6 wks. It is concluded that metabolic differences seem to be the best explanation for difference in potency of these 2 drugs.

10091. Costa de Aquino, Maria T. [Psychic disturbances associated with cortisone treatment.] (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 157-162.—Reviews conclusions in 10 articles dealing with cortisone and psychic disturbances. Caution is recommended in initiating cortisone treatment for patients with a psychiatric history.

10092. di Donato, Romano. (Free U Chieti, Medical School, Italy) [Psychotropic drugs in everyday practice.] (Ital) *Medicina Psicosomatica*, 1972(Oct), Vol 17(4), 295-323.—Examines the most important tranquilizers and antidepressants used in everyday medical practice. Recent discoveries about neurotransmitters and their relationship to drugs are reviewed. When patients request psychotropic drugs, the reasons most often given are anxiety and depression. The effects of the tranquilizers and antidepressants are reported in detail. They should not be used as a cure or remedy, but to promote a better relationship between doctor and patient. (English & French summaries) (46 ref)—*D. Araoz*.

10093. Drug Abuse Council. Heroin maintenance: The issues. *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 185-199.—Discusses the issues involved in establishing a heroin maintenance program. Topics considered include heroin toxicity, stabilization possibilities, detoxification, target population definition, effect on crime, and spread of addiction. A case study of Great Britain's heroin maintenance program is presented, and a Vera Institute of Justice proposal for a US program is discussed. Dissimilarities between the British and US drug abuse problem are noted.—*R. Tomasko*.

10094. Eldred, Carolyn A.; Grier, Velma V. & Berliner, Nancy. (Westat, Rockville, MD) Comprehensive treatment for heroin-addicted mothers. *Social Casework*, 1974(Oct), Vol 55(8), 470-477.—Describes a comprehensive treatment program. A pilot project studied 10 pairs of mothers on methadone maintenance. The progress of the treatment clients and the control clients was compared 8 mo after they had entered counseling. The treatment clients had made significantly more clinic visits per month than the controls and had only half as many urines positive for drugs.—*M. W. Linn*.

10095. Elliott, F.; Gardner-Thorpe, C.; Barwick, D. D. & Foster, J. B. (Permanente Medical Group, Santa Clara, CA) Jakob-Creutzfeldt disease: Modification of

clinical and electroencephalographic activity with methylphenidate and diazepam. *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Aug), Vol 37(8), 879-887.

10096. Elliott, Henry W. (U California, Medical School, Irvine) Pharmacology and clinical applications of narcotic antagonists. *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 225-229.—Discusses narcotic blocking agents with special emphasis on naloxone. Their usage in the treatment and diagnosis of narcotic addiction is presented. (24 ref)

10097. Erkkola, R.; Iisalo, E. & Punnonen, R. (U Turku, Finland) The effect of propranolol and oxazepam on some vegetative menopausal symptoms. *Annals of Clinical Research*, 1973(Aug), Vol 5(4), 208-213.—Compared the effects of propranolol and oxazepam on menopausal symptoms in 30 female patients (mean age = 39 yrs) undergoing hysterectomies. Ss were evaluated pre- and postoperatively without drugs and under treatment with both drugs separately. Heart rate, blood pressure, frequency and intensity of "hot flashes," and subjective menopausal symptoms were recorded. Propranolol eliminated the increase in sympathetic cardiovascular responses produced by the operation, while oxazepam had no effects. Oxazepam significantly reduced the frequency and intensity of the hot flashes more than did propranolol. Oxazepam also decreased subjective reports of palpitation and sleeplessness, while propranolol did not significantly change any reported symptoms. It is concluded that sensitization of the cardiovascular reflexes after a hysterectomy may be transmitted peripherally by beta-adrenergic receptors, although menopausal symptoms such as hot flashes are not mediated by beta-adrenergic receptors. (17 ref)—*Journal abstract*.

10098. Fann, William E.; Sullivan, John L. & Miller, Robert D. (Baylor Coll of Medicine, Houston, TX) Halazepam in anxious outpatients: A controlled study. *Current Therapeutic Research*, 1974(Dec), Vol 16(12), 1281-1286.—In previous studies in man, halazepam, a benzodiazepine, has exhibited anxiolytic properties definitely effective at 160 mg/day but not at 80 mg/day. The present study was designed to test effectiveness of halazepam at 120 mg/day in a 2-wk, placebo-controlled double-blind study in 79 23-65 yr old outpatients. Results in the 67 patients who completed the study indicate that the compound alleviates significant symptoms of anxiety in this population. Side effects were mainly limited to sedation. Halazepam appears to be safe and effective at the tested dose.—*Journal abstract*.

10099. Fine, Eric W. & Scoles, Pascal. (West Philadelphia Community Mental Health Consortium, Alcoholism Program, PA) Alcoholism: Turning a problem inside out. *MH*, 1974(Spr), Vol 58(2), 24-27.—Proposes that alcoholism needs to be viewed both as an individual and community problem. It is suggested that a community treatment program would be an appropriate method of treatment. Social, economical, medical, logistical, and moralistic arguments are discussed.

10100. Finney, Graham S. Planning for addiction services. *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 277-283.—Discusses the treatment and programmatic issues involved in the operation of the New York

City Addiction Services Agency. The sociological aspects of drug abuse planning are stressed.

10101. **Freedman, Joel.** (VA Hosp, Canandaigua, NY) **One vicious circle.** *MH*, 1974(Spr), Vol 58(2), 28-31.—Examines many reasons why alcoholics are attracted to and held by the dyssocial subculture of skid row. Ways of combating this problem are discussed. These include a multifunctional focus of attack involving all concerned parties, more action research, new experiments in relocating skid row addicts, establishing various types of half-way houses, and the devising of new creative treatment methods.

10102. **Friemert, Klaus; Beier, Rolf & Vehreschild, Torsten.** (Universitäts-Nervenklinik Rostock, E Germany) [Results of therapy with Lyogen-Depot in schizophrenic illnesses.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 374-377.—Reports statistically significant decrease in seizures among schizophrenic patients on a Lyogen-Depot (fluphenazin decanoate) regimen. Simultaneous oral administration of 4 mg Lyogen is necessary to counteract extrapyramidal side effects.

10103. **Goby, Marshall J.; Filstead, William J. & Rossi, Jean J.** (Lutheran General Hosp, Alcoholism Rehabilitation Ctr, Park Ridge, IL) **Structural components of an alcoholism treatment program: Evaluations by patients and staff.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1266-1271.—The different aspects of the treatment program at an alcoholic rehabilitation center of a general hospital were ranked according to their importance by 60 patients and 31 professional staff members. The patients viewed their small group therapy experience, relationship with their counselor, and formal information as most helpful; the staff ranked other patients, small group therapy, and significant others as the most important aspects of the program. Results are discussed in terms of the possible effects on treatment when patients and staff have different conceptions of what is important in treatment. (17 ref)—*Journal abstract*.

10104. **Gospavić, Jelena & Vidaković, Zorica.** (Neuropsychiatric Clinic, Belgrade, Yugoslavia) [Mental disturbances in parkinsonian patients treated with levodopa.] (Socr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(3), 21-28.—Describes the development of psychotic behavior patterns in 7 out of 17 parkinsonian patients treated with levodopa. (English summary)

10105. **Greenblatt, David J. & Shader, Richard I.** (Massachusetts General Hosp, Clinical Pharmacology Unit, Boston) **Drug therapy: Benzodiazepines: II.** *New England Journal of Medicine*, 1974(Dec), Vol 291(23), 1239-1243.—Discusses the use and effects of benzodiazepines in the treatment of anxiety, neuromuscular diseases, seizures, alcohol withdrawal, and sleep disorders, and their use in anesthesia and surgery. Unwanted effects and hazards related to the use of benzodiazepines include excessive central nervous system depression, sleep disturbances, injection site complications, and physiologic addiction if the drugs are abused.—*L. Gorsey*.

10106. **Herrmann, W. M. & Fabricius, J.** (Schering AG, Research Lab, Berlin, W Germany) **New psychotropic drug developments in Denmark, Russia, and**

**West Germany.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 28-30.—Describes 3 new psychotropic compounds being developed for use in Europe. A structurally new anticonvulsive drug (NSD 3004), a structurally new antipsychotic drug (karbidine), and a seroidal antiandrogen (cyproterone) which influences human sexual behavior are discussed. (40 ref)

10107. **Holtrisch, Adolpho; Modesto, José C. & de Oliveira Musacchio, Roberto.** (U Federal do Rio de Janeiro, Brazil) [Psychoanalysis and psychopharmacology.] (Port) *Jornal Brasileiro de Psiquiatria*, 1972(Jan), Vol 21(1), 9-21.—Discusses the collaboration of psychoanalysts and psychopharmacologists in treating difficult patients such as psychotics and psychopaths. Each specialist must preserve his own identity, but must also know something about the other's field. 3 articles by M. Ostow are cited which attempt to come to grips with these problems. The triangle of patient-analyst-psychopharmacologist is reviewed, considering the fantasies, defenses, and anxieties of each. (30 ref)—*D. J. Clair*.

10108. **Hollister, Leo E. & Prusmack, John J.** (VA Hosp, Palo Alto, CA) **Propranolol in withdrawal from opiates.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 695-698.—Conducted 3 studies involving 67 patients undergoing detoxification to evaluate the worth of propranolol hydrochloride in withdrawal of opiates. If propranolol acts as a narcotic antagonist, the patient's condition should become worse and require increased methadone hydrochloride; if it were to afford symptomatic relief by blocking autonomic responses, methadone requirements might be decreased. None of the studies indicated that propranolol hydrochloride in doses of 160 mg/day or less aggravated withdrawal symptoms. Ss treated with the drug consistently required a somewhat smaller methadone dose for detoxification, and those who responded favorably had mild withdrawal symptoms. The small benefit from the drug hardly merits its consideration as an adjunct to the treatment of withdrawal from opiates.—*Journal abstract*.

10109. **Horecker, Leonard.** (Illinois Security Hosp, Chester) **Chemotherapy and the behavioral disorder.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

10110. **Huussy, H. R.; Metoyer, Marie & Townsend, Marjorie.** (U Vermont, Coll of Medicine) **8-10 year follow-up of 84 children treated for behavioral disorder in rural Vermont.** *Acta Paedopsychiatrica*, 1974, Vol 40(6), 230-235.—84 children originally diagnosed as hyperkinetic and placed on psychopharmacologic therapy were followed up 8-10 yrs later. 18 had already been institutionalized in either a mental hospital or a correctional facility. Children diagnosed as hyperkinetic are considered to be seriously at risk for later difficulties.

10111. **Itil, T. M. et al.** (New York Medical Coll, NY) **New drug developments in the Netherlands: "Tetracyclic" psychotropic drugs.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 10-17.—Describes research on antiserotonin compounds, seeking minimum side effects for treatment of manic patients. A new group of tetracyclic compounds was developed. Trials in both depressed patients and in normal volunteers led to the



conclusion that GB-94 had significant antidepressive action and was similar to amitriptyline.

10112. **Jefferson, James W.** (U Wisconsin, Madison) **Beta-adrenergic receptor blocking drugs in psychiatry.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 681-691.—A review of the literature indicates that beta-adrenergic receptor blocking drugs have been employed in a variety of psychiatric conditions with variable success. The beta blockers appear to have an antianxiety action that is best established in the treatment of psychocardiac disorders but is less well defined with regard to other anxiety-related conditions. A paucity of studies comparing them with conventional anxiolytic drugs is one reason for not presently recommending their widespread use. As antipsychotic agents, the beta blockers have shown promise in studies that, at present, must be considered preliminary, while they clearly have potential as tools for investigating the neuropharmacology of psychosis. (123 ref)—*Journal abstract*.

10113. **Kielholz, P.** (U Basel, Psychiatric Clinic, Switzerland) **New psychotropic drug developments in German speaking countries.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 21-23.—Describes new psychotherapeutic drugs developed in Germany in the past 2 yrs. The antidepressant maprotilin (Ludiomil) has been demonstrated to be an incentive-increasing and mood-elevating drug without many of the side effects of antidepressants currently in use. The development of long-term neuroleptics is also cited.

10114. **Klawans, H. L. & Rubovits, R.** (Michael Reese Medical Ctr, Chicago, IL) **Effect of cholinergic and anticholinergic agents on tardive dyskinesia.** *Journal of Neurology, Neurosurgery & Psychiatry*, 1974(Aug), Vol 37(8), 941-947.—A study of 12 patients diagnosed as having tardive dyskinesia support the hypothesis that anticholinergic therapy in patients prone to develop the disorder may increase the incidence of it by lowering the threshold for the appearance of abnormal movements. Physostigmine improved these movements in tardive dyskinesia patients while scopolamine tended to aggravate abnormal movements and in some cases elicited abnormal movement not previously observed. It is suggested that tardive dyskinesia is primarily related to dopaminergic activity within the striatum. (23 ref)—*Journal abstract*.

10115. **Krager, John M. & Safer, Daniel J.** (Baltimore County Dept of Health, Towson, MD) **Type and prevalence of medication used in treating hyperactive children.** *New England Journal of Medicine*, 1974(Nov), Vol 291(21), 1118-1120.—Presents the results of a 1971 and 1973 survey on the use of medication for hyperactivity in elementary school children ( $N = 1,894$ ) in Baltimore County, Maryland. School nurses were asked to list the names of children receiving such medication, the name(s) of the drug(s), the reason for its administration, and the person who administered it. In 1971 in Baltimore County public schools, nurses reported that 1.07% of the children were on such medication. In 1973, this had increased to 1.73%. Results also show that in 1971, 76.2% of the children given medication for hyperactivity received stimulants (methylphenidate or dextroamphetamine), whereas by 1973 this had increased to 88.2%. A consistent finding was that children in

wealthier areas received medication more often than those in lower socioeconomic areas of the county.—*R. S. Albin*.

10116. **Lapierre, Y.-D.** (Hôpital Pierre-Janet, Hull, Québec, Canada) **[Sedatives, hypnotics and tranquilizers.]** (Fren) *Vie Médicale au Canada Français*, 1974(Jun), Vol 3(6), 605-609.—Reviews some of these substances with their indications and contraindications, and classifies them for practical use. (English summary)

10117. **LaRosa, John C.; Lipsius, Stephen H. & LaRosa, Judith H.** (George Washington U, Medical Ctr, Drug Dependence Program) **Experiences with a combination of group therapy and methadone maintenance in the treatment of heroin addiction.** *International Journal of the Addictions*, 1974, Vol 9(4), 605-617.—Describes a heroin addiction treatment program within a medical clinic which combines methadone maintenance and psychotherapy techniques. The majority of patients were Caucasian, employed, high school graduates and were all multiple drug abusers. Therapy sessions were led by mental health professionals or ex-addict counselors. After 1 yr, 23 of the original 42 patients (55%) remained in the program, 5 of whom were detoxified from methadone. Problems resulting from the use of ex-addicts as counselors are discussed in detail. Examples of the evolution of group progress in therapy illustrate the effective interrelationship of the 2 types of support in the treatment program.—*F. Beyer*.

10118. **Lipsitz, Phillip J. & Blatman, Saul.** (Mount Sinai School of Medicine, City U New York) **Newborn infants of mothers on methadone maintenance.** *New York State Journal of Medicine*, 1974(Jun), Vol 74(6), 994-999.—Studied the effects of methadone on 100 infants born to mothers maintained on high blocking doses of methadone. Although 56 infants exhibited narcotic withdrawal symptoms at birth, follow-up indicated normal physical and developmental growth during the first few months of life. (21 ref)

10119. **Lowe, Warren C. & Thomas, Sam D.** (VA Hosp, Shreveport, LA) **A comparison of three outcome measures of an alcoholic treatment unit.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 23-26.—Evaluated the success of an alcoholic treatment unit with 128 male alcoholics, using the criteria of job placement, total abstinence, and improved social functioning. 70% achieved 30-day successful job placement; 34% maintained total abstinence for 6 mo; and 62% showed improved social functioning after 6 mo.

10120. **MacDonald, James H. & Sparks, P. Don.** (McDonnell Douglas Corp, Personnel Development, St Louis, MO) **Employee assistance program for alcoholism and drug abuse: An industry approach.** *Industrial Gerontology*, 1974(Fal), NS, Vol 1(4), 25-27.—Describes a corporation's 4-yr employee assistance program designed to aid employees whose work performance was impaired by alcoholism or drug misuse. Key factors were identification of the problem, motivation to seek treatment, and referral to appropriate treatment services.

10121. **Neu, Carlos; DiMascio, Alberto & Williams, David.** (Boston State Hosp, MA) **Saliva lithium levels: Clinical applications.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 66-68.—Notes that, despite a few

reports in the literature indicating that saliva lithium levels could adequately replace serum determinations in monitoring patients being treated with lithium salts, this procedure has not received much clinical application. The present study of 20 patients investigated correlations between serum and mixed saliva and parotid fluid lithium levels and documented the reliability of this procedure. It is suggested that an individual patient's ratio of serum to saliva concentrations should be calculated and used as a constant in the determinations. Patients can collect saliva samples and send them to the laboratory prior to their visits, decreasing the facility's sample collection costs and the patients' inconvenience and discomfort.—*Journal abstract.*

10122. Pittel, Stephen M. & Hofer, Ricardo. (Wright Inst, Berkeley Ctr for Drug Studies, CA) **A systematic approach to drug abuse treatment referral.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 253-258.—Describes the Drug Abuse Treatment Referral System (DATRS). DATRS classifies drug abusers by their need for certain types of intervention and their ability to benefit from the alternative services available. The need is determined by indexing the nature and extent of the patient's drug involvement. A prognostic index assesses the personal and social resources available to the patient as shown by 4 scales: Achieved Stake (measures social ties and educational-vocational achievements), Duration of Drug Involvement, Treatment Commitment and Goals, and Current Cohabitants and Peers. Procedures are then used to select an optimal treatment mode. The use of DATRS to develop a community drug abuse plan is noted, and DATRS is viewed as an extension of the traditional mental health intake and referral process.—R. Tomasko.

10123. Pratt, Jesse W. (Tuum Est, Venice, CA) **Tuum Est (It's up to you).** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 179-184.—Reprints part of the Tuum Est therapeutic community program description and philosophy. The rationale is presented for Tuum Est's use of encounter groups, seminars, assigned readings, morning meetings, job assignments, rules, and daily log.

10124. Rimón, R. (U Kuopio, Finland) **Depression in rheumatoid arthritis.** *Annals of Clinical Research*, 1974(Jun), Vol 6(3), 171-175.—37 depressed female inpatients with definite or classical rheumatoid arthritis were treated with antidepressant drugs and supportive psychotherapy for a period of 3-8 wks. Rheumatological recovery was significantly more marked in those patients in whom clinical depression disappeared (as measured by the Beck Depression Inventory) than in patients with persistent depression throughout the relatively short therapy period. In most of the persistently depressed patients the clinical rheumatological state deteriorated or remained unchanged. The therapeutic regime proved beneficial in 57% of the patients, and both chlorimipramine and sulpiride seemed to be of comparable value in the treatment. The role of psychiatric consultations and therapy methods in the treatment of rheumatoid arthritis is discussed and evaluated. (27 ref)—*Journal abstract.*

10125. Rodin, E. A.; Rim, C. S. & Rennick, P. M. (Lafayette Clinic, Detroit, MI) **The effects of carbamazepine on patients with psychomotor epilepsy:**

**Results of a double-blind study.** *Epilepsia*, 1974(Dec), Vol 15(4), 547-561.—Conducted a study of the anticonvulsant and psychotropic properties of carbamazepine (Tegretol) with 37 16-55 yr old hospitalized patients with intractable psychomotor epilepsy. Patients were first stabilized on diphenylhydantoin and phenobarbital, 10-15 µg/ml in serum, and then received for 2 3-wk periods identical capsules containing either carbamazepine first, then placebo, or vice versa. Carbamazepine reduced the frequency of psychomotor seizures by 83%, and grand mal seizures by 55%. Side effects were minor except in 1 patient who developed transient leukopenia. Behavioral effects were not demonstrable on a double-blind basis. The drug tended to produce slowing of background EEG rhythms and sometimes diffuse paroxysmal activity. Carbamazepine appears to be effective for treatment of psychomotor epilepsy and is safe when blood and platelet counts are checked. (French, Spanish, & German summaries) (17 ref)—*Journal summary.*

10126. Rouleau, Yves. (Hôpital du Saint-Sacrement, Section de Psychiatrie, Québec, Québec, Canada) [The era of pharmacologic tranquility.] (Fren) *Vie Médicale au Canada Français*, 1974(Apr), Vol 3(4), 377-382.—Makes a case for better education in the use of tranquilizers. It is suggested that because of their lack of knowledge, susceptibility to advertisements, and psychological need to provide patients relief, doctors fail to prescribe tranquilizers responsibly. Patients, meanwhile, accept them passively as cures, are careless with dosage, and finally allow them to substitute for a real coming-to-terms with their problems. Although many substances have been used throughout history to relieve anxiety, the modern public ought to be encouraged to more self-reliance through education.—L. Klinkon.

10127. Rybakowski, Janusz et al. (Medical Academy of Poznań, Psychiatric Clinic, Poland) **Red blood cell lithium index in patients with affective disorders in the course of lithium prophylaxis.** *International Pharmacopsychiatry*, 1974, Vol 9(3), 166-171.—Estimated the red blood cell (RBC) lithium index (RBC lithium to serum lithium ratio) in 37 17-67 yr old patients with affective disorders in the course of lithium prophylaxis during 4 mo. The study revealed no difference in RBC lithium index between patients with manic-depressive psychosis and unipolar depression, nor between men and women. RBC lithium index was to some extent correlated with the magnitude of serum lithium concentration. The variability of RBC lithium index with time was different (+/- 2- +/- 50%) in different patients. The possible importance of RBC lithium index in affective disorders is critically discussed.—*Journal abstract.*

10128. Škopková, H. (Psychiatrická léčebna, Dobřany, Czechoslovakia) [Psychotic complications after tetraethylthiuram disulfide used in the treatment of alcoholism.] (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 102-111.—Describes 29 clinical cases of psychosis detected among 1,348 chronic alcoholics treated with antabuse. The psychotic period generally occurred after 35 days of medication and its average length was 21 days. The clinical picture was characterized by disorders of thinking, bizarre delusions, illogical speech, disturbance of mood and affect, aggressiveness, delirium, clouding of consciousness, and high variability



and frequent change of symptoms. More than half of the psychoses were directly related to antabuse alcohol reaction. Most of the cases were not volunteers but had been forced to submit to the treatment. It is hypothesized that antabuse psychoses have different etiologies, including that of overmedication. Anamnestic and katamnestic data are analyzed in order to gain better understanding of the complex phenomenon. (Russian & English summaries) (15 ref)—*V. Fischmann*.

10129. **Sack, Michael.** (Winnebago Mental Health Inst, Drug Abuse Treatment & Community Consultation Unit, WI) **Therapeutic community movement.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 169-171.—Describes the development of the therapeutic community approach to the treatment of drug abuse. Issues presented at the 1973 Wingspread Conference about the future of the movement are discussed.

10130. **Sack, Robert L. & Goodwin, Frederick K.** (Stanford U, Medical School) **Inhibition of dopamine- $\beta$ -hydroxylase in manic patients: A clinical trial with fusaric acid.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 649-654.—Studied the behavioral effects of fusaric acid, a specific inhibitor of dopamine- $\beta$ -hydroxylase (DBH) under double-blind conditions in 9 manic patients. Fusaric acid administration was associated with a significant decrease in cerebrospinal fluid 3-methoxy-4-hydroxy-phenylglycol (the major metabolite of norepinephrine) and an increase in homovanillic acid (the major metabolite of dopamine), changes consistent with central DBH inhibition. Behavioral effects of fusaric acid appeared to depend on the preexisting clinical state. Ss with more severe mania, including evidence of preexisting psychotic features, became consistently worse (more psychotic), while Ss with mild hypomanic symptoms showed no change or slight improvement. Conventional anti-manic therapies, initiated after the fusaric acid protocol, were associated with improvement in the expected time period in all Ss. (58 ref)—*Journal abstract*.

10131. **Sampliner, Richard & Iber, Frank L.** (VA Hosp, Baltimore, MD) **Diphenylhydantoin control of alcohol withdrawal seizures: Results of a controlled study.** *JAMA: Journal of the American Medical Association*, 1974(Dec), Vol 230(10), 1430-1432.—Diphenylhydantoin (300 mg/day) or placebo were blindly administered for 5 days to 157 patients entering an alcoholism detoxification unit; all patients received sedative doses of chlorthalidone. All patients had a history of convulsions in adulthood. 11 patients in the placebo-treated group but none in the diphenylhydantoin group had convulsions in the 1st 48 hrs. 2 patients had convulsions after withdrawal of active drug. Blood levels of diphenylhydantoin were determined in 18 alcoholics and in 5 normal Ss. Comparable blood levels (3 $\mu$ g/ml) were obtained in both groups after the 1st day and reached a plateau of 4 $\mu$ g/ml after the 3rd.—*Journal abstract*.

10132. **Schecter, Arnold.** (State U New York, Downstate Medical Ctr, Brooklyn) **Consumer acceptance of drug abuse programs: A provider's view.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 213-223.—Discusses consumer reaction to drug abuse treatment programs. Modalities considered include methadone, drug-free narcotic antagonists (nalorphine, cyclazocine, naloxone, and naltrexone), and long-acting methadone.

The single treatment mode approach of most drug programs is criticized, and the lack of a consumer orientation in most programs is noted. The need for realistic, ongoing vocational and emotional assistance for addicts and ex-addicts is stressed. (32 ref)—*R. Tomasko*.

10133. **Schwartz, Martin S. & Scott, D. F.** (Academic Hosp, Uppsala, Sweden) **Aminophylline-induced seizures.** *Epilepsia*, 1974(Dec), Vol 15(4), 501-505.—Presents case histories of 4 patients, all over 40 yrs of age, with a long history of bronchial asthma but no previous epilepsy, who developed serial seizures with focal onset during treatment of status asthmaticus. Seizures appeared to be related to the administration of aminophylline. (French & German summaries)

10134. **Simeon, J.; Utech, C.; Simeon, S. & Itil, T. M.** (U Missouri, Medical School, Inst of Psychiatry, St Louis) **Pediatric psychopharmacology outside the USA.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 37-47.—Describes research designed to obtain data on the use of psychotropic drugs in children outside the US. Questionnaires were sent to 251 institutions in 53 countries. 73 of these were returned from 34 countries and were analyzed. The percentage of patients receiving drugs under the care of these respondents ranged from 0 to 100% (mean of 39%). A total of 56 different drugs were administered for 11 psychiatric disorders. No regional differences were apparent, except for infrequently used drugs. The most popular drugs in use were diazepam, thioridazine, chlorpromazine, chlorthalidone, imipramine, amitriptyline, haloperidol, and methylphenidate. Highest agreements among respondents were for imipramine in enuresis, diazepam in anxiety, chlorpromazine in psychosis, and thioridazine in hyperkinesia. Major problems in interpreting cross-cultural data in pediatric psychopharmacology are elucidated by interpretation of study results.—*R. S. Albin*.

10135. **Siris, J. H.; Pippenger, C. E.; Werner, W. L. & Masland, R. L.** (Creedmore State Hosp, Section of Neurological Services, Queens Village, NY) **Anticonvulsant drug-serum levels in psychiatric patients with seizure disorders.** *New York State Journal of Medicine*, 1974(Aug), Vol 74(9), 1554-1556.—Studied the effects of psychotropic drug therapy on the serum anticonvulsant drug levels of psychiatric patients with major motor seizure disorders. The serum anticonvulsant levels of 18 Ss receiving diphenylhydantoin (DPH) and phenobarbital, and of 24 Ss receiving DPH, phenobarbital, and 1 psychotropic drug (chlorpromazine, diazepam, or thioridazine) were determined by gas liquid chromatography. It was found that all Ss had optimal therapeutic levels of serum phenobarbital, but that Ss receiving a psychotropic drug in addition to anticonvulsant drugs showed wide variations in serum DPH levels. It is concluded that effective seizure control in psychiatric patients may be frustrated by the use of psychotropic drugs which interfere with the utilization of anticonvulsant drugs. (15 ref)—*J. Kelly*.

10136. **Sirotnik, Ken.** **A comprehensive evaluation model for multimodality programs in the treatment of drug abuse.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 259-268.—Describes an evaluation model appropriate for multimodal drug treatment programs. Separating the evaluation concept from measurement per se, a 3-

dimensional data box is described which distinguishes evaluation phases, objects, and functions. (17 ref)

10137. **Smith, David E.; Linda, Lauren K. & Loomis, Stuart.** (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Experiences of the Haight-Ashbury Free Medical Clinic's community based drug rehabilitation program.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 243-251.—Describes the development of services provided by the clinic. The restoration of a drug abuser's previous level of social and vocational skills through intensive counseling and an apprenticeship program is discussed. (19 ref)

10138. **Stokes, Trevor F.; Baer, Donald M. & Jackson, Robert L.** (U Kansas) **Programming the generalization of a greeting response in four retarded children.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 599-610.—Used reinforcement techniques of prompting and shaping to develop handwaving in 4 10-13 yr old institutionalized retarded Ss. A multiple-baseline design across Ss demonstrated the reliable functioning of the training procedures. Specifically, it showed that training and maintenance of the greeting response by 1 E was not usually sufficient for generalization of the response to the more than 20 other members of the institution staff who had not participated in the training of the response. However, high levels of generalization to staff members were recorded for 3 Ss over periods ranging from 1 to 6 mo after a 2nd E trained and maintained the response in conjunction with the 1st E. The 4th S, although never receiving training by a 2nd E, showed similar results following a 2nd training by the 1st E.—*Journal abstract.*

10139. **Swazey, Judith P.** (Boston U, Medical School) **Chlorpromazine in psychiatry: A study of therapeutic innovation.** Cambridge, MA: MIT Press, 1974. xiv, 340 p. \$17.50.—Discusses the routes of development and history of chlorpromazine (CPZ), the events that led to CPZ's current prominent place in clinical psychiatry, its effects on hospital psychiatry in the US, and the history of the National Institute of Mental Health collaborative controlled study of CPZ and acute schizophrenia. (24 p ref)

10140. **Sweet, Richard D.; Bruun, Ruth; Shapiro, Elaine & Shapiro, Arthur K.** (New York Hosp, NY) **Presynaptic catecholamine antagonists as treatment for Tourette syndrome: Effects of alpha methyl para tyrosine and tetrabenazine.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 857-861.—Improvement of the tic syndrome of Gilles de la Tourette by haloperidol suggests that brain dopaminergic functions may be hyperactive in this condition. The role of catecholamines in Tourette syndrome was tested by administration to 7 15-34 yr old patients of alpha methyl para tyrosine (MPT), which inhibits synthesis, or tetrabenazine, which inhibits storage of brain catecholamines. 2 patients improved with each medication but only 1 each enjoys sustained benefit. Adverse effects were drug crystalluria with MPT and extrapyramidal effects with both medications. Intravenously given cholinergic and anticholinergic medication had no consistent effect on tics. The MPT and tetrabenazine are not satisfactory medications, but their effects suggest that brain catecholamines may be important in Tourette syndrome. (21 ref)—*Journal abstract.*

10141. **Swett, Chester.** **Adverse reactions to chlorpromazine in psychiatric patients.** *Diseases of the Nervous System*, 1974(Nov), Vol 35(11), 509-511.—Reports adverse reactions in 150 out of 470 consecutively monitored psychiatric inpatients. Mean age of patients was 36 yrs and 48% were male. In 3 of these 150 patients, these reactions were considered life-threatening (0.6%). Reactions were more frequent with higher daily doses and the intramuscular route was associated with earlier onset of a reaction. The central nervous system was most often affected. The dystonias occurred more often in males and after a shorter duration of treatment than the other types of extrapyramidal reactions. In contrast, akathisia occurred later in treatment and was observed more often in females. Drowsiness was the 2nd most common type of reaction. In addition, hypotensive reactions occurred in 7 cases and have been suggested to occur via depression of central vasomotor centers as well as by autonomic mechanisms. It is suggested that clinicians weigh the potential risk vs therapeutic efficacy in prescribing this drug.—*R. S. Albin.*

10142. **Tennant, Forest S.; Russell, Barbara A.; McMarns, Alladia & Cassas, Mary K.** (U California, Medical School, Los Angeles) **Propoxyphene napsylate treatment of heroin and methadone dependence: One year's experience.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 201-211.—Describes the use of propoxyphene napsylate (Darvon-N) in a Los Angeles heroin addiction treatment program as an alternative to methadone. Treatment procedures, toxicological effects, effects on physiologic and social functions, and interaction with other psychoactive drugs are discussed. Propoxyphene napsylate's low physical addiction liability and its minimal effects on sexual functions are noted as factors improving its patient and community acceptability. The drug is indicated to be useful for the detoxification of heroin and methadone dependent individuals as well as a short-term maintenance agent for heroin addicts.—*R. Tomasko.*

10143. **Tucker, Jerry R.** **A worker-oriented alcoholism and "troubled employee" program: A union approach.** *Industrial Gerontology*, 1974(Fal), NS, Vol 1(4), 20-24.—Describes a state cooperative alcoholism program that focuses on establishing employer agreements designed to recognize, refer to treatment, rehabilitate, and re-employ alcoholically troubled workers.

10144. **Van Dusen, Wilson & Sherman, Scott L.** (Awareness House Training Ctr, Oakland, CA) **Cultural therapy: A new conception of treatment.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 173-177.—Describes a treatment approach based on the unearthing of a drug abusing individual from his/her drug abusing subgroup. The importance of peer group pressure in learning and breaking from drug dependency is stressed. Conventional psychotherapy is contrasted to cultural therapy, and common approaches used by cultural therapy groups are outlined. Conventional therapy is considered more appropriate for drug abusers outside the drug culture. Cultural therapy is indicated to be appropriate for juvenile delinquents, victims of chronic poverty, criminals, alcoholics, and homosexuals. (25 ref)

—*R. Tomasko.*



10145. Van Stone, William W. (Stanford U, Medical School) **Treating the drug-dependent veteran: Perspective from a Veteran Administration hospital.** *International Journal of the Addictions*, 1974, Vol 9(4), 593-604.—Describes the development of a drug rehabilitation program, consisting of a detoxification ward, 2 methadone clinics, and 3 residential settings. Specific problems involved in initiating a drug program are discussed.

10146. Viol, Geoffrey W.; Grof, Paul & Daigle, Lesley. (St Joseph's Hosp, Hamilton, Ontario, Canada) **Renal tubular function in patients on long-term lithium therapy.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 68-70.—Conducted a study in which 10 female patients (mean age, 50.3 yrs) with recurrent affective disorders who responded completely to long-term lithium therapy but who were otherwise unselected were tested for renal tubular concentrating and acidification ability. Despite frequent symptoms of thirst, polyuria, and nocturia, all patients were able to concentrate urine normally, and all showed normal renal tubular acidification ability. A significant correlation was found between erythrocyte lithium concentration and maximum urinary osmolality ( $r = .67$ ,  $p < .05$ ). (20 ref)—*Journal abstract*.

10147. Waldmann, K.-D. et al. (Universitäts-Nervenklinik, Jena, E Germany) [Lithium-serum concentration within therapeutic levels causing toxic symptoms.] (Germ) *Psychiatria Clinica*, 1974, Vol 7(1), 56-62.—Reports toxic manifestations occurring during prophylactic lithium treatment of a woman with periodic depressions. They appeared as neurological and gastrointestinal symptoms as well as an organic psychosyndrome while the serum lithium level was within therapeutic levels. The connection of the earlier-mentioned symptoms and the lithium therapy could be established; the organic psychosyndrome appeared also to be due to the lithium. Particular aspects of the relations between lithium dosage and lithium serum levels, as well as changes in the potassium serum levels for the entire time of the treatment, are described and discussed.—*English abstract*.

10148. Walsh, Arthur C. & Lukas, Emma. **Alcoholic brain damage: Anticoagulant therapy.** *Journal of the American Geriatrics Society*, 1974(Dec), Vol 22(12), 555-556.—Anticoagulant therapy with bishydroxycoumarin (Dicumarol) was given for 5-6 wks to 15 hospital patients with organic brain damage secondary to alcoholism. Results were excellent in 5, good in 7, and poor in 3 cases; 8 patients were discharged.

10149. Wesson, Donald R. & Smith, David E. (West Coast Polydrug Abuse Treatment & Research Project, San Francisco, CA) **A conceptual approach to detoxification.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 161-168.—Discusses 9 principles to guide the management of drug withdrawal states. Strategies are presented for directing withdrawal from opiates, sedative-hypnotics, mixed alcohol/sedative-hypnotic dependence, mixed opiate/sedative-hypnotic dependence, Darvon (propoxyphene) and Talwin (pentazocine).

10150. Wheatley, David. (General Practitioner Research Group, Twickenham, England) **New drug development in United Kingdom.** *Diseases of the Nervous System*, 1974(Jul), Vol 35(7, Sect 2), 24-27.—Discusses

alternative drugs currently in use in Great Britain due to the impasse reached with more conventional psychotropic drugs. The uses of beta-blocking drugs in anxiety (e.g., propranolol) are reviewed. The uses of thiazide diuretics in depression, and some new antidepressants (e.g., vivalan) are also examined.

10151. Zarcone, Vincent P. & Hoddes, Eric. (Stanford U) **Effects of 5-hydroxytryptophan on fragmentation of REM sleep in alcoholics.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 74-76.—Studied the effects of oral loading with 5-hydroxytryptophan (5-HTP) on REM fragmentation in a group of 12 25-52 yr old male alcoholics who were abstinent following acute ethanol withdrawal. Decreased fragmentation was found in the majority of Ss, and those Ss with low baseline REM efficiency (i.e., greater fragmentation) showed more improvement from the drug than did Ss who were less impaired initially. It is suggested that there is an organic decrement of serotonin during ethanol withdrawal which is partially reversed by 5-HTP loading.—*Journal abstract*.

### Behavior & Group Therapy

10152. Abramowitz, Christine V.; Abramowitz, Stephen L.; Roback, Howard B. & Jackson, Carolyn. (George Peabody Coll for Teachers) **Differential effectiveness of directive and nondirective group therapies as a function of client internal-external control.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 849-853.—Tested the predictive utility of a Client x Modality interactive model for group psychotherapy outcome. 26 mildly distressed college student clients were assigned randomly to a nondirective or to 1 of 3 directive groups, all led by the same therapist. Belief in personal internal-external control (assessed with Rotter's Internal-External Control Scale) was the individual-difference predictor, and a multivariate personality battery (including the State-Trait Anxiety Inventory and the Rosenberg Self-Esteem Scale) provided the indexes of psychosocial adjustment. As hypothesized, more internally oriented persons were more therapeutically responsive to the nondirective than to the directive approach, whereas the reverse tended to be the case among those more externally oriented. (29 ref)—*Journal abstract*.

10153. Aponte, Harry J. (Philadelphia Child Guidance Clinic, PA) **Organizing treatment around the family's problems and their structural bases.** *Psychiatric Quarterly*, 1974, Vol 48(2), 209-222.—Describes a therapeutic process in which the therapist helps members of a family system to (a) agree on the problem they need to solve, (b) identify the participants in the family structure to which the problem is related, and (c) make pledges to work on changing the structural basis of the newly-clarified problem. This approach is based on the frequent discovery that a patient is not actually sick, but is simply reacting to pathology in the family constellation.—*Journal abstract*.

10154. Arkowitz, Hal. (U Oregon) **Desensitization as a self-control procedure: A case report.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 172-174.—Describes the effective use of self-desensitization in a case of social and sexual anxieties. The client

conducted the desensitization himself, with the therapist serving as "technical consultant." Details of the treatment and outcome, and of a 2½-yr follow-up are presented.

10155. Ausman, James; Ball, Thomas S. & Alexander, Dean. (Pacific State Hosp, Intensive Behavioral Intervention Ward, Pomona, CA) **Behavior therapy of pica with a profoundly retarded adolescent.** *Mental Retardation*, 1974(Dec), Vol 12(6), 16-18.—Used a 4-phase time-out procedure to treat a nonverbal 14-yr-old severely retarded, ambulatory male, who had a lengthy history of pica. Results indicate that after 9 mo of treatment, S's pica had been contained to a significant degree.

10156. Azrin, N. H. & Wesolowski, M. D. (Anna State Hosp, Behavior Research Lab, IL) **Theft reversal: An overcorrection procedure for eliminating stealing by retarded persons.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 577-581.—To deal with the problem of stealing, an overcorrection procedure was designed in which the thief was required to give his victim an item identical to the stolen one in addition to returning the stolen item. This procedure was compared with the more commonly used simple correction procedure (restitution) in which the thief is required to return the stolen item. Under the simple correction procedure, an average of 20 thefts/day had been occurring among 34 retarded residents of an institution. The overcorrection procedures reduced the thefts by 50% on the 1st day, by 75% on the 2nd day, and eliminated thefts by the 4th day, after which no further stealing occurred. The overcorrection procedure was a rapid and effective method of eliminating stealing, it provided special consideration for the victim, and it should be applicable to the nonretarded.—*Journal abstract.*

10157. Boër, Annette K. & Lantz, James E. (Family Counseling Ctr, Columbus, OH) **Adolescent group therapy membership selection.** *Clinical Social Work Journal*, 1974(Fal), Vol 2(3), 172-181.—Discusses the following considerations for selecting adolescent group members: (a) The teenager should be experiencing difficulties outside of the family. (b) All potential group members and their parents should be seen at least once by the group therapist(s) to develop a beginning relationship. (c) The group should be balanced in terms of interactional styles and sex. (d) The age span should be small. (e) Case responsibility should rest with the group therapist(s). 2 groups are described to illustrate the importance of careful membership selection.—S. R. Stein.

10158. Bond, James A. (Chicago Counseling & Psychotherapy Research Ctr, IL) **Behavior therapy: learning theory and scientific method.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 118-132.—Discusses distinctive contributions of behavior therapy in the light of 2 basic and complex notions used in previous appraisals: "learning theory" and "scientific method." Properly analyzed, these 2 notions contain the best basis for understanding what is distinctive about behavior therapy in comparison with psychoanalytic and client-centered therapies. Reappraisal of "learning theory" and "scientific method" (in terms of T. S. Kuhn's notion of a "disciplinary matrix") reveals 2 fundamental aspects—the stimulus-organism-response

model as heuristic, and the methodological value placed on publicly observable behavior. It is argued that this model and value give rise to behavior therapy's distinctive contributions: exploration of new domains of data, stress on greater specificity in terminology, and more extensive and fruitful use of all stages of scientific inquiry, especially the early stages.—*Author abstract.*

10159. Bruch, Hilde. (Baylor Coll of Medicine, Houston, TX) **Perils of behavior modification in treatment of anorexia nervosa.** *JAMA: Journal of the American Medical Association*, 1974(Dec), Vol 230(10), 1419-1422.—In recent years, overly optimistic claims have been made for the efficacy of behavior modification in the treatment of anorexia nervosa. This claim rests on the mistaken assumption that enforced correction of the emaciation, the most prominent symptom, represents meaningful treatment of this serious and complex condition. Results have been published without the benefit of follow-up studies. The cases of 3 17-20 yr old females are reported in which this method led to deterioration. In spite of bringing about a transient weight increase, behavior modification must be looked upon as potentially damaging in anorexia nervosa.—*Journal abstract.*

10160. Buda, Béla. [Strategy and tactics in group psychotherapy.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(5), 301-324.—Stresses the need for strategy and tactics in group psychotherapy. In each group an observation period at the beginning may provide necessary information for planning group activities. Strategic and tactical thinking is useful for intensifying the group process and increasing its effectiveness. Experience with 7 major types of groups: neurotic, Balint, alcoholic, juvenile drug addiction, acute and chronic schizophrenic, and training groups—illustrates the development of various strategies and tactics. Increased activity, the use of different therapeutic methods and theories, and shortening the therapeutic process do not contradict the principles of psychoanalytic group therapy. H. Brundl.

10161. Cacirol, L. et al. (U Rome, Italy) **Family psychotherapy with a case of a depressed woman: Reflections on Sigmund Freud's concept of "mourning and melancholia."** (Ital) *Rivista di Psichiatria*, 1974(Spr), Vol 9(3), 185-202.

10162. Chopra, H. D. (Geelong Psychiatric Ctr, Australia) **Obsessive compulsive neurosis and behavior therapy.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 19-22.—Discusses obsessive-compulsive neurosis, emphasizing the relevance of a learning theory model to symptom development and treatment. In the behavioral treatment model presented, a relationship between duration of obsessional behavior and focus of behavioral treatment is emphasized. For acute cases of short duration, desensitization to anxiety-provoking stimuli is appropriate, while for cases of long duration an attack on the obsessional behavior is more appropriate. Systematic desensitization and thought-stopping techniques are briefly described, and the use of these techniques in 4 cases of obsessive-compulsive disorders illustrates the successful treatment of recent and long-standing obsessions.—F. S. Beyer.



10163. Chopra, H. D. **Treatment of encopresis in a mongol with operant conditioning.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 43-46.—Describes the case of an 11½-yr-old boy with Down's syndrome who developed a problem of encopresis associated with a change in his school environment. The patient was encouraged by the parent and teacher to sit on the toilet seat in the morning and was rewarded if he defecated. No punishments were used. He showed improvement after 6 wks of consistent training and after 5 mo was fully retrained.—J. H. Pflaum.

10164. Dube, K. C. & Yadav, B. S. (SN Medical Coll, Agra, India) **Role of sympathy and attention in treating deteriorated behavior: An experience in behavior technique.** *International Mental Health Research Newsletter*, 1974(Sum), Vol 16(2), 9-11.—Studied effectiveness of sympathy and attention in treating mental hospital patients considered therapeutic failures. Ss were 10 chronically psychotic male patients hospitalized for more than 5 yrs, who were serious management problems. During 1969-1970, Ss experienced 6 mo of treatment which included separate, pleasanter living quarters, nurses selected as particularly sympathetic, and encouragement to assume responsibility for their own care. Ratings of behavioral abnormalities were made before treatment, in mid-treatment, immediately after and 6 mo after treatment. Immediate results showed marked improvement in 5 of the 9 Ss completing treatment, fair improvement in 1, and slight improvement in another. 2 showed no improvement. 4 of the 7 improved Ss maintained gains at 6-mo follow-up. Symptom improvement occurred in almost all areas except feeding and speech problems. Treatment success is attributed to the reinforcing value of kindness and encouragement; wider and more consistent use of such treatment is recommended.—C. A. Heikkinen.

10165. Eysenck, H. J. (Inst of Psychiatry, London, England) **The use of conditioning methods in psychiatry.** *Indian Journal of Clinical Psychology*, 1974(Mar), Vol 1(1), 41-52.—Discusses the principles and applications of behavior therapy in the treatment of neurotic disorders. The methods of treatment in behavior therapy are based on classical and operant conditioning. Classical conditioning techniques (e.g., desensitization, flooding, modeling, and aversion therapy) are most effective when emotional dysfunction such as anxiety is the basis of the disorder. In contrast, operant conditioning techniques (e.g., a token economy and the direct application of operant principles) are most effective when dealing more specifically with behaviors such as headbanging. Examples illustrating the success of the various methods of treatment are presented, emphasizing their superiority over psychoanalytic methods. Behavior therapy is also evaluated in terms of responses to common criticisms.—F. S. Beyer.

10166. Flannery, Raymond B. (Somerville Mental Health Ctr, MA) **Behavior modification of geriatric grief: A transactional perspective.** *International Journal of Aging & Human Development*, 1974(Spr), Vol 5(2), 197-203.—Describes a behavior modification program used in treating grief in a 77-yr-old organically impaired, single white male patient. The program, carried out in a community mental health setting, is discussed in terms of

transactional analysis (TA). The successful application of behavioral assessment and treatment techniques to TA was demonstrated by changes in the quality and amount of adaptive behavior shown by the patient over a period of 6 mo. (25 ref)—*Journal abstract*.

10167. Flowers, John V. & Guerra, Julio. (U California, Program in Social Ecology, Irvine) **The use of client coaching in assertion training with large groups.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 414-417.—Compared the use of professionals and clients as coaches in assertion training. 27 probation officers were placed in 1 of 3 experimental conditions in the behavioral rehearsal portion of such training. In these conditions Ss served as clients coached by nonprofessionals (other Ss), clients coached by professionals, or both clients and coaches. 2 outcome measures were used: (a) the client's later selection of the correct assertion strategy to maximize the chances of success in a specific situation and (b) the client's later performance of the assertion response with a minimum need for coaching. Results indicate that nonprofessional coaching was superior to professional coaching in 2 regards: (a) an S coached by a fellow client was superior in later assertion performance than one who was coached by a professional. (b) An S who had been a coach learned assertion techniques better than an S who had never had the opportunity to coach. It is suggested that employing nonprofessional client-coaches may be an effective method of delivering at least 1 form of mental health service in a way that most effectively uses both professional and client time.—*Journal abstract*.

10168. Friedman, Meredith L. & Dies, Robert R. (U Maryland) **Reactions of internal and external test-anxious students to counseling and behavior therapies.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 921.—Studied the responses of 36 test-anxious students, who differed on Rotter's Internal-External Control Scale, to 3 forms of therapy (counseling, systematic desensitization, and automated desensitization). Support was obtained for the prediction that internal Ss would show greater resistance to the control implied in the 2 behavior therapies than external Ss.

10169. Fryrear, Jerry L.; Nuell, Leon R. & Ridley, Susan D. (Tulane U) **Photographic self-concept enhancement of male juvenile delinquents.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 915.—Describes the enhancement of self-concepts of 16 13-16 yr old male juvenile delinquents using a program of photographic feedback about themselves. According to their Tennessee Self-Concept Scale scores, Ss who received the weekly photographic feedback sessions, compared to 14 controls increased in total self-concept, self-satisfaction, and the use of psychological defenses necessary for the maintenance of self-esteem.

10170. Gilandis, Alex J. (James Cook U, Townsville, Qld, Australia) **The application of broad spectrum behavior therapy to a patient with multi-dimensional problems.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 179-181.—Presents the case of an institutionalized patient who received a broad spectrum of behavioral therapy. Environmental manipulation, token economy, modeling, cognitive conditioning, and medication alleviated a wide range of behavioral

excesses, bizarre thoughts, and inappropriate emotional responses in a 45-yr-old woman diagnosed as a chronic schizophrenic.

10171. Goldsmith, Jean B. & McFall, Richard M. (Illinois State Psychiatric Inst, Chicago) **Development and evaluation of an interpersonal skill-training program for psychiatric inpatients.** *Journal of Abnormal Psychology*, 1975(Feb), Vol 84(1), 51-58.—Experimentally evaluated an empirically developed interpersonal-skill-training program for male psychiatric inpatients. The program development phase involved identifying patient-relevant problem situations, analyzing effective responses for these situations, deriving principles governing such effective behavior, and developing explicit scoring criteria for such behavior. In the evaluation phase, 36 male psychiatric inpatients received 3 individual sessions of either interpersonal skill training or pseudotherapy, or they were in an assessment-only control group. Skill training was superior to the other 2 conditions on a number of behavioral and self-report measures, both in the training context and in a more real-life context.—*Journal abstract.*

10172. Granger, James A. (Walter Reed Hosp, Child Guidance Service, Washington, DC) **Including the younger child in conjoint family evaluation and therapy.** *Psychiatric Forum*, 1974(Fal), Vol 4(2), 21-26.—Presents a conceptual model for family therapy, identifying those processes occurring in healthy and problem families. Emphasis is placed on family therapy for families with young children (3-10 yrs) and on the need to modify traditional methods of evaluation and treatment in these cases. An evaluative approach, based on the conjoint structured interview, is modified to include 5 tasks which ensure a child's participation. The main modification in treatment is the introduction of play materials, which facilitate child expression and reduce anxiety. Suggestions to increase the therapist's effectiveness in evaluation and treatment, such as useful techniques to facilitate change in a family's level of functioning, are discussed.—*F. Beyer.*

10173. Guidry, Lawrence S. (VA Hosp, New Orleans, LA) **Treatment of a case of compulsive stealing by use of a covert aversive contingency and the Premack principle.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 27-28.—Reports the case of a white male in his 20s whose long-standing stealing behavior was brought under control and virtually eliminated after 7 treatment sessions. A 10-mo follow-up indicated that the improvement had been maintained.

10174. Guidry, Lawrence S. (VA Hosp, New Orleans, LA) **Drug patient evaluation of a self directed behavior modification program.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 29-30.—Describes a behavior modification program applied to over 100 addicts, more than 20 completing all sessions. A 6-mo evaluation by the patients indicates enthusiastic acceptance and high ratings based on questionnaire data.

10175. Guidry, Lawrence S. (VA Hosp, New Orleans, LA) **Treatment of a case of claustrophobia by graded "in vivo" desensitization.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol

16(2), 28-29.—Reports the case of a 45-yr-old white male with a history of drug and alcohol abuse. S had a long-standing fear of closed places and many related anxieties. As measured on a subjective scale from 0 to 100, anxiety levels on all relevant dimensions were approaching zero at the end of treatment. Follow-up observations confirmed sustained improvement.

10176. Hall, Sharon M.; Hall, Robert G.; Hanson, Richard W. & Borden, Betty L. (U California, Langley-Porter Neuropsychiatric Inst, San Francisco) **Permanence of two self-managed treatments of overweight in university and community populations.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 781-786.—Assigned 94 males and females from community and university samples (mean ages = 20.8 and 42 yrs, respectively) to 2 self-management treatments, nonspecific, or no-treatment controls. At post-treatment, self-management conditions differed from controls in percentage of overweight lost. At 3-mo follow-up, the simpler self-management procedure differed from the nonspecific control on both dependent variables. The more complex self-management treatment differed only on percentage of body weight lost. At 6-mo follow-up, differences were not significant. Treatments  $\times$  Time of Assessment analysis on body weight indicated a significant interaction and significant losses during treatment and gains during posttreatment for both self-management conditions. (19 ref)—*Journal abstract.*

10177. Helsing, G. & Wolff, E. (Psychosomatische Universitätsklinik, Giessen, W Germany) **[Countertransference and sociometric group structure: iatrogenic structuring of closed subgroups within an open patient group.]** (Germ) *Zeitschrift für Psychotherapie und medizinische Psychologie*, 1974(Jan), Vol 24(1), 1-12.—Studied an open therapy group of patients 20-40 yrs old for 4 yrs in terms of group dynamics. The use of sociograms revealed the structure of the group and the countertransference of the therapists. A "star" subgroup and an opposition subgroup were identified. The star group characterized itself as being liked, capable, and relatively sound. They took over the therapeutic functions and were supported in this role by the group therapists. The opposition group regarded itself as ill and disturbed and was treated by the star group. Literature about role differentiation in neurotic groups is discussed. Results suggest that open groups offer conditions for developing a therapeutic social mobility within the group.—*S. D. Babcock.*

10178. Helsing, Gerd. (Psychosomatic Clinic, Giessen, W Germany) **[Active clinical therapy used with a group of phobics from a specific social class.]** (Germ) *Praxis der Psychotherapie*, 1973(Jun), Vol 18(3), 97-103.

10179. Hogg, J. & Maier, I. (U Manchester, Hester Adrian Research Ctr, England) **Transfer of operantly conditioned visual fixation in hyperactive severely retarded children.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 305-310.—Following operant conditioning of visual fixation responses to objects of known preference, 10 hyperactive, severely retarded 6-10 yr old children were given a series of transfer tests: (a) a distracting testroom, (b) neutral (unconditioned) stimuli, (c) E replacement, (d) simple play tasks presented in the testroom and the classroom, (e) Seguin formboard, (f)



beat manipulation, and (g) classroom assessment involving prescribed tasks. Results show consistent improvement for most Ss in the majority of tests for frequency and duration of visual fixation. No improvement was shown on the Seguin formboard, and a significant practice effect was obtained on the bead manipulation task.—*Journal abstract.*

10180. Hudson, R. Lofton. **Married love in the middle years.** *Journal of Religion & Health*, 1974(Oct), Vol 13(4), 263-274.—Describes cases encountered while counseling families in a religiously oriented program. It is maintained that boredom and a lack of social controls from growing children often cause a drifting apart and loss of sexual interests in married middle-aged couples. Making new friends and developing mutual hobbies are suggested as effective methods to combat the anxiety of increasing age and situations where divorce is not an alternative.—*F. A. Hardt.*

10181. Kapche, Robert. (California State U, Long Beach) **Aversion-relief therapy: A review of current procedures and the clinical and experimental evidence.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 156-162.—Reviews the literature relevant to aversion-relief therapy, which attempts to teach clients to inhibit anxiety by pairing selected stimuli with the cessation of noxious stimulation. Clinical reports describe the 4 types of procedure that have been reported in experiments with both humans and animals. This therapy appears promising, although the clinical reports suffer from the lack of controls and small samples of Ss. The animal research indicates the importance of the temporal length of the "safe" period between stimuli presentations. This factor has not been considered very crucial in many of the clinical applications.—*C. P. McCreary.*

10182. Kassirer, Lynn B. (George Washington U, National Law Ctr) **Behavior modification for patients and prisoners: Constitutional ramifications of enforced therapy.** *Journal of Psychiatry & Law*, 1974(Fal), Vol 2(3), 245-302.—Describes learning theory and techniques of behavior modification. Issues raised by coerced behavior therapy on prisoners and mental patients are discussed, as well as relevant case laws. (17 p ref)

10183. Kilmann, Peter R. & Howell, Robert J. (U South Carolina) **Effects of structure of marathon group therapy and locus of control on therapeutic outcome.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 912.—84 institutionalized female drug addicts were assigned to either direct marathon, nondirect marathon, or no-treatment control groups on the basis of the locus of control scores. Findings suggest that internals are better therapeutic risks than externals, regardless of a direct or nondirect therapist technique.

10184. Koegel, Robert L.; Firestone, Paula B.; Kramme, Kenneth W. & Dunlap, Glen. (U California, Inst for Applied Behavioral Science, Santa Barbara) **Increasing spontaneous play by suppressing self-stimulation in autistic children.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 521-528.—Studied appropriate play with toys in 2 autistic children (an 8-yr-old boy and a 6-yr-old girl) with high occurrences of self-stimulatory behavior. Each child participated in the experimental sessions in an A-B-A design, where "A"

refers to baseline sessions and "B" refers to self-stimulation suppression sessions. Results show that (a) during the baseline sessions, the children exhibited low levels of play and high levels of self-stimulatory behavior; (b) the percent of unreinforced, spontaneous, appropriate play increased when self-stimulatory behavior was suppressed; and (c) when the suppression of self-stimulation was discontinued, the percent of self-stimulation and that of appropriate play approached their presuppression levels. Results identify a set of conditions under which spontaneous appropriate behavior, uncommon in autistic children, occurs at an increased level. (24 ref)—*Journal abstract.*

10185. Kratochvíl, Stanislav. (Psychiatrisches Krankenhaus, Kroměříž, Czechoslovakia) **[Training in constructive controversy as a supportive method in group psychotherapy.]** (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 358-363.—Reports on use of a shortened and modified version of the technique developed by G. R. Bach (1969) to overcome false models of social interaction in love and marriage. The technique reduces mutual aggression by enforcing respect for the idea of "fair play" between the partners.

10186. Lazarus, Arnold A. (Rutgers State U) **Women in behavior therapy.** In V. Franks & V. Burtke (Eds), *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10187. Leonard, Laurence B. (U Pittsburgh) **A preliminary view of generalization in language training.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 429-436.—Using modeling, 8 language-handicapped 5-9 yr olds were trained in the use of 2 syntactic structures in an effort to examine the nature and extent of generalization in language training. Comparisons of pre- and posttraining tests reveal that Ss had also acquired the use of syntactic structures containing the same morphemes as those structures trained; no use was seen of syntactically identical structures containing dissimilar morphemes. Ss' ability to apply the trained morphemes appropriately and immediately to new structures suggests that the child's development from simple to complex constructions is not dependent on his use of basic constructions on which mastery of more complex constructions is predicated.—*Journal abstract.*

10188. Lima, Paul P. (VA Hosp, Miami, FL) **Behavior modification of an eating disorder on a medical ward.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 23-26.—Describes the case of a 46-yr-old male diabetic hospitalized for leg amputation. S's refusal to eat following surgery was countered with contingent social reinforcement and observations of eating behavior. S rapidly increased food intake and self-sufficient behavior. Results suggest that systematic application of operant techniques on a medical unit could help both patients and overworked staff.

10189. Little, Sandra & Jackson, Barry. (Ontario County Board of Education, Oshawa, Canada) **The treatment of test anxiety through attentional and relaxation training.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 175-178.—Studied the

effectiveness of attentional training in alleviating test anxiety. 34 junior high school students were randomly assigned to 1 of 5 treatment conditions: (a) attentional training, (b) attentional training plus training in deep muscle relaxation, (c) relaxation training by itself, (d) placebo expectancy, and (e) no treatment. Dependent measures included test and general anxiety instruments and a variety of tests of an academic nature. 4 trained Es were randomized across conditions and sessions. On posttesting, only the attention plus relaxation condition showed significant reductions of both test and general anxiety. Changes in the academic measures were generally consistent with an attentional analysis of test anxiety.—C. P. McCreary.

10190. Maier, I. & Hogg, J. (U Manchester, Hester Adrian Research Ctr, England) **Operant conditioning of sustained visual fixation in hyperactive severely retarded children.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 297-304.—The relative preferences of each of 10 hyperactive, severely retarded institutionalized 6-10 yr old children for a set of stimulus objects were assessed prior to use of the objects as discriminant stimuli in an operant program aimed at increasing the duration of visual fixation through the use of social and edible reinforcers. Increases contingent upon reinforcement in both percentage of time per session spent fixating the objects and frequency of visual fixation were demonstrated for most Ss by the use of reversal procedures, while analyses of variance of group results confirm these trends statistically. The present study confirms other findings that the behavior of the hyperactive child is amenable to modification through the appropriate management of discriminative stimuli and reinforcement contingencies.—*Journal abstract*.

10191. Mitchell, William S. & Stoffelmayr, Bertram E. (South Ockendon Hosp, England) **The effects of contingent social stimulation on severely withdrawn chronic schizophrenic patients.** *Psychological Record*, 1974(Fal), Vol 24(4), 515-521.—Studied the effects of contingent social stimulation on 7 male 38-60 yr old severely withdrawn chronic schizophrenic patients with social deprivation-satiation controlled by a 25-min social isolation period prior to each experimental trial. Ss received a total of 48 sessions each in a baseline, reinforcement, cross-over design. Results indicate that the opportunity to engage in a short conversation with E has reinforcing properties for such patients. (21 ref)—*Journal abstract*.

10192. Newton, Joseph R. & Stein, Leonard I. (Pikes Peak Family Counseling & Mental Health Ctr, Colorado Springs, CO) **Implosive therapy in alcoholism: Comparison with brief psychotherapy.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1256-1265.—Compared the effectiveness of 3 different types of treatment for 61 male hospitalized alcoholics. Ss were assigned either to the general milieu treatment program, to milieu and implosive (anxiety-reduction) therapy, or to milieu and brief psychotherapy. At the beginning of treatment and 25 days later at discharge Ss completed the Adjective Check List and rated how helpless and nervous they felt after listening to tape recordings of scenes depicting typical problems alcoholics have. Their responses were rated according to the Gottschalk-Gleser

Content Analysis Scales of Hostility Inward, Hostility Outward, Ambivalent Hostility and Anxiety, and the Experiencing Scale by A. M. Walker et al. Their mood, medical problems and previous night's sleep were evaluated at 6-day intervals. No one treatment resulted in a significant degree of improvement on any of the measures over that of the other treatments. All groups showed decreased distress and helplessness scores after treatment. (16 ref)—*Journal abstract*.

10193. Ounsted, Christopher; Oppenheimer, Rhoda & Lindsay, Janet. (Park Hosp for Children, Headington, England) **Aspects of bonding failure: The psychopathology and psychotherapeutic treatment of families of battered children.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 447-456.—Effected notable improvement in parent-child relations by treating mothers and battered children conjointly in a special unit geared to provide what had been lacking in the home environment. Another group, in which the child was at risk of being battered, was treated preventively on an outpatient basis with small mutual support groups for the mothers and play groups for the children. Mothers kept diaries of explosive situations, and had a social worker on call at crisis points. No incidents of battering occurred and some small improvements were seen in the mothers. (Spanish, German, & French summaries)—P. W. Pruyser.

10194. Paredes, Alfonso; Gregory, Dick & Jones, Ben M. (U Oklahoma, Medical School, Oklahoma City) **Induced drinking and social adjustment in alcoholics: Development of a therapeutic model.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1279-1293.—During a 5-wk inpatient treatment program, 137 male alcoholics participated in daily group meetings, weekly role-playing sessions, and occupational and recreational activities on an open ward. Every 2 wks, 1 S was chosen for a 2-day programed drinking schedule on which he was given a drink containing 20% alcohol every 30 min from 1:30 to 10:00 PM. A total of 33 Ss participated in this phase ("drinkers"). The MMPI, which was completed by 21 drinkers and 21 "nondrinkers" on admission and 5 wks later, showed similar profiles for the 2 groups. Significant differences between initial and 5-wk scores were found on the *Hy* and *Ma* scales for the drinkers and on the *Ma* and *Pd* scales for the nondrinkers. A 6-mo follow-up of nondrinkers and drinkers indicated that there were no differences in social adjustment (e.g., living situation, number of jobs held, or health). It is concluded that alcohol can be used as a treatment variable without untoward consequences for the patients. A therapeutic model in which alcoholics are taught to control their drinking is described. (40 ref)—*Journal abstract*.

10195. Pelosi, Anthony A. & Friedman, Howard. **The activity period in group therapy.** *Psychiatric Quarterly*, 1974, Vol 48(2), 223-229.—Describes the use of athletics immediately preceding group psychotherapy. The activity is seen as (a) a period during which participants can display emotions, (b) an outlet for aggressive energy, and (c) a method for therapists to have immediate interaction with the group. Such a technique also capitalizes upon the talents of nonpsychiatric personnel and gives the recreational facilities of the mental hospital added



usefulness in the treatment of patients from the surrounding community.—*Journal abstract.*

10196. Perkins, William H. et al. (U Southern California) **Replacement of stuttering with normal speech: III. Clinical effectiveness.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 416-428.—Tested 2 forms of behavioral management of stuttering for effectiveness, efficiency, and permanence. The emphasis with 27 clients in Method 1 was on control of rate to maintain fluency; the emphasis with 17 clients in Method 2 was on control of rate to facilitate normal management of the breathstream, phrasing, and prosody, as well as fluency. Stuttering was reduced for all clients with both methods. 92% of Group 1 (Method 1) and all of Group 2 (Method 2) retained some improvement 6 mo after treatment. 70% of both groups had reduced their stuttering by 85% or more at the termination of treatment. 6 mo later, only 30% of Group 1 retained that level of improvement, in contrast with 53% of Group 2. Coupling an 85% reduction in stuttering with a criterion for normal (225+ syllables/min), only 44% of Group 1, as compared with 65% of Group 2, achieved normal speech during treatment.—*Journal abstract.*

10197. Pollock, Donald D. & Liberman, Robert P. (St Elizabeths Hosp, Psychiatric Residency Training Program, Washington, DC) **Behavior therapy of incontinence in demented patients.** *Gerontologist*, 1974(Dec), Vol 14(6), 488-491.—Evaluated the use of social and material rewards with 6 demented men (mean age = 74 yrs) in an attempt to lessen or eliminate urinary incontinence. No significant changes were observed; possible reasons are discussed. It is suggested that future studies focus on more exact determination of incontinence rates, teaching behaviors necessary for bathroom utilization, complete medical evaluation, and adding environmental cues to aid bathroom location. A combined medical and psychological approach is seen as adding to the patients' self-esteem and releasing staff for more therapeutic work.—*Journal abstract.*

10198. Price, Kenneth P. (State U New York, Stony Brook) **The application of behavior therapy to the treatment of psychosomatic disorders: Retrospect and prospect.** *Psychotherapy: Theory, Research & Practice*, 1974(Sum), Vol 11(2), 138-155.—Reviews published reports of case studies and research on the use of behavior therapy for psychosomatic disorders (e.g., asthma, headaches, eating disorders, sleep disorders, and dysmenorrhea). The advantages and drawbacks of relaxation training, systematic desensitization, classical conditioning, assertive training, aversive conditioning, biofeedback, time-out and operant conditioning are discussed. It is indicated how physical symptoms can be influenced by manipulating social contingencies and by direct conditioning of autonomic nervous system activity. Emphasis is placed on the importance of viewing physical symptoms in the context of an individual's entire life space in order to discover controlling variables.—C. P. McCreary.

10199. Reimanis, Gunars. (Corning Community Coll) **Effects of locus of reinforcement control modification procedures in early graders and college students.** *Journal of Educational Research*, 1974(Nov), Vol 68(3), 124-127.—Investigated the hypothesis that internal

control can be increased by application of behavior modification techniques in early graders, and by special counseling efforts to strengthen verbalization of internality in college students. 10 1st and 3rd graders served as Ss in Study 1, 40 undergraduates scoring lowest on Rotter's Internal-External Control Scale served in Study 2, and 327 undergraduates served in Study 3. Data support the hypothesis; the 5 experimental Ss in Study 1 increased in internal control after 3 mo of counseling sessions and achievement motivation training was followed by immediate and long-range increase in internality for male undergraduates. However, initial increase for female undergraduates seemed to dissipate over a 6-mo period. (15 ref)—*Journal abstract.*

10200. Repp, Alan C.; Deltz, Samuel M. & Speir, Nancy C. (Georgia Retardation Ctr, Atlanta) **Reducing stereotypic responding of retarded persons by the differential reinforcement of other behavior.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 279-284.—Reports that the stereotypic responding of 3 retarded persons (a 12-yr-old female, 22-yr-old female, and 23-yr-old male) was reduced when reinforcement was delivered for specified periods of time in which the behavior did not occur. In an ABAB design in which "No!" was used in all 4 phases and in which each S was reinforced for not emitting stereotypic responding during the "B" phases, responding was decreased for the 3 Ss to an average of 1/100 of baseline levels. The method of differentially reinforcing behavior other than the specified one is discussed as an alternative to extinction. (32 ref)—*Journal abstract.*

10201. Rickard, Henry C. & Taylor, Nancy C. (U Alabama) **Strategy of multiple-baseline evaluation: Illustration from a summer camp.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 875-881.—Discusses the advantages of multiple-baseline designs by demonstrating the control of 2 different classes of desirable behavior. 2 experiments designed to increase toothbrushing and academic performance behaviors in children attending a summer camp for the emotionally disturbed are reported, and the usefulness of multiple-baseline strategies in short-term treatment programs is emphasized.

10202. Sajwaj, Thomas; Libet, Julian & Agras, Stewart. (North Mississippi Retardation Ctr, Oxford) **Lemon-juice therapy: The control of life-threatening rumination in a six-month-old infant.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 557-563.—Eliminated chronic, life-threatening rumination in a 6-mo-old infant by squirting a small amount of lemon juice into her mouth whenever rumination or its precursors were detected. A brief suspension of this therapy demonstrated its crucial role. Lemon-juice therapy offers a practical and acceptable alternative to other therapies for rumination, namely electric shock and massive noncontingent attention. However, since this study is limited to a single case, claims as to the effectiveness of this therapy across children are premature.—*Journal abstract.*

10203. Sanders, Shirley & Boswell, John. (North Carolina Memorial Hosp, Child Psychiatry Inpatient Unit, Chapel Hill) **Corrective social interaction therapy.** *Psychiatric Forum*, 1974(Fal), Vol 4(2), 11-13.—Describes a parent training program designed to improve

social interaction patterns between parents and emotionally disturbed children. Parental training sessions emphasized imitation, modeling, and role playing. Preliminary results indicate that when compared with initial baseline data, parent-child interactions were more appropriate following training. This result is considered an indication that a standardized training program is more effective than traditional counseling techniques in educating parents to interact more effectively with emotionally disturbed children. Areas requiring additional investigation are discussed.—*F. Beyer.*

10204. Schachter, Robert S. **Kinetic psychotherapy in the treatment of children.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 430-437.—Describes kinetic psychotherapy as a form of group therapy useful for children who have difficulty expressing themselves. Goals include (a) responsibility for self and actions, (b) awareness of feelings of self, (c) enhancement of self-esteem, (d) active dealings with life situations rather than passive acceptance, and (e) the use of play to further the reduction of anxiety. Through physical activity, the child can be brought into better touch with his body and feelings and thus can relate less defensively to a therapy situation. The main difference between this type of therapy and more conventional approaches lies in the children's social interactive games that are utilized. The children's feelings and behavior are observed, feedback is given, and the child becomes comfortable with communication and spontaneity. A high degree of success is reported. 3 case examples are presented.—*R. S. Albin.*

10205. Sherman, A. Robert; Mulac, Anthony & McCann, Michael J. (U California, Santa Barbara) **Synergistic effect of self-relaxation and rehearsal feedback in the treatment of subjective and behavioral dimensions of speech anxiety.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 819-827.—Studied independent treatments concentrating upon the subjective behavioral dimensions of speech anxiety to assess the existence of independent, generalized, or synergistic effects. 40 males from a beginning college speech course received 1 of 4 individually administered treatment conditions: self-relaxation, focusing on internal tension and subjective anxiety; rehearsal feedback, focusing on overt manifestations of anxiety while speaking; self-relaxation plus rehearsal feedback; or no treatment. Change scores on measures (e.g., the Institute for Personality and Ability Testing Anxiety Scale and the Fear Survey Schedule) obtained unobtrusively outside the treatment setting show that the independent treatments had no favorable effect on either subjective or behavioral speech anxiety as compared to the progress of the control group resulting solely from the speech course. In contrast, the combined treatments promoted substantial improvement on both speech-anxiety dimensions and on measures of general anxiety. (33 ref)—*Journal abstract.*

10206. Skoloda, Thomas E.; Alterman, Arthur I. & Gottheil, Edward. (VA Hosp. Coatesville, PA) **Drinking patterns on a fixed interval drinking decisions program.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 31-32.—Describes application of the Fixed Interval Drinking Decisions (FIDD)

program to 98 21-55 yr old male alcoholics. The 3 phases are predrinking, in which alcohol is not available; drinking decisions, in which Ss must decide whether or how much to drink; and postdrinking, with alcohol again unavailable. Physical, physiological, and psychological studies are accomplished concurrently, and individual and group psychotherapy is initiated during the 1st phase. 43 Ss remained abstinent, 18 drank regularly, and 37 drank moderately. Drinking patterns are analyzed and discussed.

10207. Word, Penny & Rozyanko, Vitali. (Veteran's Hosp, Operant Behavior Modification Program, Palo Alto, CA) **Behavior therapy of an eleven-year-old girl with reading problems.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 551-554.—Describes a case report of behavior therapy of an 11-yr-old girl with reading problems caused by learned dysfunctional avoidance responses. Relaxation and desensitization techniques to reduce fear response were employed. Concomitantly, the behaviors of reading and of talking positively about reading were reinforced. In this case, by engaging in behaviors incompatible with anxiety, the association or connection between the stimulus and the resulting fear was broken.—*Journal abstract.*

10208. Yorkston, N. J. et al. (Friern Hosp, London, England) **Verbal desensitisation in bronchial asthma.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 371-376.—Assigned 14 adults with bronchial asthma to 2 treatment groups: 2 men and 6 women were given relaxation and 2 men and 4 women verbal desensitization. The forced expiratory volume was measured before and after each treatment session. While both groups said they felt better immediately after treatment, only the desensitized group showed significant improvement in lung function. 2 yrs later, the desensitized group had reduced the dosage of all drugs, including steroids, significantly more than the group who received only relaxation.—*W. G. Shipman.*

### Psychoanalysis

10209. Burger-Plaget, Marthe. [Changes of psychoanalytic technique.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(5), 273-276.—An analyst trained in both the Freudian and the Kleinian methods may find situations in the analytic process when he must change his attitude. In order to build a therapeutic alliance with a very anxious patient the analyst may have to leave his silent attitude; with a borderline patient he may need to hold off all interpretations until the patient has expressed his fury and anger. Particularly in dealing with a suicidal patient it is necessary to abandon the orthodox attitude and talk intensively with him.—*H. Bruml.*

10210. Eagle, Morris. (York U, Toronto, Ontario, Canada) **Validation of motivational formulations: Acknowledgement as a criterion.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 265-275.—Examines T. Mischel's (see PA, Vol 41:904) proposal that acknowledgement is the critical criterion in validation of explanations which account for behavior or subjective experiences in terms of intrapsychic motivations, purposes, or desires. Since it is clearly recognized in both psychoanalysis and ordinary social life that purposeful lying and unintentional self-deception occur, the ac-



knowledge of a motivation by the person to whom it is attributed has no privileged status as a criterion for validation of motivational statements. Since motivations may not be consciously experienced, the motivated agent has no privileged access to them and is not necessarily in a better position than the psychoanalyst to assess motivational interpretations. It is concluded that the agent's acknowledgement is only one of many criteria available for evaluating statements about intentions, purposes, and motivations.—J. Kelly.

10211. Glenn, Jules. **The analysis of masturbatory conflicts of an adolescent boy with a note on "actual neurosis."** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

10212. Hirsch, Mathias. [The technique of confrontation in group and individual analysis.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(5), 291-300.—Discusses the therapy of borderline patients whose basic conflict is that of building up and accepting their own identity. This conflict is caused by early mother-child symbiosis in which all the child's attempts to find his identity are connected with threat of separation. In such cases confrontation has special importance; i.e., all of the analyst's attention should be given to the phenomena of which the patient is not aware. Confrontation may reproduce directly the infantile conflict situation. The therapeutic interpersonal relationship enables the patient to separate himself from the threatening symbiosis and to experience and express his destructive aggressions. In group psychotherapy the treatment of the borderline patient is helped by dividing transference among the group, which tolerates aggressive behavior without the danger involved in destroying a therapeutic 2-person relationship.—H. Bruml.

10213. Kernberg, Paulina F. **The analysis of a 15½-yr-old girl with suicidal tendencies.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

10214. Laufer, Moses. **The analysis of an adolescent at risk with comments on the relation between psychopathology and technique.** In M. Harley (Ed), *The analyst and the adolescent at work*. New York, NY: Quadrangle, 1974. xix, 303 p. \$12.50.

10215. Legrand, Michel. (Ctr de Psychologie Différentielle et Clinique, Kessel-Lo, Belgium) [The analytic situation and the experimental situation.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 189-202.—Suggests that psychoanalysis cannot assure adequate control of its data, nor can it be an experimental instrument for validating general psychoanalytic knowledge. In the light of S. Kuhn's concept of paradigm, psychoanalysis might serve as an "operational canvas," whose equivalents could be sought by some other psychological approach such as that of B. Skinner.—S. S. Marzoff.

10216. Malengreau, P. (Ctr de Psychologie Clinique, Kessel-Lo, Belgium) [Indication, contraindication or the ambiguous request.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 119-130.—Whether or not psychoanalysis is appropriate involves its essential nature, i.e., its search for the nature of an individual's unconscious. As such, the removal of a

symptom, i.e., effecting a cure, is incidental rather than the aim. The question of whether a symptom can be removed has different meanings for the prospective analyst and for the analyst and in each case the self-concept is involved. (English summary)—S. S. Marzoff.

10217. Palombo, Stanley R. (Georgetown U) **The associative memory tree.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 205-219.—Presents an information science based model of the collaborative search by psychoanalyst and patient for significant recollections. Memory is seen as a branching pattern of associations, with smaller units embedded in larger ones. Patients display resistance in psychotherapy by expressing associations along the least painful branches of the memory tree, or by refusing to deal with critical nodes in the memory pattern. The role of the analyst in psychotherapy is to help the patient recover significant memories by monitoring his choice of branches during the free association process. It is suggested that analogies drawn from information science can provide a conceptual framework by which both the intrapsychic and interpersonal aspects of psychoanalysis can be understood.—J. Kelly.

10218. Peterfreund, Emanuel & Franceschini, Edi. (Mt Sinai School of Medicine, City U New York) **On information, motivation, and meaning.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 220-262.—Presents an information processing model of motivation as a replacement for existing metapsychological theories which attribute the patterning and selection of behavior to the actions of psychic energies. An information model of motivation provides a unified explanatory framework within which the contingencies, priorities, and levels of motivation observed in clinical practice can be analyzed in terms of simple decision steps and specific causal relationships. Information theory explains motivation in terms of the patterning activity of the whole organism, without relying on postulates of free will and conscious awareness, or on artificial dichotomies between emotion and cognition. Some brief clinical examples are presented to illustrate the application of information processing concepts to observed motivational phenomena. It is suggested that an information processing approach offers a dynamic metatheory of motivation which is consistent with neurophysiological findings. (22 ref)—J. Kelly.

10219. Pulver, Sydney E. (Inst of the Pennsylvania Hosp. Physician Education Project, Philadelphia) **Freud and third-party payment: A historical note.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1400-1402.—Presents excerpts from the diary of Joseph Wortis to illustrate Freud's analysis of a man whose fees were paid by a 3rd party. Freud made no specific recommendations concerning 3rd-party payment, but the fact that he undertook Wortis' analysis seems to indicate that he did not find it an obstacle. Although this analysis was unsuccessful, the failure does not seem to be related to the type of payment.—Journal abstract.

10220. Rolla, Edgardo H. [Reformulations and notes within psychoanalytic theory.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 323-364.—Presents a redefinition of psychoanalysis as a scientific doctrine of

the totality of the organization and functioning of the human being. (26 ref)

10221. Searles, Harold F. (Georgetown U, Medical School) [Concerning therapeutic symbiosis.] (Germ) *Dynamische Psychiatrie*, 1973, Vol 6(6), 373-390.—Discusses autism, symbiosis, and individuation. The symbiotic relatedness between patient and analyst, the similarity to the early mother-child symbiotic stage, and the individuation processes on both sides are examined. The need of the patient to act as the therapist and fill the unconscious ego deficit of the analyst is noted. Regression during the therapeutic process leads to a stage of archaic ambivalence in which feelings of being threatened, reciprocal symbiotic closeness and dependence, and jealousy play an important role on both sides. (English summary) (18 ref)—T. Fisher.

10222. Shope, Robert K. (U Massachusetts, Boston) **Freud's concepts of meaning.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 276-303.—Describes Freud's use of the term "meaning" to refer to purpose or intention and to express that for which a mental phenomenon substitutes. Some relationships between the concepts of symbol, meaning, and mental event are discussed. (27 ref)

10223. Spence, Donald P. (New York U) **Tracing a thought stream by computer.** *Psychoanalysis & Contemporary Science*, 1973, Vol 2, 188-201.—Presents an analysis of the stream of thought leading to a specific question ("Are you pregnant?") asked by a patient during the 5th hr of analysis with a new therapist. The speech of a young woman whose analysis had been taken over by a conspicuously pregnant therapist was analyzed for direct and indirect associations to the theme of pregnancy, which was assumed to be associated by the patient with the anxiety provoking theme of separation. A computer content analysis revealed oscillations in the number of references to pregnancy-related themes both within and between separate therapeutic hours. It is suggested that various defensive maneuvers interrupted the stream of thought which connected the patient's initial contact with the therapist to her direct posing of the question about pregnancy.—J. Kelly.

10224. Zac, Joel. [The search for the articulation of psychoanalysis and epistemology.] (Span) *Revista de Psicoanálisis*, 1974(Jan-Jun), Vol 31(1-2), 459-501.—Presents a synthesis of ideas on psychoanalysis as theory and as therapeutic technology, focusing on methods of obtaining data from clients.

10225. Zenoni, A. [Psychoanalysis and language: I. Freud.] (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1974, Vol 9(2), 163-187.—Views psychoanalysis as removing symptoms and reorganizing intersubjective relations because psychic structures in the unconscious are formed in the same way as analytic free association. According to Freud, dreams, slips of the tongue, symptoms, obsessions, etc, are manifestations of a thought which works according to the procedures of ideographic writing. For this reason free word association without constraint of conscience leads to the discovery of the enigmatic connections underlying symptoms. (24 ref)—S. S. Marzolf.

## Counseling & Community Mental Health & Crisis Intervention

10226. ———. **Management information: A "mini" symposium.** *Administration in Mental Health*, 1973(Fal), 4-41.—Presents 3 articles on management information. The first explores the different roles of researchers and administrators in using information as an instrument of accountability. These roles will determine how and whether such information is actually used. The 2nd outlines the principles on which a county management information system should be built, if the objective of the system is to facilitate decision-making by management. The 3rd describes a study of information exchange patterns in a mental health center, conducted incidental to the loading of a management information system. Results showed little reliance on written documents to facilitate communication. Additional issues in mental health management information are discussed. (28 ref)—R. J. Albers.

10227. Adelson, Daniel. **Community psychology as man's encounter with history: Or self and social reconstruction as two main aspects of the same process: A point of view.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 402-405.—Defines community psychology as man's encounter with history, and suggests that each person (hopefully) becomes a maker of history—whether as creator or creature in his relationships with his community. The definition of community psychology is related to the concepts of development and/or process; system; and culture. It is contended that community psychology has as its first commitment the working out of ways to deal with total communities. An 8-point model of broad philosophical guidelines is presented, using as its base this theory.—P. O'Brien.

10228. Bath, Kent. (State University Coll New York, Buffalo) **The use of intensive individual designs in community research.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 418-425.—Discusses the idea of using multivariate research designs with an individual focus to study questions at the community level. General advantages as well as more specific aspects and examples of applicability are explored. Although the need for replications is obvious in individual methodologies, their strength in terms of investigating causal hypotheses and the effects of programs recommends these designs for consideration. The indirect study of program efficiency is also put forth as a strong point.—Journal abstract.

10229. Bazeley, Patricia & Viney, Linda L. (Macquarie U, North Ryde, NSW, Australia) **Women coping with crisis: A preliminary community study.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 321-329.—Interviews with 221 women living in government housing tested the hypothesis that some means of coping were more frequently employed during particular types of crisis. The hypothesis was supported in that passive coping was more often reported in bereavement and family conflict and illness while active coping was more frequent in separation and developmental crises. Reliance on their nuclear family and on informal social networks was more frequent at times of bereavement and marital breakdown. The use of formal social networks occurred most often in times of personal and family



illness and financial crises. Ss' age and marital status predicted the types of crises they reported; leisure time and religious experience were associated with means of coping. Ss with low mental health status reported more crises overall, specifically those involving family conflict, personal illness, and continual problems, they also relied heavily on passive coping and formal social networks. Findings point to opportunities for community intervention. (25 ref)—*Journal summary*.

10230. **Bleach, Gail & Claiborn, William L.** (U Maryland) **Initial evaluation of hot-line telephone crisis centers.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 387-394. Assessed the level of counseling and information-giving skills of 4 hot lines by rating phone calls between role-playing callers and actual hot-line workers. 6 female undergraduates served as callers. 4 problem calls were designed to reflect those most commonly experienced and included pregnancy, loneliness, parent difficulties, and drug-related problems. A total of 96 calls were made. Results, indicating differences on several variables across hot lines and some differences across caller "problems," are discussed in terms of implications for the evaluation of training and service effectiveness. (16 ref)—*Journal abstract*.

10231. **Boller, Jon D.** (State Economic Opportunity Office, Head Start Project Director, St Paul, MN) **Differential effects of two T group styles.** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 117-123. —Presents a rationale for examining the effects of the T group on introverts and extroverts. 2 T-group styles were examined—a sensory awareness group and a verbal cognitive group. Ss were 40 graduate counseling students classified as either introverts or extroverts by the Maudsley Personality Inventory. Results indicate that the sensory awareness group was more profitable to both personality types and that there was a direct relationship between personality type and profit in a T group. Although introverts profited less than the extroverts, there was reason to believe that an extended group experience might have been more profitable for the introverts. Profit was measured by quantifying emotional reactions to the ongoing group process at timed sampling intervals with G. C. Homans's social exchange model. Poker chips were used as symbolic representations of positive and negative effect.—*Journal abstract*.

10232. **Brayshaw, Bob.** (Ministry of Correctional Services, Ontario, Canada) **Leisure counselling for people in correctional institutions.** *Journal of Leisureability*, 1974(Jan), Vol 1(1), 10-14.—Describes a technique for group leisure education and counseling developed within the Ontario, Canada, correctional system to prepare inmates for coping with life in and out of prison. Groups are formed on the basis of marital status, age, and time remaining in sentence. Possibilities for extending this technique to other institutions are discussed.

10233. **Brooks, Carol M.** (Dede Wallace Ctr, Northeast Nashville Branch, TN) **New mental health perspectives in the black community.** *Social Casework*, 1974(Oct), Vol 55(8), 489-496.—Describes a model for nontraditional approaches to the delivery of mental health services in black communities.

10234. **Browning, Philip L.; Campbell, David R. & Spence, Joyce T.** (U Oregon, Rehabilitation Research &

Training Ctr in Mental Retardation) **Counseling process with mentally retarded clients: A behavioral exploration.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 292-296.—Examined behavioral aspects of the process of counseling with 28 adolescent mentally retarded clients. Transcripts from an early and a late counseling session were rated according to the initial client statement (dependent, hostile, or other), therapist response (approach or avoid), and client continuation of the topic. Results indicate that counselors varied significantly in approach-avoidance response style with respect to client IQ level and type of client statement, and retarded clients varied significantly in continuation response style with respect to therapist approach-avoidance behavior and client IQ level.—*Journal abstract*.

10235. **Calla, Vincent F.** (Rhode Island Coll) **Systematic human relations training: Appraisal and status.** *Counselor Education & Supervision*, 1974(Dec), Vol 14(2), 85-94.—Discusses the impact of the systematic human relations training (SHRT) model on the contemporary helping scene. The rudiments of the model and its historical antecedents are described, and various technical and philosophical issues are identified. The model's uncertain theoretical status, questionable and conflicting developmental elements, the merits and hazards of graded structure, the meaning and permanency of client change, the relationship of process and outcomes, the dangers of universalizing and venerating the model's attributes, and the paradox of training for transcendence are all discussed. (24 ref)—*Journal abstract*.

10236. **Coghlan, Alben J.; Pixley, Lawrence & Zimmerman, Roger S.** (Holy Cross Campus, Drug Abuse Program, Rhinecliff, NY) **Community mental health concepts and methadone maintenance: Are they compatible?** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 426-433.—Discusses some of the problems and issues associated with outpatient methadone maintenance programs located within community mental health centers. It is concluded that, in general, such programs do not belong in mental health centers. The role of the mental health center should be that of a backup service for referral of those addicts who have emotional problems and who are motivated for the services provided by the center. (20 ref)—*Journal abstract*.

10237. **Cull, John G. & Hardy, Richard E.** (Eds.). (Virginia Commonwealth U) **Organization and administration of drug abuse treatment programs: National and international.** Springfield, IL: Charles C Thomas, 1974. xii, 342 p.—Presents 25 articles on drug rehabilitation programs run by state or municipal agencies, private nonprofit drug treatment programs, and international drug abuse treatment programs. Administrative, staff, and funding issues involved in these types of programs are examined.

10238. **Dameron, Joseph D.** (North Texas State U) **Futuristic guidance programs: Texas in the 1980's?** *Texas Personnel & Guidance Association Journal*, 1972(Sep), Vol 1(1), 45-53.—Presents the concept of differentiated staffing in a new group of guidance positions: auxiliary, technical, paraprofessional, and support personnel, thus developing a career ladder. The programs discussed are in public schools but can be adapted to community colleges, universities, community

agencies, and employment agencies. It is suggested that the guidance training programs of the future will be built on performance-based competencies, eliminating semester-long courses and semester hours. The new staffing concept is offered as an antidote to the waning support for counselors and their present services. Its objective is to make the profession more "accountable."—H. H. Crouch.

10239. Dar, H.; Winter, S. T. & Tal, Y. (Rothschild Hosp, Genetic Unit, Haifa, Israel) **Families of children with cleft lips and palates: Concerns and counseling.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 513-517.—Studied 51 families in which there was a child with cleft lip or palate to ascertain their concerns. 24 received genetic counseling, immediately after the birth of the child, for up to 1 yr; the remainder were not counseled. Parents had many superstitions and misapprehensions, and were prone to guilt feelings. (French, German, & Spanish summaries)

10240. Easton, Karl. (Boerum Hill Home & Vocational Rehabilitation Inst, Brooklyn, NY) **Some psychodynamic considerations in the program development of Boerum Hill: A psychiatric halfway house.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 395-401.—Based on 5 yrs of developing and working in a 260-bed psychiatric halfway house, a definition and discussion of psychiatric rehabilitation are presented. The significance of temporariness of stay in a halfway house is noted. The method of the establishment of a proper therapeutic community environment that will bring about a corrective living experience is described. Also, aspects of the significance of the physical plant, the size of the residence, the role of psychotropic medication, and the management and staff attitudes toward regression are discussed. The psychodynamics of personality change and the importance of high expectations in the rehabilitation effort are presented.—*Journal abstract.*

10241. Evans, Ronald L. & Moberley, Bruce D. (VA Outpatient Clinic, Seattle, WA) **Theoretical and empirical assessment of adjustment to civilian living.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 11-15.—Administered a structured interview exploring 19 social variables to approximately 500 veterans. Features associated with poor adjustment to civilian life were an intense expressed need for services, extent of subjective feeling of debilitation, and noted objective transiency. Positive adjustment obtained when the individual had maintained a strong kinship support system, was aware of and utilized public services, and had benefited from the passage of time by learning to cope with a chronic disability regardless of its extent or nature.

10242. Freund, John. **Divorce and grief.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 40-43.—Observations of reactions of a group of divorced and separated persons to a presentation of various stages of grief suggest that they experience grief and that since it is often unrecognized as such by themselves and society, the working-through process is hindered. An overview of the working-through process shows a surprising lack of articles on understanding and coping with the feelings of loss through divorce. In fact, many authors rarely label these emotions as grief. It is suggested that

marriage counselors devote more attention to the problem and that they correlate it with the growing literature on grief. (Spanish & French abstracts)—*Journal abstract.*

10243. Giordano, Joseph. **Ethnic and minorities: A review of the literature.** *Clinical Social Work Journal*, 1974(Fal), Vol 2(3), 207-220.—Cites various study outcomes which indicate differences in the values and attitudes of selected ethnic minorities, and describes how these differences affect utilization of health systems. Content suggestions are made for training future mental health professionals.—S. R. Stein.

10244. Goodman, James A. (NIMH, Bethesda, MD) **The social health of disadvantaged black college students.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 272-273.—Discusses the nature of black social health problems in terms of environmental influences. Several types of black college students are identified whose basic needs and attitudes must be understood to enable them to fully benefit from health related services.

10245. Gurman, Alan S. (U Wisconsin, Medical School) **Attitude change in marital cotherapy.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 50-54.—Replicated L. E. Beutler's (see PA, Vol 47:9431) study of attitude change in marital therapy and extended it to the cotherapy situation. Attitudes of 12 couples in conjoint therapy with male and female cotherapists were measured before and after treatment and compared with their therapists' attitudes. At termination, therapists and patients rated marital relationship change and spouses' improvement. Results generally support the previously found association between patient-patient attitude convergence and outcome, but the magnitude of this relationship varied as a function of both rater and outcome dimension. Contrary to earlier research, results show specific patient-therapist attitudinal convergences to be related to outcome measures. Attitude convergence within the marital dyad was negatively related to cotherapists' experience-level difference. The influence of the cotherapy relationship on marital therapy outcome is discussed. (Spanish & French abstracts)—*Journal abstract.*

10246. Helms, Luisa. **Mexican-Americans.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 269-271.—Discusses the Mexican-American's approach to physical and mental health by describing certain characteristic attitudes and behaviors. The importance of understanding cultural values and beliefs is emphasized.

10247. Hirschman, Richard. (Kent State U) **Utilization of mental health consultation and self-perceptions of intraorganizational importance and influence.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 916.—Predicted that self-ratings of importance and influence for each of 17 volunteer workers in a mental health crisis center would be positively correlated to each worker's latency in the use of a mental health consultant. Results support the prediction for self-perceptions of influence and importance, but not for perceptions of the value of consultation in general, actual help derived from a consultant, or the number of hours in voluntary service.



10248. **Hirschowitz, Ralph G.** (Harvard U, Medical School, Lab of Community Psychiatry, Boston) **Pattern for change.** *MH*, 1974(Spr), Vol 58(2), 32-35.—Suggests that survival in the arena of human services demands that today's program planner follow a pattern for change. Deficiencies in current agency services and corrective measures are discussed. These include the realization that change is engagement in political change process and is not effectively achieved by technocratic prescription.

10249. **Horejsi, Charles R.** (U Montana) **Small-group sex education for engaged couples.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 23-27.—Describes a counseling program in which small groups of 3 engaged couples each are presented with 10 case situations or vignettes as focal points for their discussion about interpersonal difficulties, mainly centered in their sexual relationship. This approach has been found helpful in generating exchanges and questions among the participants, which in itself opens up a new manner of communication between the future spouses. This improved communication, plus the sexual information obtained in these groups, promises to be beneficial in the marriage. The role of the group leader is discussed, and sample vignettes are presented. (Spanish & French abstracts)—*Journal summary*.

10250. **Hurley, James T. & George, Rickey L.** (Buchanan High School, Troy, MO) **Telephone counseling: Charlatan or helper.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 36-41.—Describes the operations of Suicide Prevention Incorporated (SPI), the Youth Emergency Service (YES), and the Acid Rescue (AR), groups that operate telephone services for the distressed in a large urban area in the Midwest. The YES provides information about housing for runaways, sexual problems, VD detection, drug counseling and other problems. The AR operates in the area of drug education and individual and family counseling. The SPI emphasizes referral services to those who contemplate self-destruction. All staff members of the YES and the AR are unpaid volunteers. College graduates make up about 85% of the YES staff, 50% of the AR, and 25% of the SPI. All telephone calls are confidential. The services of AR and of SPI are on a 24-hr basis. The YES receives an average of 90 calls/mo, the other 2 services receive about 400 each. The services appraise their own effectiveness as ranging from "above average" to "excellent."—*A. J. Ter Keurst*.

10251. **Just, Marion R.; Bell, Carolyn S.; Fisher, Walter & Schensul, Stephen L.** (Wellesley Coll) **Coping in a troubled society: An environmental approach to mental health.** Lexington, MA: D. C. Heath, 1974. xi, 113 p. \$11.—Presents a collection of 6 articles which discuss social and environmental perspectives of mental health. Topics include the psychological effects of economic disturbances and social policies (e.g., welfare, zero population growth, and segregation), coping with political alienation, community-oriented mental health services, treatment through institutional change, and reorienting mental health policy. (4½ p ref)

10252. **Kirstein, Larry; Prusoff, Brigitte; Weissman, Myrna & Dressler, David M.** (Yale U, Medical School) **Utilization review of treatment for suicide attempters.**

*American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 22-27.—Tested the validity of the criterion-oriented approach to evaluating care given patients with suicidal behavior, comparing explicit criteria proposed by a panel of experts as essential determinants for psychiatric hospitalization with the actual clinical data on 248 suicide attempters. It was found that according to the experts' criteria (which were operationalized into rating assessments), over half of the outpatient sample should have been hospitalized. After multiple regression analysis of the criteria, however, 4 predictors showed that only 20% of the outpatients should have been hospitalized. The issues these findings raise about the criteria of the experts, their utility for research, their validity, and their implications for utilization review are discussed.—*Journal abstract*.

10253. **Klosterman, Dale.** (Northern Kentucky Comprehensive Care Ctr, Covington) **The role of the school psychologist in a community mental health center.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 269-274.

10254. **Knox, David & Knox, Frances.** (East Carolina U) **Preparation for marriage: Beyond the classroom.** *Journal of Family Counseling*, 1974(Fal), Vol 2(2), 16-22.—100 undergraduate couples who defined themselves as "involved" in a serious dating relationship completed a project in which the partners shared opinions (on economics, religion, children, sex, in-laws, alcohol, and recreation), took a 4-mile hike, developed a budget, selected an apartment and furniture, went to church and visited future in-laws. 52% of the Ss noted that the exchange of opinions was the most meaningful aspect of the project. Religion was selected as the least meaningful. Student and professional reactions to the project are discussed. (Spanish & French abstracts)—*Journal abstract*.

10255. **Koeppen, Arlene.** (Richardson Independent School District, TX) **Confrontation: A threat and a promise.** *Texas Personnel & Guidance Association Journal*, 1972(Sep), Vol 1(1), 39-43.—Describes an essential function of counseling which must be performed by someone significant to the client and timed to create constructive interaction. In confrontation, giving or receiving pain is the threat; helping or growing is the promise.

10256. **Kroll, Jerome.** (Rockland Psychiatric Ctr, Orangeburg, NY) **The career ladder and the mental health generalist at the state hospital.** *Psychiatric Quarterly*, 1974, Vol 48(2), 184-192.—Discusses the relevance of several broad social and educational changes to the training of persons for careers in mental health. This is viewed against the background of traditional beliefs about training and competence which have guided policies until very recently, but are now being questioned. It is suggested that the state hospital has an opportunity to move away from its traditional custodial role by teaming up with local community colleges and developing community-oriented training programs for careers in mental health.—*Journal abstract*.

10257. **Levinson, Daniel J. & Astrachan, Boris M.** (Yale U) **Organizational boundaries: Entry into the mental health center.** *Administration in Mental Health*, 1974(Sum), 3-12.—Describes criteria for an effective client entry system (ES) for health-education-welfare

organizations, using the community mental health center as an example. Major tasks of an ES are specified and problems with each task are discussed. (22 ref)

10258. Levy, Robert & Brown, Allan. (U Chicago, Hosp & Clinics) **An analysis of calls to a drug-crisis intervention service.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 143-152.—Presents a history and evaluation of Acid Rescue, a St. Louis drug crisis center. 1,543 telephone call reports were evaluated. LSD, other hallucinogens, and amphetamines were the drugs most commonly involved in crisis calls. The route of administration had the strongest correlation with the somatic or psychiatric symptoms reported. The influence of the center volunteers' drug experiences and professional backgrounds on the type of advice given is noted. An evaluation methodology and set of variables applicable to drug counseling programs is suggested. (21 ref)—R. Tomasko.

10259. Lifshin, Joanne H. & Schultz, Myra. (Brookdale Hosp Medical Ctr, Brooklyn, NY) **Treatment of a constellation of perceptual and behavioral difficulties in a community mental health center: Preliminary report.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 333-337.—Examined the effectiveness of a structured group program in treating boys with perceptual and behavioral difficulties. Ss were 10 boys 8-12 yrs old who were outpatients at a community mental health center. The group programs were designed either to enhance coping skills or to facilitate encoding experience. The overall results indicate that the program was a success.—H. Kaczowski.

10260. Long, Nicholas. (InterStudy Information & Referral Ctr, Minneapolis, MN) **A model for coordinating human services.** *Administration in Mental Health*, 1974(Sum), 21-27.—Presents a model designed to enhance cooperative behavior among human services organizations. The model includes an incentive-based network with defined responsibilities and evaluation of services.

10261. Mathews, Glenn. (West Virginia Board of Vocational Rehabilitation, Charleston) **Preparing for counseling with the deaf client in the vocational training setting.** *Journal of Rehabilitation of the Deaf*, 1974(Apr), Vol 7(4), 29-33.—Describes counseling with the deaf client as intrinsic to success in a vocational rehabilitation setting. The client himself, the staff, and the problems that arise in their meetings are discussed.

10262. McRee, Christine; Huckle, Brian; Corder, Billie F. & Flori, Lorraine. (Dorothea Dix Hosp, Raleigh, NC) **Utilizing psychiatric intervention techniques as a model for consultation in school-community crises: A case history.** *Psychiatric Forum*, 1974(Fal), Vol 4(2), 6-10.—Describes the diagnosis and treatment of an acute school-vandalism problem in an integrated public school. The traditional psychiatric consultation model was modified to effectively deal with a school-community crisis.

10263. Messier, Michael J. [The role of the local community service centers in the organization of psychiatric care.] (Fren) *Vie Médicale au Canada Français*, 1974(Jun), Vol 3(6), 598-601.—Suggests a way in which the psychiatric team can provide community

preventive services by making appropriate arrangements with the center's administration.

10264. Miran, Michael; Lehrer, Paul M.; Koehler, Robert & Miran, Esta. (Rutgers State U) **What happens when deviant behavior begins to change? The relevance of a social systems approach for behavioral programs with adolescents.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 370-375.—Experimented, in a community consultation program, with 14 unruly 8th-9th grade boys in a modern suburban school, using group and behavioral therapy. 6 boys, referred for therapy but not treated, served as controls. Consultants worked with guidance and psychology services of the school and with the Ss themselves. External reinforcers in the form of "points" were given to Ss; however, pressure from the community to cut school costs forced the school to eliminate the rewards that points could buy. The combined group and behavioral treatment prevented academic deterioration by teacher's ratings. Also, during the external reinforcement, school suspensions in the experimental group decreased, while suspensions in the control group increased, such that the same total of suspensions per month took place. Results point to the need for primary prevention and systems-oriented consultation.—*Journal summary.*

10265. Ostow, Mortimer & Cholt, Betty. **Unhappiness and mental illness.** *New York State Journal of Medicine*, 1974(Jun), Vol 74(6), 984-992.—Presents cases illustrating the nature of psychological difficulties found among clients seeking assistance at a rabbinical counseling center. Few clients were seen as mentally ill either by themselves or by their relatives, but many exhibited serious restrictions of behavior potential and of the capacity for interpersonal relationships. Advice from the rabbi was often sought by individuals who wished to change the behavior of others, rather than to correct their own thinking or behavior. It is concluded that the type of population which seeks help from religious counselors is substantially different from that which receives psychiatric assistance. It is suggested that the concept of mental illness be broadened to include not only cases of clearly diagnosed pathology but also persons whose minimal personality disorders cause suffering to themselves and others.—J. Kelly.

10266. Parikh, Barbara; Steinbach, Ingrid; Tausch, Anne M. & Teege, Franke. (U Hamburg, Psychological Inst, W Germany) [Dimensions of the voice and speech style of telephone counselor-therapists, correlation with personality variables, and preference by persons seeking advice and help.] (Germ) *Zeitschrift für Klinische Psychologie*, 1973, Vol 2(2), 145-150.—Investigated client-centered therapy and counseling by telephone and the effect of the counselor-therapist's voice and manner of communication on case outcome and acceptance in 28 counselors of varying age and experience. Ss answered standard counseling questions by telephone and completed the items on 6 scales of the Shostrom Personal Orientation Inventory (POI). Their performance was evaluated by 50 raters according to criteria of voice and speech style, and by patients of a psychiatric day clinic according to their preference in situations requiring advice and help. A factor analysis of 21 items produced 4 relationships: Empathic Understanding-Objective In-



struction, Warm Sympathy-Cold Indifference, Encouraging Acceptance-Discouraging Criticism, Positive Statement-Hesitant Consideration. The multiple rank correlation indicates that clients prefer counselors whose communication is marked by positive statements, encouraging acceptance, and warm sympathy. Correlations between voice-speech qualities and personality variables according to the POI scales indicate that warm sympathy correlates significantly with self-acceptance and self-actualization and sensitivity to their own feelings on the part of the counselor-therapists. (English summary)—T. Fisher.

10267. Pavlovský, P. (U Karlova, Prague, Czechoslovakia) [Psychiatric aspects of hemodialysis.] (Czec) *Československá Psychiatrie*, 1973(Apr), Vol 69(2), 118-123.—Reviews literature dealing with psychiatric problems of patients under permanent hemodialysis. 15 such cases (11 males and 4 females, average age 44 yr), who began such treatment after more than 12 yrs of renal disorder are described. Depression, anxiety, lability, apathy, decreased sexual activity, anorexia, and sleep disorders were common clinical symptoms. Psychotherapy including members of the family and psychological help for the nursing staff, on whom patients are highly dependent, are recommended. (Russian & English summaries)—V. Fischmann.

10268. Pelegrino, Donald A. (California State U, Northridge) **Death and dying counseling and the recreation therapist.** *Journal of Leisureability*, 1974(Jul), Vol 1(3), 15-18.—States that recreation therapists should remedy their lack of experience with, and knowledge of, dying patients. An attitude of acceptance rather than fear is necessary if the therapist is to be successful. Conversation is seen as a therapeutic tool, and the emphasis should be on continuing activities as long as possible.

10269. Ramer, Barry S. & Flohr, Rinna B. **Rational planning for drug abuse services.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 269-276.—Describes the development of the San Francisco Coordinating Council on Drug Abuse as a model of a comprehensive drug abuse planning process. (54 ref)

10270. Robinson, Lillian H. (Tulane U, Medical School) **Group work with parents of retarded adolescents.** *American Journal of Psychotherapy*, 1974(Jul), Vol 28(3), 397-408.—Discusses the sources of difficulty parents face in coping with retarded children and suggests ways of ameliorating these problems. 2 principal causes for such difficulty are the emotional impact of having a retarded child, and the lack of knowledge about the child's condition. Work with parents includes education, counseling, therapy, or various combinations of these. Advantages are cited for providing services for groups of parents. An illustrative short-term group of parents of vocational students is described in some detail. As the group progressed, parents became more willing to let their children grow up, and thus became more cooperative with the vocational school in its efforts to promote independent functioning.—R. S. Albin.

10271. Rosen, Irving M. (Cleveland Psychiatric Inst, OH) **Some contributions of religion to mental and physical health.** *Journal of Religion & Health*, 1974(Oct), Vol 13(4), 289-294.—Reviews some supportive mental health contributions that clergy can make in typically

psychiatric situations. It is argued that clergy are more suited to deal with the whole person and with humanization of patients than are psychiatrists and other medical workers, since the latter deal only with what is objectively known but religion deals also with knowledge not completely understood in objective contexts.

10272. Sanderson, Robert G. **A personal theory of counseling.** *Journal of Rehabilitation of the Deaf*, 1974(Apr), Vol 7(4), 22-28.—Describes a personal theory of counseling the deaf, including thoughts on the nature of man, human growth and development, goals of therapy, characteristics of the client and the counselor in a therapeutic relationship, and therapeutic methods.

10273. Schapiro, Hans M. (New York State Dept of Mental Hygiene, Albany) **The state hospital: What is its future?** *MH*, 1974(Spr), Vol 58(2), 11-16.—Discusses the future role of the state mental hospital and alternative ways in which they can become an integral part of a total service delivery system in the treatment of the mentally ill. Special emphasis is placed on expansion of services, coordination with other community resources, and transferring control of the hospital to the community.

10274. Smith, David E. (Haight-Ashbury Free Medical Clinic, San Francisco, CA) **Street drug analysis and community based drug programs.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 153-159.—Describes several types of programs providing accurate information about drugs delivered in a believable manner to the user community. Controversies around such programs are highlighted, and the view that withholding information about street drugs will reduce their usage is disputed.

10275. Speyer, Nico; Diekstra, Rene F. & Van de Loo, Karel J. (Eds.). **Proceedings: 7th International Conference for Suicide Prevention, Amsterdam, The Netherlands, August 27-30, 1973.** Amsterdam, Netherlands: Swets & Zeitlinger B. V., 1974. xvi, 661 p.—Presents a collection of 85 symposium papers in English, French, and German on characteristics of, and factors in, suicidal behavior; follow-up studies of attempted suicides; suicidal behavior in different life stages; epidemiological studies of suicidal behavior; sociocultural factors in suicide; therapy and management of suicidal persons; the role and problems of volunteers in suicide prevention; and suicide and mass media.

10276. Sue, Stanley; McKinney, Herman; Allen, David & Hall, Juanita. (U Washington) **Delivery of community mental health services to black and white clients.** *Journal of Consulting & Clinical Psychology*, 1974(Dec), Vol 42(6), 794-801.—Compared services rendered to 959 black and 11,904 white clients seen at 17 community mental health centers. Data included client's age, sex, income, education, marital status, diagnosis, assignment to type of treatment program, major service received, number of contacts, and assignment to type of therapist. Results indicate that the 959 blacks compared to a 10% random sample of 1,190 whites (a) represented a different group of clients in demographic characteristics, (b) were no more likely to receive inferior forms of treatment programs, (c) saw paraprofessional rather than professional personnel, and (d) failed to return after the initial contact at a high rate (i.e., over 50% terminated at this time). The latter 2 findings persisted irrespective of

other demographic differences between blacks and whites. (20 ref)—*Journal abstract.*

10277. Tausch, Anne-Marie; Kettner, Ursula; Steinbach, Ingrid & Tönnies, Sven E. (U Hamburg, Inst of Psychology, W Germany) [Effects of child-centered individual and group counseling on disadvantaged kindergarten and second grade children.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 77-88.—For 6-7 wks client-centered counseling was given individually once weekly for 10 min and in a group once weekly for 30 min to 29 disadvantaged kindergartners. The same treatment, plus a second 30-min group session, was conducted with 30 disadvantaged 2nd graders. Counselors were specially trained psychology students. 28 disadvantaged kindergartners and 25 2nd graders served as controls, and 27 nondisadvantaged kindergartners and 19 2nd graders were available for comparison. Counseled children increased significantly in their emotional stability, social cooperation, and sociability as rated by 29 parents. Their perceptual accuracy increased significantly, as did "self-exploration" by 2nd graders. The latter correlated .49 with "positive regard" by the psychologists and .42 with empathic understanding. There was no increase in social maturity and no measurable decrease in anxiety. (English summary)—*W. O. Horn.*

10278. Thomas, Kenneth R.; Gottlieb, Anne B. & Kravetz, Shlomo P. (U Wisconsin, Madison) **Congruence and attributes of meaning: Community mental health center and vocational rehabilitation personnel.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 402-408.—The purpose of this study was to (a) investigate similarities and differences between vocational rehabilitation and community mental health center personnel in their perceptions of 8 concepts relating to emotional disability, social and vocational adjustment, work, dependence, and agency affiliation; and (b) provide descriptive information regarding the structure of these helpers' value systems as reflected in their ratings of the 8 concepts. 20 vocational rehabilitation counselors and 20 community mental health workers served as Ss. The semantic differential technique served as the basis for construction of the research instrument. Data were analyzed by means of a 2-way analysis of variance for repeated measures. Results indicate that (a) the groups differed in their ratings over all 8 concepts, (b) some of the concepts were seen more favorably by both groups than other concepts, and (c) particular concepts did not discriminate between the groups. Findings are discussed and tentative hypotheses are presented.—*Journal abstract.*

10279. Thuyns, Karen & Evans, Ron. (VA Hosp. Seattle, WA) **Comprehensive health care as a function of consumer-provider relationship.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 27-29.—Investigated the health care consumer-provider relationship through interviews with 60 health care consumers. 5 consumer utilization variables and 2 provider variables defined comprehensive health care, the role of the primary health provider, and continuity of care. Results show that only 3% of the Ss experienced a continuous consumer-provider primary care relationship.

10280. Tippet, Jean; Owens, Rosita & Frome, Francine. (Area A Community Mental Health Ctr, Washington, DC) **Indirect services and referral system for community mental health centers: Implementation and methods of measurement.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 450-465.—Explores the role of indirect services and a client referral system in community mental health and presents a method of implementing, tracking, and evaluating them within a center. The method can be used with or without computer support and includes a resource index, an optical coincidence card-sort file for fast and appropriate client referrals, and an indirect service form for recording community-oriented services, staff training activities, and other staff functions not directly related to client care. Use of the system by a facility considerably expands its service potential by placing at its immediate disposal a large number of service resources, thus providing an extensive network of comprehensive care within the catchment area.—*Journal abstract.*

10281. Uchimura, Hideyuki. (U Connecticut, Lab of Neuropsychopharmacology) [Community psychiatry in the Connecticut state department of mental health facilities.] (Japn) *Kyushu Neuro-psychiatry*, 1973(Dec), Vol 19(3-4), 228-234.—Reports on location of patients (by bed and by ward) throughout the facilities in Connecticut, occupational therapy, service programs for chronic patients, inpatient statistics for the year ending June 1972, research and clinical training programs, and the administrative organization of community psychiatry. To improve community psychiatry in Japan to its US level, innovations are suggested such as research centers, education and training centers, communication centers, and clinical centers in the national department of mental health facilities.—*S. Ashida.*

10282. van Buskirk, David. (South Shore Mental Health Ctr, Quincy, MA) **Training and treatment costs in a community mental health center.** *Administration in Mental Health*, 1974(Sum), 28-36.—Describes a method for defining and allocating training costs among different programs for different types of trainees. Using cost/unit of service, price tags are put on training programs within a community mental health center.

10283. Weinman, Bernard; Kleiner, Robert; Yu, Jin H. & Tillson, Vicki A. (Philadelphia State Hosp. PA) **Social treatment of the chronic psychotic patient in the community.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 358-365.—Investigated the clinical utility of community treatment of chronic psychotic patients. The outcome of a community treatment program was compared with results of 2 hospital-based control conditions: socioenvironmental therapy and traditional hospital treatment. Nonprofessional indigenous community members served as visiting or live-in enablers for 8-12 mo. Ss were 590 patients with an average age of 48.9 yrs and an average of 13.2 yrs of accumulated hospitalization. Results show that community treatment surpassed residential socioenvironmental treatment in release rates and in level of community performance as well as in the community tenure of patients placed in boarding settings. Both community and socioenvironmental treatment were clearly superior to traditional hospital ward programs in increasing



community tenure. In the community program, 52% of 242 Ss remained in the community for at least a 24-mo posttreatment period as compared to 38% of 246 Ss in socioenvironmental treatment. 102 Ss released from traditional wards incurred the highest return rate—41%.—*Journal summary.*

10284. Wesson, Donald R.; Smith, David E. & Linda, Lauren K. (West Coast Polydrug Abuse Treatment & Research Project, San Francisco, CA) **Drug crisis intervention: Conceptual and pragmatic considerations.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 135-142.—Discusses alternative techniques useful for drug crisis intervention. Areas covered include crisis definition; common approaches; crisis intervention agency types; street drug analysis; and medical management of adverse reactions to opiates, sedative-hypnotics, mixed opiate/sedative-hypnotics, stimulants, and psychedelics. Special emphasis is given to LSD crisis management. The therapeutic implications of crisis as a time of unusually high patient receptivity to assistance are considered.—*R. Tomasko.*

10285. Wildman, Robert W. & Wildman, Robert W. II. (Central State Hosp, Milledgeville, GA) **Administrative problems and patterns of agency clinical psychology departments.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 336-344.—Surveys requesting information on administrative patterns and problems were returned by 222 chief psychologists of mental health facilities. It was found that the majority believed that psychology departments should have a chief psychologist who has line authority over all psychology personnel and that psychology departments should have a central budget and control all expenditures in regard to personnel and other operating expenses. However, these desired conditions were found in only a minority of the responding departments. Major factors inhibiting the progress of psychology in mental health institutions were medical domination, inadequate budget, inadequate number of personnel, lack of understanding of the value of psychology, and insufficient authority for psychology personnel.—*Journal summary.*

10286. Zarle, Thomas H.; Hartsough, Don M. & Ottinger, Donald R. (Purdue U) **Tornado recovery: The development of a professional-paraprofessional response to a disaster.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 311-320.—Reports on a response to the emotional and social needs of disaster victims in the town of Monticello, Indiana, following severe tornado damage in April 1974. A project was developed which combined mental health and crisis intervention resources from outside the disaster community with paraprofessional workers indigenous to the area. Recovery efforts evolved into 3 distinct phases: (a) First, time was devoted to developing the program and to training paraprofessionals. (b) During the first months of recovery, response was focused on the victims and the acute effects of the disaster. (c) Finally, the needs of both victims and other members of the community were related to the long-term process of rebuilding. It is concluded that professional and paraprofessional workers can combine efforts successfully in a program grounded in crisis theory and crisis intervention techniques. However, valuable time

could have been saved by the availability of a guiding recovery plan and ready financial support.—*P. O'Brien.*

### Physical Treatment

10287. Asken, Michael J. (West Virginia U) **Psychemotional aspects of mastectomy: A review of recent literature.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 56-59.—Reviews the recent literature on the psychological reactions of mastectomy patients and on appropriate intervention strategies. Individual and familial fears and concerns related to mastectomy are discussed, and the importance of preoperative counseling and postoperative rehabilitation are emphasized. (22 ref)—*Journal abstract.*

10288. Berkwitz, Nathaniel J. **An up-to-date review of theories of shock therapies: Are convulsive shock therapies "moral treatments?"** *Diseases of the Nervous System*, 1974(Nov), Vol 35(11), 523-527.—Describes the history, current usage, and controversies surrounding treatment of psychological problems with electroconvulsive shock therapy (ECT). Issues such as the morality of this approach, explanations for its effectiveness, and various forms of the treatment are discussed. It is suggested that manic-depressive illness and involutional psychosis respond well to ECT. On the other hand, experience is cited in which ECT given to outpatients for the amelioration of depression, anxiety states, conversion hysteria, and in some ambulatory cases of acute schizoid reactions was not successful whereas treatment with Faradic or nonconvulsive therapy was helpful. (33 ref)—*R. S. Albin.*

10289. Berman, Mark L. **Application of contingency management: Considerations in a correctional setting.** *Educational Technology*, 1974(Apr), Vol 14(4), 20-27.—Describes a contingency management system in a correctional institution designed to prepare and qualify inmates to attend colleges as regular undergraduates. Reinforcements were provided in the form of points worth money and praise from peers and staff. Problems in the system are described, and suggestions for implementing similar systems in correctional institutions are given.—*C. B. Kreitzberg.*

10290. Bernstein, Dorothy M. & Simmons, Roberta G. (U Minnesota, Minneapolis) **The adolescent kidney donor: The right to give.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1338-1343.—Interviewed and administered the MMPI, WAIS, and WISC to 26 16-20 yr old potential and actual kidney donors. Results indicate that adolescent donors were more likely than adult donors to experience a boost in self-esteem and feel rewarded by, rather than regretful of, the decision a year later. 73% of the potential donors and 89% of the actual donors appeared to be under no family pressure to donate. Rescue of the terminally ill was the most frequently mentioned motive for donation, occurring 15 times, followed by concern and love for the recipient. The most prominent gain mentioned by almost all the donors was that of the gratitude of the recipient and family. All Ss had normal IQs except 1, and all but 2 had normal MMPI scores.—*L. Gorsey.*

10291. Cohen, Bertram D.; Penick, Sydnor B. & Tarter, Ralph E. (Rutgers State U, Medical School, Piscataway) **Antidepressant effects of unilateral electric**

**convulsive shock therapy.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 673-675.—Obtained Zung Self-Rating Depression Scale scores from 3 groups of depressed patients before and after 2 electric convulsive shock treatments (ECT). The ECT was administered bilaterally in 1 group and unilaterally, to the left- or right-cerebral hemisphere, in the other 2 groups. A 4th group was tested before and after the same interval but with no ECT. There were 10 patients in each group, all right-handed. All groups improved in mood, but the gain was significantly larger for right-hemisphere ECT than for either left- or bilateral-ECT. Comparisons with the no-ECT group, although nonsignificant, suggest that shock to the left hemisphere retards the antidepressant effects of ECT. It is speculated that right-hemisphere shock facilitates denial, while shock to the left-hemisphere interferes with verbally more complex means of processing dysphoric information defensively.—*Journal abstract*.

10292. **Cotton, Ester.** **Improvement in motor function with the use of conductive education.** *Developmental Medicine & Child Neurology*, 1974(Oct), Vol 16(5), 637-643.—Describes 2 cases of cerebral palsy whose progress in making active hand movements was felt to be due to the Peto method of conductive education. (French, German, & Spanish summaries)

10293. **Frankel, Fred H.** (Harvard U, Medical School, Boston) **Reasoned discourse or a holy war: Postscript to a report on ECT.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 77-79.—Points out that both favorable and unfavorable opinions regarding the value of electroconvulsive therapy (ECT) have become entrenched in the absence of adequate data. These opinions are discussed in relation to the training, experience, and personal orientation of the psychiatrist. The inability of some psychiatrists to tolerate uncertainty is held responsible for their denial of the validity of alternative methods of treatment. It is recommended that psychiatrists tolerate a certain amount of ambiguity and uncertainty; postponing closure may lead to the conclusion that treatment styles (including use of psychotherapy and ECT) are not mutually exclusive.—*Journal abstract*.

10294. **Hagberg, Bo & Malmquist, Ann.** (U Lund Hosp, Sweden) **A prospective study of patients in chronic hemodialysis: IV. Pretreatment psychiatric and psychological variables predicting outcome.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 315-319.—Studied psychiatric and psychological test assessments, made before hemodialysis began, of 23 patients with chronic renal failure, and compared results with treatment outcomes. Rehabilitated patients seemed to be more stable and to have an ability for positive identification and a persistency of life pattern. Further prognostically favorable variables were regular social contacts, adequate reaction towards kidney disease, expectation of fast rehabilitation, and use of defense mechanisms other than isolation.—*W. G. Shipman*.

10295. **Jones, Bill.** (U Queensland, St Lucia, Australia) **The importance of memory traces of motor efferent discharges for learning skilled movements.** *Developmental Medicine & Child Neurology*, 1974(Oct), Vol 16(5), 620-628.—Reviews methods of physiotherapy currently

used to improve movement control (especially in spastic children). It is argued that many of these methods may be ineffective because they are based on proprioceptive feedback theory. New methods need to be developed for teaching a child to monitor his own voluntary movements visually. (French, German, & Spanish summaries) (48 ref)—*P. W. Pruyser*.

10296. **Kohn, Bruno & Dennis, Maureen.** (York U, Downsview, Ontario, Canada) **Selective impairments of visuo-spatial abilities in infantile hemiplegics after right cerebral hemidecortication.** *Neuropsychologia*, 1974(Oct), Vol 12(4), 505-512.—8 14-28 yr old infantile hemiplegics with decortication of the left or right cerebral hemisphere were compared on tests of visuo-spatial abilities, of sense of direction and orientation, and of route-finding skills. The 2 hemidecorticate groups performed with similar competence if test requirements did not exceed capacities which normal children attain by the age of about 10 yrs. Unlike the left-operated group, right hemidecorticates were severely impaired on tests of later-developing spatial abilities. It is concluded that, after perinatal disease and hemidecortication of the right brain-half, left hemisphere control of processes underlying spatial analyses is associated with developmental deficits in these capacities. (French & German summaries) (19 ref)—*Journal abstract*.

10297. **Landis, Bernard; Baxter, James; Patterson, Russel H. & Tauber, Carl.** (State University Coll New York, Purchase) **Bender Gestalt evaluation of brain dysfunction following open-heart surgery.** *Journal of Personality Assessment*, 1974(Dec), Vol 38(6), 556-562.—The heart-lung machine makes open-heart surgery possible by providing extracorporeal blood circulation; however, it creates microemboli in the blood that cause neurological damage. A new filter, designed to remove these emboli, was assessed by preoperative and postoperative Bender Gestalt testing of 28 38-66 yr old patients. A lesser degree of the kinds of visual-motor difficulties associated with neurological deficit was produced by patients who received filtered blood. Postoperative impairment was assessed with some precision by using C. R. Pascal and B. J. Suttell's (1951) method of scoring distortions of Bender designs. The Bender scores were consistent with ultrasonic (sonar) counts of microemboli.—*Journal abstract*.

10298. **Malev, Jonathan S. & Landau, William.** (VA Hosp, Houston, TX) **Psychosis and informed consent: A brief communication based on a report of a case.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 7-9.—Discusses the problem of obtaining informed consent for treatment or surgery from a psychotic patient. In the case of parathyroid adenoma discussed, informed consent was finally obtained through the intervention of the patient's family doctor.

10299. **Malmquist, Ann & Hagberg, Bo.** (U Lund Hosp, Sweden) **A prospective study of patients in chronic hemodialysis: V. A follow-up study of thirteen patients in home-dialysis.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 321-326.—13 patients in home dialysis were psychiatrically evaluated before the start of dialysis and both psychiatrically and psychologically evaluated at the follow-up, using projective test



methods (Meta contrast technique and tachistoscopic exposure of a dialysis scene). The home-dialysis patient is much less disturbed emotionally by the treatment situation than the patient in center-dialysis. (19 ref)—*W. G. Shipman*.

10300. Nielsen, H. Birk & Ewertsen, H. W. (Bispebjerg Hosp, State Hearing Ctr, Copenhagen, Denmark) **Effect of hearing aid treatment.** *Scandinavian Audiology*, 1973, Vol 3(1), 35-38.—Studied the social hearing handicap index (SHI) in a group of 551 hard-of-hearing persons who were fitted with hearing aids for the first time. When relating the SHI to the speech reception threshold (SRT) in the better ear, it was found that the hearing handicap—as experienced by the Ss themselves—was at least as great as the physical hearing loss expressed in SRT values. It is concluded that the SHI gives supplementary information to objective measures. Applied to different diagnostic groups and type of tone audiogram, the SHI before and after treatment with hearing aids expressed the therapeutic gain, which was biggest in groups of Ss with conductive disorders and with flat audiograms. In relation to different age groups, the subjectively experienced therapeutic gain proved to be the same for young, middle-aged, and elderly Ss and somewhat less for Ss over 75 yrs of age.—*Journal abstract*.

10301. Pedersen, B.; Frankner, B. & Terkildsen, K. (Rigshospitalet, ENT Clinic F, Copenhagen, Denmark) **A prospective study of adult Danish hearing-aid users.** *Scandinavian Audiology*, 1974, Vol 3(3), 107-111.—Findings of a long-term study of hearing-aid users (89% were over age 50) indicated that 1/3 of them exhibited problems of a mental nature and that, in general, Ss who showed unsatisfactory adjustment to the aid were unmotivated to mobilize the extra effort needed to use the aid.

10302. Pfeiffer, Alfred. [Acupuncture and the science of medicine.] (Germ) *Psychiatrie, Neurologie und medizinische Psychologie*, 1974(Jun), Vol 26(6), 369-373.—Speculates on the probable existence of mechanisms for regulating transformation of energy in the central nervous system. Suggestion therapy in general is discussed, and the analgesic effects of acupuncture in particular.

10303. Pritchard, Michael. (London Hosp Medical Coll, England) **Dimensions of illness behaviour in long term haemodialysis.** *Journal of Psychosomatic Research*, 1974(Oct), Vol 18(5), 351-356.—The responses of 14 patients undergoing hemodialysis to a 22-item questionnaire were factor analyzed.

10304. Squire, Larry R.; Slater, Pamela C. & Chace, Paul M. (VA Hosp, San Diego, CA) **Retrograde amnesia: Temporal gradient in very long term memory following electroconvulsive therapy.** *Science*, 1975(Jan), Vol 187(4171), 77-79.—Used a newly designed remote memory test to assess the temporal dimension of prolonged retrograde amnesia. 16 22-66 yr old psychiatric inpatients given a course of electroconvulsive treatments for relief of depressive illness exhibited a temporal gradient of retrograde amnesia after 5 treatments. Memories acquired up to about 3 yrs before treatment were impaired, but memories acquired 4-17 yrs before treatment were not affected. Results suggest that the neural substrate of memory gradually changes with the

passage of time after learning and that resistance to amnesic treatment can continue to develop for years. (20 ref)—*Journal abstract*.

10305. Starkman, Monica N. & Youngs, David D. (U Michigan, Medical Ctr, Psychiatric Consultation-Liaison Service) **Psychiatric consultation with patients who refuse medical care.** *International Journal of Psychiatry in Medicine*, 1974(Spring), Vol 5(2), 115-123.—Ethical and pragmatic issues related to patient refusal of medical care are considered and a comprehensive approach to psychiatric evaluation and management is presented. Legal interventions which may be utilized are described. The medical-legal committee and the interdisciplinary case conference are suggested as avenues for dialogue, problem solving, and education.—*Journal abstract*.

10306. Steinhart, Melvin J. (Albany Medical Coll, Union U) **Psychiatric aspects and management of aging patient.** *New York State Journal of Medicine*, 1974(Jun), Vol 74(6), 976-978.—Discusses some special problems encountered by physicians in the treatment of geriatric patients. Although the physiological changes of aging sometimes result in cognitive disorders, perceptual difficulties, and personality alterations, it is important for the physician to remember that the elderly patient's needs for friendship, security, and integrity are basically the same as those of younger persons. It is suggested that physicians frequently react to the aged with unconsciously expressed fear, hostility, and condescension. It is concluded that a successful therapeutic relationship between the physician and geriatric patients requires cooperation from the patient and his family and flexibility on the part of the physician.—*J. Kelly*.

10307. von Euen, E. (U Freiburg, Medizinische Poliklinik, W Germany) [The psychology of diet behavior: Examinations of patients with kidney failure.] (Germ) *Zeitschrift für Psychotherapie und medizinische Psychologie*, 1974(Jan), Vol 24(1), 31-35.—Studied 29 patients with chronic kidney failure who did not follow the low-protein diet prescribed for them, to determine the reasons for noncompliance. The degree of intelligence proved not to be a factor. The problem was attributed to circumstances unfavorable to staying on a diet, especially when circumstances are combined with such factors as the individual's susceptibility, disposition, attitudes, latency structure, etc. The basic problem of such a diet is the restriction of oral desires, which is seen as an offense to one's self-worth and is felt to be a recurrence of arbitrary parental demands. Case histories to illustrate this point of view are presented.—*S. D. Babcock*.

10308. Weinstein, Milton C. (Harvard U, School of Public Health, Ctr for the Analysis of Health Practices, Boston) **Allocation of subjects in medical experiments.** *New England Journal of Medicine*, 1974(Dec), Vol 291(24), 1278-1285.—Considers that randomized clinical trials have been a subject of much controversy for ethical reasons. When alternative experimental designs are judged on the basis of expected outcomes to the entire patient population, including the experimental Ss, it can be demonstrated that classical randomized designs need not be optimal. Consideration of individual patient preferences in a decision-analytic framework may lead to rejection of randomized trials in favor of alternative,

perhaps nonrandomized, designs. Moreover, the ethical problems of experimentation can be rendered less severe if adaptive designs are used—designs that make use of information obtained during the investigation—thus permitting meaningful inferences to be drawn while exposing fewer patients to the inferior treatment. For both statistical and ethical reasons, adaptive designs should be used more often, and strictly randomized designs should be used sparingly. (28 ref)—*Journal abstract*.

### Social Casework & Rehabilitation

10309. Angliker, Colin C. (McGill U, Montréal, Québec, Canada) [The training of prison guards.] (Fren) *Vie Médicale au Canada Français*, 1974(Jun), Vol 3(6), 602-604.—Notes some ways in which guards can be taught to support the rehumanization of the prison environment for their own as well as for inmates' benefit.

10310. Barney, Oscar R. (Georgia Regional Hosp, Augusta) **Client age, education, and work experience as predictors of rehabilitation outcome.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Mar), Vol 7(1), 25-30.—Analyzed results of a study of 40 vocationally impaired individuals referred to a work evaluation program in order to determine whether certain demographic factors (age, education, and previous employment) might serve as valid predictors of rehabilitation success. The disabilities included emotional problems, with several Ss having orthopedic, neurological, or cardiovascular disorders. The severely disabled (Ss with mental retardation, hemiplegia, or severe cerebral palsy) were excluded. Statistical results indicate that a background of 10 or more years of education is a significant factor in predicting rehabilitation outcome; the factors of age and previous employment are not significant.—*A. de la Haba*.

10311. Barry, John R.; Becker, Joel L. & Sonenshine, William J. (U Georgia) **Variables associated with rehabilitation prognosis and type of crime.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 392-401.—Describes a study which relates certain prisoner characteristics and experiences to (a) rehabilitation prognosis and (b) the kind of offense committed. The biographical data and rehabilitation experiences of over 600 prison inmates were compared with prognostic ratings made by 10 vocational rehabilitation counselors. Postprison follow-up data were available for 163 of these Ss which supported the validity of the prognostic ratings. 9 of the 60 characteristics and experiences were significantly associated with the prognostic ratings. For example, those Ss who lived in the rehabilitation center, who received more counseling-therapy, or who attended trade school were judged to have a better post prison prognosis than the other inmates. This prognostic judgment related significantly to post prison behavior.—*Journal summary*.

10312. Bloch, Carole S. & Gould, Wilbur J. (Lenox Hill Hosp, New York, NY) **Vocal therapy in lieu of surgery for contact granuloma: A case report.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 478-485.—Presents the case of a 42-yr-old male in which resolution of a contact granuloma was attained with vocal therapy and psychological support. It is concluded

that surgery should probably never be used as initial therapy for contact granuloma of the larynx, regardless of its presumed state of evolution.

10313. Bodenhamer, Randy. **Introducing the principles of contingency management into the work adjustment program: One approach.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Sep), Vol 7(3), 28-30.—Summarizes one method of introducing contingency management principles to supervisors in a work adjustment program of Goodwill Industries. The approach was used to promote the acceptance and implementation of these principles and appeared to be successful.

10314. Chevalier, Millie. **A review of Rankian with therapy and its relevance for social casework.** *Clinical Social Work Journal*, 1974(Fal), Vol 2(3), 194-206.—Examines the basis of Rankian treatment philosophy, partly through case examples.

10315. Collins-Ahlgren, Marianne. (Riverside Community Hosp, CA) **Teaching English as a second language to young deaf children: A case study.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 486-499.—Examined the development of a 3-yr-old deaf female's use of her native language of signs, and the emergence of English—a 2nd language—between the ages of 3 and 4.

10316. Corthell, David W. & Lesnick, Michael J. (U Wisconsin, Stout) **Observation and recording behavior.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Sep), Vol 7(3), 21-27.—Describes a narrative method for recording client behavior or performance by vocational evaluators and work adjusters. The method includes 7 steps of what, when, and how to record the information briefly and accurately.

10317. Couch, Robert H. & Allen, Conrad M. (Auburn U) **Attendance behavior of the disadvantaged: A comparison of tangible and intangible reinforcers.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Jun), Vol 7(2), 34-41.—Analyzed the statistical results of a study of 75 Ss to compare the effectiveness of tangible reinforcers with intangible reinforcers in increasing attendance behavior of disadvantaged rehabilitation facility clients. Ss were divided into 3 groups of 25. Group 1 was rewarded for attendance and punctuality with a token which could be exchanged for one of several tangible items in a facility store. Group 2 was rewarded with a token and verbal reinforcement, and was permitted 45 min in a recreational area. Group 3 (controls) was given no rewards for attendance. The 3 null hypotheses, which stated that there would be no significant difference in attendance rates among the 3 groups, were supported statistically by attendance and follow-up data. However, a directional nonsignificant trend and several indices favoring both experimental treatments was discerned. (17 ref)—*A. de la Haba*.

10318. Davila, Robert R. (Ed.). **Proceedings of the Fifth Biennial Conference of the Professional Rehabilitation Workers with the Adult Deaf.** *Journal of Rehabilitation of the Deaf*, 1974(Jul), Vol 8(1), 176 p.

10319. Deming, Romine R. (Northeastern U, Coll of Criminal Justice) **Valence as a measurement of the effectiveness of probation officer-client relationship.** *Journal of Criminal Justice*, 1974(Sum), Vol 2(2),



157-162.—Probationers are expected to be socialized or resocialized through the assumed "primary relationship" which is supposed to occur by randomly assigning probationers to officers. A Likert-type scale was developed to assess the necessary ingredient of a primary group—relationship valence—and was administered to 100 clients (male delinquents aged 12-18 yrs) of an urban probation agency. The assumption was supported. However, evidence suggests possible improvement through planned matching of clients to officers based on client and officer personality profiles. The Relationship Valence (RV) Scale facilitates this matching as well as assists in officer development and program evaluation. The RV Scale can be used as a research instrument to compare high and low scorers and also to enhance a greater understanding of officers by comparing officers who elicit high scores with those who elicit low scores. (21 ref)—*Journal abstract*.

10320. Hindman, Ross L. (St Edward's U) **Preparing the sheltered worker for a competitive work setting.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Mar), Vol 7(1), 20-24.—Discusses the need to prepare the sheltered worker for the realities of the actual work world. This includes teaching him to accept and understand the interaction with other workers that will occur during the first days on the job. Very often the retarded or disabled worker has been encouraged to be an overly enthusiastic producer and this can place him in serious conflict with the established work patterns of other workers on the new job. What happens during the initial work period is crucial to the sheltered worker's self-image and it is important that he be prepared to adjust to the prevailing work production situation in order to avoid psychological pressure and attack from his fellow workers.—*A. de la Haba*.

10321. Kaplan, Mildred F. **Counseling middle-class university students.** *Social Casework*, 1974(Oct), Vol 55(8), 484-488.—Demonstrates how clinical social work can be helpful to psychologically sophisticated, middle-class university students.

10322. Lechowicz, Joseph S. & Carmack, Nathan D. (St John's U, Jamaica, NY) **Systematic approach to client care in a rehabilitation facility: Adaptation of a medical model.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Mar), Vol 7(1), 14-19.—Discusses the L. L. Weed System, as modified by J. W. Hurst (1971), of client care in a sheltered workshop. The medical model devised integrates the data-collection and problem-solving services of all personnel in the facility and includes the following sequential steps: (a) data base, including diagnosis, problems, and sequence of events; (b) complete problem list; (c) initial plans and orders; (d) progress notes; and (e) discharge notes. A system of numerical codes includes information on general education; social, personal and medical history; and test and psychological profiles. This permits the placement of the client in an appropriate treatment atmosphere. The system enables helping personnel to acquire a complete overview and eliminates unnecessary duplication of efforts. It also provides for a more honest assessment of the quality of client care.—*A. de la Haba*.

10323. Lord, John C. (Dalhousie U, School of Physical Education, Halifax, Nova Scotia, Canada)

**Helping children help themselves: A clinical approach.** *Journal of Leisurability*, 1974(Jul), Vol 1(3), 4-8.—Describes the objectives and programs of the Children's Developmental Clinic at Dalhousie University, Halifax, Nova Scotia. The clinic treats children aged 6-12 with perceptual-motor disabilities and also conducts research and training functions. Gains in self-confidence and variable perceptual-motor improvements are reported to result from treatment emphasizing physical activity.

10324. Miller, James H. & Alfano, Anthony M. (U Tennessee) **The efficacy of Tennessee rehabilitation facilities: A counselor critique.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Mar), Vol 7(1), 31-37.—Surveyed 60 rehabilitation counselors to determine the efficacy of Tennessee's metropolitan rehabilitation facilities. Questionnaires requested information on (a) style, length, and dispatch in reporting of client data; (b) specificity; (c) potential value and performance rating of evaluative data; (d) counselor familiarity with services provided by local facilities; (e) facility services; and (f) usefulness of evaluative tools. Results indicate that the counselors regarded the rehabilitation services very favorably. Suggested improvements included more rapid return of evaluation reports to counselors; more contact between counselors and facilities to promote a better understanding of the facilities' services and methodologies; greater familiarization of facility personnel with local job opportunities, providing for the development of relevant work samples and worker station assignments; and a 2-way feedback system between counselors and facilities.—*A. de la Haba*.

10325. Mongeau, Maurice. (Inst de réhabilitation, Médecine physique et réadaptation, Montréal, Québec, Canada) **[Rehabilitation of the physically disabled child.]** (Fren) *Vie Médicale au Canada Français*, 1974(Apr), Vol 3(4), 354-356.—Stresses the importance of a positive, realistic approach for the physically disabled child from the start, so that the child will interact and compete as normally as possible in the family, in school, and in society. (English summary)

10326. Muleski, Marilyn. (Ministry of Community & Social Service, Sport & Recreation Bureau, Toronto, Ontario, Canada) **Play and the hospitalized child.** *Journal of Leisurability*, 1974(Jul), Vol 1(3), 22-27.—Defines the function of the "child life worker," who deals with the emotional and psychological problems of hospitalized children. The cathartic and social values of play therapy are emphasized. Environmental factors that can facilitate children's adjustment to hospitalization are described, and outdoor play is recommended.

10327. Norlin, Judy & Ho, Man Keung. (U Oklahoma, School of Social Work) **A co-worker approach to working with families.** *Clinical Social Work Journal*, 1974(Sum), Vol 2(2), 127-134.—Examines the advantages and disadvantages of the coworker approach. A strong argument is made in favor of using this method despite its limitations, which are pointed out. Significant details related to the process are given.

10328. Odell, Brian N. (U Wisconsin, Madison) **Accelerated entry into the opportunity structure: A sociologically-based treatment for delinquent youth.** *Sociology & Social Research*, 1974(Apr), Vol 58(3) 312-317.—Evaluated 2 psychologically-based

and 2 sociologically-based treatment programs serving 60 lower-class, persistently offending delinquent boys (44 nonwhite, 16 white). The psychological programs consisted of casework with the youths and their families; the sociological offered educational development and job placement. Results indicate that the sociological programs were significantly more effective than the case-work programs in reducing recidivism, enabling more of the delinquents to enter the "opportunity structure" (regular employment after high school). This entry was accompanied by improved self-images and identification with more "traditional" reference groups.—*R. V. Heckel.*

10329. **Perlman, Helen P.** (U Chicago, School of Social Service Administration) **Confessions, concerns, and commitment of an ex-clinical social worker.** *Clinical Social Work Journal*, 1974(Fal), Vol 2(3), 221-229.—Describes the social work profession in terms of its uniqueness and the sense of professional identity acquired by its members.

10330. **Pittel, Stephen M.** (Wright Inst, Berkeley Ctr for Drug Studies, CA) **Addicts in wonderland: Sketches for a map of a vocational frontier.** *Journal of Psychedelic Drugs*, 1974(Apr), Vol 6(2), 231-241.—Discusses the "street work" behavior of the drug addict, and its implications for his vocational rehabilitation. Many job skills addicts possess are seen to have been acquired after they started to abuse drugs. It is suggested that an addict's street routines be analyzed when assessing his postaddiction vocational possibilities. Suggestions regarding vocational assessment, training, job design, and the addict's entry into a new social environment are presented. (21 ref)—*R. Tomasko.*

10331. **Rees, Stuart.** (Aberdeen U, Scotland) **No more than contact: An outcome of social work.** *British Journal of Social Work*, 1974(Fal), Vol 4(3), 255-279.—Describes how social worker and client perspectives on various aspects of their meetings are related to one or all of several outcomes of treatment (e.g., failure to give a service, failure to perceive the social worker's role, or the failure to continue to seek help). The author's experiences with 8 sets of clients are described to illustrate how the outcome in each case is a reflection of each party's interpretations of crucial aspects of the meetings. Although this may reflect a 1-sided picture of the practice of social work, it is argued that it also emphasizes the process in which past and present circumstances affect both parties' perspectives of the therapeutic contact and how these circumstances increase the probability that the clients will either fail to obtain help or regard their meetings with social workers as no different from other passing contacts with "officials" who feature in their lives. (28 ref)—*Journal abstract.*

10332. **Remmes, Harold.** (Massachusetts Council of Organizations of the Handicapped, Boston) **Consumer feedback: Tiny Tim is dead!** *Rehabilitation Literature*, 1974(Oct), Vol 35(10), 298-300.—Cites personal experience as head of the Consumer Advocacy Project as a basis for urging greater cooperation between the providers and recipients of rehabilitation services for handicapped persons.

10333. **Rullman, Lee.** (Metropolitan Toronto Assn for the Mentally Retarded, Ontario, Canada) **Adapted**

**activities and the handicapped.** *Journal of Leisurability*, 1974(Jan), Vol 1(1), 15-19.—Discusses activities that can be modified for participation of the handicapped without changing their original purpose (e.g., wheelchair basketball). Case histories and suggestions for modifying activities to fit abilities rather than disabilities and allow the handicapped to participate in a wide range of activities are presented.

10334. **Rusche, Philip J.** (Northeastern U, Graduate School of Education) **Feedback: An organizational imperative.** *Rehabilitation Literature*, 1974(Oct), Vol 35(10), 290-297, 300.—Emphasizes the importance to a social service agency of feedback from those whom the organization serves and from the community in which the agency functions.

10335. **Skelly, Madge; Schinsky, Lorraine; Smith, Randall W. & Fust, Rita S.** (VA Hosp, St Louis, MO) **American Indian sign (Amerind) as a facilitator of verbalization for the oral verbal apraxic.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 445-456.—6 oral and verbal apraxic adult patients with no speech on admission to a clinical study project achieved varying degrees of verbalization with American Indian Sign as a synchronous facilitator. Gains were measured by comparing patients' verbal scores on the Porch Index of Communicative Ability on entering and leaving the project. Family and hospital observers noted improvement in the patient's daily spontaneous speech.—*Journal abstract.*

10336. **Stockton, Michael D. & Foreyt, John P.** (Florida State U) **The hospital hires its own: Ex-patients as employees.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Sep), Vol 7(3), 31-34.—Compared the work adjustment of 12 expatients of a mental hospital hired as full-time employees by the hospital with a control group of 12 nonpatients hired at the same time. No difference was found in either supervisors' ratings or comments about job performance.

10337. **Wodarski, John S. & Feldman, Ronald A.** (Washington U) **Practical aspects of field research.** *Clinical Social Work Journal*, 1974(Fal), Vol 2(3), 182-193.—Describes experience obtained from implementing a project concerning behavioral change within children's groups. The most important prerequisite for planning a project is the researcher's evaluation of the agency's operations before the study begins. What research questions can be answered by the study within the given context? Can mutual exploration of research objectives and consensus be obtained? Proper coordination, collaboration, monitoring of the study, and other important practical planning aspects are discussed.—*S. R. Stein.*

#### Hospital Programs & Hospitalization & Institutionalization

10338. ———. [22nd symposium of the Kyushu Neuropsychiatric Association: Topics on geriatric wards.] (Japn) *Kyushu Neuro-psychiatry*, 1973(Dec), Vol 19(3-4), 189-212.—Reports 4 symposium papers. (a) Results of clinical examinations of 1,104 geriatric patients are presented and appropriate geriatric ward setups are suggested. (b) A paper based on 20 mo of experiences in a geriatric ward discusses problems



peculiar to such a ward, the design of new wards, and problems in geriatric nursing, clinical examinations, and safety. (c) A paper on communicable diseases among mentally ill senile patients reports various causes of death, bacterial counts in hospital rooms, culture counts of mouth and throat viruses, and major communicable diseases among these patients. (d) A paper on the use of the creative arts, especially painting and ceramics, in a geriatric ward reports schedules, methods, and case studies of a successful program of art therapy.—S. Ashida.

10339. Baker, Joseph J. (VA Central Office, Mental Health & Behavioral Sciences Service, Washington, DC) **New perspectives in psychiatry in the Veterans Administration.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 70-73.—Discusses the mental health services in the Veterans Administration (VA) which, in 1972, were reorganized in a manner designed to increase the probability of interdisciplinary collaboration. VA hospitals were urged to form multidisciplinary mental health committees to advise on local programs and practices. This "corporate" approach has led to significant changes in the use of staff and in the physical and psychological environment in some hospitals. While it is too early to evaluate the full impact of the changes on patient care, waiting lists have been reduced, and length of hospital stay has decreased.—*Journal abstract*.

10340. Boudewyns, Patrick A. (VA Hosp, Iowa City, IA) Is "milieu therapy" in a short-term inpatient psychiatric setting worth the money? *International Mental Health Research Newsletter*, 1974(Sum), Vol 16(2), 7-8.—Evaluated lasting behavioral benefits of short-term milieu therapy (MT). Ss were 36 volunteer male inpatients less than 50 yrs old having MMPI peaks on D or Pt; each was randomly assigned to 1 of 3 short-term therapy groups—implosive therapy (IT) plus MT, desensitization therapy (DT) plus MT, and MT only—and completed the MMPI and Mooney Problem Checklist pre- and posttherapy and 6 mo later. Ss and significant others also rated therapeutic achievement toward individual goals. Results of *t*-tests showed that Ss receiving only MT displayed no significant pre-post or pre-follow-up changes on any measures. Of 8 MT Ss surveyed 1 yr after discharge, 4 had re-entered the hospital at least once. Findings for IT and DT Ss were significantly better. Despite absence of an untreated control group, the findings indicate that short-term MT alone was ineffective and suggest that in view of its cost, controlled studies of its effects should be carried out before its use in short-term programs is continued.—C. A. Heikkinen.

10341. Bourestom, Norman & Tars, Sandra. (VA Hosp, St Cloud, MN) **Alterations in life patterns following nursing home relocation.** *Gerontologist*, 1974(Dec), Vol 14(6), 506-510.—Compared the effects of a radical involuntary relocation of elderly patients with the effects of a moderate involuntary relocation. A total of 98 Ss in the 2 groups were matched with a like number of nonrelocated controls. The radical relocation required S adjustment to new staff, a new program, a new physical environment, and a new patient population; the moderate relocation involved only a move to a new building several hundred yards away. Findings indicate a

strikingly higher mortality rate for the relocated groups than for their nonrelocated counterparts. This rate was notably greater for the radical-change group, which showed a 43% mortality rate in the 6 mo preceding the year following relocation compared with 21% of controls. The moderate-change group experienced a 37% death rate compared with 26% among their controls. On all measures the radical-change group fared more poorly than did the moderate-change group, confirming that a weighty source of the variance in relocation effects is the degree of environmental change involved. (20 ref) —*Journal abstract*.

10342. Chapman, Marvin. (Central State Hosp, Wau-pun, WI) **The right to treatment and the institution.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender: I*. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.—Discusses the historical, philosophical, and legal antecedents of the right to treatment, to determine whether individuals confined to a mental hospital have an enforceable right to treatment. Relevant court decisions are summarized, and it is concluded that the major implication of the right of treatment issue is that institutional interference in any area of personal liberty requires legal justification.

10343. Cleland, Charles C. & Sluyter, Gary V. (U Texas, Austin) **The Alabama decision: Unequivocal blessing?** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 409-413.—Explores implications of the Alabama *Wyatt vs Stickney* case in terms of budget conflicts, economics, effects of growth, and rate of growth. It is concluded that administrators will need to exercise great skill in implementation of an overly simplified legal decision.

10344. Ferrel, L. & Guyer, E. (VA Hosp, North Little Rock, AK) **Evaluation of a milieu therapy program for chronic hospitalized patients.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 18-19.—Compared pre- and posttest scores on the Anxiety Scale of the Institute for Personality and Ability Testing and on the Nurses' Observation Scale for Inpatient Evaluation (NOSIE), using 33 patients in a 6-mo treatment test of milieu therapy. Ss showed a significant increase in social interest and a decrease in manifest psychosis and depression as assessed by the NOSIE, but little or no change in the anxiety scores.

10345. Fields, Francis R. & Tumilty, Thomas N. (VA Hosp, Lebanon, PA) **A patient-centered approach to a beginning program for improvement of veteran-employee relations.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 5-9.—Implemented 2 separate programs in an attempt to improve employee-veteran relations. One was primarily didactic and included only employees. The other included both patient participation and more active staff involvement. Surveys indicated that, in general, employees' and patients' views regarding patient treatment were congruent, although consistent discrepancies between staff and patient responses were noted. These discrepancies tended to diminish after the program.

10346. Fleming, Juanita W. (U Kentucky, Coll of Nursing) **Hospitalized physically disabled children focus on things not people.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 1002.—Assessed the reactions of

136 5-12 yr old hospitalized children and children who had never been hospitalized using 6 projective pictures depicting events and people related to the hospital environment. Ss who were physically disabled focused on objects in the pictures rather than on people, while Ss who were either chronically or acutely ill focused on both objects and people, and controls focused on people.

10347. Foster, Leslie L. (VA Hosp, American Lake, Tacoma, WA) **A comparison of staff ratings related to posthospital adjustment.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(Aug), Vol 16(3), 11-14.—Explored the relationship between staff ratings of clients and their later adjustment. Factor analysis of a staff questionnaire gave 2 factor scores which were correlated to 9 scores from the Personal Adjustment and Role Skills Scale. Results show that the nonprofessional male rater was just as accurate as other staff in predicting a client's posthospital adjustment.

10348. Frank, John L. & Herndon, James H. (Hahnemann Medical Coll & Hosp, Philadelphia, PA) **Psychiatric-orthopedic liaison in the hospital management of the amputee war casualty.** *International Journal of Psychiatry in Medicine*, 1974(Spr), Vol 5(2), 105-114.—Describes methods of effecting a psychiatric liaison with an orthopedic service for amputee war casualties. Case examples are presented.

10349. Frankel, Alan & Murphy, John. (VA Hosp, Research Service & Rehabilitation Medicine Service, Salem, VA) **Physical fitness and personality in alcoholism: Canonical analysis of measures before and after treatment.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1272-1278.—Evaluated physical fitness and MMPI scores of 214 28-56 yr old male alcoholics before and after an 84-day treatment program that included a daily 1-hr physical fitness session. Ss were all of low socioeconomic status and generally in poor health. At the end of the program, Ss had significantly lower mean resting pulse rates and diastolic blood pressure, had gained weight, and had improved scores on a physical fitness test. Significant changes on the MMPI indicated that Ss had become less antisocial and less blame-projecting and that there had been decreases in neurotically anxious-depressive affect. When scores were weighted to control for scores at admission, major changes were on the physical fitness test and systolic blood pressure and on the D and Pa scales of the MMPI. (15 ref)—*Journal abstract*.

10350. Gottesman, Leonard E. & Bourestom, Norman C. (Philadelphia Geriatric Ctr, PA) **Why nursing homes do what they do.** *Gerontologist*, 1974(Dec), Vol 14(6), 501-506.—Describes an observation-based study of actual nursing home behavior which shows that, among 1,144 residents, half needed little assistance with activities of daily living and half were mentally alert. Little of nursing care was provided, suggesting a refocusing of care.

10351. Greve, W. (Schlosspark Clinic, Berlin, W Germany) **[Psychiatry in general hospitals: Possibilities and limits.]** (Germ) *Praxis der Psychotherapie*, 1973(Jun), Vol 18(3), 118-123.—Describes the program and progress of the Schlosspark-Klinik of West Berlin.

10352. Groisman, Moyses. **[Therapeutic community and teaching groups.]** (Port) *Jornal Brasileiro de Psiqui-*

*atria*, 1972(Jan), Vol 21(1), 81-91.—Describes an inpatient therapeutic community in which a team of experienced patients are made responsible for guiding newer patients through successive typical group crises. The "teaching group" itself receives guidance from a supervising psychoanalyst. (English summary)

10353. Harris, Joan M.; Velt, Steven W.; Allen, George J. & Chinsky, Jack M. (U Connecticut) **Aide-resident ratio and ward population density as mediators of social interaction.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 320-326.—Observed various types of interpersonal interaction between 37 institutionalized retarded children (mean age = 9 yrs) and 18 attendants under different ward populations and resident-aide ratios. High population density alone was not associated with decreases in the general quality of aide-initiated interactions with residents when resident-aide ratio was held constant. Lowering the resident-aide ratio by adding a 2nd attendant to a moderately populated ward did not change the behavior of either aide. Decreasing the resident-aide ratio when 1 aide was present, by decreasing the resident population, was associated with significant increases in the frequency of desirable types of aide behavior. These findings suggest that attendants might be most effective when working alone with a small group of residents.—*Journal abstract*.

10354. Heskin, K. J.; Bolton, N.; Smith, F. V. & Banister, P. A. **Psychological correlates of long-term imprisonment: III. Attitudinal variables.** *British Journal of Criminology*, 1974(Apr), Vol 14(2), 150-157.—Administered a semantic differential test to 175 men serving indeterminate sentences or determinate sentences of at least 10 yrs in English prisons in order to assess attitudes to concepts selected either because of their relevance to the experience of imprisonment or because of their general importance. Ss were divided into 4 groups, matched for age but differing in mean total time imprisoned. Self-evaluation was found to decrease significantly with imprisonment. Evidence presented supports the contention that imprisonment itself, rather than release-selection procedures, was responsible for this trend. There was some evidence that increasing imprisonment was associated with more unfavorable attitudes to the concepts of "work" and "father." These changes might be a consequence of the breakdown of relationships between prisoners and their families. (19 ref)—*Journal summary*.

10355. Howard, Ephraim M. & Howard, Joyce L. (Inst of Human Ecology & Living Processes, Bucks County, PA) **Women in institutions: Treatment in prisons and mental hospitals.** In V. Franks & V. Burtie (Eds). *Women in therapy: New psychotherapies for a changing society*. New York, NY: Brunner/Mazel, 1974. xiii, 441 p. \$15.

10356. James, Edassery V.; Armatas, James P. & Gump, Paul V. (Greenville Coll) **Ward behavior of patients.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 21-23.—Observed patient behavior on 4 hospital wards to determine influences of different treatment objectives, effects of the behavior of other individuals, and effects of the physical milieu. Assuming activity and sociality to be important in total treatment, results reveal insensitivities in hospi-



tals to the needs of older, chronic, or less competent patients.

10357. Kaltreider, Nancy B.; Martens, Wilma; Monterrosa, Susan & Sachs, Lewis. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **The integration of psychosocial care in a general hospital: Development of an interdisciplinary consultation program.** *International Journal of Psychiatry in Medicine*, 1974(Spring), Vol 5(2), 125-134.—Describes the process of changing from a traditional psychiatric consultation to one in which representatives from psychiatry, psychology, social work, and nursing worked to carry out a coordinated plan to provide psychosocial consultation to a general hospital. A case example is provided.—*Journal abstract*.

10358. Kiger, Roger S. (Utah State Hosp, Provo) **The therapeutic community in a maximum security hospital: Treatment implications.** In L. M. Irvine, T. B. Brelje (Eds), *Law, psychiatry and the mentally disordered offender*. I. Springfield, IL: Charles C Thomas, 1972. xv, 147 p. \$9.75.

10359. Lieberman, Morton A. (U Chicago) **Relocation research and social policy.** *Gerontologist*, 1974(Dec), Vol 14(6), 494-501.—4 studies examining factors predicting the effects of relocation on the elderly are discussed. 3 major strategies used to alleviate the stress of elderly persons entering institutions or transferring from one institution to another are examined—selection, preparation, and environmental manipulation.

10360. Markson, Elizabeth W. (Massachusetts Dept of Mental Health (Research), Boston) **The emperor's new clothes: A case study of instability on a geriatric service.** *Gerontologist*, 1974(Dec), Vol 14(6), 472-475.—Results of a case study on the geriatric service of a mental hospital suggest that staff disagreement on ward norms and daily activities provides a useful indicator of instability within the social system of a hospital.

10361. McCollough, Thomas E. (Duke U) **Mental illness and public policy.** *Journal of Religion & Health*, 1974(Oct), Vol 13(4), 251-258.—Summarizes recent federal and state legislation that requires more humane treatment for mentally ill patients. Voluntary hospital commitments and the right to treatment are particularly emphasized. Religious groups are admonished to oppose subcultural group treatment of mentally ill patients and to work toward developing more positive community attitudes toward emotionally deviant individuals.—*F. A. Hardt*.

10362. Mendel, Julius G. (Long Island Jewish—Hillside Medical Ctr, Queens Hosp Ctr, NY) **Utilization of outpatient psychiatric consultation services.** *New York State Journal of Medicine*, 1974(Jul), Vol 74(8), 1413-1414.—Reports that availability of a psychiatrist in a hospital outpatient medical clinic increases requests for psychiatric consultation, but that rate of follow-through with psychiatric treatment is low. It is suggested that patients who seek medical help for essentially emotional problems do not respond to conventional psychiatric intervention.

10363. Miketić, Božidar. (Medical Ctr, Dubrovnik, Yugoslavia) **[Prevention of psychic disturbances in old people in a home for the aged.]** (Srce) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(3), 61-65.

10364. Morrice, J. K. (Ross Clinic, Aberdeen, Scotland) **Life crisis, social diagnosis, and social therapy.** *British Journal of Psychiatry*, 1974(Oct), Vol 125, 411-413.—Examined data from 266 consecutive admissions to a day hospital run as a therapeutic community, which was previously described by the author (see PA, Vol 50:7447). 490 crises for these patients were identified, with the majority falling into 1 of 2 categories: interpersonal difficulties in the family and work problems. Problems in identifying the appropriate "social prescription" for the patients are noted, and the types of treatment offered (including group psychotherapy, family therapy, and encounter groups) are briefly outlined. Findings support the idea of social crisis as a precipitant of mental illness and the value of intervention which takes full account of social relationships.—*L. Gorsey*.

10365. Orvin, George H. (Medical U South Carolina) **Intensive treatment of the adolescent and his family.** *Archives of General Psychiatry*, 1974(Dec), Vol 31(6), 801-806.—Describes a specialized inpatient program developed for the study, teaching, and treatment of psychiatric disorders in the adolescent. It presents a conceptual framework of function and impairment by which the adolescent is evaluated and from which his treatment goals are evolved. The philosophy of admission stresses early and clearly defined requirements for patient, family, and staff. Parents and family participate in the treatment program at several different levels, including individual psychotherapy, couples therapy, family therapy, and family group therapy. A self-discharge plan emphasizes the adolescent's participation in the decision. (20 ref)—*Journal abstract*.

10366. Patil, C. B. **Correctional strategy of social defence.** *Social Defence*, 1972(Oct), Vol 8(30), 5-13.—Suggests the remodeling of the staffing of correctional institutions in India. Tasks performed should be re-examined, qualifications should be assessed, and the integration of services should be carried out.

10367. Perrucci, Robert. (Purdue U) **Circle of madness: On being insane and institutionalized in America.** Englewood Cliffs, NJ: Prentice-Hall, 1974. xiv, 176 p. \$7.95(cloth), \$2.95(paper).—Based on the author's fieldwork in a mental hospital for 1 yr, the processes of becoming mentally ill, being mentally ill, and becoming normal again and their relation to communal definitions and relationships are discussed. The idea of the mental hospital as a closed, caste-like society is examined, and it is argued that mental patients are victims rather than disease carriers who are bound to their caretakers by a shared stigma.

10368. Plutchik, Robert et al. (Albert Einstein Coll of Medicine, Program Development & Clinical Research, Yeshiva U) **Effects of transfer of chronic patients to a short-stay hospital.** *Psychiatric Quarterly*, 1974, Vol 48(2), 256-265.—Compared 143 chronic patients transferred from a suburban state hospital to an urban short-term state hospital with (a) patients similar in age, diagnosis, and sex who were admitted directly to the urban hospital; and (b) patients similar in age, diagnosis, and sex who were not transferred from the suburban hospital. Results show that the transferred patients were rated as more severely ill than patients in the other 2 groups and a greater percent exhibited symptoms such as

social withdrawal and isolation. 14 mo after the transfer, 72% of the directly-admitted patients had been discharged, 35% of the transferrees had been discharged, 5% of the nontransferred patients had been discharged, and 23% of the directly-admitted discharges had been readmitted.—*Journal abstract.*

10369. **Ralph, Donald E.; Hirschowitz, Ralph G. & Schrader, Jerry.** (Kentucky Bureau for Health Services, Northeastern Region, Lexington) **Breaking the logjam: A program of issue-focused intervention in a state hospital system.** *Psychiatric Quarterly*, 1974, Vol 48(2), 169-183.—Describes an intervention program which was designed for staff in hospital care services who saw a need for improved services for patients. The program improved communication throughout the system and helped increase awareness of possible community liaisons, but did not substantially change the administrative apparatus.

10370. **Reich, Louis H. & Weiss, Brian L.** (US Air Force Medical Ctr, Keesler Air Force Base, Biloxi, MS) **The clinical research ward as a therapeutic community: Incompatibilities.** *American Journal of Psychiatry*, 1975(Jan), Vol 132(1), 48-51.—Using information gathered in a 26-bed clinical psychiatric ward, the numerous incompatibilities between the ward, with its emphasis on the collection of baseline and treatment data, and the therapeutic milieu environment, with its emphasis on an open door, team orientation, and nonauthoritarianism are discussed. It is posited that the 2 orientations may be mutually destructive and that the therapeutic milieu may not be the best treatment setting for patients with schizophrenic or certain affective disorders. 2 case histories illustrating these ideas are included. (26 ref) —*Journal abstract.*

10371. **Scheerenberger, R. C.** (Central Wisconsin Colony & Training School, Madison) **A model for deinstitutionalization.** *Mental Retardation*, 1974(Dec), Vol 12(6), 3-7.—Discusses 5 aspects of a viable deinstitutionalization program for the retarded—local boards, a standard-setting and monitoring agent, back-up services and support, adequate financial resources, and a legal advocacy system.

10372. **Sturm, Richard J.** (VA Hosp, Roseburg, OR) **Patient attitudes toward admission.** *Newsletter for Research in Mental Health & Behavioral Sciences*, 1974(May), Vol 16(2), 3-5.—Received from 27 patients a completed questionnaire indicating what attitudes and behavior by the hospital staff were most important to patients during admission procedures. Friendly and courteous treatment headed the 15-item list. Patients also want someone to take charge and get things done, and they want simple, direct answers to questions.

10373. **Szasz, Thomas S.** (State U New York Hosp, Upstate Medical Ctr, Syracuse) **Psychiatry: A clear and present danger.** *MH*, 1974(Spring), Vol 58(2), 17-20.—Proposes that involuntary psychiatric hospitalization and treatment in the name of mental illness is an affront to the concept of civil liberty and due process. It is suggested that the public's awareness of the results of various questionnaires completed by a sampling of psychiatrists about their views in selected areas will be a factor in weakening support for an untenable position.

10374. **Talbot, John A.** (Dunlap-Manhattan Psychiatric Ctr, NY) **A study of readmissions to a state hospital.** *Psychiatric Quarterly*, 1974, Vol 48(2), 159-168.—Studied 100 consecutive readmissions to a state psychiatric hospital. It was judged that 84 might have been prevented, and that almost half of these might have been prevented with minor improvements of existing services necessitating no additional expenditure of money. 5 brief case studies are included to illustrate the various types of preventable and nonpreventable readmissions.—*Journal abstract.*

10375. **Upadhyay, R. K.** (Hosp for Mental Diseases, Post-Graduate Training Ctr, Ranchi, India) **A study of the attitude of newly hospitalised mental patients towards their hospitalisation and homes.** *Indian Journal of Psychiatric Social Work*, 1972(Jul), Vol 1(1), 21-28.—Studied the attitudes of 100 male patients recently admitted to a mental hospital. Findings indicate that social stigma was the major reason for resistance to hospitalization and that those who were voluntarily admitted responded better to treatment than those who came unwillingly.

10376. **White, W. C.; McAdoo, Wm. George & Phillips, Leslie.** (Cornell U) **Social competence and outcome of hospitalization: A preliminary report.** *Journal of Health & Social Behavior*, 1974(Sep), Vol 15(3), 261-266.—To evaluate the impact of hospitalization on the posthospital social adjustment of state hospital patients, the Worcester Scale of Social Competence was administered to 159 psychiatric patients subsequent to hospitalization and 1 yr following discharge. Analysis of pre- to posthospitalization change scores revealed significant sex differences, particularly with regard to role orientation and adequacy with which leisure time was utilized. (22 ref)

## EDUCATIONAL PSYCHOLOGY

10377. **Bernauer, Margaret & Jackson, John H.** (Milwaukee Public Schools, WI) **Review of school psychology for 1973.** *Professional Psychology*, 1974(May), Vol 5(2), 155-165.—Evaluates the profession of school psychology in terms of its actual and potential contributions to ongoing educational innovation. Some of the more important trends in the development of education which relate to school psychology, such as the individualization of instruction and the incorporation of affective goals and techniques into curricula, are specified. The major areas of diagnosis, intervention, and consultation in the clinical practice of school psychology are considered with regard to their current status and to the problems and issues that must be resolved in order for school psychology to make the contribution to education of which it is capable. Other aspects of school psychology practice given similar consideration include the administration and supervision of psychological services and professional training and staffing. (18 ref) —*B. Lindsey.*

10378. **Furneaux, Desmond; Bynner, John & Murphy, John.** **Data analysis: Methods of educational enquiry.** Block 4. Bletchley, England: Open University Press, 1973. 159 p.—Examines methods for describing, tabulat-



ing, summarizing, and transforming a sample of data collected for a single variable; methods for interpreting the relationship between variables, and the process of generalizing sample findings to the population from which the sample comes. A detailed analysis of published research is also included.

10379. Olson, David R. (Ed.). **Media and symbols: The forms of expression, communication, and education: The seventy-third yearbook of the National Society for the Study of Education: I.** Chicago, IL: National Society for the Study of Education, 1974. xvii, 508 p. \$10.—Presents a collection of 18 discussion and review papers on the nature and educational consequences of communication and its various technologies. Papers are divided into 4 sections to analyze symbol systems as forms of expression and communication and their educational implications; the educational potential of various media (e.g., print, films, and computers) and the interaction between the medium, message, task, and learner; and the major problems facing educational institutions in teaching a society greatly affected by communication technology.

10380. Smith, M. Daniel. (U New Hampshire) **A mathematical model of instructional processes.** *Instructional Science*, 1975(Jan), Vol 3(4), 375-382.—Presents some basic postulates and theorems of a theory of instruction as a mathematical model. The postulates are interpretations of principles of learning, and thus descriptive, while the theorems present processes for bringing about changes in learners, and are prescriptive. Instructional operators are derived from the theorems and used along with additional postulates to build further theorems. Assumptions implicit in early postulates are formalized in later developments in order to begin to deal with the cognitive domain.—*Journal abstract.*

#### School Administration & Educational Processes

10381. American Academy of Arts & Sciences. (Boston, MA) **American higher education: Toward an uncertain future.** *Daedalus*, 1974(Fal), Vol 103(4), 345 p.—Presents an issue describing American higher education, its current tensions and its possible future. The special problems of blacks and of women are discussed, and the belief systems associated with different types of higher education are explored in depth.

10382. Bailey, Gerald D. (Kansas State U) **Verbal behavior models: Identifying change and direction of teacher interaction pattern styles.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 18-24.—Investigated whether or not the verbal interaction patterns between the teacher and pupils were modified after 2 yrs of independent teaching. 2 hypotheses were tested: (a) Teachers who exhibited high correspondence with the Inquiry Verbal Behavior Model (IVBM) during their student teaching would not alter their interaction styles significantly when they taught independently. (b) Teachers exhibiting low correspondence with the IVBM as students would not alter their interaction styles when they taught independently. The classroom verbal behavior patterns of the teachers were recorded by means of the Interaction Analysis System devised by N. A. Flanders (1960). Of the 5 teachers operating under the

1st hypothesis, only one shifted to low correspondence with the model. Of the 4 teachers operating under the 2nd hypothesis, 3 shifted to high correspondence with the model and one remained at low correspondence. The 1st hypothesis was thus confirmed and the 2nd was rejected.—A. J. Ter Keurst.

10383. Ballesteros, David. (California State U, Sacramento) **Community-based education: A program to improve home school communication.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 281-288.—Discusses goals, management, training, and programs necessary to effectively develop a community-based education system. The importance of school personnel participation in home-school communication is emphasized, and examples of ways to increase community-school-home awareness and interaction are presented.

10384. Bloom, Benjamin S. (U Chicago) **Implications of the IEA studies for curriculum and instruction.** *School Review*, 1974(May), Vol 82(3), 413-435.—Describes the International Association for the Evaluation of Education Achievement (IEA), an organization of 22 national research centers engaged in the study of education. They have published studies dealing with mathematics achievement, science, reading comprehension, and literature. Future studies will deal with achievement in French as a foreign language, English as a foreign language, and civic education. Implications for curriculum and instruction from the major results of the IEA surveys are discussed in overall terms and in terms of the special needs and problems of individual countries. (16 ref)—C. K. Miller.

10385. Blumberg, Allen. (West Virginia Coll of Graduate Studies, Institute) **Training special education teachers to use new methods.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 78-82.—Trained special education teachers to use new methods and pass on their knowledge to other teachers working with the mentally retarded. 15 special education master teachers were trained in 3 new methods: operant conditioning, psycholinguistics, and programmed learning material. They, in turn, trained 47 special education teachers the theoretical understanding and the functional use of these methods. Results show that teachers in special education were (a) interested in learning new methods as long as these techniques were relevant to the classroom, (b) capable of assuming leadership roles for training other special education teachers, and (c) creative in developing innovative ideas for implementing new methods. It is concluded that, although new methods have been presented in conventional reading research studies and demonstrations, it cannot be assumed that special education teachers are adequately trained to use the methods. A higher priority is recommended for the reorganization of methods courses in teacher education programs.—P. O'Brien.

10386. Boydell, Deanne. (U Leicester, School of Education, England) **Teacher-pupil contact in junior classrooms.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 313-318.—Examined the nature of teacher contact with children in 6 informal junior school classrooms, using a specially designed observation instrument which focused on 3 methods of addressing children (as a class, in a small group, and privately) and

on 19 types of teacher conversation. Private, work-oriented contact predominated, but this was mainly task supervision with relatively little on the substantive content of children's activities. Most substantive contact was low-level and factual.—*Journal abstract.*

10387. Brown, David J.; Reschly, Daniel & Wasserman, Howard. (U Arizona) **Effects of surreptitious modeling upon teacher classroom behaviors.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 366-369.—Describes how 2 children were taught to change the classroom behavior of their teacher. Support for the new behavior was obtained from an "observer" whose purported role was to assess the degree of disruptive behavior in the classroom.

10388. Bullock, Lyndal M.; Dykes, M. Kay & Kelly, Thomas J. (U Florida, Program in Emotionally Disturbed & Socially Maladjusted) **Competency based teacher preparation in behavioral disorders.** *Exceptional Children*, 1974(Nov), Vol 41(3), 192-194.—Describes a conceptual model that includes various aspects of a training program for teachers of behaviorally disordered children. The model reflects levels of training that would be provided in the program, types of facilities available for field experiences, consumer needs, and a philosophical base.

10389. Cooper, E. S. & Ingleby, J. D. (MRC Unit on Environmental Factors in Mental & Physical Illness, London, England) **Direct observation in the infant-school classroom.** *Journal of Child Psychology & Psychiatry & Allied Disciplines*, 1974(Oct), Vol 15(4), 263-274.—Describes a method for measuring certain aspects of classroom behavior using video recording equipment. The measure was designed to investigate the behavioral correlates of teachers' overall ratings on 1st-yr school-children, and differences between types of school. The methodological problems of filming and coding are discussed in detail, and results from a small sample ( $N = 14$ ) are presented which show that the measures developed are reliable and sufficiently sensitive to reveal significant correlates of teachers' ratings and school types.—*Journal summary.*

10390. Drabman, Ronald S. & Lahey, Benjamin B. (Florida Technological U) **Feedback in classroom behavior modification: Effects on the target and her classmates.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 591-598.—A behavior modification program that employed feedback with no additional contingencies was initiated and withdrawn in an ABAB design on a 10-yr-old target child within a classroom. The disruptive behavior of the target child as well as that of her peers was monitored. Additionally, the sociometric status of the target child was recorded. Finally, the positive and negative comments made to the target by her teacher and her peers were related to initiation and withdrawal of the feedback contingency. Results indicate that (a) feedback alone may be an effective behavior modification procedure; (b) the disruptive behavior of the target's classmates changed, even though they were not directly treated; (c) sociometric status of the target was altered by behavioral contingencies; (d) positive comments by classmates to the target increased; and (e) negative comments from the teacher to the target child decreased.—*Journal abstract.*

10391. Fairchild, Thomas N. (Cedar Rapids Community Schools, IA) **An analysis of the services performed by a school psychologist in an urban area: Implications for training programs.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 275-281.—Describes how a school psychologist in a large urban area spends his working day. A log of daily services performed indicates that approximately 40% of his time is spent on assessment, 25% on intervention, 12% on evaluation, and 24% on administrative matters. It is suggested that the training program for school psychologists should reflect these percentages.—*H. Kaczowski.*

10392. Frew, David R. (Gannon Coll) **The effectiveness of the academic president as a leader.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 3-6.—Surveyed 20 Ohio colleges by questionnaires sent to randomly-selected Ss from the categories of faculty, trustees, academic administrators directly related to the teaching-research function, and general administrators. 460 usable responses were received. The questionnaire requested rating of the college president on a Likert scale ranging from 1 for "very ineffective" to 5 for "highly effective." The average of the reported ratings was 3.79. The highest ratings received by the presidents came from general administrators, the next highest from the trustees, followed by those from the faculty and the academic administrators. The faculty rating of 3.74 differed significantly ( $p < .05$ ) from the ratings of 3.99 by the general administrators. The problem of a college president is to balance the time and effort spent in seeking support for the college against that spent in administering its academic affairs.—*A. J. Ter Keurst.*

10393. Giffard, Jacques. **[Practical classes or how to solve a key problem.]** (Fren) *Orientation Scolaire et Professionnelle*, 1974(Apr-Jun), Vol 3(2), 135-154.—Presents a critical review of the reform measures adopted in the French public school system, specifically the reorganization of the "practical classes" that emphasize training of applied skills. The poor results of this major effort to solve the problem of a general education for the moderately gifted are analyzed.—*M. G. Strobel.*

10394. Hall, Keith A. (Pennsylvania State U) **Inservice mathematics education for elementary school teachers via computer assisted instruction.** *Educational Technology*, 1974(Apr), Vol 14(4), 59-61.—Describes a project to test a teacher training program using computer assisted instruction. The program uses a mobile laboratory to provide inservice education to teachers in Appalachia. Of 444 students who started the course, 387 completed it, and their mean performance on an achievement test increased from 53% pretest to 73% posttest.—*C. B. Kreitzberg.*

10395. Herbert, G. W. (U Newcastle-upon-Tyne, England) **Teachers' ratings of classroom behaviour: Factorial structure.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 233-240.—Proposes that a 5-factor structure in ratings by teachers is useful and theoretically justifiable, comprising stable and unstable aspects of extraversion-introversion, and a dimension of Competence or the Good Pupil. The construction of a scale to test this structure is described. The scale was administered to 141 10-11 yr old males. The resultant factor analysis supports the 5-factor structure at the 1st-



order level; at the 2nd-order level there is a parallel with broad dimensions identified by other workers. (25 ref)  
—*Journal abstract.*

10396. Jackson, Gregg & Cosca, Cecilia. (US Commission on Civil Rights, Washington, DC) **The inequality of educational opportunity in the Southwest: An observational study of ethnically mixed classrooms.** *American Educational Research Journal*, 1974(Sum), Vol 11(3), 219-229.—Assessed teacher behavior as a factor in the quality of educational opportunity afforded students of different ethnic groups. Os visited 494 classrooms, using a modified Flanders interaction coding system to code teacher verbal behaviors with reference to the ethnicity of the student to whom each behavior was directed. Results indicate a number of statistically significant, substantial, and pedagogically important disparities in teacher behavior toward Mexican-American and Anglo-American students. 22 teacher, student, classroom, and school characteristics were also investigated for their possible association with these disparities; a few significant relationships were found.—*Journal abstract.*

10397. Kessler, Christine; Korn, Hildegard; Precht, Ursula & Vogel, Angelika. (U Munich, Inst of Psychology, W Germany) [Teachers' attitudes toward school psychologists.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 103-112.—Obtained the opinions of a representative sample of 100 teachers in Munich schools of 4 different levels regarding 40 statements about school psychologists. Factor analysis identified 7 factors which accounted for 51.3% of the variance. 91% of the respondents stated that they would actively promote the creation of positions for school psychologists, 69% without any reservations. 81% wanted such a psychologist to have teacher training also, and 79% thought that he should teach besides having other duties. Extensive psychological knowledge was valued by practically all the teachers questioned. (English summary)—*W. O. Horn.*

10398. Legrand, Louis. [School attendance of the 11-16 age group: Essay concerning general problems.] (Fren) *Orientation Scolaire et Professionnelle*, 1974(Apr-Jun), Vol 3(2), 87-104.—Evaluates the organization and rationale of the French secondary school system in the light of the aspirations and goals of present French society. The discussion endeavors to define basic problems of any educational system and stresses psychological factors to be taken into consideration when implementing structural changes.

10399. Leviton, Harvey. (Edina Public Schools, MN) **Promoting professional growth for the school psychologist.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 260-262.—Lists 33 behavioral objectives that could be used to guide the professional development of school psychologists. They are related to the areas of instruction, assessment, community relations, and professional growth.

10400. Lewis, Carol R. (Rahway Junior High School, NJ) **School psychologist as program consultant.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 294-295.—Describes the role of psychological services in a junior high school, the type of help they provided, and specific outcomes obtained through these services.

10401. Lintner, Alfred C. & DuCette, Joseph. (Stratford Public Schools, NJ) **The effects of locus of control, academic failure and task dimensions on a student's responsiveness to praise.** *American Educational Research Journal*, 1974(Sum), Vol 11(3), 231-239.—Investigated the responsiveness to praise of 285 elementary school pupils as a function of task variables and S characteristics. The individual difference variables of locus of control and previous school-related failure were utilized. Analyses of the effects of praise differed considerably between an ambiguous coding and an academic reading task. Male Ss with an external locus of control orientation were responsive to praise on the coding task. Female Ss were generally not responsive, regardless of individual characteristics. Reading test residual gains, however, were affected by prior experiences of failure and praise. Results are interpreted as demonstrating the importance of integrating task variables into aptitude-treatment interaction research.—*Journal abstract.*

10402. Masendorf, Friedrich; Tücke, Manfred & Bartram, Mathias. [Accuracy of teachers' estimates of their teaching as judged by their students.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 89-93.—25 statements indicating strictness and authoritarianism and 23 items measuring a democratic, helping attitude on the part of their teachers were answered anonymously by 15 elementary school classes, 15 classes for special students, and 10 junior high school classes in Grades 7-9. The 40 teachers of these classes had to estimate their students' answers on each item. Teacher and student scores on strictness correlated .63, on helping only .41. The need to increase feedback and to evaluate the effectiveness of a democratic teaching style is discussed. (English summary)—*W. O. Horn.*

10403. McNamara, J. Regis & Diehl, Luther A. (Ohio U) **Behavioral consultation with a Head Start program.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 352-357.—The effects of a behaviorally oriented psychological consultation program for teachers were evaluated by 3 methods in a system of 10 Head Start centers. Each center had 20 children; teachers were 10 white females with an average age of 40.5 and an average IQ of 108. The centers were divided into 3 groupings, each having the same program but different conditions for goal setting, type of feedback received, and degree of structure for carrying out program assignments. Program effectiveness was analyzed on the basis of recording performance, final workshop examination scores, and teacher ratings of the program. Results show that the type of feedback received and the way program assignments were structured differentially affected program performance. (19 ref)—*Journal summary.*

10404. Merwin, William C. (U North Florida) **A systems approach for teacher training.** *Educational Technology*, 1974(Apr), Vol 14(4), 57-59.—Describes the philosophy underlying the development of a series of self-instructional modules for the competency-based education of social studies teachers.

10405. Miller, P. McC. & Dale, R. R. (MRC Epidemiology Unit, Royal Edinburgh Hosp, Scotland) **A comparison of the degree results of university students from co-educational and single-sex schools.** *British*

*Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 307-308.—Compared the university degree results from 221 matched pairs of students from co-educational and single-sex schools. Results were similar except that more 1st-yr dropouts occurred among the single-sex educated students.

10406. Ozer, Mark N. & Dworkin, Nancy E. (George Washington U, Medical School, Program for Learning Studies) **The assessment of children with learning problems: An in-service teacher training program.** *Journal of Learning Disabilities*, 1974(Nov), Vol 7(9), 539-544.—Describes a model clinical program designed to help children with learning problems remain in the regular classroom and to enhance the competence of the teacher to deal with the variety of needs within the classroom. In a demonstration, the teacher observes those children whom she has first identified as having difficulties and then described on a teacher report form (TRF). The examiner utilizes specific strategies in interaction with the child to solve the child's problem in accomplishing a given task. The teacher sees how the child may be assisted in learning how to cope with difficulties. She may recognize the strategies demonstrated as being within her own repertoire and as those she was exposed to in the TRF. The consultant aids the teacher in applying the strategies in the context of what she would like to see the child accomplish, thereby making the teacher more aware of her own competence in helping the child. The consultant also helps the teacher to generalize the strategies she uses with a specific child to her interactions with other children within the classroom. The clinical program thus works as an in-service teacher training program, with communication of a limited but expanding number of problem-solving strategies that may be applied to a multitude of educational tasks.—*Journal abstract.*

10407. Pascarella, Ernest T. (Syracuse U) **Student-institutional congruence: A student perspective.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 78-87.—Compared the views of A. W. Astin and G. G. Stern regarding institutional pressures vs student characteristics. Astin held that student characteristics create the climate of a college, while Stern said that students account for about 35% of the college environment. 145 freshman and 121 senior students responded to 26 bipolar adjective pairs. Varimax rotation identified 4 factors: Intellectual-Creative Dynamism, Impulsive Idealism, Competition, and Openness. Significant concept effects were found in the freshmen analyses on dynamism and idealism, and in the seniors on all factors. The students perceived substantial dissonance between the characteristics of their peers and of institutional environment. On dynamism for the seniors and freshmen and on competition for the seniors, student perceptions of the college environment were more closely related to faculty attitudes toward them than to peer attitudes. Findings largely support Stern's viewpoint. (23 ref)—A. J. Ter Keurst.

10408. Rosenfeld, Joseph G. & Blanco, Ralph F. (Temple U) **Incompetence in school psychology: The case of "Dr. Gestalt."** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 263-269.—Presents the case study of an incompetent school psychologist, and demonstrates

how the areas of incompetency can be identified and what can be done to have the psychologist dismissed.

10409. Shane, Don G. & Van Osdel, William R. (Central State U, Edmond, OK) **Practicum: As a part of special education training programs.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 74-77.—Discusses the purposes and implications of college student practicum experiences. The inclusion of practicum experience as an integral part of special education training programs is seen as essential, the most effective means available to provide a practical orientation in teacher training. A major advantage of practicum is seen in the flexibility it offers by assigning students to different types of exceptional children. Students, in this way, can have meaningful experiences in gaining firsthand knowledge of the wide variances in personality and learning characteristics of exceptional children. The program requirements and services provided by a state university training program in special education are outlined. It is concluded that, as knowledge of practicum increases, and as more community services are initiated, training programs will continue to improve.—P. O'Brien.

10410. Swassing, R. H. (Ohio State U, Faculty for Exceptional Children) **Parameters of classroom environment for beginning teachers.** *Education & Training of the Mentally Retarded*, 1974 (Apr), Vol 9(2), 89-93. Alerts the beginning teacher to the various parameters that can be controlled to establish the best environment for both children and teacher. 6 parameters are explored: physical properties, student placement, task presentation, time, performance rates, and motivational system. It is suggested that the environment must be a dynamic, changing setting, and that in a classroom where the teacher can quickly ascertain the impact of an environmental change upon performance, success rates of the children will reach criterion.—P. O'Brien.

10411. Thomson, Carolyn; Holmberg, Margaret & Baer, Donald M. (U Kansas) **A brief report on a comparison of time-sampling procedures.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 623-626.—Used the teacher training model to quantitatively compare the accuracy of continuous and intermittent time-sampling procedures. Contiguous, alternating, and sequential methods for assigning a limited number of Os to a larger number of teachers and/or children were tested. Repeated daily observations were made of 2 different behaviors (rate of reinforcing S's social interactions with peers and rate of priming social interaction with peers—prompting the child to play with other children) of 3 different teachers. Each teacher was observed for at least 64 min, using the standard 10-sec ongoing time-sampling technique. The sequential method (i.e., that which assumes that the most widely dispersed pattern of sampling would be most representative and would systematically use each time segment to sample whichever S had been sampled longest ago) was associated with the smallest percentage of error, apparently because it was the most widely dispersed sample of the entire observation period. The contiguous (i.e., sampling during the longest possible unbroken time period) and the alternating (i.e., sampling intermittently for half the time available) showed similar amounts of error.—L. Gorsey.



10412. Tomlinson, Jerry R. (Minneapolis Board of Education, Psychological Services, MN) **Functional analysis and accountability of psychological services.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 291-294. —Describes how functional analysis was used to evaluate the psychological services program of a large metropolitan school system. 44% of the services were performed in the kindergarten through the 3rd grade, and individual evaluation was the most frequently performed service. The psychologist met with teachers in 75% of the cases. One-third of the referrals were of children previously seen for psychological services.—H. Kaczowski.

10413. Twardosz, Sandra; Cataldo, Michael F. & Risley, Todd R. (U Kansas) **Open environment design for infant and toddler day care.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 529-546.—In a series of 6 studies in an infant and a toddler day-care center, an open environment was examined as a means to increase the visibility of children to staff and of staff-child interactions to the supervisor, and to investigate potential adverse effects of the open environment on infants' and toddlers' activities. Results show that (a) an open environment markedly decreased the amount of time a child could not be seen by any adult and the amount of time staff members' activities were not visible to the supervisor, and markedly reduced the effort required to supervise those who were not immediately visible; (b) an open environment did not adversely affect the sleep of either infants or toddlers; and (c) an open environment was as conducive to small group preacademic activities with toddlers as was a separate room. It is concluded that infant and toddler day care can and should be accomplished in an open environment. (16 ref) —*Journal abstract.*

10414. von Engelhardt, Georg & Lück, Helmut E. (Rhineland Coll of Education, Div of Special Education, Cologne, W Germany) **[Teacher's job satisfaction in schools of different levels.]** (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 113-117.—A 36-item job satisfaction scale and 20 items to measure the perceived leadership style of their principals were answered by 155 teachers in 21 Cologne schools. 79% thought their work interesting and satisfying, but 56% thought their classes were too large, 35% were dissatisfied with discipline, and 34% complained about too many administrative tasks. The 88 females did not differ in overall job satisfaction from their male colleagues. Those descended from or married to teachers were more often satisfied. High school teachers (Gymnasium) were significantly less satisfied than those from elementary schools. Satisfaction decreased as the size of school and size of class increased, and as principals were less considerate of teaching staff. (English summary) (15 ref) —W. O. Horn.

10415. Wetterström, Magnhild. **[Student influence in some organizationally different environments in grades 7-8 in the comprehensive school.]** (Swed) *Pedagogisk-Psychologiska Problem*, 1974(Oct), No 250, 55 p.—Examined the influence exerted by 7th and 8th graders in 3 different environments (from traditionally built schools to open-plan schools, with increasing degrees of flexibility in organization). Questionnaires were administered to

students and their teachers over a 2-yr period. Results show no systematic differences between the schools, despite different means of organization and working methods used by the teachers. (18 ref)—*English abstract.*

### Curriculum Development & Teaching Methods

10416. Arnaud, Elie E. (Character Education Project, San Antonio, TX) **Can the schools affect character education?** *Texas Personnel & Guidance Association Journal*, 1973(Mar), Vol 2(1), 39-42.—Summarizes the Character Education Project (CEP) of San Antonio, Texas. The full-year programs for kindergarten through 6th grade have been tested in Indiana, Minnesota, California, Texas, and Colombia, South America. They are intended for counselors, teachers, and parents. Children are taught a technique of thinking which leads to behavior consonant with American values and the pursuit of the good life. All preliminary evidence as to the effectiveness of CEP is favorable.—H. Crouch.

10417. Betson, C. Daniel. (Kansas U) **Creative religious growth and pre-formal religious education.** *Religious Education*, 1974(May), Vol 69(3), 302-315.—Discusses theories of religious development and their application to early religious education. 4 aspects seem important: (a) that the child learn, through participation in activities of the community of faith, that he is a loved and accepted member; (b) that he be encouraged to interpret significant experiences in his life through symbolic thought and expression; (c) that he be helped to deal with conflicts arising from his interactions with others; and (d) that this education take place in a responsive environment. The religious educator's task in working with children before preadolescence is to foster their growth in these ways, rather than to pass on a particular religious tradition.—E. A. Gavin.

10418. Brown, David; Reschly, Daniel & Sabers, Darrell. (U Arizona) **Using group contingencies with punishment and positive reinforcement to modify aggressive behaviors in a Head Start classroom.** *Psychological Record*, 1974(Fal), Vol 24(4), 491-496.—Attempted to modify and decrease aggressive behaviors exhibited in a Head Start classroom. Ss were 20 4-yr-old children. Treatment procedures designed to reduce classroom acts of aggression permitted analysis of whether group contingencies enhanced the effects of extrinsic reinforcement and punishment. Findings show that (a) the modification procedures used led to a significant decline in the incidence of aggressive behaviors, and (b) grouping children who are striving for rewards contingent upon prosocial behavior was a useful addition to other behavior modification techniques. (15 ref)—*Journal abstract.*

10419. Carlson, John G. & Minke, Karl A. (U Hawaii) **The effects of student tutors on learning by unit mastery instructional methods.** *Psychological Record*, 1974(Fal), Vol 24(4), 533-543.—In a section of an introductory psychology course employing unit-mastery learning procedures, small groups of students were assigned to individual tutors for testing and tutoring. In 2 other sections unassigned groups of tutors were made available to students. A total of 143 undergraduates served as Ss. Relative to the latter sections, the individually tutored students performed at a higher level

on the unit quizzes, earned higher course grades, and expressed more favorable attitudes toward their tutors. Results are interpreted in terms of interactions between the reinforcing value of the tutors and the types of student-tutor relationships which evolved in the testing situation.—*Journal abstract.*

10420. Cheong, George S. (Mt Saint Vincent U, Halifax, Nova Scotia, Canada) **Changes in student teachers' beliefs and classroom behavior.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 30-35.—Measured changes in the beliefs of student teachers about experimentalism and in the patterns of their teaching behavior, using the Experimentalism Scale (ES) and the Teacher Practices Observation Record (TPOR), both developed by B. B. Brown (1968). The 1st hypothesis was that students are more experimental in their attitudes, beliefs, and values at the end of 1 yr of teacher education than at the beginning. The 2nd hypothesis predicted the same change in classroom teaching practices during the year's program. Most of the 23 undergraduate Ss were majors in the liberal arts. Changes in pre- and posttest performance were significantly in favor of experimentalism both on the ES, representing attitudes ( $p < .01$ ) and on the TPOR, representing teaching practices ( $p < .05$ ). (18 ref)—A. J. Ter Keurst.

10421. Connes, Bernard. (U Sherbrooke, Quebec, Canada) **Course-component evaluation: II. A dynamic computer system for item banking.** *Journal of Structural Learning*, 1973, Vol 4(1), 33-40.—Describes a system of computerized data storage of information gathered during evaluation of components of educational courses. Identified items are filed, and results of testing are coded using a mathematical model. The system of programs includes provisions for updating and use of a flexible language that facilitates keypunching.

10422. Dearth, Paul B. (U New Mexico) **Viable sex education in the schools: Expectations of students, parents, and experts.** *Journal of School Health*, 1974(Apr), Vol 44(4), 190-193.—153 college students, 77 of their parents, and 68 experts responded to a mailed questionnaire concerning their expectations of a sex education program in the schools. Results indicate strong agreement on the issue of providing sex education in the schools: students and experts were unanimously in favor, while only 5% of the parents were opposed. Students favored the separate course approach (63%) with parents concurring (55%) and experts not far behind (40%). There was mixed support among the groups concerning the marital status of the sex education teacher and of the professional affiliation of this teacher: doctor or nurse. In general, where disagreement occurred among the 3 groups, the parent group was usually in opposition to the other 2. It is suggested that these results can be helpful in implementing quality sex education courses.—R. S. Albin.

10423. Deltz, Samuel M. & Repp, Alan C. (Georgia State U) **Differentially reinforcing low rates of misbehavior with normal elementary school children.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 622.—Used a modified differential reinforcement of low rates (DRL) procedure with 3 students in normal classrooms to eliminate talking out and out-of-seat behaviors. Data add single-S replication with normal

children to the literature on the effectiveness of modified DRL techniques.

10424. Egeland, Byron & Winer, Ken. (U Minnesota, School Psychology Training Program) **Teaching children to discriminate letters of the alphabet through errorless discrimination training.** *Journal of Reading Behavior*, 1974(Jul), Vol 6(2), 143-150.—64 inner-city preschool children were taught to discriminate letters of the alphabet using either an errorless discrimination training (EDT) approach or the traditional reinforcement-extinction approach. For the EDT group the distinctive feature of the letter to be discriminated was highlighted in red and as the training proceeded the red was gradually faded. Each group received 10 training trials for each of 2 letter combinations presented in a match-to-sample format. Results show that the EDT group made significantly fewer errors during training and on the posttest than the reinforcement-extinction group.—*Journal abstract.*

10425. Faraponova, E. A. & Kotovskii, A. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[The possibility of introducing elements of problem-solving in elementary school model-construction classes.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 105-116.—Reports classroom teaching of general principles of technical problem-solving using the method of model building. Tests of transfer from models of machinery to related problems (spacecraft design) showed more adequate solutions in experimental than in control students. (English summary)

10426. Flammer, August. (U Wisconsin, Madison) **[Individualized instruction in project PLAN.]** (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 136-141.—Explains project PLAN (Program for Learning in Accordance with Needs) which utilizes computer terminals in different schools to individualize sequences of learning according to abilities and different needs. In 1971 the project involved 15,000 students in California, Pennsylvania, and New York. (English summary)

10427. Gardner, David C. (Boston U) **Halo effects in employer ratings of career education students and coordinators.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 363-366.—Discusses problems in evaluating the effectiveness of work and work-related programs used in career education, showing how the "halo effect" determines if a program is termed successful or unsuccessful.

10428. Gordon, Sol. (Syracuse U) **What place does sex education have in the schools?** *Journal of School Health*, 1974(Apr), Vol 44(4), 186-189.—Discusses the alternatives schools have in helping children to become more knowledgeable about their own sexuality. It is asserted that psychological counseling is not the domain of the educational system and that this must be provided by parents. Another limitation of the schools' role in this learning is the student's general mistrust and suspicion of the system. Individual differences in the need for sex education exist among schools and should be assessed within each system. It is suggested that the greatest potential for sex education lies in psychology and in human relations courses. In this sense, a consideration of the issue of what is normal would teach students about the great range of human behavior that is healthy. Topics



considered to be important in any sex education course include information about masturbation, penis size, perversions, homosexual thoughts and experiences, and emotional commitment and sex. Parenting is a topic rarely discussed but of great importance to a healthy conception of sex. Suggestions are made for implementing such a program. (35 ref)—*R. S. Albin.*

10429. **Graubard, Paul & Rosenberg, Harry.** (Yeshiva U) **Classrooms that work: Prescriptions for change.** New York, NY: E. P. Dutton, 1974. x, 214 p. \$7.95.

—Argues for the use of behavior modification techniques as teaching tools to be used by and for entire student populations, both "deviant" and normal. Various successful programs based on these principles, including student team teaching, peer tutoring, cross-age tutoring, individualized learning, contracts, and token economy systems, are surveyed, and specific case illustrations are presented. (4 p ref)

10430. **Hahn, Joyce & Dunston, Virginia.** (La Escuela Cuauhtemoc, Redwood City, CA) **Bilingualism and individualized parent education: An organic approach to early childhood education.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 253-260.—Describes an education program designed to use as many aspects of the child's world as possible and which includes both bilingualism and individualized parent education in its preschool program. Results show significant gains from pre- to posttest administrations of the Caldwell Preschool Inventory. The children of parents who participated most achieved higher scores at the end of the year.

10431. **Harris, Mary B. & Liguori, Ralph A.** (U New Mexico) **Some effects of a personalized system of instruction in teaching college mathematics.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 62-66.—Investigated the effect of using a Personalized System of Instruction (PSI) approach to teach college mathematics; the role of a final examination, and the use of students as tutors in such procedures. 80 undergraduates were assigned to a mastery approach which used students as proctors, to a mastery approach without students as proctors, or to a lecture control group. Within each group Ss were randomly assigned to have their final examination score count or not count towards their grade in the course. Scores on the final were not significantly different for those in the 3 treatment groups. Ss for whom the final counted had significantly higher scores on that test and reported studying more than did their controls. No advantages to serving as a proctor were found in those who dropped out, but those in the PSI groups who completed the course had lower pretest scores than those in the control group who finished the course. (17 ref)—*Journal abstract.*

10432. **Harris, V. William & Sherman, James A.** (Southwest Indian Youth Ctr, Tucson, AZ) **Homework assignments, consequences, and classroom performance in social studies and mathematics.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 505-519.—In 2 experiments with a total of 77 6th graders, Ss who frequently answered questions incorrectly in class were given daily homework assignments in social studies and mathematics, but they rarely completed the assignments

accurately, and their classroom performance in social studies and math was only slightly better than when they did not have homework assignments. However, consequences provided for accurate completion of homework assignments increased the number of students completing homework and the accuracy with which homework assignments were completed. Further, assignments of homework with consequences for accuracy were associated with more accurate classroom performance. (26 ref)—*Journal abstract.*

10433. **Hartnett, Rodney T.** (Educational Testing Service, Princeton, NJ) **Adult learners and new faculty roles.** *Findings*, 1974, Vol 1(3), 1-4.—Evaluated innovative teaching programs at three American universities which utilized the teaching methods and materials of the British Open University System. The system had no formal classes, an emphasis on self-motivation and study at home, a rigid schedule of assignments, plus heavy use of textbooks, television, and correspondence materials including study guides and quizzes. Study centers were provided where students could go, on a voluntary basis, for tutoring, counseling, review of television programs, etc. Questionnaires were administered to 247 students who completed a humanities course in this way. Results show that contact with other students and with tutors was very relevant to their satisfaction with the course. 38 faculty members involved with the program were also queried. Since their participation 71% reported an increase in interest in working with students, 79% reported an increase in desire to develop new course materials, and 76% said they had become more interested in developing nontraditional teaching modes. Recommendations are made for development of new open university programs.—*R. S. Albin.*

10434. **Hosie, Thomas W.; Gentile, J. Ronald & Carroll, Jill D.** (Northeast Louisiana U, Monroe) **Pupil preferences and the Premack principle.** *American Educational Research Journal*, 1974(Sum), Vol 11(3), 241-247.—Studied the application of the Premack Principle using human Ss. In Exp 1, 14 Ss were randomly selected from a class of 28 6th graders in Buffalo, New York, who were classified by an O as preferring painting or modeling clay. The amount of time Ss spent on a reading task was also recorded and they were then randomly assigned to receive painting or modeling based upon successful completion of a report-writing task. Exp II was similar but utilized 40 Ss from 4 classes (2 5th- and 2 6th-grade) and preferences were determined using 2 Os instead of one. The dependent variable was the amount of time taken to complete the assignment. According to the Premack Principle, the time taken to complete the task would be less for those who were promised that they would be able to engage in the activity they preferred when they had completed the task. Both experiments supported this hypothesis. It is concluded that where a clear preference existed, the Premack Principle might be usefully applied in class.—*E. J. Mason.*

10435. **Jacquemin, J.-M.** (U Louvain, Belgium) **[Genetic psychology and modern mathematics in the primary school.]** (Fren) *Revue de Psychologie et des Sciences de l'Education*, 1973, Vol 8(4), 503-509.—Argues that, from the point of view of the psychogenesis of cognitive structures in 5-8 yr old children, attempts to

teach modern mathematics from the beginning of the elementary school cycle have created important problems. A few of these problems are discussed, with the emphasis on the need for a strict and continuous adaptation of the sequences of mathematical apprenticeship to the recognized objective characteristics of cognitive development. (French, Flemish, & English summaries)—*Journal summary*.

10436. Joiner, Elizabeth G. (U South Carolina) **Evaluating the cultural content of foreign-language texts.** *Modern Language Journal*, 1974(Sep-Oct), Vol 58(5-6), 242-244.—Presents a questionnaire to help assess stereotyping and negative attitudes toward a foreign culture incorporated in a foreign-language textbook.

10437. Kharlov, G. A. (Dnepropetrovsk U, USSR) [The possibility of memorizing increased lexical dosages in learning a foreign language.] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 85-93.—Tested the ability of foreign language students to learn more words during a class session than has been accepted as the norm. 48 students in 2 colleges served as Ss. A letter cancellation task was given at the beginning and end of each training session as a measure of fatigue. Ss learned the meaning of 10, 20, 30, 48, or 60 words using the paired associates method, contextual recognition, translation, and other exercises. Humanities majors and others with some language background could learn 48 and 60 words in a session without significant fatigue. Students in an agriculture college course with no foreign language prerequisite could learn as many as 30 or 35 words. Higher dosages, however, led to a statistically significant decrement in work capacity. (English summary)—*L. Zusne*.

10438. Klasson, Alger. [Principals in the compulsory school: Description of tasks by means of data from interviews.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Jul), No 245, 169 p.—Presents an analysis of the tasks of principals in the compulsory school, based on interviews with 62 principals and 8 teachers. To get a picture of future principal tasks and the changing tendencies in the job, 26 interviews were carried out with high officials and central organizations. By means of content analysis the interviews were classified into the categories of Content, Contact, and Ability.—*English summary*.

10439. Knight, John J. (Indiana U) **Instructional dysfunction and the temporary contract.** *Educational Technology*, 1974(Apr), Vol 14(4), 43-44.—Proposes temporary instructional "contracts" between teacher and student as a means of improving the quality of communication in the classroom.

10440. Knowles, Lyle. (Pepperdine U) **Helping students learn basic inferential statistics.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 7-11.—Presents several techniques by which undergraduate and graduate college students can improve their learning of statistical concepts and operations. 2 unusual devices are described: providing the students with the instructor's teaching notes and returning students' examination papers to them for correction. The latter device increases academic achievement because student anxiety is reduced and

because they do not compete with other students but with their own previous performance.—*A. J. Ter Keurst*.

10441. Koffman, Elliot B. (U Connecticut) **CAI systems that process natural language.** *Educational Technology*, 1974(Apr), Vol 14(4), 37-42.—Surveys a number of generative systems of computer assisted instruction which have the ability to construct tutorial sequences and respond to student queries by manipulating a data base of relevant information. The systems are oriented toward the humanities and textual manipulation. The use of artificial intelligence research as a theoretical foundation for the natural language processing aspects of these systems is discussed.—*C. B. Kreitzberg*.

10442. Kroll, Herman M. (U Wisconsin Ctr System, Madison) **The relative effectiveness of written and individualized audio instruction in the intermediate grades.** *AV Communication Review*, 1974(Fal), Vol 22(3), 247-268.—Using cassette tapes or printed booklets, 120 children, mostly 5th-graders, studied the scientific method. Children read or listened individually and could reread or replay the material as they wished. Posttests showed that high-ability students did equally well by listening or reading, and low-ability students did not do as well, regardless of mode.—*Journal summary*.

10443. Lesiak, Walter J. & Walt, Judith A. (Central Michigan U) **The diagnostic kindergarten: Initial step in the identification and programming of children with learning problems.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 282-290.—Describes how a traditional kindergarten can be transformed into a diagnostically and developmentally oriented program. Topics discussed include assessment strategies, inservice training goals, classroom interventions, implications for the primary grades, and the function of the school psychologist. Field test results of the model are reviewed.—*H. Kaczowski*.

10444. Long, Barbara E. (Dept of Health & Welfare, San Mateo, CA) **Educational change with elementary school psychology curriculum.** *Professional Psychology*, 1974(May), Vol 5(2), 166-174.—Discusses implications of making psychology an essential part of precollege education. It is contended that the assimilation by children of psychology presented in a way fitted to their interests and their developmental level contributes to their mental health, increasing their self-understanding, coping strength, and empathy with others. Research possibilities deriving from evaluation studies of psychology curricula are suggested, and changes in teacher role and philosophy entailed by the incorporation of psychology experiments into the classroom procedure are considered. (33 ref)—*B. Lindsey*.

10445. Lovinger, Sophie L. (Central Michigan U) **Socio-dramatic play and language development in preschool disadvantaged children.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 313-320.—Studied the relationship between language development and creative play in 18 disadvantaged children enrolled in a preschool nursery program. It is concluded that play helps children organize information into meaningful concepts.

10446. Matlick, Richard. (Howard Community Coll, Columbia, MD) **A learning laboratory for the small community college.** *Audiovisual Instruction*, 1974(Sep), Vol 19(7), 30-32.—Describes the development of a



laboratory for mediating independent learning at a community college. Ways in which the usually prohibitive cost of the laboratory was controlled are discussed.

10447. McCoy, David. (Eastfield Coll) **Continuous evaluation of instructional media services at Eastfield College.** *Audiovisual Instruction*, 1974(Sep), Vol 19(7), 10-13.—Describes how the staff of a college "learning resource center," in order to maintain a high standard of service, developed and implemented a simple yet effective system for ongoing evaluation of instructional media services.

10448. McFadden, John. (California State U, Sacramento) **A bi-cultural approach to ESL for adults: A Paulo Freire model of the basic learning group.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 289-293.—Presents a theoretical study of experiences and needs in bicultural adult education in English as a second language (ESL) using P. Freire's (1970) 5-point model of learning groups. Suggestions for ESL teachers and for empirical research on curriculum content, democratic class organizations, codification of home-school experiences, and problem-solving activities are presented.

10449. McNinch, George. (U Southern Mississippi, Reading Ctr) **Reading sight words in different letter styles.** *Southern Journal of Educational Research*, 1974(Sum), Vol 8(3), 332-341.—Studied whether graphic constraints (i.e., the style in which the letters were constructed) would be a factor in sight word reading success. 4 9-item word lists—upper case, primary type, manuscript, and mixed allographs—were constructed and presented tachistoscopically to 40 randomly selected 4th graders. Comparisons were made across all Ss and between good and poor reading groups. No differences were found in any of the 3 comparisons. It is concluded that distorting the featural field of words by presenting them in mixed allographs did not increase the difficulty of their pronounceability.—*Journal abstract.*

10450. Merritt, Ray. (Delta State Coll) **Conventional methods and independent study in teaching educational psychology.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 826.—42 undergraduates learned 2 units of work either by independent study or by the conventional methods of teaching (e.g., lecture and films). Analysis of variance of scores earned on teacher-made tests indicated no significant differences in the groups' performances.

10451. Morin, Stephen F. (California State Coll, San Bernardino) **Educational programs as a means of changing attitudes toward gay people.** *Homosexual Counseling Journal*, 1974(Oct), Vol 1(4), 160-165.—Assessed ways in which a specifically designed course on homosexuality including 7 groups of gay speakers affected attitudes of 18 advanced college students. Semantic differential ratings of 16 concepts were analyzed by means of a *D* statistic in a pre- and posttest design. Ratings of the term "homosexual" were significantly more positive on the posttest as were the ratings of "gay person," "dyke," and "woman." A self-concept measure indicated a significant change in a positive direction as predicted.—*Journal abstract.*

10452. Mullins, Terence Y. **Social desirability as a factor in Christian education.** *Religious Education*, 1974(May), Vol 69(3), 292-301.—Proposes that what a

person sees as socially desirable partially depends upon the kind of education he receives. In Christian education persons may be alerted to see things in life that they would be unable or unlikely to see in the absence of the expectations such education affords. Social desirability can subtly influence action by affecting a person's attitudes and by presenting a different range of options for his responses. Emphasis of Christian education upon individual attitudes is likely to increase their social desirability within the group.—*E. A. Gavin.*

10453. Newton, James E. (U Delaware) **College student knowledge of Afro-American history and culture in relation to black studies.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 42-49.—Measured differences between 50 students in the Black Studies Curriculum Group (BSCG) and 42 students in the Traditional Curriculum Group (TCG). Both groups included white and black students. All Ss were administered the 2-part Afro-American Knowledge Inventory (AAKI); Part 1 measures knowledge of Negro culture by a multiple-choice test, Part 2 measures knowledge of Negro personalities by visual presentations. Ss were also tested by 2 attitude scales: a semantic differential test and a general attitude test. The differences between the 2 curriculum groups both on the AAKI ( $p > .01$ ) and on the 2 attitude scales ( $p > .05$ ) were significant. Scores of the white Ss in the 2 curriculum groups differed significantly ( $p < .01$ ). Differences between the ethnic groups in the BSCG were significant for Part 2 of the AAKI but not for Part 1.—*A. J. Ter Keurst.*

10454. Parkay, Forrest. (U Chicago) **The inner-city high school.** *School Review*, 1974(May), Vol 82(3), 468-485.—Discusses the unique demands of inner-city teaching, based on 4 yrs of experience in teaching English at an all-black high school in Chicago. 4 interacting variables which teachers can control in their classrooms are described: the content and relevance of curriculum, the emotional climate of the group, methodological choices, and awareness of class dynamics. Inner-city students can be classified into 1 of 6 types: conforming, nonconforming, variable, disruptive, withdrawn, and marginal. The teacher's role is to maximize success by adapting approach and content to the particular students involved.—*C. K. Miller.*

10455. Paulson, F. Leon. (Child Development Associate Consortium, Washington, DC) **Teaching cooperation on television: An evaluation of Sesame Street social goals programs.** *AV Communication Review*, 1974(Fal), Vol 22(3), 229-246.—During its 3rd season, the "Sesame Street" program included segments specifically designed to teach children cooperation. The effectiveness of the instruction was examined by testing 36 inner-city preschool children who viewed an entire season of "Sesame Street" at their day care centers, and 42 who did not. Children were observed in situations like those shown on TV and during free play, and were asked to identify pictured examples of cooperation. Viewers scored significantly higher than nonviewers, but there was no evidence of transfer of learning to new situations.—*Journal abstract.*

10456. Peelle, Howard A. (U Massachusetts, Amherst) **Computer glass boxes: Teaching children concepts with "A Programming Language (APL)." Educational Tech-**

nology, 1974(Apr), Vol 14(4), 9-16.—Describes a new computer-based approach to teaching children concepts which differs from traditional systems of computer assisted instruction in that the new approach allows children to exert some control over their own learning processes.

10457. Ponomareva, R. A. (Inst of Psychology, Kiev, Ukrainian SSR) [Methods of constructing an image of a technical object in adolescents.] (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 117-126.—Studied the development in 7th- and 8th-graders of a visualized image of a verbally presented description of a piece of electronic apparatus. 3 methods for developing such an image were identified, corresponding to 3 levels of generalization of the essential characteristics of the object to be represented: Ss drew the diagram element by element, as an integral system, or in a way that reflected a method intermediate between these two. (English summary) (15 ref)—L. Zusne.

10458. Postovsky, Valerian A. (Defense Language Inst, West Coast Branch, U California, Berkeley) Effects of delay in oral practice at the beginning of second language learning. *Modern Language Journal*, 1974(Sep-Oct), Vol 58(5-6), 229-239.—Studied the effects of graphic instead of oral response on performance in beginners' Russian. In Exp I, 62 young military language-training volunteers were matched in pairs and divided into an experimental (E) and a control (C) group. Exp II was an exact replication of Exp I, using 30 matched pairs. For the 1st 4 wks of instruction, Group E responded to Russian utterances in Russian script, while Group C responded orally. Thereafter both groups received equal treatment. After 6 wks, Group E's general performance was superior ( $p < .01$ ), particularly in speaking ( $p > .0001$ ). After 12 wks, confidence interval analysis indicated superior listening comprehension in Group E ( $p < .008$ ). Results are attributed to (a) increased storage time of Russian utterances required when responses are written, (b) E group's nonexposure to imperfect Russian, and (c) visual reinforcement.—C. A. Sherrard.

10459. Powell, J. P. (U Papua & New Guinea, Port Moresby) Small group teaching methods in higher education. *Educational Research*, 1974(Jun), Vol 16(3), 163-171.—Coded tape recordings of 13 undergraduate tutorial meetings to determine amount of speech contributed by each member and the cognitive content of the verbal interaction. Participation rate of tutors was 27.8-74% with a mean participation score of 58%. Student participation scores increased significantly when tutor was absent. Content of discussions in tutor-led groups emphasized information while leaderless groups stressed argument. Both tutors and students reacted favorably to the leaderless groups, with 84% of the students feeling that they learned more when the tutor was absent. Results suggest that both teacher-led and leaderless tutorial groups can provide significant educational benefits for students.—J. B. Francis.

10460. Rieth, Herbert et al. (U Kansas) Influences of distributed practice and daily testing on weekly spelling tests. *Journal of Educational Research*, 1974(Oct), Vol 68(2), 73-77.—Compared different means of presenting spelling words to students. A total of 8 4th graders, 58

5th graders, and 1 7th grader took part in 4 experiments. The dependent variable for all studies was the Ss' scores on weekly review tests. Exps I, II, and III demonstrated that Ss did better on the weekly review tests when they received a portion of the words each day and were tested daily than when they received all words at the beginning of the week and did not have daily tests. Exp IV indicated that receiving a portion of the words each day without daily testing was inferior to receiving a portion of the words each day with daily testing, but better than receiving all words at the beginning of the week without daily testing.—Journal abstract.

10461. Rushman, John R. Educational consciousness. *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 76-77.—Argues that a liberal education, if it is to meet the needs of a modern free society, should re-emphasize growth in personal creativity and a sense of individuality on the part of the student. The emphasis of current liberal education on the priority of group practices stifles individuality.

10462. Schoen, Harold L. (Virginia Polytechnic Inst & State U) CAI development and good educational practice. *Educational Technology*, 1974(Apr), Vol 14(4), 54-56.—Learning theories and theories of instruction have established that certain practices are essential to efficient education. A number of examples of "good educational practice" derived from various theories are cited. It is argued that to be effective computer assisted instruction must incorporate good educational practice.—C. B. Kreitzberg.

10463. Stanton, H. E. (Flinders U South Australia, Bedford Park) The relationship between teachers' anxiety level and the test anxiety level of their students. *Psychology in the Schools*, 1974(Jul), Vol 11(3), 360-363.—Studied the effect that the type of classroom (open vs closed) and the level of teacher anxiety has on the level of student anxiety. Ss were 1,047 Australian children and 32 6th- and 7th-grade teachers. The Trait Anxiety Scale of the State Trait Anxiety Inventory and the Test Anxiety Scale for Children were used to assess levels of anxiety. Results indicate that anxious teachers did not necessarily produce anxious students.

10464. Strain, Phillip S. & Timm, Matthew A. (American U) An experimental analysis of social interaction between a behaviorally disordered preschool child and her classroom peers. *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 583-590.—Measured the social interaction between a behaviorally disordered preschool child and her classroom peers under 2 conditions of contingent adult attention: verbal praise and physical contact directed to the target S's peers for appropriate interaction with the target S, and verbal praise and physical contact directed specifically to the target S for engaging in appropriate interaction with peers. Continuous measures of interactive behavior were made during baseline, intervention, and return to baseline conditions. Results indicate that application of experimental contingencies to peers (Condition 1) rapidly increased appropriate social behaviors by the peers and also by the target S. When experimental contingencies were applied to the target S (Condition 2), a similar increase in appropriate social behaviors was noted for both the target S and the peers. Additionally,



during Conditions 1 and 2 the recipient(s) of contingent adult attention initiated more appropriate social contacts than did the interacting partner(s).—*Journal abstract.*

10465. **Sturgis, Daniel K.; Iacono, C. U. & Kuncze, Joseph T.** (U Missouri) **Parental advantagement, IQ, and differential responsiveness to an education enrichment program.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 329-333.—Reports on the effectiveness of a large experimental program to provide assistance to students according to their diagnosed needs. Ss were 878 1st-grade students. It is concluded that the program helped to reduce the gap in achievement between the less capable students and their peers.

10466. **Thiagarajan, Sivasailam.** (Indiana U, Ctr for Innovation in Teaching the Handicapped) **Indicator hunt: A goal analysis game.** *Educational Technology*, 1974(Apr), Vol 14(4), 17-20.—Describes an instructional game concerning the analysis of attitudinal goals into observable indicators. Completion of the game yields a set of objectives as well as a rank ordering of relevant behaviors which are goal-related.

10467. **Topper, Louis.** (Canada Public Libraries, Learning Resources Ctr, Toronto, Ontario) **A communications model to help understand the main problems of AV materials design and use.** *Educational Technology*, 1974(Apr), Vol 14(4), 30-33.—Proposes the use of an "interpersonal communications model" to discover obstacles in the design of audiovisual materials. The model is also appropriate for evaluating the effects of presentation.

10468. **Valley, John R.** **The external degree: Recent developments.** *Findings*, 1974, Vol 1(3), 5-8.—Describes innovations in external degree programs in the US. Education in this context is viewed as a lifelong process that is an integral and continuous part of living. Topics include the use of community resources for education, an increase in the range of support services, the extension of authority to grant degrees, operational across traditional boundaries, granting of credit through course evaluation, and assessing what is learned off-campus. Implications of such programs for the maintenance of academic standards are cited. In addition, the problem of quack programs which do not provide reputable degrees is discussed. Specific programs are described that illustrate these issues.—*R. S. Albin.*

10469. **Van Houten, Ronald; Morrison, Elizabeth; Jarvis, Rowena & McDonald, Margo.** (Mount St Vincent U, Halifax, Nova Scotia, Canada) **The effects of explicit timing and feedback on compositional response rate in elementary school children.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 547-555.—Studied the effects of several variables on compositional response rate in 3 2nd- and 5th-grade classrooms. After establishing baseline composition rates in each classroom, an experimental phase was introduced that consisted of explicit timing of the children's composition period with a stopwatch, immediate feedback on the number of words each child produced, public posting of the greatest number of words written by each child to date, and instructions to try to exceed their highest score. In the 2nd-grade classroom, these conditions were introduced, removed, and reintroduced. In 2 5th-grade classrooms, these conditions were introduced according to a multiple

baseline, across classes. In all cases, introduction of the experimental conditions led to a doubling of rate of words written by students and an increase in subjective quality ratings of compositions made by independent judges.—*Journal abstract.*

10470. **Wexley, Kenneth; Guidubaldi, John & Kehle, Thomas.** (U Akron) **An evaluation of Montessori and day care programs for disadvantaged children.** *Journal of Educational Research*, 1974(Nov), Vol 68(3), 95-99.—Compared 25 children from the Montessori program and 25 from a day-care compensatory program with a disadvantaged control group and an advantaged children group ( $n = 19$  Ss in each). Ss were matched on age (3-5 yrs), race, sex, socioeconomic status, number of parents at home, and years of program participation. 8 tests of cognitive skill were administered. Ss were compared on a composite factor score derived from the 8 tests as a single summary index. Analysis indicated that treatment differences existed on 6 of the 9 analyses. Both preschool programs were effective in raising levels of performance beyond those of other disadvantaged Ss, and both approached middle-class levels of performance, yet the treatment groups did not differ from each other.—*Journal abstract.*

10471. **Williams, John D. & Fogelman, Kenneth R.** (U Sherbrooke, Quebec, Canada) **Sets, logic and intelligence tests.** *Journal of Structural Learning*, 1972, Vol 3(3), 25-36.—Studied the effects of mathematics learning on intelligence test scores of 185 primary school children. Ss were administered the Picture and Primary Verbal I tests of the National Foundation for Educational Research before and after a period of learning mathematics. Control Ss were taught a traditional arithmetic while experimentals were taught modern mathematics. No significant differences were found between groups. It is suggested that while the skills derived from a course in sets and logic are related to performance on intelligence tests, they do not affect the test used here.—*R. S. Albin.*

10472. **Williams, John D.** **Course-component evaluation: I. Rationale and outline.** *Journal of Structural Learning*, 1973, Vol 4(1), 25-31.—Suggests that course evaluation be restricted to comparison of carefully selected component parts rather than entire courses. A sample evaluation of a mathematics course is presented, and it is proposed that this technique could be used for any course.

10473. **Winett, Richard A. & Edwards, Sharon M.** (U Kentucky) **An evaluation plan for educational innovations.** *Journal of Community Psychology*, 1974(Oct), Vol 2(4), 345-351.—Tested a comprehensive evaluation plan that included a number of behavioral, social, ecological, and achievement measures in a small-scale study comparing an open and traditional classroom. Ss were 25 3rd graders of varied socioeconomic backgrounds and heterogeneous abilities. Results, generally supportive of open education, are discussed in terms of the kinds of students profiting from each classroom environment, and applications to other kinds of educational evaluation projects. Points noted are inclusion of other teacher and student variables, possible methodological improvement, and the integration of comparative and experimental studies as a basis for administrative decisions. (24 ref)

—*Journal summary.*

10474. Yawkey, Thomas D. & Jones, Dawn M. (U Wisconsin, Madison) **Application of behavior modification to learning center choices in a kindergarten open education classroom.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 321-328.—Studied the effect of teacher attention on the number of academic activities chosen and completed by 26 kindergarten children. The RIP technique (i.e., rules, ignore, praise) was used to enlarge the academic behavioral repertoires of these children. The data indicate that the RIP technique is useful in manipulating the behavior of children.—H. Kaczkowski.

10475. Young, Carl E.; True, John E. & Packard, Mary E. (Ctr for Human Services Research, Baltimore, MD) **A national survey of associate degree mental health programs.** *Community Mental Health Journal*, 1974(Win), Vol 10(4), 466-474.—Reports on the 1st national survey of associate degree mental health programs and illustrates their development by states. Included are data on current enrollments, percentage of graduates employed, and other related variables.

10476. Ysseldyke, James E. & Salvia, John. (Pennsylvania State U, Ctr for Educational Diagnosis & Remediation) **Diagnostic-prescriptive teaching: Two models.** *Exceptional Children*, 1974(Nov), Vol 41(3), 181-185.—Examined the extent to which 4 assumptions underlying diagnostic-prescriptive teaching are met within 2 models—the ability training model and the task analysis model. Diagnostic-prescriptive teaching assumes that (a) children enter a teaching situation with strengths and weaknesses, (b) these strengths and weaknesses are causally related to the acquisition of academic skills, (c) these strengths and weaknesses can be reliably and validly assessed, and (d) there are well identified links between children's strengths and weaknesses and the relative effectiveness of instruction. It is concluded that the task analysis model meets the assumptions and the ability training model does not. (25 ref)—M. E. Pounsel.

10477. Zankov, L. V. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General Pedagogy, Moscow) **[The problem of education and development.]** (Russ) *Voprosy Psikhologii*, 1974(May-Jun), No 3, 21-30.—Presents an overview of an educational research project begun in 1957 and carried out in 1,200 classrooms in different republics of the USSR. The performance of experimental classes using a new teaching system is compared with that of control groups in 3 lines of activity: observation, intellectual performance, and practical tasks. All comparisons were in favor of the experimental groups, showing quantitative changes in the structure of the students' mental activity. It is argued that the piecemeal approach to educational reform yields insignificant results and that total reorganization of the educational process is necessary to achieve optimum development in children. (English summary)—L. Zusne.

#### Academic Learning & Adjustment & Achievement

10478. Alexander, Karl & Eckland, Bruce K. (Johns Hopkins U) **Contextual effects in the high school educational attainment process.** *Center for Social Organization of Schools Report, Johns Hopkins U*, 1974(Jul), No 178, 29 p.—Presents a multidimensional

mediation model of composition influences. Ability and social status of student body composition are distinguished, and the interpersonal and social comparison processes by which their effects tend to offset each other are specified. The model was examined using data for a national sample first surveyed in 1955 as high school sophomores and followed up in 1970. Results suggest that for both men and women, ability composition mainly affected subsequent outcomes only insofar as it lowered relative performance scores. Status composition affected the likelihood of enrollment in a college preparatory program and for males, the likelihood of associating with college-oriented peers. The absence of a substantial linkage between status context and peer plans for women was found, and several interpretations of this are suggested. (72 ref)—*Journal abstract*.

10479. Alexander, Karl & McDill, Edward L. (Johns Hopkins U, Ctr for Social Organization of Schools) **Social background and schooling influences on the subjective orientations of high school seniors.** *Center for Social Organization of Schools Report, Johns Hopkins University*, 1974(Nov), No 185, 48 p.—Describes a multivariate "school process" model of the ways in which social background and schooling influences combine to affect subjective school outcomes. 4 areas of subjective orientation are considered: educational plans, self-conceptions of competence, intellectualism, and satisfaction with school. The analysis, based on questionnaire and testing data from 20,345 high school seniors, identifies "social background" characteristics (sex, measured ability, and status origins) as important determinants of such outcomes, while school process mechanisms, including curriculum enrollment, characteristics of peer associates, and academic performance, both contribute uniquely to the explanation of subjective orientations and serve as important mediators of background influence. Quite diverse specific patterns of dependency were obtained across outcomes. Finally, 2 underlying dimensions of subjective orientation practically exhausted the explanatory power of predictor variables in relation to the 4 outcomes.—*Journal abstract*.

10480. Bender, Paula S. & Ruiz, Rene A. (U Arizona) **Race and class as differential determinants of underachievement and underaspiration among Mexican-Americans and Anglos.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 51-55.—Compared a total of 176 Mexican- and Anglo-American 11th graders from the lower and middle socioeconomic classes to determine the nature of interrelations between scholastic performance and race and class. Ss were given a battery of tests (e.g., the Personal Opinion Survey) measuring locus of control, achievement reality orientation, and temporal orientation. These factors were seen as potential correlates of current scholastic performance and future educational and vocational goals. Results indicate that membership in social class rather than racial group was the critical factor in determining current academic achievement, educational aspirations, and belief in one's ability to control his environment. Inferences emerge that generalizations from one ethnic minority group and/or socioeconomic class to another group or class may not be valid. In addition, programs designed to involve low-achieving



and low-aspiring students should take relevant variables such as social class into account in their development. —*Journal abstract.*

10481. Eaves, L. C.; Kendall, D. C. & Crichton, J. U. (U British Columbia, Vancouver, Canada) **The early identification of learning disabilities: A follow-up study.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 632-638.—Presents follow-up findings of the authors' 1969 study (see PA, Vol 49:7436) which attempted to measure, predict, and define readiness for school and potential problems in learning. Of 228 children who were given a screening test in kindergarten, 163 were followed to the end of Grade 2. At that time they were given an achievement test, and school progress was reported by their teachers. Over 70% of the Ss had been classified correctly as to their achievement on the basis of the kindergarten screening test. The individual test items or subsets of them predicted better than the composite score. Of the 196 psychological, neurological, and academic measures taken on a sample of 50 Ss, a small number were highly predictive of Grade 2 achievement. When achievement by diagnosis was considered, only 11% of the Ss diagnosed in kindergarten as having minimal brain dysfunction were ready for Grade 3, as contrasted to 86% of the normals.—*Journal abstract.*

10482. Feldman, David M. (California State U, Fullerton) **Measuring auditory discrimination of suprasegmental features in Spanish.** *IRAL: International Review of Applied Linguistics in Language Teaching*, 1973(Aug), Vol 11(3), 195-209.—Describes the construction and use of a test of contrastive auditory discrimination of the suprasegmental features of Spanish: intensity, duration, pitch, and terminal contour. Comparison of discrimination of the features when synthesized and isolated vs when spoken indicates that performance was better with synthesized features. Students who had undergone testing ultimately attained better grades in listening to Spanish and in comprehension.—C. A. Sherrard.

10483. Gezi, Kal. (California State U, Sacramento) **Bilingual-bicultural education: A review of relevant research.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 223-239.—A review of the literature indicates that when nonverbal ability tests are used and when socioeconomic variables are controlled, bilingual children have as high IQs as monolingual children, if not higher ones in some respects. Reasons for the below-average school achievement of many culturally different students in regular school programs are discussed. (5 p ref)

10484. Gottlieb, David. (U Houston) **Work and families: Great expectations for college seniors.** *Journal of Higher Education*, 1974(Oct), Vol 45(7), 535-544.—Describes an emerging ethic among seniors which places a much greater demand upon work. These students see work as an integral part of one's total life.

10485. Hardy, Clifford A. (North Texas State U) **Student attitudes toward controversial issues: A study of social class.** *Southern Journal of Educational Research*, 1974(Sum), Vol 8(3), 316-325.—Administered the Purdue Master Attitude Scale entitled "A Scale to Measure Attitudes Toward Any Proposed Social Action" to 312 undergraduates. W. L. Warner's Index of Status Charac-

teristics was used to measure social class. Results indicate that (a) while the total group expressed an unfavorable attitude toward busing, they expressed stronger favorable attitudes toward the legalizing of abortion and marihuana; (b) women in general appeared to hold somewhat stronger attitudes along all 3 attitude dimensions, especially in the area of busing, than men; and (c) there appeared to be a negative relationship between attitudes toward busing and social class, while there appeared to be no relationship between social class and the other attitude variables.—*Journal abstract.*

10486. Howe, Michael J. (U Exeter, England) **The utility of taking notes as an aid to learning.** *Educational Research*, 1974(Jun), Vol 16(3), 222-227.—Discusses the effect of note-taking by students on the acquisition of knowledge. Analysis of current research shows that besides recording information, note-taking influences learning by (a) ensuring that learners attend to information; (b) providing a version that is particularly valuable to the individual learner; and (c) directly increasing the scope and accuracy of learned content. It is suggested that further research into the relative effectiveness of different note-taking strategies and training of students in their use can facilitate learning. (25 ref)—J. B. Francis.

10487. Jacobs, Keith W. & Galvin, Kathryn S. (U Southern Mississippi) **Variables which differentiate members and non-members of social fraternities and sororities.** *Southern Journal of Educational Research*, 1974(Sum), Vol 8(3), 342-352.—Administered the Eysenck Personality Inventory, Rotter's Internal-External Control Scale, the Sensation Seeking Scale, and a biographical questionnaire to 86 undergraduates, 22 of whom belonged to social fraternities or sororities. Differences were found between the member and nonmember groups on all 3 personality measures, student voting practices, and attitudes toward several social groups. Several sex differences were also observed, and the only significant interactions were on 2 factors of the Sensation Seeking Scale. It is concluded that students who join social fraternities and sororities can be differentiated from nonmembers, generally without regard for sex differences.—*Journal abstract.*

10488. McConkie, G. W. & Meyer, Bonnie J. (Cornell U) **Investigation of reading strategies: II. A replication of payoff condition effects.** *Journal of Reading Behavior*, 1974(Jul), Vol 6(2), 151-158.—Replicated a study of reading strategies of college students through the use of payoff conditions. Ss were 70 undergraduates. The influence of 4 variables on reading speed and test performance was studied: existence of a payoff structure, the form of the payoff structure, type of payoff, and presence or absence of feedback. The existence of a payoff structure had little effect by itself, but the form of the structure produced significant changes in reading rate. Feedback on performance appears critical in producing substantial reading strategy changes.—*Journal abstract.*

10489. Nowicki, Stephen & Walker, Charlotte. (Emory U) **The role of generalized and specific expectancies in determining academic achievement.** *Journal of Social Psychology*, 1974(Dec), Vol 94(2), 275-280.—Examined the relation of generalized and specific expectancies to actual academic performance. 63 5th and 6th graders

completed the Nowicki-Strickland Personal Reaction Survey for children and Rotter Level of Aspiration Board procedures. Results indicate that those who perceived themselves to be internally controlled or those who used immediate experience on the Rotter board to form accurate expectancies of future performance on this board achieved more than their counterparts. It is suggested that results support the conceptualization of achievement in expectancy terms. (20 ref)—*Journal abstract*.

10490. Politzer, Robert L. (Stanford U) **Developmental sentence scoring as a method of measuring second language acquisition.** *Modern Language Journal*, 1974(Sep-Oct), Vol 58(5-6), 245-250.—Describes how a developmental test of native-language acquisition can be applied to foreign-language acquisition. The application is partially successful (validated) but it is concluded that tests of both kinds are biased by the assumption that both processes are similar.

10491. Scott, Owen; Halpin, Gerald & Schnittjer, Carl. (U Georgia) **Relationships between students' perceptions of college instruction and selected students' characteristics.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 855-860.—Studied the relationships between sex, creativity, life history, and academic achievement and student perceptions of 6 aspects of college instruction—instructional objectives, human relations, use of instructional resources, motivation, content meaningfulness, and measurement and evaluation. Ss were 51 male and 133 female undergraduates who completed a battery of tests including the Inventory of Student Perceptions of Instruction, Torrance Tests of Creative Thinking, and the What Kind of Person Are You? Sex and academic achievement were significantly related to one or more of the aspects of students' perception of instruction. Females perceived their motivation more favorably and meaningfulness of content less favorably than did males. For males, academic achievement was significantly related to perception of instruction, with grade point average and human relations making the largest relative contribution to the relationship.—*Journal abstract*.

10492. Simons, Herbert D. (U California, Berkeley) **Black dialect phonology and word recognition.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 67-70.—Examined the hypothesis that black children can read words that are closer to their black dialect (BD) pronunciation better than words that are further away. This hypothesis was tested by administering to a total of 76 2nd-, 3rd-, and 4th-grade blacks 2 lists of BD real word homophones, e.g., "cold"—"coal," and 2 lists of nonsense homophones, e.g., "dold"—"doal." It was predicted that the 2nd member in each pair would be easier to read than the 1st because it is closer to BD phonology. A multivariate and univariate analysis of variance of the differences between the closer and further homophones failed to support the prediction.—*Journal abstract*.

10493. Smithers, A. G. & Dann, Sheila. (U Bradford, School of Research in Education, England) **Success and failure among engineers, physical scientists and linguists at a technological university.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 241-247.—Analyzed the academic performance of a total of 447

undergraduates in 3 fields of study—engineering, physical sciences, and languages—by comparing the characteristics of successful students with those of the less successful and those who failed to graduate. Results show that Ss who obtained the better degrees generally had the better entry qualifications, and in engineering and the sciences, had reacted less against the industrial training element of sandwich courses. No strong relationship between social class and academic performance was found in engineering and the sciences, but, in languages, the successful students tended to come from nonmanual backgrounds. It is suggested that their acknowledged greater flexibility in their native language may have generalized to foreign languages. In a study of student worries, it was found that those who did less well or did not graduate were aware of their difficulties at an early stage, and were able to articulate them. (16 ref)—*Journal abstract*.

10494. Smithers, Alan; Avis, George & Loble, David. (U Bradford, School of Research in Education, England) **Conceptions of school among pupils affected by the raising of the school leaving age.** *Educational Research*, 1974(Jun), Vol 16(3), 210-217.—Divided 781 3rd-yr students in 4 comprehensive schools into "leavers," defined as those who wished to leave school at age 15; "stayers," those who wished to remain in school until age 18; and a middle group who expected to leave at age 16. Leavers were compared with stayers in terms of sex, social class, and ability. Highly significant relationships were found between desire to stay in school and social class and ability. Students of lower social class and students with lower presumed ability were more likely to be leavers than stayers. Leavers attached more importance to the expressive role of the school, cultural development, and education for leisure. Findings raise questions about the validity of raising the school-leaving age to enable more students to take public examinations. (16 ref)—*J. B. Francis*.

10495. Start, K. B. (U Melbourne, Faculty of Education, Vic, Australia) **Establishing children's learning as the criterion for teacher effectiveness.** *Educational Research*, 1974(Jun), Vol 16(3), 206-209.—Critiques current methods of assessing teacher effectiveness as ambiguous and not expressed in terms of pupil learning. Specifying what dimensions of learning the school is responsible for can lead to the development of criteria for successful learning. Progress on these criteria could be taken as measures of teaching effectiveness. It is concluded that the task is difficult but necessary.—*J. B. Francis*.

10496. Swap, Susan M. (Tufts U) **Disturbing classroom behaviors: A developmental and ecological view.** *Exceptional Children*, 1974(Nov), Vol 41(3), 163-172.—Presents a framework for understanding the behaviors of children which may lead to disturbing encounters within the classroom environment. The ecological perspective on emotional disturbance in children stresses that disturbance does not reside in the child but in the interaction between the child and his environment. Triggering behaviors which are the product of temperamental and developmental differences in children are discussed, and adaptive environmental responses to those behaviors are suggested. (20 ref)—*Journal abstract*.



10497. **Telegdy, Gabriel A.** (Windsor Separate School Board, Ontario, Canada) **The relationship between socioeconomic status and school readiness.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 351-356.—Examined the relationship between socioeconomic status and results of 4 reading readiness tests: the Screening Test of Academic Readiness, the First Grade Screening Test, the Bender-Gestalt Test for Young Children, and the Metropolitan Readiness Test. Ss were 68 kindergarten children. 4 times as many lower-class children as middle-class children were not ready for 1st grade. Human figure drawing, copying, picture completion, and picture completion subtests proved to be useful in selecting students for 1st grade.—*H. Kaczowski.*

10498. **Tomassetti, A. & Bozzano, A.** (Genoa Province Mental Health Service, Italy) **[Psychosocial and personality factors in vocational or academic choice.]** (Ital) *Neuropsychiatria*, 1972(Jan), Vol 28(1-2), 149-168.—A group of 16 boys with school problems and their families were studied in the 6th grade and 5 yrs later to determine the personality and environmental factors leading to their vocational choices. Ss were 11-13 yrs old, with IQs on the WISC of 74-120, and were from culturally deprived families. Their emotional troubles, their families' psychodynamic interferences, the educational systems that influenced their school problems, and their later job choices were examined. Despite school problems, the Ss reached a satisfactory social adjustment through spontaneous selection of jobs which brought them affective rewards, though their jobs were at a level lower than expected from their intellectual ability. Their entrance into the working world was limited by their basic personality patterns and by family difficulties in supporting their higher aspirations. The educational efforts of the school were not successful in reducing their maladjustment or in improving their relational problems or their life difficulties, which were aggravated in the adolescent period. (English, French, & German summaries) (2 p ref)—*A. Felice.*

10499. **Werner, C. Sue & Simpson, Richard L.** (U Kansas) **Attention to task and completion of work as a function of level of adjustment and educational environment.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 56-58.—Compared the academic performance and attention-to-task behaviors of a total of 36 well-adjusted, moderately-adjusted, and poorly-adjusted 1st graders in an open-space and a traditional, self-contained classroom. Each classroom environment was observed for 50-min periods, with each S being successively observed for 5 sec and marked for attention to task. Results indicate that both academic productivity and attention to task were significantly different as a function of the level of adjustment variable. No significant differences were found for either of the 2 dependent variables as a function of the classroom environment variable, nor were either of the interactions significant.—*Journal abstract.*

10500. **Wetterström, Magnhild.** **[School democracy in grades 1-6: Student opinions.]** (Swed) *Pedagogisk-Psychologiska Problem*, 1974(Jun), No 241, 99 p.—Conducted a series of investigations to determine the attitudes of 1st-6th graders towards participation in decision-making in the school. Results include (a) suggestions made by

the students for improving the school, (b) assessment by different student groups of their present and desired degree of influence, (c) comparisons between the opinions of students and teachers on these questions, and (d) development within this area over a 2-yr period. (37 ref)—*English abstract.*

10501. **Wood, Kenneth; Linsky, Arnold S. & Straus, Murray A.** (Stanford U) **Class size and student evaluations of faculty.** *Journal of Higher Education*, 1974(Oct), Vol 45(7), 524-534.—Found that as class size increased from under 10 to 250 students, ratings of the faculty by students became lower, but that ratings rose again in classes over 250.

### Special Education

10502. ———. **[Greater attention to vocational training and employment of the mentally retarded pupils of special education schools.]** (Russ) *Defektologiya*, 1972, No 4, 3-9.—Offers suggestions, arising from a 1970 government study, to help special education schools prepare mentally retarded pupils for socially useful work. Among the suggestions are the following: (a) The type of vocational training offered by a school should be closely related to the industry near the school; e.g., schools in rural communities should teach different subjects than city schools. (b) In addition to being trained in school workshops, students should be given the opportunity to work in actual jobs. (c) Schools should be required to help their graduates find jobs.—*E. C. Koffman.*

10503. **Bannatyne, Alexander.** (Bannatyne Children's Learning Ctr, Miami, FL) **Reading: An auditory-vocal process.** *Bulletin of the Orton Society*, 1974, Vol 24, 87-102.—Discusses English as a phonetic language, and presents a remedial methodology which involves linguistic code breaking with which the reading skills of the learning-disabled child can be enhanced.

10504. **Berdine, William H.** (U Kentucky, Certification Programs in Mental Retardation) **A comparison of retrieval systems to prescriptively select materials.** *Exceptional Children*, 1974(Nov), Vol 41(3), 195-197.—Compared responses to information requests on instructional materials generated by the Select-Ed Prescriptive Materials Retrieval (PMR) System and the University of Texas Information Retrieval Program. Results show that while the PMR system tended to be rated higher for the descriptive clarity of its abstracts, the differences were not significant.

10505. **Cormany, Robert B.** (West Shore School District, Lemoyne, PA) **Outdoor education for the retarded child.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 66-69.—Discusses an outdoor education program for the mentally retarded child which involved 50 10-13 yr old children and 10 adults and was continued at the behest of parents, educators, and children. The objective of the program was to provide a central theme for the intermediate special curriculum. From the children's point of view the program was an unqualified success; they appreciated it not only because it was fun but because they found the work interesting. Administrators found it a success because none of the anticipated problems arose; children did not become sick and need to be taken home, and no one became lost or was seriously injured. Most impor-

tant, it was a success because the children learned and retained what they learned.—P. O'Brien.

10506. Cundick, Bert P.; Crandell, John M. & Hendrix, Lee. (Brigham Young U) **A new method for the group testing of blind persons.** *New Outlook for the Blind*, 1974(Nov), Vol 68(9), 398-403.—Because most testing of blind persons is now done on a one-to-one basis, the problems involved in the more efficient group testing of the blind were investigated. 2 main problems were isolated—presentation of the test items and recording of the answers by the Ss. A solution, involving verbal presentation via prerecorded cassette tapes and a specially designed tactual answer board, was devised and tested experimentally with 36 sighted university students. Ss were tested while blindfolded and again while sighted. It was found that testing under blindfolded conditions yielded results that were not significantly different from those obtained via visual test-taking ( $p < .03$ ). Experimentation with these materials using blind Ss is suggested.—*Journal abstract*.

10507. D'Annunzio, Anthony & Steg, Doreen R. (Drexel U) **Effects of individualised learning procedures on children with specific learning disabilities.** *Developmental Medicine & Child Neurology*, 1974(Aug), Vol 16(4), 507-512.—Attempted to individualize remedial approaches to specific learning disabilities (auditory or visual). After careful diagnosis of 12 children 4-6 yrs old, a personal program was developed for each one, consisting of 30 treatment hrs. A control group received a standard, nonspecific program. Results suggest the superiority of an individualized approach. (French, German & Spanish summaries)—P. W. Pruyser.

10508. Daly, David A. & Johnson, Hettie P. (U Michigan) **Instrumental modification of hypernasal voice quality in retarded children: Case reports.** *Journal of Speech & Hearing Disorders*, 1974(Nov), Vol 39(4), 500-507.—Used the Oral Nasal Acoustic Ratio (TONAR) to reduce the hypernasality of 3 mental retardates during a 3-wk treatment period; concomitant improvements in speech intelligibility occurred in 2 Ss.

10509. Das, J. P. (U Alberta, Interdisciplinary Research Ctr, Edmonton, Canada) **How to teach retardates to control their behaviour.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 5-20.—Summarizes a symposium on the development of control in mentally retarded children, held at the 20th International Congress of Psychology at Tokyo, August 1972. S. W. Bijou discussed the application of operant conditioning principles to teaching retardates, and K. Yamaguchi described 3 teaching areas in which he had used behavior modification. V. I. Lubovsky explained his "motor conditioning" method for developing verbal control in retardates. K. Amano reported that rhythm training has been found to contribute to the acquisition of reading skills, and P. E. Bryant discussed differences in the perceptual strategies used by normals and retardates.—J. H. Pflaum.

10510. Edmonson, Barbara. (Ohio State U) **Arguing for a concept of competence.** *Mental Retardation*, 1974(Dec), Vol 12(6), 14-15.—Presents a behavioral description of competence with the argument that failure to adopt such objectives leads to easy satisfaction with the results of training of the retarded and to quick

termination of training. It is argued that the adoption of competence objectives would not only generate more continuous effort at training, but might encourage more innovative methods of training.—*Journal abstract*.

10511. Frame, Phyllis. (George Washington U) **The use of art in remedial tutoring with an 8-year-old boy.** *American Journal of Art Therapy*, 1974(Apr), Vol 13(3), 205-216.—Describes the case of a boy referred to a reading clinic. His intelligence was above average but he had a severe learning disability in the area of visual discrimination. Expressive art therapy enabled him to express fears and anxieties which interfered with his school work and thus to progress in reading and other academic areas.

10512. Frisch, Sue A. & Schumaker, Jean B. (Woolley Wood School, Sheffield, England) **Training generalized receptive prepositions in retarded children.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 611-621.—Used prompting and reinforcement in 2 experiments to teach 3 retarded children (3, 4, and 11 yrs old) to respond correctly to 3 categories of prepositional requests. Training sessions were alternated with probe sessions. During training, a child was trained to respond to 1 request (e.g., "put the doll next to the cup"); during probing, the child was tested for generalization of this training to untrained requests. Responses to untrained requests were never prompted nor reinforced. Results show that, as requests from 1 category were trained, the children's responses to the untrained requests of that category became increasingly correct. As discriminations among 2 or more categories were trained, the children's responses to the untrained requests of those categories also became increasingly correct.—*Journal abstract*.

10513. Gillespie, Patricia H. & Fink, Albert H. (Indiana U, School of Education, Ctr for Innovation in Teaching the Handicapped) **The influence of sexism on the education of handicapped children.** *Exceptional Children*, 1974(Nov), Vol 41(3), 155-162.—Views the sex label as having a pervasive influence on the education of handicapped children. Specific attention is drawn to (a) biases contained within special class curricula which reinforce traditional roles, (b) vocational training practices which program children for economic discrimination by encouraging selection of traditional occupational roles, and (c) special class placement processes which result in the selection of a greater number of boys than girls in all significant areas of exceptionality. The implications for major activities within special education are discussed. (48 ref)—*Journal abstract*.

10514. Gow, David W. (Gow School, South Wales, NY) **Dyslexic adolescent boys: Classroom remediation is not enough.** *Bulletin of the Orton Society*, 1974, Vol 24, 154-163.—Presents a pragmatic discussion of the characteristics of the language-disabled adolescent. Techniques to be used to improve the adolescent's self-concept and social comprehension are suggested. Academic classroom activities are only a part of the remediation process.

10515. Greelis, Michael. (Mental Retardation Inst, Valhalla, NY) **Media stimulation and exceptional children.** *Mental Retardation*, 1974(Dec), Vol 12(6), 30-31.—Describes a media stimulation project which utilizes 2 categories of video equipment—live video



systems and prerecorded video tapes—as a therapeutic aid. The project is based on the assumption that a retarded child who is functioning at a medium to high level can recognize his self-image and will respond favorably. Pilot studies at a mental retardation institute indicate the validity of this presumption.—*M. E. Pounsel.*

10516. **Guerin, Gilbert R. & Szatlocky, Kathleen.** (U California, Ctr for Research in Special Education, Berkeley) **Integration programs for the mildly retarded.** *Exceptional Children*, 1974(Nov), Vol 41(3), 173-179.—Examined programs that integrated mentally retarded students in 8 California school districts. Interviews were conducted with 17 administrators and 31 teachers. Regular classroom observations were made of 27 retarded pupils and 54 randomly selected nonretarded pupils. 4 program models were identified and an index of integration was developed and applied to each program. The attitudes of administrators toward integrating programs, with only 1 exception, was positive, and the majority of teachers also held positive attitudes. The behavior of the retarded students was found to be similar to that of regular students.—*Journal abstract.*

10517. **Iwata, Brian A. & Bailey, Jon S.** (Florida State U) **Reward versus cost token systems: An analysis of the effects on students and teacher.** *Journal of Applied Behavior Analysis*, 1974(Win), Vol 7(4), 567-576.—Studied the effects of reward and cost token procedures on the social and academic behavior of 2 groups of elementary special-education students, using a reversal design. Behavioral observations of 3 target Ss in each group revealed that both procedures were about equally effective in reducing rule violations and off-task behavior. Records kept on the daily arithmetic performance of all Ss showed that output doubled in both groups during the token phases, although accuracy remained unchanged. When students were allowed to choose either contingency, no pattern of preference was established. Small differences were found in teacher behavior: the reward procedure led to an increase in approval comments, but cost procedures produced no changes in teacher behavior.—*Journal abstract.*

10518. **Jenkins, Joseph R.; Mayhall, William F.; Peschka, Corrinne & Townsend, Verlinda.** (U Illinois) **Using direct and daily measures to increase learning.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 605-608.—Conducted a study of 6 6-9 yr old primary-level learning-disabled children to examine the effects of direct and daily measurement of Ss' performance on their learning. In one condition a resource teacher had access to these measures; in another condition these measures were not available. Results show that Ss increased their rate of word recognition significantly more when these measures were available.—*Journal abstract.*

10519. **Jones, Fredric H. & Miller, William H.** (U Rochester) **The effective use of negative attention for reducing group disruption in special elementary school classrooms.** *Psychological Record*, 1974(Fal), Vol 24(4), 435-448.—In a private school for 9-14 yr old behaviorally deviant children, 2 teachers who led orderly discussions were designated as "comparison teachers" and 2 whose discussions were characterized by excessive disruptiveness were designated "target teachers." Appro-

priate and disruptive student behaviors as well as positive, neutral, and negative teacher attention contingent upon each class of student behavior were recorded. In an ABA design with follow-up, the target teachers were trained to dispense negative attention contingent upon student disruptiveness in a manner similar to that of the most effective comparison teachers. Intervention reduced disruptiveness in the target classrooms, and follow-up indicated that skills learned by target teachers were being used effectively 3 mo later. Comparison teachers decreased use of negative attention throughout the year without loss of classroom control.—*Journal abstract.*

10520. **Karen, Robert L.; Elsner, Melvin & Endres, Robert W.** (California State U, San Diego) **Behavior modification in a sheltered workshop for severely retarded students.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 338-347.—Conducted a study of 10 severely retarded 16-19 yr olds to investigate the effects of a token system and a prosthetic modification (screening of a sheltered workshop area) on Ss' work behavior. Task-specific performance measures of average error and production in each of 5 nursery-can production tasks and the generalized work performance measure of average visual inattention-verbal prompt were observed during baseline, training, and follow-up. Grouped data reveal differences in task difficulty, a reduction in average error, and an increase in average production with the tokens. Average visual inattention-verbal prompt decreased irrespective of the tokens, and there were individual differences in average error, production, and visual inattention-verbal prompt.—*Journal abstract.*

10521. **Kazdin, Alan E. & Forsberg, Sara.** (Pennsylvania State U) **Effects of group reinforcement and punishment on classroom behavior.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 50-55.—Used group token reinforcement and punishment procedures to alter appropriate behaviors in a class of educably retarded students. Baseline observations were made to determine the rate with which 6 11-12 yr old students were performing appropriate behaviors. A group token program was implemented where students could earn points if the entire class was paying attention when a timer sounded at various time intervals. Points earned could be exchanged at the end of each day for a special event. This program was removed and points were given to the group independent of performance. In the final phase a punishment procedure was used in which points were given at the beginning of the class session and withdrawn from the group if anyone was not attending when the timer sounded. Results show that appropriate behaviors increased over baseline during the reinforcement and punishment phases. Performance tended to decline when the tokens were delivered without requiring appropriate behavior. Practical advantages of group procedures are discussed. (19 ref)

—*Journal abstract.*

10522. **Keogh, Barbara K. & Hall, Robert J.** (U California, Los Angeles) **WISC subtest patterns of educationally handicapped and educable mentally retarded pupils.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 296-300.—The scaled scores of the WISC for 157

Ss were grouped according to Witkin's 3 factors (e.g., verbal comprehension, attention-concentration, and analytical-field-approach). Significant differences in analytical, attention, and verbal-index scores were obtained. It is concluded that treatment programs should be individualized after diagnosis because standardized approaches designed to help these types of children tend not to be helpful.—H. Kaczkowski.

10523. Kiraly, John & Morishima, Akira. (U Iowa) **Developing mathematical skills by applying Piaget's theory.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 62-65.—Discusses considerations in developing mathematical skills for the trainable mentally retarded child, using Piaget's ideas of concreteness for developing instructional skills. A curriculum guide is presented for developing mathematic skills, and instructions are included for using the curriculum. It is stressed that abstract thinking is difficult for the trainable retarded; therefore, mathematics skills should be concrete and useful in the everyday life of the child.—P. O'Brien.

10524. Laus, Michael D. (Pittsburgh School System, PA) **Orientation and mobility instruction for the sighted trainable mentally retarded.** *Education & Training of the Mentally Retarded*, 1974(Apr), Vol 9(2), 70-73.—Reports on a program designed for the trainable mentally retarded (TMR) in public school curriculums. Ss were 35 pupils from an inner city TMR program with a mean age of 16 yrs and an IQ mean of 42.7. The group had normal corrected visual acuity. Orientation in the classroom and both classroom and outdoor mobility instruction were initiated. Results show that Ss were able to safely and independently travel within their community after receiving such instruction. After 1 school year of instruction 35 pupils were traveling independently to and from school by public transportation. Adolescents who previously were transported daily from their doorstep by leased vans were initiating their own travel to and from school. It is suggested that orientation and mobility instruction should now be considered an integral part of the total curriculum for TMR pupils in the public schools.—P. O'Brien.

10525. Lichtenberger, Waldemar. [Education and instruction of the handicapped inside and outside of the "Gesamtschule." (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 130-135.—Questions the practice whereby children of marginal ability and those with deficient hearing, sight, speech, etc, because of deprived circumstances, or with general maladjustment attend special schools for the retarded with smaller classes and well-trained teachers. Although many leave these schools with normal achievements, they encounter extensive prejudice on jobs. An integration of these children into a "Gesamtschule" or complete school, where all levels are present under 1 roof, is proposed to reduce these difficulties. (English summary)—W. O. Horn.

10526. Long, Peggie A. & Anthony, John J. (School Board of Alachua Cty, Gainesville, FL) **The measurement of mental retardation by a culture-specific test.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 310-312.—Gives a number of correlations between the WISC and the Black Intelligence Test for Cultural Homogeneity. Ss

were 30 black students in classes for the educable mentally retarded (EMR). It is concluded that EMR students will score poorly on test instruments regardless of cultural specificity built into the instrument.—H. Kaczkowski.

10527. Malin, A. J. **Landmarks "down under" in mental retardation.** *Indian Journal of Mental Retardation*, 1973(Jan), Vol 6(1), 21-23.—Reports on the 12th International World Congress on Rehabilitation, held in Australia in August 1972 and attended by 2,000 delegates from 60 nations. One of the inaugural addresses described the Swedish model of "open education," which integrates the mentally retarded into normal classrooms. The Swedish situation is contrasted with that of India, where approximately half a million retardates are born annually. Since even normal classrooms are now overcrowded in India, the education of retardates is neglected and not much improvement can be foreseen.—J. H. Pflaum.

10528. McClelland, Jane. **Adolescents: It's never too late to learn.** *Bulletin of the Orton Society*, 1974, Vol 24, 141-153.—Considers diagnostic and remedial approaches to reading, spelling, writing, and speaking deficits of adolescents. Examples of these disabilities and their treatment are included.

10529. Morris, Richard J. & Dolker, Michael. (Syra-cuse U) **Developing cooperative play in socially withdrawn retarded children.** *Mental Retardation*, 1974(Dec), Vol 12(6), 24-27.—Compared 3 approaches (high-low dyad, low-low dyad, and experimenter-low shaping) to the development of cooperative play in 6 severely retarded 4-12 yr olds. Results show that pairing a high and low interacting child and the shaping procedure produced the greatest amount of cooperative play. No appreciable increase in cooperation was found by pairing 2 low interacting children or in the no-treatment condition. These results were maintained at the 3-wk follow-up evaluation.—Journal abstract.

10530. Morris, Robert H. (California State Dept of Transportation, Sacramento) **A play environment for blind children: Design and evaluation.** *New Outlook for the Blind*, 1974(Nov), Vol 68(9), 408-414.—Describes an environment comprised of 8 circular play courts arranged around a 9th court which was designed on the basis of the idea that play could be used to help blind children learn orientation skills essential for their development as individuals. Sensory stimulation, especially hearing and touch, and spatial perception are integral parts of the environment, as is the requirement that the child actively participate in order to enjoy the activities. Tactile maps and recorded instructions are also utilized. The design was presented for evaluation to a panel of experts, including orientation and mobility instructors, teachers, a psychologist, a recreation therapist, and a research designer. A majority judged the concept, the overall design, and the design of the individual elements to be "effective" or "very effective" in promoting the development of orientation skills in blind children.—Journal abstract.

10531. Mosher, Richard. (U Ottawa, School of Physical Education & Recreation, Ontario, Canada) **Effectiveness of perceptual-motor programs: An update.** *Journal of Leisureability*, 1974(Oct), Vol 1(4), 10-17.



—Reviews experimental evidence on the effectiveness of perceptual motor programs, particularly those for learning disabled children. The assumption on which most programs are based—that improvement in motor skills will generalize to cognitive tasks—is not supported by the majority of the studies in this area. Emphasis on the specificity of learning is increasing, and an alternative approach is teaching specific cognitive concepts using physical techniques. It is noted that most programs do not distinguish between different types of learning disabilities and that further research may identify variables that could facilitate development of more effective programs. (29 ref)—C. Wright.

10532. Reger, Roger. (Board of Cooperative Educational Services, Buffalo, NY) **A case study of the effects of labeling.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 650-651.—Discusses the appropriateness and relevance of labeling children who need special education. It is suggested that this case study belies the assumption that labeling is necessarily tied to the funding and provision of services.

10533. Riding, R. J. & Shore, J. M. (U Birmingham, School of Education, England) **A comparison of two methods of improving prose comprehension in educationally subnormal children.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 300-303.—Conducted a study of 100 educationally subnormal 9-16 yr olds to compare 2 methods of facilitating Ss' aural reception. Under the 1st method, an attempt was made to improve Ss' listening comprehension by providing images of the concepts in prose detail to facilitate recoding; the 2nd method decreased the rate of presentation to allow more time for Ss to analyze and store the material. Both methods produced similar significant improvements in recall performance. Ways of studying the recoding performance of educationally subnormal children to provide information to enable further improvement in reception are examined. (15 ref)—*Journal abstract*.

10534. Stoppleworth, Leland J. (Central Connecticut State Coll) **Special education and reinforcement theory: Are we reinforcing deficient behavior?** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 357-359.—Discusses the consequences of the practices of giving extra help to children who are having difficulty with a subject. It is suggested that the handicapped child's environment be analyzed with the same intensity as deficits purportedly caused by internal factors.

10535. Turnbull, Ann P. (North Carolina Memorial Hosp, Div for Disorders of Development & Learning, Chapel Hill) **Teaching retarded persons to rehearse through cumulative overt labeling.** *American Journal of Mental Deficiency*, 1974(Nov), Vol 79(3), 331-337.—20 educable mentally retarded children (mean age = 11 yrs), divided into 2 treatment groups, were given a pretest, 14 training sessions, and a posttest on a 7-position serial memory task. Experimental Ss were given specific instructions in cumulative overt labeling and practiced this technique with prompting during the 14 training sessions. On the posttest with no accompanying instructions to rehearse, all experimental Ss continued to engage in cumulative overt labeling and performed significantly better than controls. Findings are discussed

in terms of a production deficiency model with comparisons made to other rehearsal and training investigations.—*Journal abstract*.

### Counseling & Measurement

10536. ———. **Evaluation and assessment of educational research: Methods of educational enquiry, Block 6.** Bletchley, England: Open University Press, 1973. 52 p.—Presents a student workbook on the skills needed to evaluate 3 examples of published research reports on educational achievement. Specific activities include how to develop criteria for evaluating research and apply them to the actual reports. Sample evaluations are included, along with guidelines for understanding the structure of a research paper and determining whether the methodology is adequate for the goals of the study.

10537. Alvord, David J. & Brittingham, Barbara E. **Evaluating performance on national assessment objectives: Norm-referenced and criterion-referenced interpretations.** *Journal of Educational Research*, 1974(Oct), Vol 68(2), 59-61.—Utilized National Assessment of Educational Progress exercises to assess performance on specific reading objectives. The method of data analysis encompassed both norm-referenced and criterion-referenced interpretations of pupil performance. Reading assessment results from 1,105 4th graders indicate, from both norm- and criterion-referenced aspects, that performance was sufficient to suggest attainment of the objectives. Problems associated with certain aspects of the criterion-referenced interpretations are discussed and recommendations for solutions explored.—*Journal abstract*.

10538. Aschersleben, Karl. (Niedersachsen Coll of Education, Hannover, W Germany) [Transformation and standardization in education and psychology.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 118-129.—Defines and explains, using examples, linear, plane, rectangular transformations and normalizations of raw data. Grades, C and stanine norms, IQs, Z and T scores are compared and evaluated. (English summary) (35 ref)

10539. Bernal, Ernest M. (U Texas, San Antonio) **Gifted Mexican American children: An ethno-scientific perspective.** *California Journal of Educational Research*, 1974(Nov), Vol 25(5), 261-273.—Determined whether behavioral descriptors abstracted from interviews with Mexican-American barrio residents could be used to differentiate gifted Chicano children from their average peers. A purposive sample of 54 5-9 yr old gifted and average children from 2 Texas cities was tested with 3 different instruments—the WISC, the Torrance Tests of Creative Thinking, and E. A. De Avila's Cartoon Conservation Scales. Ratings on 43 behaviors were subjected to multiple discriminant analysis. Results indicate that 9 items had high discriminant power, including high grades in school, large vocabulary for S's age, and ability to learn quickly. Chicano views on giftedness are summarized, and implications for cross-cultural research and education are discussed. (27 ref)—*Journal abstract*.

10540. Borman, Christopher & Reilly, Robert R. (Texas A&M U) **Vocational guidance in the '70's.** *Texas Personnel & Guidance Association Journal*, 1972(Sep), Vol

1(1), 32-37.—Reports on 4 conferences held in each of 4 Texas cities, and the resulting strategy developed by the planners for counselors in vocational guidance. The conference speakers stated that high school curriculums are inappropriate for 60% of the students. Career development cannot be separated from personality development; vocational guidance must therefore be concerned with attitudes and attitude change. It might also involve the identification and possible alteration of a counselor's values and expectations.—*H. H. Crouch.*

10541. **Burke, William M.** (U Massachusetts Medical School, Worcester) **Attitudes and the utilization of health services.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 320-324.—Administered a questionnaire to a probability sample of 718 college students to determine the relationship between attitudes and the decision to utilize professional medical services and the type of service utilized. 56.3% of the respondents, with a higher proportion of females, utilized some type of medical service. Females also reported more days of restricted activity (need). Variables measuring reported symptoms and days of restricted activity (morbidity) were the best predictors of utilization. Attitudes, while significant in the decision to utilize professional medical services, were more significant in the decision concerning type of service to utilize.—*F. Beyer.*

10542. **Capuzzi, Dave.** (Our Lady of the Lake Coll, Counselor Education Program) **Academic skills counseling: Guidelines for program implementation.** *Texas Personnel & Guidance Association Journal*, 1972(Sep), Vol 1(1), 25-31.—Provides suggestions for counselors interested in implementing future academic programs. The counselor can work individually or with small groups. He should ascertain which clients have attitude or personal concerns and which have weak study and reading skills. Self-reports, tests, and feedback from instructors can be utilized. It is suggested that clients commit themselves to 3 1-hr sessions/wk, the 1st for attitude and personal concerns, the others to develop study and reading skills. Objectives for the study and reading skills area are given, and questions for the counselor to ask before attempting academic skill counseling are suggested.—*H. H. Crouch.*

10543. **Cary, Gene & Papalia, Anthony S.** (Milton Hershey Medical School, Hershey, PA) **A college mental health program that works.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 288-294.—Describes the addition of psychiatric services to a small state college and the resulting collaboration and integration of the psychiatric, counseling, and medical services. Several case histories are presented to illustrate the interaction between the 3 services in evaluating and treating various medical, psychiatric, and educational problems. Initially the counseling center acts as the main channel of communication by referring most psychiatric and medical cases. Further collaboration is exemplified by interdisciplinary staff conferences and consultations and supervision when needed. Results of the integrated program show an increase in use of services in addition to more effective functioning of the individual disciplines. (23 ref)—*F. Beyer.*

10544. **Crabbs, Michael A. & Kissler, John M.** (Westside High School, Omaha, NB) **Guidance innova-**

**tions: Videotaping for relevance.** *Audiovisual Instruction*, 1974(Sep), Vol 19(7), 20-23.—Based on the experiences of a secondary school guidance department, it is suggested that videotape equipment may be a valuable tool for the dissemination of career and educational material to students. The development and effects of videotapes on such topics as college entrance test interpretation and the college planning process are described. Questionnaire evaluation by high school juniors indicates that 262 (86%) felt the videotapes had been worthwhile and would be willing to watch over videotapes on college information. Implications for school counselors are discussed.—*A. Olson.*

10545. **Craig, Thomas J.** (Johns Hopkins U, Medical School) **Evaluating utilization and outcome in a small college mental health service: Implications for future planning.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 295-301.—Examined the functioning of a system-wide approach to mental health care in a small 4-yr professional arts college. The mental health service consisted of a consulting psychiatrist, a referral clinic, and informal sessions—moderated by the Dean of Students—for students with less severe problems. Clinical and academic records of students utilizing psychiatric services during 1 academic year were reviewed. Data indicate that the majority of the 44 students seen were freshman and junior transfers experiencing situational disorders. The need was established for prevention measures for identifying 2 generally unrecognized groups, those with psychotic experiences and those dropping out of school. Significant increases in grade point averages were indicated following consultation, particularly for students who followed through on referrals. The importance of defusing responsibility for prevention, identification, treatment, and rehabilitation is discussed. (23 ref)—*F. Beyer.*

10546. **Dinkmeyer, Don.** (DePaul U) **Facilitating communications: A mutual concern of counselors and teachers.** *Texas Personnel & Guidance Association Journal*, 1973(Mar), Vol 2(1), 4-11.—Sees the counselor's role as affecting teacher-student relationships and class-run processes. The counselor should provide service beyond the one-to-one (and small group) counseling; he should also be a consultant to the staff and a coordinator of staff-student activity. 2 procedures are described which personalize and humanize relations between teachers and students: (a) the "C" group format with teacher groups, so called because the 10 factors that make the group effective begin with "C" (collaboration, consultation, clarification, etc); and (b) the program called Developing Understanding of Self and Others (DUSO), with 1 kit for kindergarten and the primary grades, and 1 for Grades 3 and 4. Students in the DUSO program become responsible for their own learning. The counselor demonstrates materials in classrooms and conducts practical in-service experiences which help teachers acquire competency in intellect-affect-behavior education.—*H. Crouch.*

10547. **Doyle, Kenneth O. & Whitely, Susan E.** (U Minnesota, Measurement Services Ctr) **Student ratings as criteria for effective teaching.** *American Educational Research Journal*, 1974(Sum), Vol 11(3), 259-274.—Discusses the concern felt in many quarters about the use of



student ratings as criteria for effective teaching. A rating instrument was administered to students in a multisection beginning-language course. Across- and between-sections data were studied for generalizability and validity. Results indicate that student ratings overlapped with one of the principal criteria of teaching effectiveness, i.e., classroom achievement, yet possessed a unique component. Ramifications of the "across" and "between" distinction are explored.—*Journal abstract.*

10548. Eisenberg, Sheldon. (Syracuse U) **Exploring the future: A counseling/curriculum project.** *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 527-533.—Proposes the establishment of a curriculum that will engage students in a study of the future. The goals of this curriculum are to (a) help students develop a sense of personal agency toward their futures, and (b) help them acquire the skills involved in planning and decision making. To lead this process of exploring personal futures should be an inherent function of counselors.—*J. F. McIlvaine.*

10549. Feshbach, Seymour; Adelman, Howard & Fuller, Williamson W. (U California, Los Angeles) **Early identification of children with high risk of reading failure.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 639-644.—Compared 2 alternative models for identifying kindergarten-age children with a high risk of becoming reading failures. One model places primary emphasis on psychometric test procedures assessing linguistic and perceptual-motor skills related to reading readiness. The alternative strategy is based upon the kindergarten teacher's evaluation of the child's skills and behavior, with particular emphasis on the discrepancy between a child's specific competencies and those required for success in a particular 1st-grade classroom. Data were obtained from use of both strategies with 1,732 kindergartners from 10 middle-class urban schools. Significant correlations resulted between the various measures taken in kindergarten and reading achievement test scores obtained at the end of 1st-grade.—*Journal abstract.*

10550. Friedman, William H. & Reifler, Clifford B. (U North Carolina, Chapel Hill) **How come you guys in mental health don't see more patients?** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 274-278.—Traditionally, campus medical and mental health services use the number of patients seen per unit of time as an indicator of activity. This practice results in the misleading conclusion that mental health workers see only a small number of patients. Differences between the medical and mental health practices are discussed in terms of "indirect services," and the alternative of accounting for number of staff hours paid for by the health service instead of reporting a patient count is suggested. A detailed system for reporting time is presented and its success in 4 clinics is discussed.—*F. Beyer.*

10551. Goetzl, Ugo. **The traditional role of a psychiatric consultant in a nontraditional college.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 284-287.—Discusses the establishment and operation of a part-time consulting psychiatrist arrangement to fulfill the needs of a small nontraditional college. In contrast to most mental health literature, the

community psychiatry model was limited in its usefulness.

10552. Kennedy, Helena. (Seattle Area School System, WA) **Changes in task-specific self-concepts after vocational evaluation.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Jun), Vol 7(2), 27-33.—Studied 20 high school age reluctant learners (students with learning problems caused by anything other than mental deficiency) to determine whether task-specific self-concepts became more accurate after 2 wks of vocational evaluation and exploration. Students were assigned vocational evaluators and an abilities self-rating form (ASRF) was administered on the first and last days of the study. Evaluator ratings of student aptitudes were obtained using the Client Performance Rating Form, a parallel of the ASRF. Results support the hypothesis that, following the 2-wk program, student self-concepts relating to the ability to perform specific tasks would change in the direction of increased agreement with vocational evaluator observations of performance.—*A. de la Haba.*

10553. Kirshner, Lewis A. (Harvard U, Health Services) **A follow-up of a freshmen group counseling program.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 279-280.—Examined the motivation, needs, and degree of emotional disturbance of 53 freshmen in a counseling program. Student volunteers participated in informal weekly discussions, led by psychiatrists and psychologists, which emphasized college adjustment. 83% ( $n = 44$ ) of the students who attended at least 1 meeting responded to questionnaires as part of a 1-yr follow-up. Motivation for attendance was indicated by a desire for therapy and interest in meeting others. Although a high degree of emotional disturbance was reported, in most cases the counseling experience eliminated the seeking of psychiatric help. The program is considered an effective preventive measure for dealing with "problem students."—*F. Beyer.*

10554. Laurer, Philip J. (U Arizona, Coll of Education) **Consulting with teachers: A systematic approach.** *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 535-540.—Stresses that counselors need and wish to reach more students through effective consultation with teachers. While the desirability of consulting has been established in professional literature, the counselor may be uncertain about how to begin a consulting role and relationship with teachers. Systematic procedures to develop this consulting relationship are discussed.—*J. F. McIlvaine.*

10555. Lindell, Ebbe. **[What is good language? Some results from the project FRIS: Free writing in the intermediate stage of the comprehensive school.]** (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Nov), No 251, 9 p.—Reports findings of studies which suggest that the quality of essays can be described by the aid of objective data from linguistic analyses. It is suggested that judges of essays take both creativity and correctness into consideration.

10556. Lucas, C. J. & Crown, Sidney. (University Coll London, Health Ctr, England) **Concepts and methods in student mental health.** *British Journal of Psychiatry*, 1974(Dec), Vol 125, 595-603.—Describes some changes which have occurred in the models on which psychiatric

practice in a university or college setting is based, emphasizing the practical consequences of different models for treatment, teaching, and training. The historical development of student health services in Great Britain is outlined, and the current relevance of the medical, psychological (e.g., psychodynamic, psychoanalytic, behavioral, cognitive, and psychometric), counseling, and social-interactional models of mental health to student problems is examined. It is concluded that future research should aim at both the theoretical classification of these models and at cost-benefit evaluations of them to determine their suitability for different disorders and patients.—*L. Gorsey.*

10557. Lujan, Sylvia S. & Aleman, Ramon. (Pan American U, Counseling Ctr) **El chavalo de los hijos de MACEP. (The grandchild of MACEP).** *Texas Personnel & Guidance Association Journal*, 1973(Mar), Vol 2(1), 23-30.—Evaluates a 1-semester guidance and counseling program, conducted after the authors had been trained at the Mexican-American Counselor Education Project (MACEP). Each author was assigned to 3 schools, involving a total of 87 teachers and 2,200 children, kindergarten through 8th grade. Each shared office space with nurses, which meant distractions during counseling sessions. They could appreciate the conflicts of biculturalism which they themselves had experienced as adolescents. These evaluations will help to plan future cooperative counseling.—*H. Crouch.*

10558. Maitland, Suzanne; Nadeau, J. B. & Nadeau, Gretchen. (Dartmouth Coll, Medical School) **Early school screening practices.** *Journal of Learning Disabilities*, 1974(Dec), Vol 7(10), 645-649.—Conducted a questionnaire survey of 980 US school districts to determine the prevalence of early school screening practices, the specific tests employed, and the use made of the test results. Data from 581 responding districts indicate that a majority did screen, and there was great variability in the measures they employed. Although there are many published measures for kindergarten and 1st-grade, only the Metropolitan Readiness Tests were used by a high percentage of school districts. Tests given at the end of the kindergarten year were most often used for determining 1st-grade placement; tests given at the beginning of the kindergarten or 1st-grade year were used equally often to individualize instruction.—*Journal abstract.*

10559. Marcotte, Donald G. (Niles Township Community High School, North Div, Skokie, IL) **An approach to the problem student problem.** *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 548-551.—Discusses the strategic program implemented by a high school to coordinate the pupil personnel staff in reducing patterns of misbehavior, truancy, and academic failure for entering students. The program consisted of a series of counseling seminars in which the students were given information and training to (a) reduce anxiety-producing situations; (b) promote optimal educational, social, and emotional growth; (c) assist them and their parents in developing positive attitudes toward the school and to assist the school in maintaining positive attitudes toward the students; and (d) encourage students to take advantage of academic and extracurricular activities. A

detailed description of the program and its guidelines are presented.—*J. F. McIlvaine.*

10560. McNeil, Keith A. & Phillips, Beeman. (Educational Monitoring Systems, Ann Arbor, MI) **The factor structure of the School Anxiety Scale in a college population.** *College Student Journal*, 1974(Sep-Oct), Vol 8(3), 63-67.—Revised the Test Anxiety Scale for Children (TASC), which contained 198 items, to create a 24-item School Anxiety Scale (SAS) as a measure of test-anxiety among a college population. The SAS was administered to 788 male and female Ss at Southern Illinois University. 5 factors, accounting for 87.8% of the variance, were identified: (a) Fear of Rejection by Others, (b) Fear of Taking Tests, (c) Lack of Confidence in Meeting Expectations by Others, (d) Physiological Reactivity Associated with Low Tolerance of Stress, and (e) Peer Evaluation.—*A. J. Ter Keurst.*

10561. Neville, Mary H. & Pugh, A. K. (U Leeds, England) **Context in reading and listening: A comparison of children's errors in cloze tests.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 224-232.—Tested 66 9-10 yr olds in 2 groups with 2 parallel forms of a cloze test of silent reading comprehension—the GAP Reading Comprehension Test. The same tests were then given as cloze tests of listening comprehension. Each group received different parallel forms in each of the language modes. The scores for the listening tests for both groups were significantly lower than the reading scores. Significantly fewer responses were made in the listening mode. Analysis of errors made in both modes reveal that 44% of errors in the reading tests and 37% of errors in the listening tests were syntactically appropriate responses. (29 ref)—*Journal abstract.*

10562. Peterson, Carol J. (St Mary's Junior Coll, Nursing Project, Minneapolis, MN) **Development of oral quizzes in a multimedia approach.** *Educational Technology*, 1974(Apr), Vol 14(4), 47-51.—Argues that oral quizzes are preferable to written objective tests in certain instructional situations because they tend to require responses at higher cognitive levels. Oral quizzes also provide practice in social interaction as well as exercising the students' verbal skills. A scoring system is described. Students regard these oral quizzes with mixed feelings.—*C. B. Kreitzberg.*

10563. Prout, H. Thompson & Phillips, Preston D. (Indiana U) **A clinical note: The kinetic school drawing.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 303-306.—Describes how the Kinetic School Drawing can be used as a projective instrument in a clinical battery to assess the child's perception of himself, his teachers, and his peers. Several examples are given.

10564. Rosenstock, Harvey A. & Hansen, Douglas B. (Baylor Coll of Medicine, Houston, TX) **Toward better school adaptability: An early adolescent group therapy experiment.** *American Journal of Psychiatry*, 1974(Dec), Vol 131(12), 1397-1399.—Reports an experimental study in which 8 7th graders with behavior problems in school were given group therapy during school hours. Compared with a control group of 8 problem students who received no therapy, the students who participated in group therapy showed significantly improved behavior on 2 measurements. It is concluded that in-school group therapy is an effective means of increasing the adaptability



ity of young adolescents with behavior problems to the academic and interpersonal milieu of school.—*Journal abstract*.

10565. Rothman, Carole. (Herbert H. Lehman Coll, City U New York) **Differential vulnerability of WISC subtests to tester effects.** *Psychology in the Schools*, 1974(Jul), Vol 11(3), 300-302.—Reports on the vulnerability of WISC subtests to tester effects under ordinary testing conditions. Overall results are in agreement with other studies that investigated this problem.

10566. Röhm, Hartwig. [Problems of student evaluation.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(2), 94-102.—Stresses the influence of grading achievements as well as the personality on students' self-concepts, motivation, and future employment. Examples of the unreliability of grading essays and the influence of social background, sex, etc, are cited. 4 school episodes are described to illustrate stereotyping, prejudice, projection, and rigidity. The significance to these teacher attitudes in coping with student behavior and in the teacher's mental hygiene are discussed. (English summary) (22 ref)—*W. O. Horn*.

10567. Smits, B. W. (Katholieke U, Inst voor Onderwijskunde, Nijmegen, Netherlands) **[A random sample investigation by means of the similarity of norms.]** (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(May), Vol 29(3), 213-227.—Measured the reliability of the following standardized tests: the Mechanical Ability in Reading Test (MART) by S. Wieggersma; the Interest, School Progress and Intelligence Test (ISIT) by J. T. Snijders and V. J. Welton; the Achievement Motivation Test (AMT) by H. J. Hermans; the School Entrance Test (SET) by J. Luning Prak; and the Pintner-Durost Lower School Test (LST) revised by Luning Prak. Published norms of the tests are compared with those obtained by testing pupils in 25 schools. Results indicate that the norms of the MART were reliable. Those of the ISIT were acceptable, although some of the published norms were too low. Differences between published and test norms of the AMT were minor. For the SET and LST, the lack of information about the conditions of the original samplings raises questions about the reliability and validity of the results of the tests.—*A. J. Ter Keurst*.

10568. Stubbs, Joseph B. & Tucker, G. Richard. (American U Beirut, Lebanon) **The cloze test as a measure of English proficiency.** *Modern Language Journal*, 1974(Sep-Oct), Vol 58(5-6), 239-241.—Evaluated the use of the cloze test in assessing foreign students' proficiency in English. A high correlation was found between exactly correct responses and contextually acceptable responses ( $p < .01$ ), indicating that only the 1st type of response need be scored.

10569. Van der Ven, Ad H. (U Nijmegen, Psychological Lab, Netherlands) **The correlation between speed and precision in time-limit tests.** *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Sep), Vol 29(6), 447-455.—Presents 2 models of the relationship between speed and precision. Model 1 postulates that for a given S precision is a monotonically linear function of decreasing speed. Another assumption for Model 1 is that precision is a uniparametric function of speed. In a study of 8- and 9-yr-old children, the Ss were asked to

indicate a special grouping of dots among 25 designs, and were then motivated to increase their speed. The number of items selected increased enormously but the proportion of correct markings did not change. Model 2 is based on the concept that precision remains constant while speed varies. The covariance of precision and expected speed is zero. The factor of mental effort cannot be measured directly.—*A. J. Ter Keurst*.

10570. Vincent, Denis. (National Foundation for Educational Research, Guidance & Assessment Service, Windsor, England) **Reading ages and NFER reading tests.** *Educational Research*, 1974(Jun), Vol 16(3), 176-180.—Discusses practical and theoretical weaknesses of the concept of "reading age." Methods of computing average reading age are ambiguous, and there is a tendency for reading age to become a fixed property of a pupil rather than an estimate of his standing relative to time of testing or choice of test. Because too little is known of relationship between age and reader development, the assumption that there is a linear pattern of reading development over time is unwarranted. The "reading age" concept is easily misunderstood by parents and teachers. It is suggested that there is a strong case for abandoning it in favor of other kinds of scales employed in modern education.—*J. B. Francis*.

10571. Wathelet, André (Ctr psycho-medico-social, Ixelles, Belgium) **[A psychopedagogical explanation of the development of a 4th primary grade arithmetic test.]** (Fren) *Revue Belge de Psychologie et de Pédagogie*, 1973(Dec), Vol 35(144), 89-112.—Reports on the creation of a new test of arithmetic achievement for 4th graders in Belgium. Guidelines of the American Psychological Association were followed throughout. Detailed analysis indicates that discrimination, validity, reliability, and other factors of the completed test are acceptable.

10572. Weiner, Hubert. (Northern Illinois U) **A comparison of frequent and non-frequent health service users.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 315-319.—Studied the relationship between 16 male and 17 female characteristics and student health service usage at Northern Illinois University. The 408 students randomly selected were predominantly from a moderately educated middle-class background. Student characteristics were divided into 4 groups: personal-social, high school activities, academic experience, and health experience. Results of chi-square tests indicate significant relationships for males between 1 or more health service visits per semester and 6 personal-social characteristics. For females, significant relationships were found between health service usage and 4 personal-social characteristics and 3 health experience characteristics. The high proportion of significant personal-social factors for both sexes suggests that health service usage is socially and culturally learned behavior. Recommendations are made for campus medical staffs.—*F. Beyer*.

10573. Winer, Jerome A.; Dinello, Frank A.; Pasca, Alyce & Weingarten, Samuel. (U Chicago, Student Mental Health Clinic) **Innovations at university mental health services.** *Journal of the American College Health Association*, 1974(Apr), Vol 22(4), 281-283.—Describes innovative techniques at 39 university-based mental health facilities in Illinois. The number and variety of

innovations were reported by clinic directors and subjected to a panel of 3 judges. Facilities were divided into 10 medical-psychiatric centers, 14 counseling centers, and 15 others. Data indicate that 79% of the counseling centers had innovations as compared to 44% of the medical-psychiatric and other facilities combined. Reported innovations were divided into 10 categories and comparisons were made between services currently offered, services desired but not offered, and services discontinued. The importance of adapting mental health services to student needs is emphasized.—F. Beyer.

10574. Wolff, Thomas. (U Massachusetts, Amherst) **Helping students change the campus.** *Personnel & Guidance Journal*, 1974(Apr), Vol 52(8), 552-556.—Focuses on issues and expectancies in programs designed to help college students change the academic and living environment on their campuses; specifically, programs and their resultant issues as they developed at the University of Massachusetts at Amherst in activities run by the university health service. The 4 programs involved (a) training health consumers, (b) training social change agents, (c) working with a group of discontented veterans, and (d) working with a group of discontented paraprofessionals. Each program is discussed in detail, and the influence of the programs on the entire university population is reported.—J. F. McIlvaine.

## APPLIED PSYCHOLOGY

10575. Belanger, P. et al. (McGill U, Montreal, Quebec, Canada) **System simulation: On the modeling of large-scale health care systems.** *Behavioral Science*, 1974(Nov), Vol 19(6), 407-414.—Suggests that mathematical modeling of the system elements' functional properties allows the generation of a macromodel involving the flows of demands and resources, which can be useful for planning purposes over a time span of 5-10 yrs. Computer simulation runs can quickly compare many different strategies for their effect on system performance provided that adequate data are available on the unit cost distributions and effectiveness. The choice of flow parameters is discussed in addition to the difficult problems of resource allocation and appropriate measures of system performance.—*Journal abstract*.

10576. Johnson, Edgar M. **The effect of data source reliability on intuitive inference.** *US Army Research Institute for the Behavioral & Social Sciences, Technical Paper*, 1974(Jul), No 251, 26 p.—Presented military intelligence reports from data sources of given reliability and diagnosticity to 22 US Army enlisted men in a series of 2 hypothesis-decision problems. Each problem required the S to indicate the most likely of 2 hypotheses and to state the subjective odds. Results indicate that the subjective odds varied as a function of data diagnosticity and source reliability. Subjective odds were generally conservative when compared with the Bayesian model, with the exception that as reliability decreased subjective odds increased. Ss tended to use nonoptimal inference strategies with reliabilities as multiplicative weighting factors. Findings suggest several techniques for improving inferences based upon unreliable data. (19 ref)—A. J. Drucker.

10577. Katz, Fred E. (Tel-Aviv U, Israel) **Indeterminacy in the structure of systems.** *Behavioral Science*, 1974(Nov), Vol 19(6), 394-403.—Discusses theory of systems by concentrating directly on indeterminacy. It is suggested that indeterminacy, when bounded by limits, can be regarded as a definite component part of the structure of systems.

10578. Lipscomb, David M. (U Tennessee) **Noise: The unwanted sounds.** Chicago, IL: Nelson-Hall, 1974. 331 p. \$15.—Presents a comprehensive discussion of the types, effects, and characteristics of noise. Topics include sound, sound measurement, human responses to sound, structure and function of the ear, noise-induced stress, recreational noise, and noise control.

10579. Morse, E. V. & Gordon, G. (Tulane U) **Cognitive skills: A determinant of scientists' local-cosmopolitan orientation.** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 709-723.—Studied differences in work orientations of a group of chemical scientists, all of whom held similar positions in a single organization. Data were gathered in 1965 and 1968 using S. Mednick's Remote Associates Test, a social differentiation test, and D. C. Pelz and F. M. Andrews's "style of approach to work" questionnaire. A factor analysis of Remote Associates Test scores yielded 4 categories of researchers (integrator, problem solver, problem recognizer, and technician) which were used to classify data. Findings support the argument that the cognitive skills which enable a scientist to identify and solve problems interact with the social dimensions of his work setting so as to increase the probability of his becoming either cosmopolitan or local in his orientation, and emphasize the importance of considering individual differences in social behavior rather than solely emphasizing the importance of structural determinants in a situation. (19 ref)—L. Gorsey.

10580. Quinn, Robert P. & Shepard, Linda J. (U Michigan, Inst for Social Research, Survey Research Ctr) **The 1972-73 quality of employment survey: Descriptive statistics, with comparison data from the 1969-70 survey of working conditions.** Ann Arbor, MI: University of Michigan, Institute for Social Research, 1974. 328 p.—Presents detailed data from personal interviews conducted with 1,496 persons to investigate variables associated with the quality of employment in the US. Topics include overall physical health, job satisfaction and motivation, comparisons among labor standard problem areas, working hours, discrimination, and the meaning of work.

10581. Somers, Gerald G. (Ed.). **Industrial Relations Research Association series: Proceedings of the twenty-sixth annual winter meeting, December 28-29, 1973, New York.** Champaign, IL: R. F. Colwell, 1974. xii, 293 p. \$6.50.—Presents a collection of theoretical and discussion papers on various aspects of industrial relations, including industrial democracy and the role of management, employee attitudes, job enrichment, and the work ethic, human capital theory, and growth in labor organizations.

10582. Weick, Karl E. (Cornell U) **Middle range theories of social systems.** *Behavioral Science*, 1974(Nov), Vol 19(6), 357-367.—Argues that several analytical biases provide false positive evidence support-



ing systems theory. False positives are likely when nouns exceed verbs in theoretical language, the analogy of thermostats is used indiscriminately, phenomenology of causation is ignored, need-specific interdependencies are neglected, organizational routines are mistaken for feedback systems, and when a more coarse-grained analysis is done of effects than of origins. Awareness of biases favoring false positives should result in interdependence being treated as a variable rather than a constant and to specification of conditions under which systems theory does and does not apply. With these changes, social systems theory would become a discrete confirmed theory that applies to limited ranges of data, consolidates segregated hypotheses, and is itself available for consolidation with other apparently discrete theories. (21 ref)—*Journal abstract*.

10583. Youngling, Edward W.; Vecchiotti, Robert A.; Bedarf, Erwin W. & Root, Robert T. (McDonnell Douglas, St Louis, MO) **Job requirements of G2 air and image interpretation personnel.** *US Army Research Institute for the Behavioral & Social Sciences, Research Report*, 1974(May), No 1181, 81 p.—Reviewed the literature, conducted interviews, and analyzed questionnaires mailed to US Army aerial reconnaissance and surveillance system (AR&S) personnel to determine the tasks, duties, and procedures of G2 Air and image-interpretation personnel. Data were integrated within the framework of the Army Air intelligence system by using system flow diagrams and task analyses. The role of G2 Air officers was found to be primarily managerial, while the image interpreter's job tended to be more technically oriented. Suggestions for future training needs are provided.—*A. J. Drucker*.

#### Occupational Guidance & Personnel Selection & Training

10584. Akman, Allan & Nordhauser, Fred. (System Automation Corp, Silver Spring, MD) **A conceptual view of the Officer Procurement Model (TOPOPS).** *US AFHRL Technical Report*, 1974(Jul), No 73-73, 44 p.—Documents the conceptual design of a computer-based linear programming model of the Air Force officer procurement system called TOPOPS (Total Objective Plan for the Officer Procurement System). The principal features of the model are highlighted, a detailed description of the framework used in developing it is presented, and the mathematical model is described. An appendix presents sample input and output reports.—*Journal abstract*.

10585. Barad, Cary B.; Lawrence, Richard E. & Krieger, George W. (Social Security Administration, Baltimore, MD) **Role conflict and consensus in vocational evaluation.** *Vocational Evaluation & Work Adjustment Bulletin*, 1974(Jun), Vol 7(2), 20-26.—Gathered questionnaire data from 462 vocational evaluation and rehabilitation counseling professionals regarding potential sources of role conflict and consensus in vocational evaluation. For 5 of the 8 dimensions examined role consensus appeared to exist. Both vocational evaluators and other relevant professionals placed equal emphasis on the psychometrist, assessor, instructor, co-worker, and case coordinator aspects of the vocational evaluators' roles. The validity of the remaining 3 dimensions

(foreman, vocational counselor, and psychologist-case-worker) was agreed on by vocational evaluators and their impinging supervisors, but was a source of conflict for affiliated professionals outside the immediate field. (20 ref)—*A. de la Haba*.

10586. Fletcher, Frank M. et al. (Ohio State U) **The delivery of manpower and supportive services to rural areas.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 167-174.—Identifies problems encountered by state employment service agencies and other organizations in the delivery of manpower and supportive services to rural and migrant workers. A midwest field trip to agencies and organizations suggests that the delivery of services commensurate with those given in urban centers is feasible. Conditions and minimal services necessary for a rural employment office to operate effectively are outlined, and programs for extremely isolated areas are proposed. Ways are seen for assisting migrant Mexican-American workers to settle in rural communities. It is considered that the cost per placement of Mexican-Americans would be generally high and the cost per placement for the general rural population would be similar to that in urban offices, but the long-range benefits outstrip the costs. A formal comprehensive study by the Manpower Administration, covering 15-20 rural areas, is recommended.—*P. O'Brien*.

10587. Harwood, Richard K. (U Virginia) **Educating, rather than coaching, for the job interview.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 187-190.—Considers that, in order for students to successfully secure employment, placement counselors need to regard the total job campaign as an educational process. The process begins by accepting students as they are, helping them to identify and clarify their career strengths, weaknesses, and goals, and identifying and contacting prospective employers. It is, theoretically, a never-ending process in which the actual employment interview is a small, but important facet.—*Journal abstract*.

10588. Jukl, Eduard. (Vysoká škola strojí a elektrotechniká, Plzeň, Czechoslovakia) **[The problem of prognostication and planning the development of professional categories: Developmental tendencies of the engineering profession.]** (Czec) *Sociologický Časopis*, 1974, Vol 10(1), 68-78.—Theorizes about the potential contribution of sociology to the development and planning of trades and professions. Research findings in Czechoslovakia and elsewhere concerning the engineering profession are presented and analyzed. A discrepancy between the growing requirement of technical development and the unsatisfactory intellectual level of students at the Technical College in Plzeň is found. (Russian & English summaries) (30 ref)—*V. Fischmann*.

10589. Leung, Paul. (U Arizona, Coll of Education) **The use of behavior contracts in employability development planning.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 150-153.—Suggests the counseling procedure of the behavior contract for the enhancement of the employability development plan. Some of the difficulties associated with the use of employability development planning, such as lack of motivation for completion, can be dealt with successfully by incorporation of a behavioral contract. Specific behaviors and

responsibilities are defined and appropriate reinforcements are applied in a combined approach. Although this type of planning may require some examination of the 2 processes for full use within a manpower program, the end result appears to be a more effective use of manpower programs.—*Journal abstract.*

10590. Loomis, Rosemary & Starry, Richard. (Employment Security Div, Work Incentive Program, Green Bay, WI) **Rural WIN-ings.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 183-186.—Explores the experiences of 2 Work Incentive Program (WIN) staff members in delivering employment-related services in a rural WIN program. 3 prevalent rural obstacles to employment are dealt with: transportation, flexibility with individual cases, and sex barriers. The theory that rural areas offer few employment possibilities for WIN clients is disputed, and it is pointed out that, with flexibility and creativity, rural areas are productive in helping WIN clients become self-supporting.—*Journal abstract.*

10591. Nigro, Felix A. & Nigro, Lloyd G. (U Georgia) **The trainer as a strategist.** *Public Personnel Management*, 1974(May-Jun), Vol 3(3), 193-198.—Identifies 3 basic dimensions in the task of developing and instituting training programs: (a) identification and analysis of technical or social-psychological intervening variables; (b) strategy of decisions about training goals and means; and (c) program design, execution, and evaluation. Discussion is focused on the 2nd aspect. It is concluded that capable trainers are contextual strategists and that they strive to minimize uncertainty.—*S. E. Bowser.*

10592. Olmstead, Joseph A.; Cleary, Fred K.; Lackey, Larry L. & Salter, James A. (Human Resources Research Organization, Alexandria, VA) **Development of leadership assessment simulations.** *US Army Research Institute for the Behavioral & Social Sciences, Technical Paper*, 1974(Oct), No 257, 34 p.—Describes a project designed to develop leadership assessment simulations for use in US Army assessment centers. Simulations and associated procedures were developed to assess 3 levels of military personnel on 11 leadership dimensions as well as materials and procedures for training staff personnel to conduct the simulations and employ the assessment instruments. It is concluded that organizational simulations contribute to assessment programs in a manner that is not obtainable through other techniques.—*A. J. Drucker.*

10593. Orpen, Christopher. (U Cape Town, South Africa) **The "correct" use of personality tests: A view from industrial psychology.** *Public Personnel Management*, 1974(May-Jun), Vol 3(3), 228-229.—Notes several areas of agreement about personality tests among industrial psychologists: (a) A test whose validity is dubious cannot be accepted. (b) Assessments of clinical nature or application are unwarranted invasions of privacy. (c) A test must be demonstrated to be related to effectiveness at work. (d) Test norms must be relevant to person tested.—*S. E. Bowser.*

10594. Pate, Robert H. & Harwood, Richard K. (U Virginia) **Employment interviews: How critical.** *Journal of Employment Counseling*, 1974(Dec), Vol 11(4), 176-182.—Analyzed interview ratings of job applicants to determine the relationship between selected character-

istics and behaviors of applicants and the outcome of their interviews. Ss were 398 registrants of a university placement office who were evaluated in 1,894 interviews with 234 organizations. Findings indicate that, despite suggestions in placement literature which focus on specific aspects of the interview, applicants' actual interview behavior is evaluated on 1 dimension, and their paper credentials are evaluated on another. Results suggest that part of the cause of dispositions of employment interview results comes from candidates' interview behaviors and part comes from as yet unexplained sources. It is recommended that both job applicants and placement counselors question the validity of stereotypes of college interviews presented in the literature.—*Journal abstract.*

10595. Rivers, P. Clayton; Sarata, B. P. & Book, Thomas. (U Nebraska, Alcohol Training Program, Lincoln) **Effect of an alcoholism workshop on attitudes, job satisfaction and job performance of secretaries.** *Quarterly Journal of Studies on Alcohol*, 1974(Dec), Vol 35(4), 1382-1388.—Conducted a workshop to improve the handling of alcoholics and referrals by secretaries of agencies concerned with alcohol-related problems. 2 4-hr sessions, attended by 25 secretaries from 12 agencies, gave basic information about alcohol, the problems involved in handling alcoholics, and the functions of local agencies dealing with alcohol problems. After the workshop the employees expressed greater satisfaction about working in the field of alcoholism. Of the 18 secretaries for whom complete data were available, 12 had higher scores on a factual knowledge quiz after the workshop, 16 said the workshop helped them in dealing with other agencies and 13 in relating to alcoholics. It is concluded that the workshop increased satisfaction with employment in the field of alcoholism and increased the secretaries' ability to handle extra-agency contacts.—*Journal abstract.*

10596. Spangenberg, Ronald W. (US Air Force Human Resources Lab, Media Design & Evaluation Branch, Lowry Air Force Base, CO) **The motion variable in procedural learning.** *HumRRO Professional Paper*, 1974(Sep), No 14-74, 16 p.—Studied the effects of motion in instructional presentations. 40 Army enlisted men in their 6th wk of basic training were exposed to a motion film sequence and a still film sequence of 2 different operations involving the disassembly of an M85 machine gun, first when cued by a short demonstration, and second without cues. Ss were required to complete the disassembly task under both conditions. Findings indicate that the use of motion in display is indicated when the material to be learned consists of movement itself, or where the content is enhanced and differentiated by the cues provided. Motion did not appear to be a factor in learning procedural sequence of steps. The use of animation arrows to direct attention and to show the direction of motion did not help learning. (20 ref)—*A. de la Haba.*

10597. Ward, Joe H. & Haltman, Harry P. (US Air Force Human Resources Lab, Brooks Air Force Base, TX) **Computer-based enlistment quota reservation system using the general data management system 2000.** *US AFHRL Technical Report*, 1974(Aug), No 74-62, 25 p.—Describes the capabilities of a system



designed as a feasibility demonstration for US Air Force Recruiting Service staff. Operational commands are described which allow a user to search the data base to locate enlistment openings for which applicants might be eligible. A user can also reserve an enlistment opening when the applicant is ready to accept a position. Management can use commands that summarize openings and enlistments by Air Force Specialty Code, aptitude area, and other categories.—*Journal abstract.*

10598. Zacker, Joseph. (City Coll, City U New York) **Is opposition to social intervention resistance or coping?** *Professional Psychology*, 1974(May), Vol 5(2), 198-205.—Reports on an unexpectedly high level of initial resistance encountered in training sessions designed to reorient police officers from traditional operations to a community-oriented, neighborhood police (Team) strategy. One week training sessions were run during 4 consecutive weeks, and each session involved groups of about 32 police officers. Methods such as discussion groups, practice interventions, and simulated community meeting workshops were used to promote active decision making and interdependence among Team members. The function of the staff psychologists was to facilitate participatory learning about Team operations. A high level of initial resistance was manifest in an intense and openly expressed hostility. In all 4 groups there was a marked diminution in the opposition between the end of Day 2 and the start of Day 4, and the remainder of the training was marked by a high degree of cooperation and involvement. The psychoanalytic theory of resistance is rejected as an adequate explanation of what occurred during training. It is proposed, instead, that the opposition represented an effort to constructively increase integrity by resisting manipulation.—*B. Lindsey.*

### Job Performance & Satisfaction

10599. Feuille, Peter & Blandin, James. (State U New York, Buffalo) **Faculty job satisfaction and bargaining sentiments: A case study.** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 678-692.—A survey of 454 faculty members shows that faculty demographic and job satisfaction measures were related to perceptions of and sentiments toward collective bargaining at 1 institution which is unorganized but which has experienced substantial resource scarcities. A heavy majority of the respondents favored collective bargaining. This support was strongly correlated with expressed dissatisfaction and several demographic variables. (16 ref)—*Journal abstract.*

10600. Kalleberg, Arne L. (U Wisconsin, Madison) **A causal approach to the measurement of job satisfaction.** *Social Science Research*, 1974(Dec), Vol 3(4), 299-322.—Compared 4 commonly used measures of job satisfaction (2 single-item indicators and 2 scales—"is now" and "should be-is now") with respect to their relationship to 3 independent variables (education, occupational status, and income) in the context of a causal model that incorporates considerations of measurement error in both independent and dependent variables. Data from a previous study of 656 male office and factory workers were used. It was found that, in some cases, different indicators imply different conclusions regarding the

influence of education and occupational status on job satisfaction. The utility of a causal modeling approach to these problems is discussed. Direct and other work indicators were found to be invalid in that they produced relatively large underestimations of the effects of occupational status when compared to the 2 scales, which produced essentially the same results. (43 ref)—*Journal abstract.*

10601. Leamon, T. B. (Inst of Technology, Industrial Ergonomics Section, Cranfield, England) **An investigation into the effects of knowledge of results on operator performance.** *Ergonomics*, 1974(Sep), Vol 17(5), 639-650.—The effect of knowledge of results (KR) on the performance of 7 female operators engaged on repetitive hand work in industry was investigated over a 40-day period. Significant increases in performance were observed in the Ss during the 20-day KR period compared to the 10-day baseline, as well as significant increases in post-KR compared to KR periods. The relationship of these findings to earlier conflicting studies is discussed in terms of 2 mechanisms, the 1st utilizing information to alter and maintain the work pace and the 2nd utilizing the feedback to motivate the Ss to alter their paces. (French & German summaries)—*Journal abstract.*

10602. Lyon, Herbert L. & Ivancevich, John M. (U Kentucky, Coll of Business & Economics) **An exploratory investigation of organizational climate and job satisfaction in a hospital.** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 635-648.—Studied organizational climate and its impact on job satisfaction in a university teaching hospital. 35 nurses and 99 administrators completed a questionnaire derived from the Halpin and Crofts Organizational Climate Description Questionnaire, a 9-item measure of job satisfaction, and interviews which were held before and after the administration of the questionnaires. Results indicate that different climate dimensions influence individual job satisfaction facets and that the impact of organizational climate on satisfaction varies with the climate dimension and type of satisfaction. Some climate dimensions had no impact at all on the satisfaction facets. In general, organizational climate for both occupational groups had the most significant impact on self-actualization, a lesser impact on autonomy, and only a slight impact on esteem. (36 ref)—*L. Gorsey.*

10603. Sielaff, Theodore J. (San Jose State U) **Modification of work behavior.** *Personnel Journal*, 1974(Jul), Vol 53(7), 513-517.—Describes the results of various attempts to improve the work performance of 22-yr-old employees. After they chose a piece rate system with earnings based on units of work completed, production increased dramatically.

10604. Strauss, George. (U California, Berkeley) **Job satisfaction, motivation, and job redesign.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.

10605. Strauss, George; Miles, Raymond E.; Snow, Charles C. & Tannenbaum, Arnold S. (Eds.). (U California, Berkeley) **Organizational behavior: Research and issues.** Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.—Includes 8 chapters that focus

on various aspects of organizational behavior, including the problem of alienation among workers, methods of involving workers in management problems, conflict and conflict resolution, and organizational development.

10606. Szilagyi, Andrew D. & Sims, Henry P. (U Houston) **An exploration of the path-goal theory of leadership in a health care environment.** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 622-634.—Studied relationships between leader behavior and subordinate satisfaction and performance, unmoderated and moderated by a subordinate's role ambiguity, at multiple occupational skill levels in a hospital. Data were obtained by questionnaire (e.g., Job Descriptive Index) from 53 administrative, 240 professional, 117 technical, and 231 service personnel. Results support path-goal theory's propositions concerning the relationship between leader initiating structure and subordinate satisfaction, but not leader initiating structure and subordinate performance. (37 ref)—*Journal summary*.

### Management & Leadership

10607. Alderfer, Clayton P.; Kaplan, Robert E. & Smith, Ken K. (Yale U, School of Organizations & Management) **The effect of variations in relatedness need satisfaction on relatedness desires.** *Administrative Science Quarterly*, 1974(Dec), Vol 19(4), 507-532.—Conducted a study of 21 male middle and upper-middle managers to test hypotheses on relatedness satisfactions and desires; these hypotheses were derived from existence, relatedness, and growth (ERG) theory. Ss participated in role-playing activities based on their descriptions of actual work experiences. 3 degrees of mutuality and relatedness satisfaction were created in the role-playing experiment. Ss' desires for relatedness varied as a function of the experimental conditions and support the hypothesized curvilinear relationship between relatedness satisfaction and desires. Results were consistent with previous results obtained by field correlational methods and thus provide a link between the 2 methodologies for the study of human needs in organizational settings. A new behavior coding system is presented for scoring mutuality in interpersonal behavior and suggests that high degrees of relatedness satisfaction can be produced in a laboratory setting. (20 ref)—*Journal abstract*.

10608. Dunahee, Michael H. & Wangler, Lawrence A. (Bank of A Levy, Oxnard, CA) **The psychological contract: A conceptual structure for management/employee relations.** *Personnel Journal*, 1974(Jul), Vol 53(7), 518-526, 548.—Describes various characteristics of the unwritten contract between an employer and his employees. The employment relationship is discussed in terms of the refinement of mutual expectations that evolve during the lifetime of the contract. Thus, management functions to maintain a workable contract with each employee by (a) clearly structuring job responsibilities, (b) maintaining continuous feedback between the 2 parties, (c) emphasizing the man and the job as a total system, and (d) correlating compensation with terms of the psychological contract.—*P. L. Crawford*.

10609. Helme, William H.; Willemin, Louis P. & Grafton, Frances C. **Prediction of officer behavior in a simulated combat situation.** *US Army Research Institute*

*for the Behavioral & Social Sciences, Research Report*, 1974(Mar), No 1182, 55 p.—Of 4,000 US Army officers who took the experimental Differential Officer Battery (DOB) at entry on active duty, 900 went through a 3-day Officer Evaluation Center (OEC) simulation exercise 1-2 yrs later, performing 5 technical, 5 administrative, and 5 combat-type tasks. Successive factor analyses of OEC data yielded 30 task-specific factors and 8 major behavioral dimensions, the 2 most important being Combat Leadership and Technical-Managerial Leadership. Parallel DOB factor analyses produced 92 psychological factor scale scores and 17 major factorial dimensions of officer characteristics for validation against OEC performance. In relating major dimensions (17 DOB to 8 OEC), OEC Combat Leadership was well predicted only by the DOB Combat Leadership factor. OEC Technical-Managerial Leadership was best predicted by the DOB Scientific Potential and General Knowledge factors, which also predicted OEC Technical Staff and Tactical Staff Skills, though Technical Skills were best predicted by DOB Mechanical Technology, which did not predict other OEC dimensions.—*A. J. Drucker*.

10610. Ivancevich, John M. (U Houston) **Changes in performance in a management by objectives program.** *Administrative Science Quarterly*, 1974(Dec), Vol 19(4), 563-574.—Conducted a longitudinal study of performance in a manufacturing company using management by objectives (MBO); a multiple-time-series quasi-experimental research design was utilized. The performance of the subordinates of 181 MBO-involved supervisors in production and marketing departments is analyzed, as well as time lag, reinforcement, and sustaining improvements in performance. (33 ref)—*Journal abstract*.

10611. Kearney, William J. & Martin, Desmond D. (U Cincinnati) **Sensitivity training: An established management development tool?** *Academy of Management Journal*, 1974(Dec), Vol 17(4), 755-760.—Surveyed 225 personnel and training directors in large manufacturing firms about the effectiveness of commonly used management development instruments (e.g., game theory, T groups, role-playing, and in-basket techniques). On-the-job experiences and job transfer were perceived as being clearly more effective than any other instrument. Sensitivity training ranked lowest among the named techniques. 109 respondents (48.4%) stated that they do not set aside any portion of their management development program for sensitivity training. 78 respondents (70%) did not think that the use of sensitivity training in management programs would increase over the next 5 yrs. It is concluded that sensitivity training does not fill an important role in management development since it may be viewed as inappropriate for existing organizational goals or less effective than other techniques.—*L. Gorsey*.

10612. Leidecker, Joel K. & Hall, James L. (U Santa Clara) **The impact of management development programs on attitude formation.** *Personnel Journal*, 1974(Jul), Vol 53(7), 507-512.—Describes the results and implications of a management development program at the University of Santa Clara. Research instruments were the Public Opinion Questionnaire and the Profile of Organizational Characteristics.



10613. Price, Barbara R. (Pennsylvania State U, Law Enforcement & Corrections Services) **A study of leadership strength of female police executives.** *Journal of Police Science & Administration*, 1974(Jun), Vol 2(2), 219-226.—Measured leadership traits of both sexes at all ranks in 3 municipal police departments. The Dynamic Personality Inventory was administered to 26 women and 227 men at the rank of sergeant or above. Of 11 subscales directly associated with leadership, maturity, and self confidence, 6 showed sex differences, all but one in favor of women. It is concluded that women police executives showed more leadership potential than their male counterparts. Interdepartmental and intercity analyses of the data were not conducted due to sample size restrictions.—R. J. Albers.

10614. Ritchie, J. B. (Brigham Young U) **Supervision.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.—Examines some conceptual and methodological issues associated with the study of supervision. Supervisory style, attitudes, and policy questions are discussed.

10615. Robins, James E.; Buffardi, Louis & Ryan, Thomas G. (Bunker-Ramo Corp, Arlington, VA) **Research on tactical military decision making: Application of a decision prediction concept in a SIMTOS environment.** *US Army Research Institute for the Behavioral & Social Sciences, Technical Paper*, 1974(Mar), No 246, 53 p.—Experimentally investigated 9 potential predictors of decision quality in a test military scenario for division defensive planning. 20 US Army senior field grade officers, utilizing a fully computerized information retrieval facility (SIMTOS), participated in the experiment. Results indicate that 4 of the 9 predictors maintained substantial predictive stability in the present SIMTOS environment: (a) recency of attendance at the Command and General Staff College (CGSC), (b) CGSC class standing, (c) information request slope—the number of information requests made by the officer early in the decision-making process in relation to decision quality, and (d) terminal pause—the time between final information request and decision.—A. J. Drucker.

10616. Tannenbaum, Arnold S. (U Michigan) **Systems of formal participation.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.—Explores the relationship between participation and control. 4 major groups of formal workers' participation are discussed: legal systems, collective bargaining, consultative schemes, and behavioral science approaches. Conditions under which participation is most likely to be effective are discussed.

10617. Vujtěch, Jan. [Problem of style of management of a work group.] (Czech) *Syntéza*, 1972, (Apr), Vol 5(2), 58-66.—To determine the relationship of leadership styles to workers' preferences and leaders' effectiveness, a questionnaire measuring authoritarian, democratic, liberal (laissez-faire), and motivational leadership styles was administered to 236 employees (91 returns) of a foreign-trade government office, who worked in groups of 3 to 12. Managers were also judged by 2 independent

superiors as successful or less successful. Successful managers were more authoritarian and less democratic than less successful managers; their styles were less congruent with the style desired by their subordinates; and motivational styles characterized good human relationships. Workers with elementary school education preferred democratic leadership while workers from high school and college levels preferred motivational leadership. Administrators expressed preference for democratic and authoritarian styles while leaders expressed preference for motivational style. Unsuccessfully led employees expressed more satisfaction with their leader's style than successfully led ones. No differences were found in preferences between men and women nor older and younger workers. The laissez-faire style was rejected by all respondents. A warning is expressed about generalizing from this study. (English, German, French, & Russian summaries)—P. Babarik.

### Organizational Structure & Climate

10618. Brown, L. Dave; Aram, John D. & Bachner, David J. (Case Western Reserve U) **Interorganizational information sharing: A successful intervention that failed.** *Journal of Applied Behavioral Science*, 1974(Oct-Dec), Vol 10(4), 533-554.—Examines an interorganizational intervention conducted in a consortium of 7 schools of theology for evidence of intervention effects and for clues to the complexities of the 3rd-party role. Although the data support the hypothesis that the intervention would increase the amount and accuracy of the information shared by participant organizations, the expected increases in organizational consensus and decreases in interorganizational problems of coordination failed to materialize. Some implications of these findings are discussed, and some hypotheses about the role of 3rd parties in interorganizational interventions are generated.—*Journal abstract*.

10619. Golembiewski, Robert T.; Hilles, Rick & Kagno, Munro S. (U Georgia) **A longitudinal study of Flexi-Time effects: Some consequences of an OD structural intervention.** *Journal of Applied Behavioral Science*, 1974(Oct-Dec), Vol 10(4), 503-532.—Describes the implementation of a flexible work-hours program and analyzes its major effects, using both attitudinal and hard data. Specific outcomes of this version of a model that is currently being widely applied are discussed, though typically on the basis of anecdotal evidence and without the support of organizational development (OD) values and methods. Both the hard and the soft data indicate that the structural intervention worked but do not indicate how much of its impact was the result of the intervention as a technique and how much was a function of the culture of the host organization. It is believed that much of that impact derived from client acceptance of OD values, which found expression not only in the work-hours design itself but also in the dynamics of the implementation of that design. It is concluded that Flexi-Time installations are intimately affected by the culture and values of organizations in which they are located.—*Journal abstract*.

10620. Hrebiniak, Lawrence G. (Pennsylvania State U) **Effects of job level and participation on employee attitudes and perceptions of influence.** *Academy of*

*Management Journal*, 1974(Dec), Vol 17(4), 649-662.

—Studied the relative impact of perceived deficiency in decision making and job level on 46 general hospital mental health workers' perceptions of desired influence and 3 work-related attitudes—interpersonal trust, role tension, and commitment to the organization. All Ss completed questionnaires assessing participation in decision-making interpersonal trust, role tension, and perceptions of desired influence. Results show that (a) technological level or level of task sophistication was not strongly related to perceived deprivation in decision making, (b) job level and decisional deprivation had independent and different effects on the attitudinal and influence variables, (c) perceived deficiencies in participation were more important than level when considering desired alterations in the influence or control structure of the task unit, and (d) perceived deficiency had little impact on work related attitudes (e.g., trust and commitment). (34 ref)—*L. Gorsey*.

10621. **Kahn, Robert L.** (U Michigan) **Organizational development: Some problems and proposals.** *Journal of Applied Behavioral Science*, 1974(Oct-Dec), Vol 10(4), 485-502.—Reviews the organizational development (OD) literature, revealing that (a) much of its research is redundant and without refinement or validation, (b) the term "organizational development" itself remains scientifically undefined and primarily a convenient label for a variety of activities, and (c) the OD literature as a whole is more autobiographical than organizational in focus and scope. It is suggested that work toward resolution of these 3 problems would help the practice of OD base itself on a more mature and usable set of principles and procedures for organizational change. The adequacy and utility of the traditional dichotomy between organizational process and structure evident in the literature are questioned, and a reconceptualization of organizational structure that permits clarification of key issues in the practice and theory of organizational change is discussed. (55 ref)—*Journal abstract*.

10622. **Kroes, William H.; Margolis, Bruce L. & Hurrell, Joseph J.** **Job stress in policemen.** *Journal of Police Science & Administration*, 1974(Jun), Vol 2(2), 145-155.—Studied the factors in occupational stress experienced by policemen. Interviews were conducted with 100 male members of the Cincinnati police department involved with car patrol. Data collected included background information, perceptions of job stress, and health status. Replies to interview questions show that the most important stressors were (a) problems with administration (e.g., work assignments); (b) problems with the courts (excessive leniency); (c) community relations (e.g., negative public reactions); and (d) inadequate or defective equipment. Direct life-threatening stressors were less frequently mentioned.—*R. J. Albers*.

10623. **Miles, Raymond E.** (U California, Berkeley) **Organization development.** In G. Strauss, R. E. Miles, C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.

10624. **Nightingale, Donald.** (Queen's U, Kingston, Ontario, Canada) **Conflict and conflict resolution.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum

(Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.

10625. **Nord, Walter R.** (Washington U, Graduate School of Business) **The failure of current applied behavioral science: A Marxian perspective.** *Journal of Applied Behavioral Science*, 1974(Oct-Dec), Vol 10(4), 557-578.—Argues that Marx's writings allow the objectives, approach, and practice of applied behavioral science to be analyzed in the context of the prevailing socioeconomic system. It is contended that this system reveals latent forces which may be responsible for the failure of applied behavioral science to humanize modern organizations. J. A. Lee's (1971) modern human resources management (MHRM) paradigm and the works of MHRM theorists are discussed, and the MHRM paradigm is compared with Marx's analyses of goals for mankind, human development, work, alienation, and the progress of social change. It is contended that the assumptions and limited scope of MHRM writers are partially responsible for the failure of organizational change agents to fully achieve their goals. The Marxian approach, it is held, points to the symbiotic relationship between the MHRM paradigm and capitalistic ideology and encourages exploration of alternative power bases for humanistically oriented change. (60 ref)—*B. McLean*.

10626. **Ouchi, William G. & Harris, Reuben T.** (Stanford U) **Structure, technology, and environment.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.—Explores H. Leavitt's (1972) theory that organizations behave in ways above and beyond the individual action of its members. A review of the literature is presented on the ways in which organizations are subject to external forces in the environment and to the demands of technology.

10627. **Perlaki, Ivan.** (Československý výzkumný ústav práce, Bratislava, Czechoslovakia) **[Influence of the structure of organization units on their innovational capacity.]** (Czec) *Sociologický časopis*, 1974, Vol 10(1), 55-67.—Deals with theoretical and practical problems of institutional management under the growing pressure of innovational changes. Effective functioning of an institution will depend on the adaptability of the structure and inner processes of its subsystems—the individual organization units. The effects of specialization, standardization, formalization, centralization, and configuration of units are discussed in detail but the need to evaluate innovational capacity of units in reference to the effective functioning of the institution as a whole is stressed. (Russian & English summaries) (66 ref)—*V. Fischmann*.

10628. **Reiser, Martin.** (Los Angeles Police Dept, CA) **Some organizational stresses on policemen.** *Journal of Police Science & Administration*, 1974(Jun), Vol 2(2), 156-159.—Examines the stresses on policemen arising from personal problems, the police organization, and the work environment.

10629. **Schröder, Marjan.** (Van de Bunt & Co BV, Amsterdam, Netherlands) **The shadow consultant.** *Journal of Applied Behavioral Science*, 1974(Oct-Dec),



Vol 10(4), 579-594.—Discusses the reciprocal responsibilities of the consultant and of the shadow consultant—a consultant who, at the request of a colleague and through a socioscientific approach in mutual discussions, evaluates the diagnosis, tactics, or role adopted in a certain assignment—and the possible pitfalls encountered by each in relation to the client.

10630. Strauss, George; Miles, Raymond E. & Snow, Charles C. (U California, Berkeley) **Implications for industrial relations.** In G. Strauss, R. E. Miles, C. C. Snow & A. S. Tannenbaum (Eds), *Organizational behavior: Research and issues*. Madison, WI: Industrial Relations Research Assn, 1974. iv, 236 p. \$6.

### Human Factors Engineering & Safety

10631. Breinbauer, W. & Höfner, K. J. [Der jugendliche Kraftfahrer: Untersuchung im Auftrag des Bundesministeriums für Gesundheit und Umweltschutz. (Youthful motorists: Investigation of the commission of the state ministry for health and environmental protection.).] (Germ) Wien, Austria: Verkehrspsychologisches Inst, Kuratorium für Verkehrssicherheit, 1974. 62 p.—Compared the types of accidents of various groups of persons according to age, sex, degree of intoxication, and seriousness of resultant injury. Data from 52,763 personal injury traffic accidents show that the age variable was dominant over the sex variable, although differences in the types of accidents characteristic of drivers in certain age groups disappeared when intoxicated drivers were considered. (4 p ref)

10632. Browning, A. C. (Royal Aircraft Establishment, Farnborough, England) **City transport of the future—the high speed pedestrian conveyor: I. Ergonomic considerations of accelerators, decelerators and transfer sections.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 225-321.—Reports results of laboratory experiments investigating ergonomic factors involved in using moving pavements as a form of passenger transport. Implications for passenger safety and comfort are discussed.

10633. Phanér, Gunilla & Hane, Monica. (U Göteborg, Sweden) **Seat belts: Contextual factors and bias of reported use.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 166-170.—Studied the effects of respondent's perception of interviewer's knowledge of actual seat belt use, survey sponsorship (e.g., by the government or a university), and interviewer sex on self-reports of seat belt use. None of the 3 factors affected self-reported belt use or attitudes.

10634. Gallagher, C. C. (U Strathclyde, Glasgow, Scotland) **The human use of numbering systems.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 219-223.—Considers the role of short-term memory in the design of numbering systems for both public and industrial use, with particular reference to the manipulation of numbers and letters. (17 ref)

10635. Hultgren, Gosta V.; Knave, Bengt & Werner, Maud. **Eye discomfort when reading microfilm in different enlargers.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 194-200.—At a large banking firm, the lighting conditions were studied under which 9 50-60 yr old female employees read microfilms in different enlargers. Complaints from the staff were analyzed and compared

with the results obtained. Discomfort glare due to heavy contrasts between the dark documents on the screens and other light surfaces in the visual fields was the main cause of the complaints. It was recommended that individual near-work spectacles might decrease or eliminate some of the disturbing factors which had led to the subjective complaints. Suggestions are made for improving the enlargers.—*Journal abstract*.

10636. Kogi, Kazutaka & Saito, Yoshio. (Railway Labour Science Research Inst, Tokyo, Japan) **Rhythmic fluctuation of orientation to a continuous manual control task.** *Journal of Human Ergology*, 1973(Dec), Vol 2(2), 169-184.—Fluctuation of orientation to a tracking task was made observable by varying the controlled system characteristics according to the error level of the moment. 6 male adult Ss in each of 2 experiments performed either compensatory or pursuit tracking for 15 min, and large error increases were seen between intervals of half a minute to a few minutes. In compensatory tracking, the S was to find, as quickly as possible, randomly appearing, flickering illumination of the target spot. The critical flicker frequency thus measured was significantly lower during 15-sec periods preceding error increases than during steady control phases, low values from the former periods deviating from a normal distribution. In pursuit tracking, saccadic eye movements were found less frequently during 15-sec periods prior to large error increases, resulting in lowered instantaneous saccade rates computed from distribution of saccade intervals. Results suggest that a recurrent phase exists in which orienting to the tracking temporarily declines prior to an apparent performance decrement, presumably due to spontaneous lapse of attention. (34 ref)—*Journal abstract*.

10637. Leplat, Par J. (Ecole Pratique des Hautes Etudes, Lab de Psychologie du Travail, Paris, France) **[Criteria in ergonomic studies of road safety.]** (Fren) *Ergonomics*, 1974(Sep), Vol 17(5), 663-675.—Considers, in the light of recent work, methodological problems posed by the definition of safety criteria and their relevance to ergonomic studies. Methods of categorizing accidents are discussed, and, because of the inadequacy of the term "accident," other definitions of safety are suggested which describe the same dysfunctioning of the system. The nature and validity of several broad categories of criteria are discussed (e.g., incidents, near-accidents, infraction of rules, and characteristics of the system). Possible improvements in the study of the nature of accidents and in preventive measures arising from the use of less broad criteria are considered. (German summary) (37 ref)—*English summary*.

10638. McBay, Arthur J.; Hudson, R. Page; Hamrick, Nancy & Beaubier, Jeff. (North Carolina Dept of Human Resources, Office of the Chief Medical Examiner, Raleigh) **Alcohol impairment in highway fatalities in North Carolina, 1972.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 177-181.

10639. Prentice, John W. (Ford Motor Co, Advanced Vehicles Product Planning Office, Dearborn, MI) **The evasive action decision in an intersection accident: A game theory approach.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 146-149.—Describes a procedure which uses matrices, derived from game theory, to

determine strategies that will avoid an accident or minimize the severity of the resulting crash. An example of an accident situation is presented.

10640. Rogne, Karl. (Work Research Inst, Oslo, Norway) **Redesigning the design process: Superstructures of ships.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 213-218.—Uses open-system theory to propose an alternative process for solving social and technological problems in ship design. Cooperative residential workshops for both office and seagoing staff to increase their awareness of social trends in ship environments are described.

10641. Routledge, D. A.; Repetto-Wright, R. & Howarth, C. I. (U Nottingham, England) **A comparison of interviews and observation to obtain measures of children's exposure to risk as pedestrians.** *Ergonomics*, 1974(Sep), Vol 17(5), 623-638.—144 5-11 yr old children were discreetly followed home from school by female Os who recorded their behavior at each road crossing on concealed tape recorders. The day after being followed each S was interviewed about his or her activities the previous day. Comparison was made between the Ss' reported exposure to traffic and findings of previous studies and between the Ss' reports and observation of their journeys. The comparisons indicate that Ss slightly underreported their actual exposure but confirm earlier findings that there is a highly significant increase in exposure with age but no difference in exposure between males and females over the age range studied. (French & German summaries)—*Journal abstract*.

10642. Schuster, D. H. (Iowa State U) **The effectiveness of official action taken against problem drivers: A five-year follow-up.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 171-176.—Evaluated the effectiveness of official action such as suspension or probation taken against problem drivers. Official action was manipulated randomly up or down 1 level from the normal course of action selected at the end of a 1-hr driver improvement interview. Drivers given less-than-normal action at the interview, however, had significantly more driving accidents subsequently than did drivers with normal or more-than-normal action. A significant interaction with previous official action complicated this 2nd finding in that drivers with previous suspension, but less-than-normal action at the interview, had more accidents later than if given normal or more-than-normal interview action. It is concluded that official departmental action affects later driving accidents but has little effect on moving violations. Official action should be progressively more severe if a problem driver doesn't improve.—*Journal abstract*.

10643. Shanmugam, T. E. (U Madras, India) **Presidential address at the Conference on "Accident & Safety" conducted under the auspices of the Madras Psychology Society, on 9th October 1971.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 80-82.—Suggests that consideration be given to prevention of the injuries and deaths due to industrial and traffic accidents which can be expected to accompany technological modernization in India. Various psychological factors involved in proneness to accidents are discussed.

10644. Siegel, Arthur I. & Burkett, James R. (Applied Psychological Services, Wayne, PA) **Application of**

**structure-of-intellect and psycholinguistic concepts to reading comprehensibility measurement.** *US AFHRL Technical Report*, 1974(Sep), No 74-49, 153 p.—Attempted to clarify and define methods for increasing the capability of written training materials to transfer information to the reader. Approximately 130 recruit US Air Force men were tested, half of them on materials highly loaded with Structure-of-Intellect variables, and half on materials lightly weighted with the variables. Results support the potential of psycholinguistics and intellectual concepts for readability-comprehensibility measurement. Concepts are presented for automating the measurements described. (8 p ref)—*Journal abstract*.

10645. Smart, Reginald G. (Addiction Research Foundation, Toronto, Ontario, Canada) **Marihuana and driving risk among college students.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 155-158.—Surveyed 296 undergraduates about the frequency of driving, accident involvement, and driving charges after marihuana use. While 42% of the licensed drivers ( $n = 246$ ) had used marihuana, only 62% of those reported driving soon after that use. Few reported accidents or moving violations after marihuana use, especially in comparison to after alcohol use. The frequency of marihuana-driving occasions is only about 35% that of alcohol driving occasions, however. It is possible that if legalization resulted in increased exposure, marihuana would not be safer than alcohol for driving.—*Journal abstract*.

10646. Sternberg, Jack J.; Banks, James H.; Widener, Thomas A. & Jennings, John W. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Selected elements of a battalion integrated sensor system: Device and mix effectiveness.** *US Army Research Institute for the Behavioral & Social Sciences, Research Report*, 1974(Jan), No 1183, 81 p.—Describes the 1st phase of a research program designed to develop an effective integrated sensor system for ground surveillance utilizing several combinations of radars, night vision devices, and sensors. The results obtained in a realistic operational setting with 3 US Army officers and 75 enlisted men show that (a) all devices used were effective for surveillance and target acquisition; (b) device performance effectiveness was also related to target type, terrain, and ambient conditions; and (c) the optimal mix was judged to be a 2-device mix—a medium-range night observation device plus ground surveillance radar. At the battalion level this mix performed best when used at 3 sites simultaneously.—*Journal abstract*.

10647. Stewart, T. F. (U of Technology, Loughborough, England) **Ergonomic aspects of man-computer problem solving.** *Applied Ergonomics*, 1974(Dec), Vol 5(4), 209-212.—Interviewed industrial designers, engineers, and economists concerning hardware and software interface problems. Results show that interactive computer usage can be of considerable assistance to specialists, although there are difficulties in using the computer system to full advantage.

10648. Summala, Heikki & Näätänen, Risto. (U Helsinki, Inst of Psychology, Finland) **Perception of highway traffic signs and motivation.** *Journal of Safety Research*, 1974(Dec), Vol 6(4), 150-154.—9 20-33 yr old drivers were instructed to drive as safely as possible over



a highway route of 257 kilometers and to name all the traffic signs they saw along the route. Ss were able to report approximately 97% of the signs on the entire route and virtually all of the signs in the nonurban, nonintersection areas, while driving safely and committing no traffic violations. It is concluded that earlier experimental results pointing to the relative inefficiency of highway traffic signs are probably primarily due to the deficient motivation of drivers to use them.—*Journal abstract.*

10649. Thillainayagam, R. (Highway Research Station, Madras, India) **Roadway elements: Their relation to road safety.** *Journal of Psychological Researches*, 1972(May), Vol 16(2), 83-88.—Illustrates how factors affecting the perception, expectation, decision, and action of the driver may pertain to the occurrence of traffic accidents. A number of road characteristics, such as traffic volume, median width, horizontal alignment, and type of intersection, are described in relation to accident rate.

10650. Tonge, D. G. (Glamorgan Polytechnic, Treforest, Wales) **Logical properties of the perceived behavi-**

**our patterns of a dynamical system.** *International Journal of Man-Machine Studies*, 1974(Nov), Vol 6(6), 715-728.—In studies of machine perception and learning and in the simulation of the adaptive control aspects of human behavior, one of the basic problems is that of obtaining suitable representations of the environment. The signal sources in the external world are essentially continuous in time and space, while their internal representations are generally discontinuous, being both sampled and quantized. It is noted that the relationship between the continuous world of physics and the perceived world of discrete objects is not a simple one psychologically, and an investigation of this relationship is important both to human and artificial intelligence theory. In the present article, a mathematical framework is detailed in which basic invariance requirements on the trajectories of a dynamical system in a quantized state space are analyzed to obtain relationships between the dynamical and logical properties of the system. A method for generating internal representations is presented.—*Journal abstract.*

# BRIEF SUBJECT INDEX

Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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# PASAR Search Request Guidelines

## P PA PAS PASA PASAR

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*Charges for processing PASAR requests are based on the amount of computer time required to perform a search. Typically these charges range from \$40 to \$60 and will not exceed \$100 unless the requester is contacted first. The total charge for a search is based on its complexity and is in most cases unrelated to the number of references retrieved. For example, a complex search strategy involving many variables or limiting factors may require more computer time and may result in fewer references retrieved than a broad search with few limiting factors.*



The PASAR Request Form has been designed to assist you in constructing a comprehensive statement of your requirements. However, it should not restrict your input. Provide whatever other information you feel will augment the information specialist's understanding of your requirements. These guidelines should help to clarify items on the Request Form.

**ITEM 1. Narrative statement of search topic.** Provide a detailed description of the subject matter you wish to be retrieved. Please avoid submitting multiple, discrete requests on a single PASAR Request Form, since such cannot be processed for a single fee. However, multiple aspects of a primary subject may be requested. The distinction is illustrated in the following examples:

*Acceptable:* "the effects of socioeconomic status, education level, or birth order on career motivation in women."

"Career motivation" is the primary element of this request, while the other elements serve merely to qualify or narrow the scope of this rather broad subject area.

*Unacceptable:* "the measurement of employee attitudes concerning wages and benefits. Also desire references dealing with the factors that influence management decision-making with respect to personnel policies and procedures."

Although these two topics are closely related to the design and administration of personnel policies and procedures, two separate search strategies would have to be executed to retrieve the specific information requested, and a separate charge for each would have to be made.

**ITEM 2. Descriptor(s) relevant to dependent variable(s).** Provide a list of words or phrases that indicate the subject matter of prime interest. Descriptors for the "acceptable" example (see Item #1) might include: career motivation, career preference, and career aspirations.

**ITEM 3. Descriptor(s) relevant to independent variable(s).** Provide a list of words or phrases that will qualify or narrow the scope of the dependent variable. Descriptors for the "acceptable" example (see Item #1) might include: socioeconomic status, social class, educational level, birth order, and women.

**ITEM 4. Search qualifications.** Once the subject matter of the search has been defined, you may wish to refine it with specific requirements such as population or time frame. These qualifications are often essential to the actual information need; however, they can unnecessarily limit the search, causing retrieval of few of the relevant records. Therefore, consider your requirements carefully.

**ITEM 5. Sorting requirements.** Please indicate whether you would prefer to have references sorted alphabetically by author or chronologically by year.

**ITEM 6. Intended use of search results.** Provide a description of how the references resulting from your search will be used (e.g., definition of a research project, preparation of an article, proposal preparation, dissertation, etc.).

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PLEASE TYPE OR PRINT

1. Narrative statement of search topic:

2. Descriptor(s) relevant to dependent  
variable(s):

3. Descriptor(s) relevant to independent  
variable(s):

4. Search qualifications: (Caution should be exercised in order not to limit unnecessarily the range of references to be retrieved. We may not always be able to meet your precise needs, but will attempt to avoid types of literature that are of no interest to you.)

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b. Age group (approximate): \_\_\_\_\_ infants \_\_\_\_\_ children \_\_\_\_\_ adolescents \_\_\_\_\_ college  
\_\_\_\_\_ adults \_\_\_\_\_ aged

c. Publication date: (Current data base contains PA entries 1967 to present only.) From \_\_\_\_\_ To \_\_\_\_\_

5. Sorting requirements: ☐ Author sort ☐ Year sort

6. Intended use of search results:

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## KEY TO THE TEXT

The examples of different types of *Psychological Abstracts* records presented here are number coded to provide definition of their elements.

## JOURNAL ARTICLE ABSTRACT

'8327. <sup>2</sup>Howard, R. Lee.; Glendinning, Robert L. & Meyer, Donald R. <sup>3</sup>(Ohio State U ) <sup>4</sup>Motivational control of retrograde amnesia: Further exploration and effects. <sup>5</sup>*Journal of Comparative & Physiological Psychology*, 1974(Feb). Vol 86(2), 187-192. <sup>6</sup>Reports 5 investigations of variables related to the motivational control of retrograde amnesia for long-term habits, which result from single electroconvulsive shock treatments. Ss were 176 Long-Evans rats. In terms of the paradigms of M.J. Robbins and D.R. Meyer<sup>7</sup>(see PA Vol 44:11961), habits that were 3rd in a series were generally resistant to the treatment and were markedly impaired if the tests for retention were carried out in changed motivational contexts. The latter result is discussed in relation to the view that long-term habits are affected by the treatments if and only if, they operate as punishments. <sup>(8)</sup> <sup>9</sup>(15 ref). <sup>10</sup>*Journal abstract.*

- 1 - Record number.
- 2 - Author(s) or editor(s). As many as four are listed, if there are more than four, the first is listed followed by "et al." Succession marks (i.e., Jr., II, III, etc) are not given.
- 3 - Affiliation of first-named author/editor only.
- 4 - Article title, including subtitles: If the original article is in a foreign language, the translated title is given in brackets and the language of the original article is indicated in parentheses.
- 5 - Primary publication title and bibliographic data.
- 6 - Text of abstract.
- 7 - Reference to a previous entry in *Psychological Abstracts*. If an abstract number is unavailable at time of publication, the issue number is given. Consult the Author Index of the PA issue noted in order to determine the record number for the article.
- 8 - Summaries included in the primary publication are listed when in language(s) other than that of the article.
- 9 - Number of references is included when there are 15 or more listed.
- 10 - Abstract source.

### BOOK ANNOTATION

'8328. 'Chase, William G. ' (Ed). ' (Carnegie-Mellon U) ' Visual information processing. ' New York, N.Y. ' Academic, ' 1973. ' xiv, ' 555 p. ' \$17.50.- ' Presents a series of readings on visual processes in cognition and linguistic comprehension and on information-processing models

- 1 - Record number.
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- 6 - Place of publication
- 7 - Publisher
- 8 - Year of publication.
- 9 - Prepagination.
- 10 - Total pagination.
- 11 - Price.
- 12 - Text of annotation.

### BOOK CHAPTER CITATION

<sup>1</sup>8329. <sup>1</sup>Clark, Herbert H.; Carpenter, Patricia A. & Just, Marcel A. <sup>2</sup>(Stanford U) <sup>3</sup>On the meeting of semantics and perception. <sup>4</sup>In W.G. Chase (Ed), *Visual information processing*, New York, NY: Academic, 1973. xiv, 555 p. \$17.50.

- 1 - Record number.
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- 3 - Affiliation of first named author only.
- 4 - Chapter title.
- 5 - Referral to the whole book and its bibliographic data.

## CONTENT CLASSIFICATION

PA has subsections for some of the 17 major classification categories. These are displayed in the Table of Contents and are designed to group all abstracts relevant to a narrower topic than the major categories under a single heading. Abstracts that are relevant to a major category but not to any of the subsections are listed first and followed by abstracts that are relevant both to a major category and also to the subsections. It is expected that this will help readers locate material related to their interests more quickly.

## ABBREVIATIONS

In addition to commonly understood abbreviations\* (including all units of measurement, educational degrees, standard statistical abbreviations, and standard Latin and reference terms), standard abbreviations used in *Psychological Abstracts* records are:

ACTH	=	adrenocorticotrophic hormone	NREM	=	nonrapid eye movement
DNA	=	deoxyribonucleic acid	REM	=	rapid eye movement
E	=	experimenter	RNA	=	ribonucleic acid
EEG	=	electroencephalogram or -graph	S	=	subject
ESP	=	extrasensory perception	TV	=	television
Exp	=	experiment	US	=	United States
IQ	=	intelligence quotient	USSR	=	Union of Soviet Socialist Republics
LSD	=	lysergic acid diethylamide	WAIS	=	Wechsler Adult Intelligence Scale
MMPI	=	Minnesota Multiphasic Personality Inventory	WISC	=	Wechsler Intelligence Scale for Children

Computer languages and computer names will also be used without definition, e.g., **ALGOL**, **COBOL**, **FORTRAN**, **IBM 360**.

Language abbreviations used after translated titles are:

Afri	= Afrikaans	Geor	= Georgian	Port	= Portuguese
Alba	= Albanian	Germ	= German	Romn	= Romanian
Arab	= Arabic	Grek	= Greek	Russ	= Russian
Bulg	= Bulgarian	Hebr	= Hebrew	Sloe	= Slovene
Chin	= Chinese	Hung	= Hungarian	Slok	= Slovak
Czec	= Czech	Iran	= Iranian	Span	= Spanish
Dan	= Danish	Ital	= Italian	Srbr	= Serbo-Croatian
Duth	= Dutch	Japn	= Japanese	Swed	= Swedish
Finn	= Finnish	Lith	= Lithuanian	Turk	= Turkish
Flem	= Flemish	Norg	= Norwegian	Ukrm	= Ukrainian
Fren	= French	Poln	= Polish	Yugo	= Yugoslavian

\*Consult *Webster's New Collegiate Dictionary* for more details.

\*Consult Webster's New Collegiate Dictionary

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# PSYCHOLOGICAL ABSTRACTS

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## GENERAL

10651. ———. **Guide to scientific instruments.** *Science*, 1974(Nov), Vol 186(4165-A), 162 p.—Lists laboratory instruments and equipment along with the names and addresses of their manufacturers.

10652. Adler, Helmut E.; Adler, Leonore L. & Tobach, Ethel. (American Museum of Natural History, New York, NY) **Past, present, and future of comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 184-192.—The history of comparative psychology is very briefly traced from its modern inception in the work of Darwin. In America, the interaction among comparative psychology, behaviorism, and ethology is discussed. The impact of ethology on comparative psychology is seen as twofold, first in its revival of the nature-nurture issue and second in its broadening of research interests to include adaptation and evolution. The history of the study of these 2 processes in American psychology is briefly summarized, emphasizing their interrelatedness. The divergence in research methodologies of the ethologists who utilize field methods and the psychologists who employ laboratory methods is discussed. Future goals and research implications of current concepts and theories are proposed. (44 ref)—R. S. Albin.

10653. Adler, Leonore L. (John Jay Coll, City U New York) **Contributions of C. Lloyd Morgan to comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 41-48.—Discusses the implications of C. L. Morgan's (1894) canon for comparative psychology. This canon warned against interpretation of animal behavior as due to higher thought processes when it could be understood as the outcome of lower faculties. His effect on aspects of psychology (e.g., the nature-nurture controversy and instinctive behavior) is described.

10654. Ball, G. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[The concepts of influence, action, and operation.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 10-20.—Discusses the logic of action by defining such terms as object, system, change, and influence, action, operator, operation, operandum, and absolutely effective operation. Applications of these concepts to psychological studies are indicated. (English summary) (31 ref)—L. Zusne.

10655. Brandstaetter, Jacob & Terkel, Joseph. (Tel-Aviv U, George S. Wise Ctr for Life Sciences, Israel) **Adaptation of a double swivel for cross-transfusion.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 11-14.—Describes a system, useful in behavioral, psychological, and physiological studies, for connecting a double lumen chronic heart cannula from a freely

moving laboratory animal to a pair of stationary outlets. This system allows the connection of 2 flow-ways to the blood system of a stress-free animal.

10656. Clinton, LeRoy & Arter, Judith. (U Illinois) **A computer program for the generation of Hudson's Variance Index for categorical clustering performance.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 58.

10657. Connes, Bernard. (U Sherbrooke, Research Ctr of Psychomathematics, Quebec, Canada) **The use of electronic desk computers in psychological experiments.** *Journal of Structural Learning*, 1972, Vol 3(3), 51-72.—Describes a desk computer and its uses. Its advantages are its capacity of 22 positions/line, its adaptability and flexibility, the written print-out it produces, automatic feedback, automatic recording, and its ability to process the data it generates. Its limitations are the small size of the written display, a print-out in the form of numerals, its limited memory, and the delay between operations.—R. S. Albin.

10658. Cowen, Emory L.; Lorton, Raymond P. & Dorr, Darwin. (U Rochester) **Research in the community cauldron: A case history.** *Canadian Psychologist*, 1974(Oct), Vol 15(4), 313-325.—Discusses obstacles faced by community researchers, including being a "foreign body" to the system under examination; the time-consuming, longitudinal demands of studies in this area; the dangers of program instability and change; the need for community accountability; and the pro-action, anti-research orientation of many community program personnel. These hazards lead to riskier studies and to research that falls short of traditional standards of scientific rigor. It is concluded that unless investigators are willing to gamble with less precise, less well-controlled approaches, and to build knowledge through gross successive approximations, many significant, exciting problems of community psychology will not be studied. (French abstract)—*Journal abstract*.

10659. Dewsbury, Donald A. (U Florida) **Comparative psychologists and their quest for uniformity.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 147-167.—Asserts that there are many ways to conduct legitimate and important research in animal psychology. The quest for uniformity of approach is considered fruitless. The fact that this quest is frequently frustrated and then taken as failure of comparative psychology in general is criticized. Problem areas of this field are discussed, including development and causation, evolutionary history, and teleonomy. The lack of theory in comparative psychology is cited and it is suggested that this will eventually come from evolutionary theory. The selection of species for study, methods, criteria, and relationship to humans are described. The method of



diagnosing the health of comparative psychology by counting the number of species used in published journal papers is denigrated. (90 ref)—R. S. Albin.

10660. Dunlap, William P. & Duffy, John A. (Tulane U) **FORTRAN IV functions for calculating exact probabilities associated with  $z$ ,  $\chi^2$ ,  $t$ , and  $F$  values.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 59-60.

10661. Eisner, Donald A.; Kosick, F. Roger & Thomas, Janet. (Lincoln Hosp, Bronx, NY) **Investigators' instructions and experimenters' misrecording of questionnaire data.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1278.—12 undergraduates were required to score questionnaire data which had been provided by other Ss. Results suggest that E misrecording effect is minimal regardless of the investigator's instructions.

10662. Firsoff, V. A. **Life and quantum physics.** *Parapsychology Review*, 1974(Nov-Dec), Vol 5(6), 11-16.—Argues against a mechanistic view of life and presents numerous examples which conform best to the assumption of some type of "ghost in the machine." (26 ref)

10663. Friedman, Richard C.; Richart, Ralph M.; Vande Wiele, Raymond L. & Stern, Lenore O. (Eds.). **Sex differences in behavior.** New York, NY: John Wiley & Sons, 1974. xvi, 495 p.—Presents a collection of 24 theoretical and empirical conference papers on sex differences in psychological functioning, physiological processes, and social systems. Topics include the effects of hormones on the development of behavior, stress and early life experience in nonhumans, early mother-child interactions in humans, gender identity and transsexualism, sex differences in aggression and adaptation, and perspectives on psychoendocrine differences.

10664. Friendly, Michael L. (York U, Toronto, Ontario, Canada) **Computer processing of free recall data: Program RECALL.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 47-50.—Describes a program for comprehensive analysis of data from free-recall experiments which scores each S's recall protocols, calculates main effects and interaction means for experimental factors, and provides a variety of other analyses, such as serial position curves and probabilities of item recall. (15 ref)

10665. Gilbert, Albin R. **An essay on the history of Asian psychology.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Sep), Vol 17(3), 121-125.—Like Western psychology, Asian psychology developed a scientific methodology introspectively. Fundamental to the Eastern personality model is conscious awareness. Since Asian psychology aims at heightening and illuminating personality, it would be more appropriately called "psychagogy."—R. D. Nance.

10666. Gray, Philip H. (Montana State U) **Comparative psychology and ethology: A saga of twins reared apart.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 49-53.—Discusses, compares, and contrasts the study of behavior in the laboratory with the study of behavior in natural settings. Both comparative psychology and ethology grew out of a time and tradition that saw animal and human behavior as different in degree rather than kind. Both fields have often been utilized by the same individual, who combines both naturalism and experimentation in his

research. The definition of the terms "ethology" and "comparative psychology" have a different history from that of the content they label. While both disciplines study animal behavior, man is the central concern of both. The logical principles of the comparison of the species existed before the acceptance of the theory of evolution. Thus, despite differences, comparative psychology and ethology are also much alike. (17 ref)—R. S. Albin.

10667. Haney, Jack N.; Sewell, William R.; Edelstein, Barry A. & Sartin, Harry H. (Memphis & Shelby County Community Mental Health Ctr, Tennessee) **A portable, inexpensive, walkie-talkie-type "bug-in-the-ear."** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 19-20.—Describes a device for use in behavior modification training and treatment, consisting of an inexpensive walkie-talkie and a miniature earphone and plug. The advantages of the system are discussed relative to more sophisticated, expensive, and less mobile sound systems.

10668. Hartley, Alan A. (Florida International U) **A procedure and a program for the trial-by-trial identification of hypotheses in concept learning.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 51-53.—Reviews techniques for tapping information processing and describes an algorithm which identifies the S's hypothesis on each trial of a concept-learning task. The algorithm operates on classifications of the entire stimulus population. A computer program has been prepared to execute the algorithm.

10669. Helmer, R. J. (Trinity U) **Modulator and filter circuits for EEG biofeedback.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 15-18.—Presents inexpensive designs for 2 components of a 2-channel, signal-processing EEG biofeedback system and for various experimental configurations of this equipment suitable for student projects, demonstrations, or research.

10670. Hofmann, Richard J. (Miami U) **A program for latent partition analysis.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 56.

10671. Klopfer, Peter H. (Duke U) **Does behavior evolve?** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 113-119.—Questions the logic of applying evolutionary concepts to behavior changes. Similarities between organisms can be due to convergence as well as to kinship. In addition, this sort of logic assumes that there exists a highly constrained relationship between an act and the structures that subserve it. As a result, behavior is linked to genetics, at best an oversimplification. The step from structure to behavior generally entails a further loosening of the coupling between gene and end product. Thus, while little can be gained from extrapolations from one species to another, comparative psychology can be useful in specifying both the ecological factors and the evolutionary accidents that have provided the significant constraints on particular behavior patterns. Only when this has been accomplished for a wide range of species will generalizations applicable to others emerge. (20 ref)—R. S. Albin.

10672. Kreft, Lev. [Erich Fromm's theory of love.] (Sloe) *Anthropos*, 1972, No 3-4, 131-137.—Fromm's theory of love is discussed first within the framework of

Fromm's eclecticism, then within the context of dialectical materialism. It is emphasized that Fromm's premise of man's separation from nature and other people caused him to neglect the role of work, leading him to psychologism. (Slovenian & English summaries)—S. Slak.

10673. Krushinskii, L. V. (Moscow State U, Lab of the Pathophysiology of Higher Nervous Activity, USSR) **Problems of comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 77-83. —Describes the types of behavior studied by comparative methods. Relevant research is cited. Comparative studies concerning simple operant food reflexes show that there is no direct relationship between the latency of reflex formation, its stability, and the phyletic level of the species. Research concerning instinctive behavior has studied the evolution of building activity in birds and insects. Comparative physiological studies confirm Darwin's view of the evolution of behavior. Adaptive behavior and extrapolatory ability has been studied comparatively. Reasoning ability has been more fundamentally changed in the process of the evolution of higher nervous activity than any other behavior. This conclusion is based on studies with dogs, dolphins, monkeys, fish, reptiles, rats, and birds. Thus, comparative psychology has produced much data elucidating the general rules of the evolution of various features of behavior. (47 ref)—R. S. Albin.

10674. Lapointe, Francois H. (Tuskegee Inst) **A selected bibliography on the existential and phenomenological psychology of G. Marcel & Paul Ricoeur.** *Journal of Phenomenological Psychology*, 1973(Fal), Vol 4(1), 363-373.

10675. Le Unes, Arnold. (Texas A&M U) **Contributions to the history of psychology: XIX. A review of selected aspects of texts in child psychology.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1291-1298. —A review of 16 child psychology textbooks indicates that (a) 96 journal articles published prior to 1950 were cited in 3 or more texts; (b) these articles were found in various journals, although 2 dominated; (c) articles by "classical" authors were included; and (d) there was variation in reverence for the past and for bibliography. (17 ref) —Journal abstract.

10676. Le Unes, Arnold. (Texas A&M U) **Contributions to the history of psychology: XX. A review of selected aspects of texts in abnormal psychology.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1319-1326. —A review of 12 textbooks indicates that (a) certain journals dominated in publishing "classic" articles, with  $\frac{1}{2}$  of them originating from medical or psychiatric publications; (b) children's disorders and functional psychoses were prominent themes; (c) texts varied in their treatment of developments in abnormal psychology; and (d) certain texts included more of the "classics" than others. (18 ref)—Journal abstract.

10677. Lifton, Robert J. **On death and the continuity of life: A "new" paradigm.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Spring), Vol 1(4), 681-696. —Based on *Death in Life*, the author's studies of Hiroshima, a new paradigm of human behavior is proposed: a process of "psychic numbing" as a consequence of modern technological violence and

absurd death. The Freudian (Victorian era) paradigm of repression of sexuality is contrasted with the overwhelming difficulties surrounding death that confront modern man. Psychic numbing contributes to the cessation of the "formative process," the impairment of man's essential mental function of symbol-formation or symbolization. These concepts are then applied to a constellation of psychological issues such as mental disturbance. (1 p ref) —J. Carlson.

10678. Lynch, James J. (Fordham U) **Use of a generalized analysis of variance program in repeated measures designs having unequal group sizes.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 54-56.

10679. Martin, Garry L. (U Manitoba, Winnipeg, Canada) **Varieties of behavior modification: A comment.** *Canadian Psychologist*, 1974(Oct), Vol 15(4), 378-381. —Argues that there is more than one version of what behavior modification is all about. The different versions can be considered in terms of a continuum of partially overlapping historical ties and identities. Any discussion of an identity for behavior modification without clarifying which version is being discussed may be misleading and unfair to particular brands of behavior modification. (French abstract)—Journal abstract.

10680. Noble, Clyde E. (U Georgia) **Philosophy of science in contemporary psychology.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1239-1246. —Argues that behavioral scientists should be principally engaged in performing inductions, deriving deductions, and formulating and testing hypotheses. Adopting Peircean terminology, the activities of induction, deduction, and abduction are analyzed and interrelated. It is suggested that the development of psychology might be accelerated by paying more attention to the hypothetical nature of scientific knowledge.—Journal abstract.

10681. Pecter, Richard. (Dartmouth Coll) **Subroutine for generating all permutations of N integers.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 57.

10682. Pfaffmann, Carl. (Rockefeller U, New York, NY) **The comparative approach to physiological psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 57-64. —Asserts that the physiological approach to the study of the mechanisms that underlie behavior has been too little influenced by the comparative method. This may be due to the effect of neurophysiology on physiological psychology in that neurophysiological methods select animals to study on the basis of convenience, availability, cost, and relevant technology. Another tendency in physiological psychology is the attempt to study pure, uncontaminated stimuli instead of natural ones. Higher levels of complex organization are thus missed. The main thrust of traditional physiological psychology has been to search out commonalities, to somehow gloss over differences, and to delineate similarities. The comparative approach contrasts with this in its emphasis on both similarities and differences in behavior and physiology. The traditional approach thus ignores the usefulness inherent in a broader and comparative analysis.—R. S. Albin.



10683. Pieper, William J. & Pinkus, Allen L. (Applied Science Assoc. Denver, CO) **Computer-generated troubleshooting trees: The program.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 180-181.

10684. Plitz, Gordon F. (Southern Illinois U, Carbonale) **Building a programming language for a small computer: Reinventing the wheel.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 42-46.—Describes SP-12, a language for a PDP-12 computer, showing how a special-purpose language can be constructed from a set of machine-language subroutines that are called by a simple interpreter. Preliminary translation of the source program into binary code, using an assembler, greatly increases the speed of the interpreter.

10685. Rogo, D. Scott. **Demonic possession and parapsychology.** *Parapsychology Review*, 1974(Nov-Dec), Vol 5(6), 18-24.—Surveys selected possession cases and lists features commonly present. These include such parapsychological phenomena as levitation and the ability to use unlearned languages. The vicious and violent psychokinetic and ESP manifestations make it doubtful that the phenomenon is a conventional poltergeist, or any other general manifestation of psychic ability, or due to suggestion. Although all these possible explanations are related to possession, they do not fit the facts as well as a demonic theory. (23 ref)—P. F. Grim.

10686. Rose, Steven P. & Rose, Hilary. (Open U, Bletchley, England) **"Do not adjust your mind, there is a fault in reality": Ideology in neurobiology.** *Cognition*, 1973, Vol 2(4), 479-502.—Discusses the possible sources of ideological input into science in general and examines a particular group of sciences neurobiology, for evidence of the role of ideology. Reductionist ideology in neurobiology, in particular, is explored. (French summary) (45 ref)

10687. Rus, Vojan. [Fromm's and Scheler's anthropology.] (Sloe) *Anthropos*, 1972, No 3-4, 103-130.—Discusses similarities and differences between E. Fromm's and V. M. Scheler's philosophies of man, including problems related to psychology. (Slovenian & English summaries)

10688. Russell, Roger W. (Flinders U South Australia, Bedford Park) **On the definition of comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 54-56.—Proposes a new terminology to describe the subject matter of comparative psychology that refers to genetically coded behaviors and to environmental conditions that activate similar processes. The applicability of concepts studied comparatively to human behavior is discussed. The existence of a field of study entitled comparative psychology is asserted. (17 ref)

10689. Schoenfeld, W. N. & Cole, B. K. (Queens Coll, City U New York) **What is a "schedule of reinforcement"?** *Pavlovian Journal of Biological Science*, 1975(Jan-Mar), Vol 10(1), 52-61.—Discusses the term "schedule of reinforcement." 2 distinguishable operational rules are implicated in the term: In the case where reinforcement is of the so-called response contingent type, the "schedule" is really a rule to identify the response to be reinforced. In the case of noncontingent reinforcement, the "schedule" is truly a rule for delivery

of reinforcement. Other terminological ambiguities discussed are "reinforcement" and "intermittency." A resolution of these problems will necessarily involve the procedures of noncontingent reinforcement and the parameter of reinforcement probability.—*Journal abstract.*

10690. Schwanenber, Enno & Huth, Wolfgang. (U Frankfurt, W Germany) [The relevance of experimental non-zero-sum games.] (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(3), 167-183.—Discusses the relevance of experimental social psychology, using the non-zero-sum game as a paradigm. The games of Prisoner's Dilemma, Chicken, and Maximizing Differences are described. Different approaches and conceptualizations of economic-mathematical game theory and social-psychological game research are explored with reference to the dilemma of individual vs collective rationality. The utility that the players assign to the features of the game is crucial for interpreting the effects of both organismic and situational variables. The question of relevance is discussed in terms of recognizing and evaluating theory and method in social psychology. (40 ref)—*English abstract.*

10691. Scott, J. P. (Bowling Green State U, Ctr for Research on Social Behavior) **The organization of comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 7-40.—The principal function of comparative psychology is to establish the generality of behavioral phenomena. This approach enables one to ascertain those processes or qualities that are basic and important to all life. It is suggested that this methodology has been perverted, a perversion somewhat explained by the history of its use in psychology. The period from 1890 to modern times is described from this viewpoint. 2 trends are discerned: (a) the tendency to dichotomize social factors and to insist that there are only 2 classes of causes, when the possibility exists that there are many classes; and (b) the tendency to insist that theoretical causal factors are mutually exclusive, when they are obviously mutually interactive. The major drawback to subdivisions of comparative psychology (e.g., behavior genetics and comparative social psychology) is the artificiality and arbitrariness they engender in research. However, both comparative evolutionary and developmental psychology can be seen as unifying. The latter is explicated through a description of the development of behavior in the dog. Sensory, motor, learning, and patterned behavior are reported. (111 ref)—R. S. Albin.

10692. Shapiro, S. I.; Gregory, Judith; Allman, Toney & Yoshimura, Emogene K. (U Hawaii) **The psychology and sociology of science: A bibliography.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 178.

10693. Stacey, William D.; Weissmuller, Johnny J.; Barton, Bruce B. & Rogers, C. R. (US Air Force Human Resources Lab, Lackland, TX) **CODAP: Control card specifications for the UNIVAC 1108.** *US AFHRL Technical Report*, 1974(Oct), No 74(84), 204 p.—Presents control card writeups for the 34 main programs in the UNIVAC 1108 version of CODAP, a highly interactive system of computer routines for analyzing, organizing, and reporting occupational information.

10694. Stewart, Robert A. (Massey U, Palmerston North, New Zealand) **States of human realization: Some physiological and psychological correlates.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Sep), Vol 17(3), 126-134.—Defines the basic purpose of all psychotherapy as the maximization of human happiness. Systems for promoting self-realization have come from both the West and the East. 2 Eastern systems, in the Zen tradition and the Hindu Yoga meditative tradition, are attracting interest in the West. Some of the physiological, psychological, and social research on transcendental meditation are examined. Recent work in training people to produce subjective states of mind, and some of the correlates of states of "human realization," are discussed. (33 ref)—R. D. Nance.

10695. Tack, Werner H. (U Saarlandes, W Germany) **[Two theorems on the construction of three-person games with nonempty core.]** (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(3), 184-188.—Discusses assumptions necessary to test deviations of actual behavior from that defined by game theory as rational behavior in 3-person games. Theoretical assumptions about rational behavior in the division of winnings are offered, and the necessary and sufficient conditions for the construction of games testing these assumptions are specified.—*English abstract.*

10696. Tarbox, Raymond. **Exhaustion psychology and Sartre's *The age of reason*.** *American Imago*, 1973(Spring), Vol 30(1), 80-96.—Describes characteristics of "scream-boomerang-exhaustion literature": The Omnipotent Scream of Rage, The Boomerang of One's Never Silenced Scream of Rage, The Exhausted Body, and The Torporous World of the Fetal Hero. A number of examples from contemporary fiction are cited. In particular, the characters and events of J. P. Sartre's *The Age of Reason* are examined and interpreted in the light of these ideas. Mathieu, the central figure, is "an individual left waiting," unable to make a commitment to any destiny. As a "scream hero" under great exhaustion he is incapable of identifying with the treacherous and time-controlling and exhausting mother or father. The other persons in the book are discussed in the light of Mathieu's self-destructiveness.—R. S. Albin.

10697. Turnbull, Allen A. (Carleton U, Ottawa, Ontario, Canada) **Replication in psychology, or If it happens once, will it happen again?** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 179.

10698. Tyler, C. William & Raibert, Marc. (Northeastern U) **Generation of random-dot stereogratings.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 37-41.—Stereogratings are an extension of periodic stimulation to the Cyclopean domain (a method of stereoscopic presentation of stimuli in the absence of corresponding monocular information). A program for the generation of random-dot stereogratings is described, with discussion of the advantages and disadvantages of the program.

10699. Virsu, Veijo & Lehtio, P. K. (U Helsinki, Finland) **A microphotometer for measuring luminance distributions on a CRT.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 29-33.—Notes that cathode-ray tubes (CRTs) are convenient devices for

producing well-controlled visual stimuli for varying the spatial or temporal features of the stimulus. A relatively inexpensive microphotometer is described for use in conjunction with a CRT to obtain calibrations required in psychophysical and physiological experiments and in which the spectral sensitivity can be corrected to approximate that of the human photopic eye.

10700. Voyat, Gilbert. (City Coll, City U New York) **The work of Henri Wallon.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 4-23.—Discusses Wallon's fundamental contribution to the development of theories concerning imitation, emotions, and syncretic thought in the child, with special attention to the controversies between Wallon and J. Piaget. The relevance of Wallon's global and coherent perspective within psychoanalytical, phenomenological, and purely cognitive points of view; the significance of the extensive range of his work from pathological to sophisticated philosophical and epistemological problems; his emphasis on development in its ontogenic and phylogenetic aspects and his belief that knowledge and reality, intelligence and emotions are a result of external and internal processes; and finally, his emphasis on a social ethic for psychology, are all discussed to explain his influence on psychologists and philosophers, especially Marxist ones. (24 ref)—A. H. Alawi.

10701. Wallon, Henri. **Psychology and dialectical materialism.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 75-79.—Contends that dialectical materialism provides the normal base and guiding principles for the science of psychology. Marxist dialectics have made psychology a natural and human science and have enabled it to comprehend the organism and its ever-changing environment as a single, unified whole in constant interaction. The division between consciousness and things that spiritualism has sought to impose on the universe has been abolished, and Marxist dialectics provides psychology with a tool for explaining and studying individual behavior.—A. H. Alawi.

10702. Welford, A. T. (Ed.). (U Adelaide, SA, Australia) **Man under stress.** New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

10703. Wiesensthal, David L. (York U, Downsview, Ontario, Canada) **Reweaving deception's tangled web.** *Canadian Psychologist*, 1974(Oct), Vol 15(4), 326-336.—Reviewed recent trends in social psychological research toward greater use of field settings and unobtrusive measurement. 4 major issues relating to this problem were identified: (a) the general public may be more intolerant of being used as research Ss than are college students; (b) disguised observation may tend to aggravate a post-Watergate concern over invasion of privacy; (c) greater harm to participants in some field research may be likely because laboratory control is greatly lacking; and (d) because concern with revealing social psychology data to the public may jeopardize future research, scant feedback is provided to participants. (French abstract) (33 ref)—*Journal abstract.*

10704. Williams, David B. & Shelton, Chris. (South West Regional Lab for Educational Research & Development, Los Alamitos, CA) **A procedure and instrumentation for presenting luminous numeric response cues in a nonverbal auditory serial position task.** *Behavior*



*Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 23-25.—Describes the experimental use of a luminous numeric display to generate response cues in a forced-choice recall task for nonverbal auditory (pitch) sequences. A description of the response cue display (RCD) constructed for this purpose and triggered by a 3-bit binary configuration of sine-wave logic tones is included.

10705. Wong, Paul T.-P.; Roach, Tom & Osborne, Bruce. (Trent U, Peterborough, Ontario, Canada) **A sand-digging apparatus for rats.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 34-36.—Describes an apparatus which permits automatic recording of the topography of sand digging. Research carried out to evaluate the apparatus indicates that time in sand contact was better correlated with the amount of sand displaced than frequency of contact and that a sand-and-iron-filing mixture had no suppressive effect on sand digging as compared to normal sand.

10706. Zeigler, H. P. (Hunter Coll, City U New York) **The problem of comparison in comparative psychology.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 126-134.—Describes 2 rationales for the scientific study of animal behavior. One rationale is that since all living things are phylogenetically related, animals may be justifiably studied in the hope that they will clarify the causal mechanisms that underlie supposedly homologous behaviors in man by the fact that these animals exhibit human structural or functional patterns in considerably less complex form. Often then, the behavior of animals is of interest only insofar as they exemplify human processes such as learning, memory, or aggression. The 2nd rationale views the evolutionary process as having produced an almost endless series of variations upon relatively few basic themes. Thus, the use of this approach in research results in the study of the similarities and differences among species—the study of comparative psychology. The research and theoretical implications of these 2 methodologies are detailed. (20 ref)—R. S. Albin.

## PSYCHOMETRICS AND STATISTICS

10707. Bakeman, Roger; Helmreich, Robert & Wilhelm, John. (U Texas, Austin) **The Life History Questionnaire (LHQ): II. Description and applications.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 127.

10708. Fee, F. (Belfast Education & Library Board, Northern Ireland) **An analysis of two diagnostic tests: The Frostig and the I.T.P.A.** *Irish Journal of Psychology*, 1974(Win), Vol 2(3), 176-182.—Factor analyzed data presented by the respective authors of the Frostig Developmental Test of Visual Perception (DTVP) and the Illinois Test of Psycholinguistic Abilities (ITPA), using a method described by F. Fee (1973). Results indicate that while the structure of the DTVP conforms to its reported claims, this cannot be said of the ITPA.—*Journal abstract.*

10709. Holt, Robert R. (New York U, Research Ctr for Mental Health) **Clinical and statistical measurement and prediction: How not to survey its literature.** *Catalog*

*of Selected Documents in Psychology*, 1975(Win), Vol 5, 178-179.

10710. Seidenstücker, Gerhard & Seidenstücker, Ellen. (U Regensburg, W Germany) **[Contributions to a computer evaluation of the Thematic Achievement Motivation Test by Heckhausen.]** (Germ) *Psychologische Beiträge*, 1974, Vol 16(1), 68-92.—Reviews the present state of research on computer scoring of H. Heckhausen's test. The correlation between the scoring by experts and computer on the test variable Hope of Success was .78 and on Fear of Failure was .53. Needed improvements in present computer programs are discussed with special reference to the linguistic approach of generative semantics. (French summary) (30 ref)—*English summary.*

10711. Shalit, Benjamin. **Type of display of assessment scales and distribution of responses.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1100-1102.—Ss marked their assessment of a neutral and of an emotionally loaded question on identical scales, 2 vertical and 2 horizontal, with the 0-point at top, bottom, right, or left. The distribution of responses to the emotional question was significantly greater on a vertical scale with the 0-point at the top and is discussed in terms of scanning as affected by anchor point.

## Test Construction & Validation

10712. Heim, A. W.; Watts, K. P. & Simmonds, V. (U Cambridge, Psychological Lab, England) **AH 2 and AH 3: Parallel tests of reasoning.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 493-503.—Discusses tests AH 2 and AH 3, group tests of reasoning with several features usually associated with individual tests of intelligence. In the course of standardizing the 2 tests, several widely accepted findings have been confirmed, notably male superiority on numerical questions, female superiority on verbal questions, and the greater variance found generally among males than females. 2 further results are also noted: (a) the data do not support the suggestion, often made by teachers and other educationists, that girls tend to excel boys around 10-12 yrs of age owing to their earlier physical and mental maturation—to be rejoined, or surpassed, by the boys in their early teens; (b) it seems well worth while incorporating pictorial items in a group test of reasoning, intended to cover a wide age range. It is suggested that this type of item enables the younger (and the less able) to show their strength in an area usually neglected in group tests, and it proves to be a task in which they delight.—*Journal abstract.*

10713. Holm, Kurt. **[Theories of question batteries.]** (Germ) *Kölner Zeitschrift für Soziologie und Sozialpsychologie*, 1974(Jun), Vol 26(2), 316-341.—Presents a model of question batteries and discusses their theoretical aspects. (16 ref)

10714. Jäger, Reinhold. (Otto-Selz-Inst für Psychologie und Erziehungswissenschaft, Staudenweg, W Germany) **[Observations on the standard scale of critical differences.]** (Germ) *Diagnostica*, 1974, Vol 20(4), 165-168.—Examines "differentiability," a criterion to evaluate tests to be used in conjunction with objectivity, reliability, and validity. "Differentiability" refers to the number of meaningful cut-off points of a scale. It is a function of the type of reliability considered and of the

stability of this reliability across different populations and subpopulations exhibiting different scores on the scale to be evaluated.—*M. Morf.*

10715. **Johansson, Charles B.** (National Computer Systems, Edina, MN) **Strong Vocational Interest Blank in-general samples.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 113-116.—Throughout the history of the Strong Vocational Interest Blank (SVIB), the aggregation of "in-general" samples to represent an "average" has been of concern because an adequate in-general sample is necessary for the development of valid occupational scales for the SVIB. 6 in-general samples have been generated over the years to fit different developments of the SVIB. In the present study 20 experimental homogeneous scales were used to measure the similarities and differences among the 6 in-general samples. Generally, all samples were strikingly similar, with the greatest differences appearing between male and female in-general samples.—*Journal abstract.*

10716. **Kristof, Walter.** (U Hamburg, Seminar für Sozialwissenschaften, W Germany) **Estimation of reliability and true score variance from a split of a test into three arbitrary parts.** *Psychometrika*, 1974(Dec), Vol 39(4), 491-499.—Presents a method of estimating the reliability of a test which has been divided into 3 parts. The parts do not have to satisfy any statistical criteria like parallelism or  $\tau$ -equivalence. If the parts are homogeneous in content (i.e., if their true scores are linearly related and if sample size is large) then the method will give the precise value of the reliability parameter. If the homogeneity condition is violated then underestimation will typically result. However, the estimate will always be at least as accurate as coefficient  $\alpha$  and L. Guttman's (1945) lower bound  $\lambda_1$  when the same data are used. An application to real data is presented by way of illustration. 7 different splits of the same test are analyzed. The new method yields remarkably stable reliability estimates across splits as predicted by the theory. One deviating value can be accounted for by a certain unsuspected peculiarity of the test composition. Both coefficient  $\alpha$  and  $\lambda_1$  would not have led to the same discovery.—*Journal abstract.*

10717. **Kroger, Rolf O. & Turnbull, William.** (U Toronto, Ontario, Canada) **Invalidity of validity scales: The case of the MMPI.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 48-55.—Tested the hypothesis that Ss fake personality tests by enacting a specific social role, rather than by responding in terms of personality constructs, and that such role faking cannot be detected by validity scales. In Exp I, 22 male undergraduates were able to reproduce without detection the MMPI profile of an Air Force officer but not that of a creative artist. The latter was attributed to the Ss' inaccurate conception of the artist role. However, when 10 of 21 Ss in Exp II were given an accurate conception of the artist role, they succeeded in reproducing the MMPI artist profile without detection as well. Results favor the hypothesis, provided that the Ss possess an accurate conception of the role to be simulated. (17 ref)—*Journal abstract.*

10718. **MacDonald, A. P.** (West Virginia U) **Instrumental and terminal values: Some new developments.**

*Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 123.

10719. **Smith, Kent W.** (Princeton U) **Forming composite scales and estimating their validity through factor analysis.** *Social Forces*, 1974(Dec), Vol 53(2), 168-180.—Suggests that when forming a scale through factor analysis and evaluating it with D. R. Heise and G. W. Bohrnstedt's (1970) validity index, rho, the factor analysis should include the indicators of only one construct. If these variables are optimally weighted through least-squares regression, rho is the multiple correlation of the factor with the measured variables. An often tenuous assumption underlies the use of rho to correct a scale's correlations for invalidity and error. Although useful, rho is not a substitute for external validation. Maximizing rho is a better criterion for selecting weights of variables than is maximizing Heise and Bohrnstedt's reliability index. (22 ref)—*Journal abstract.*

### Mathematical Models & Statistics

10720. **Bernhardson, Clemens S.** (U Saskatchewan, Saskatoon, Canada) **Probability of Type I error for pairwise comparisons between ordered means.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 113.

10721. **Bernhardson, Clemens S.** (U Saskatchewan, Saskatoon, Canada) **Empirical Type 1 error rates for two methods of testing simple main effects.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 179-180.

10722. **Berry, Kenneth J.; Martin, Thomas W. & Olson, Keith F.** (Colorado State U) **Testing theoretical hypotheses: A PRE statistic.** *Social Forces*, 1974(Dec), Vol 53(2), 190-196.—Departures from statistical independence are conjoined with an assessment of predictive accuracy in a coefficient of association for nominal-level  $2 \times 2$  contingency tables which is both interpretable as a proportional reduction in error (PRE) measure and consistent with research hypotheses of manifold forms. Measurement assumptions and operating characteristics of the measure, which is termed K, are delineated, definitional and computational formulae are derived from classical probability theory, comparisons with other relevant statistics are made, and the test of significance is shown to be the traditional chi-square test.—*Journal abstract.*

10723. **Cotton, John W.** (U California, Santa Barbara) **Implications of two local consistency strategy selection models.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 364-390.—Examines mathematical implications of 2 process models of concept identification, the 1-element strategy selection model with a local consistency assumption and J. Chumbley's (see PA, Vol 44:3102) hypothesis manipulation (HM) model. Under slightly restrictive assumptions, each process model (Level 1) is shown to imply a stochastic model (Level 3), making predictions of behavior in experimental situations in which the stimulus presented to an S on any trial is randomly selected and independent of that presented on any other trial. In addition, each model makes predictions at an intermediate level (Level 2) about performance on successive trials with specific stimulus sequences



presented. At Level 2, each model falsely predicts zero probabilities for particular response patterns when stated stimulus sequences are used. Fewer such problems arise with the HM than with the 1-element model. Minimum squared error fits of 1 set of experimental data show relatively good correspondence of predictions and observations when a Chumbley model with different saliences for different hypotheses is employed. (21 ref)—*Journal abstract*.

10724. Cramer, Elliot M. (U North Carolina) **The relation between Rao's paradox in discriminant analysis and regression analysis.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 99-107.—C. R. Rao (1952) has commented on an apparent paradox in discriminant analysis in which 2 variables discriminate the groups when used separately but not when used in combination. It is shown that there is an exact relationship between this and the paradoxes in regression analysis. An expression for the  $F$  statistic in discriminant analysis is given in terms of the average of squares of  $t$  values to clarify this relationship.—*Journal abstract*.

10725. Cunningham, James P. & Shepard, Roger N. (U California, San Diego) **Monotone mapping of similarities into a general metric shape.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 335-363.—Describes and tests a method of maximum variance nondimensional scaling that transforms similarity measures into distances that meet just 3 conditions: (a) they exactly satisfy the metric axioms; (b) they are, as nearly as possible, monotonically related to the similarity measures; and (c) they have maximum variance possible under the 2 preceding conditions. By achieving an appropriate balance between the last 2 conditions, one can determine the true underlying distances and the form of the unknown monotone function relating the similarity measures to those distances without assuming that the underlying space has any particular Euclidean, Minkowskian, or even dimensional structure. The method appears to have potential applications to studies of stimulus generalization and the structure and processing of semantic information. (42 ref)—*Journal abstract*.

10726. Doignon, J. P. & Falmagne, J. C. (U Brussels, Belgium) **Difference measurement and simple scalability with restricted solvability.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 473-499.

10727. Dudziński, M. L.; Norris, J. M.; Chmura, J. T. & Edwards, C. B. (Commonwealth Scientific & Industrial Research Organization, Canberra, ACT, Australia) **Repeatability of principal components in samples: Normal and non-normal data sets compared.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 109-117.—Demonstrates, using arguments based on Monte Carlo methods, that if there is enough meaningful structure in the population, then principal components analysis (PCA) of samples of behavior data with multivariate nonnormal distribution may provide answers relative to the "true" population principal components of comparable reliability to PCA of samples of multivariate normal data.

10728. Fishburn, Peter C. & Gehrlein, William V. (Pennsylvania State U) **Alternative methods of constructing strict weak orders from interval orders.** *Psychometrika*, 1974(Dec), Vol 39(4), 501-516.—Proposes

es to let  $n$  stimuli be linearly ordered by a physical attribute and to consider that an individual's "more than" relation be based on perceived attribute values. Assuming that the individual's relation agrees with the linear order and is an interval order, the present study examines the extent to which ordered pairs in the linear order but not in the interval order (due to nondetection of "small" differences) can be correctly identified on the basis of the interval order alone. Different methods of constructing strict weak orders from interval orders are compared by the degree of agreement with the underlying linear order. (15 ref)—*Journal abstract*.

10729. Hakstian, A. (U British Columbia, Vancouver, Canada) **Brief report: Asymmetric simplicity criteria for orthogonal factor transformation.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 119-125.—Discusses the notion of column simplicity in a factor pattern matrix and shows that the varimax procedure is only one way of operationalizing this notion. A general central-moment simplicity criterion is introduced, and the special cases of this formulation that indicate asymmetry are shown to have logical appeal in a constraint-free factor transformation context. Results of implementing these criteria with data, however, suggest that, in the case of orthogonal rotation, the considerable constraints render solutions based on various special cases of the general criterion quite similar to one another.—*Journal abstract*.

10730. Hakstian, A. Ralph & Abell, Robert A. (U British Columbia, Vancouver, Canada) **A further comparison of oblique factor transformation methods.** *Psychometrika*, 1974(Dec), Vol 39(4), 429-444.—4 prominent oblique transformation techniques—promax, C. W. Harris and H. F. Kaiser's (see PA, Vol 39:9008) procedure, biqurtamin, and direct oblimin—are examined and compared. Additionally, 2 newly developed procedures, falling into the category designated as Case III by Harris and Kaiser, are presented and included in the comparisons. The techniques are compared in light of their freedom from bias in the interfactor correlations and in their ability to yield clear simple structures, over many data sets—some constructed and some real—varying widely in terms of number of variables and factors, factorial complexity, and clarity of the hyperplanes. Results are discussed, and implications for practice are noted.—*Journal abstract*.

10731. Hoffmann, Gisbert. [Comparison of rank ordering by instructors and by participants at the officers training school, Hamburg.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 546-563.—During the last session of an officer training course 18 instructors and 412 students each ranked all participants in the course, producing 766 rank orders. Correlations between the rank order of the instructor and the mean of the participants resulted in Spearman  $r_s$  of .86 and a Kendall coefficient of  $w = .705$ . The correlation  $r_s$  was independent of the number of participants and relatively independent of the instructor. (English & French summaries)—W. J. Koppitz.

10732. Hofmann, Richard J. (Miami U) **The computation of regression estimate factor scores for singular and nonsingular data.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 56.

10733. Hubert, Lawrence. (U Wisconsin) **A note on Freeman's measure of association for relating an ordered to an unordered factor.** *Psychometrika*, 1974(Dec), Vol 39(4), 517-520.—Within the context of a contingency table, the relationship between L. C. Freeman's (1965) measure of association  $\theta$  and the asymmetric association measures developed by R. H. Somers (see PA, Vol 38:1579) is described. The  $\theta$  coefficient is appropriate for a contingency table in which the levels of one factor are ordered and the levels of the other factor are unordered; the indices defined by Somers are usually used when the levels of both factors are ordered, and one is assumed to be the independent factor.—*Journal abstract.*

10734. Hunter, John E. & Cohen, Stanley H. (Michigan State U) **Correcting for unreliability in nonlinear models of attitude change.** *Psychometrika*, 1974(Dec), Vol 39(4), 445-468.—Briefly discusses the problems in testing nonlinear models of attitude change. The regression artifacts produced by unreliability are shown in both the linear and nonlinear case. Classical solutions for the linear case are reviewed, and a new solution to the linear case is presented and applied to the nonlinear case. It is shown to work well under a broad set of conditions. Regression artifacts in bivariate regression are discussed. If the predictors are independent, then the univariate correction procedure can be applied to each predictor separately. If the predictors are correlated, a joint correction procedure must be used. One such procedure is defined and shown to work perfectly in the case of linear regression and reasonably well in a broad set of conditions in which the regression is nonlinear.—*Journal abstract.*

10735. Jaffray, Jean-Yves. (U Paris VI, France) **On the extension of additive utilities to infinite sets.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 431-452.—Independence condition C is known as necessary and sufficient for the existence of an additive utility on a finite subset  $X$  of a Cartesian product. In the present paper, a stronger necessary condition,  $H$ , interpreted as both an independence and Archimedean condition, is derived. It is shown to be sufficient when  $X$  is countable by constructing an additive utility as the limit of a sequence of additive utilities on finite subsets of  $X$ . When  $X$  is not countable, but is a Cartesian product, another necessary condition, the existence of  $A$ , a countable perfectly (order-) dense subset of  $X$ , is added to  $H$ ; an additive utility is constructed by extension to  $X$  of an additive utility on a countable set linked to  $A$ . An application to a no-solvability case is given. (17 ref) —*Journal abstract.*

10736. Joe, George W. & Woodward, J. Arthur. (Texas Christian U) **An approximate confidence interval for maximum coefficient alpha.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 93-98.—Develops an approximate confidence interval for the maximum coefficient alpha reliability of a scale where the scale is considered fixed and persons are sampled. The interval requires the assumption that the items of the scale are multivariate normally distributed, and use of the interval estimate is not encouraged in cases where the assumption of multivariate normality is not warranted.—*Journal abstract.*

10737. Kaiser, Henry F. & Horst, Paul. (U California, Berkeley) **A score matrix for Thurstone's box problem.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 17-25.—Since the score matrix for L. L. Thurstone's (1947) classic 20-variable box problem contains no measurement error and also generates a singular correlation matrix, a new score matrix for this problem, both containing measurement error and having enough entities to yield a nonsingular correlation matrix, is developed. Various interesting statistics for the new data are given, and an extended vector projection for the new data is shown. The new score matrix should be of use for work in factor-analytic methodology.—*Journal abstract.*

10738. Kalleberg, Arne L. & Kluegel, James R. (U Wisconsin, Madison) **Analysis of the multitrait-multimethod matrix: Some limitations and an alternative.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 1-9.—Discusses the multitrait-multimethod (MTMM) matrix which is widely used by researchers in applied psychology to assess the convergent and discriminant validity of constructs. A path analytic conceptualization of MTMM matrix analysis shows that the appropriateness of the inferences drawn on the basis of this method is heavily dependent upon the extent to which its underlying assumptions are fulfilled. To test these assumptions, as well as to interpret the relationships in the MTMM matrix, it is recommended that a confirmatory factor analytic model be used. This technique is illustrated by a reanalysis of J. Wanous and E. Lawler's (see PA, Vol 48:7988) MTMM matrix; the reanalysis shows how faulty inferences were drawn due to a violation of the assumptions underlying the matrix.—*Journal abstract.*

10739. Kneppreth, Norwood P.; Gustafson, David H.; Leifer, Richard P. & Johnson, Edgar M. (U Wisconsin) **Techniques for the assessment of worth.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 180.

10740. Laming, Donald. (U Cambridge, Psychological Lab, England) **The sequential nature of the quantal experiment.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 453-472.—Proposes a linear model for the interrelation of successive responses in the quantal experiment. The model is based on a direct mechanism of response linkage rather than on an indirect relation by means of fluctuations in sensitivity, because U. Neisser's (see PA, Vol 33:2915) published results implicate the former mechanism rather than the latter. The proportion of increments detected is an unbiased estimator of the detection probability and has a statistical efficiency of only 20%. In view of this unexpectedly low efficiency it is possible that rectilinear psychometric results have occurred by means of a biased, but unwitting, selection of data. (21 ref)—*Journal abstract.*

10741. Lienert, G. A. & Krauth, J. (U Düsseldorf, Inst for Psychology, W Germany) **[Configural frequency analysis: VIII. Evaluation of multivariate factorial designs.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 298-311.—Presents the 8th part of a series of articles on the theory and techniques of configural frequency analysis (CFA). How CFA can be modified for the purpose of evaluating multivariate factorial designs is explained. The suggested



procedure results in a nonparametric substitute for multivariate analysis. If repeated measurements from each patient are taken in each variable, they may be represented by trend configurations and evaluated in the same manner as single measurements. (English summary)—*T. Fisher.*

10742. Lingoes, James C. & Schönemann, Peter H. (U Michigan) **Alternative measures of fit for the Schönemann-Carroll matrix fitting algorithm.** *Psychometrika*, 1974(Dec), Vol 39(4), 423-427.—In connection with a least-squares solution for fitting one matrix,  $A$ , to another,  $B$ , under optimal choice of a rigid motion and a dilation, P. H. Schönemann and R. M. Carroll (see PA, Vol 47:5986) suggested 2 measures of fit: a raw measure,  $e$ , and a refined similarity measure,  $e_s$ , which is symmetric. Both measures share the weakness of depending upon the norm of the target matrix,  $B$ . Therefore, both measures are useless for answering questions of the type: "Does  $A$  fit  $B$  better than  $A$  fits  $C$ ?" 2 new measures of fit are suggested which do not depend upon the norms of  $A$  and  $B$ , which are (0, 1)-bounded, and which, therefore, provide meaningful answers for comparative analyses.—*Journal abstract.*

10743. Lissitz, Robert W. & Green, Samuel B. (U Georgia) **Effect of the number of scale points on reliability: A Monte Carlo approach.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 10-13.—Discusses the contradictions and confusion in the literature on determining the optimal number of scale points in a rating scale, and suggests a mathematical model that allows for the simulation of the rating situation. The model involves generating data with different item variance-covariance structures and with different numbers of scale points. Such data were generated and used to calculate 3 reliability measures. The effects of different numbers of scale points and different covariance structures upon these reliability measures are examined, and the results help explain a large number of empirical studies exploring the "optimal number of scale points" problem.—*Journal abstract.*

10744. Loesel, Friedrich & Wuestendorfer, Werner. **[Problems of incomplete data matrices in empirical social research.]** (Germ) *Kölner Zeitschrift für Soziologie und Sozialpsychologie*, 1974(Jun), Vol 26(2), 342-357.—Discusses reasons for missing data. The structures of matrices with incomplete data are analyzed and statistical procedures for handling such matrices are given. (26 ref)

10745. Narens, Louis. (U California, School of Social Sciences, Irvine) **Minimal conditions for additive conjoint measurement and qualitative probability.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 404-430.—Presents axioms for additive conjoint measurement and qualitative probability. Representation theorems and uniqueness theorems are proved for structures that satisfy these axioms. Both Archimedean and non-Archimedean cases are considered. Approximations of infinite structures by sequences of finite structure are also given.—*Journal abstract.*

10746. Nitsch, Jürgen R. (Deutsche Sporthochschule, Köln, W Germany) **[The hierarchical structure of the self: An application of binary structural analysis (BISTRAN).]** (Germ) *Diagnostica*, 1974, Vol 20(4),

142-164.—Introduces a new method to cluster aspects of the self hierarchically. 465 Ss rated themselves on 91 rating scales. An initial factor analysis led to a first classification of the rating scales. One group loaded more highly on the 1st factor, the other more highly on the 2nd. Each of the 2 groups was separately factor analyzed, and the procedure was repeated, yielding 8 groups of ratings on the 3rd level, 4 on the 2nd, and 2 on the 1st. The 14 groups of ratings are interpreted and appear to constitute a rational scheme.—*M. Morf.*

10747. Orlik, Peter. (U Saarlandes, Saarbrücken, W Germany) **[The RAPID technique in factor analysis: A "computer-free" approximation procedure.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 592-620.—Describes a nonparametric fast approximation procedure to factor analysis which allows simultaneous determination of  $Q$ - and  $R$ -factors from binary or ternary data without correlation matrices. Case 1 of the RAPID technique is closely related to the CENTROID solution, especially suitable for binary data (e.g., G. A. Kelly's Rep.-Test). Case 2 leads to good approximations of the "true" principal axes solution. Data in this case are trichotomized. Mathematical proofs, computational rules, and examples are provided. (English & French summaries)—*W. J. Koppitz.*

10748. Pawlik, Kurt & Buse, Lothar. (U Hamburg, Psychologisches Inst I, W Germany) **[Sampling errors of factor loads: A preliminary note.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 691-693.—Demonstrates that high-load values of factors gained in a factor analysis carry up to 3 times as many sampling errors as zero-loads. Factor rotation to simple structure is therefore statistically advantageous.

10749. Renn, Heinz. (U Hamburg, W Germany) **[The methodology of progress analysis: The problem of nonorthogonality of initial values and of factors of variation.]** (Germ) *Psychologische Beiträge*, 1974, Vol 16(1), 61-67.—Discusses implications of J. Fahrenberg and M. Myrtek's measure of individual reaction to a preceding stimulation. The suggested method can be applied only in cases of orthogonality of initial values and in cases of factors of variation. In all other cases there is a specification error, i.e., the data are analyzed according to a false model. A model using initial and final values explicitly as single variables is suggested. (French summary)—*English summary.*

10750. Rimmer, A. **A Radex of the language of emotion.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 238-241.—Reanalyzed J. R. Davitz's (1969) structural analysis of emotions, using the concept of facets and nonmetric data analysis. Reanalysis confirms the original finding and shows properties predicted by Davitz but not validated by factor analysis. Further structural properties emerged—a Radex formation for the set of variables.

10751. Rohner, Ronald P. & Ness, Robert C. (U Connecticut) **Procedures for assessing the validity and reliability of data in cross-cultural research.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 190.

10752. Shepard, Roger N. (Stanford U) **Representation of structure in similarity data: Problems and prospects.** *Psychometrika*, 1974(Dec), Vol 39(4),

373-421.—Discusses 6 major problems that confront attempts to use nonmetric multidimensional scaling to represent structures underlying matrices of similarity data. The problems and possible solutions are (a) attaining the globally minimum departure from monotonicity by judicious selection of the initial configuration to ensure convergence to the desired global minimum; (b) achieving a meaningful substantive interpretation by trying for a solution in space of 3 or fewer dimensions, by seeking objective means for finding the most interpretable rotated axes, and by searching for interpretable features other than axes; (c) determining the proper number of dimensions by recognizing the special advantages of visually accessible 2-dimensional representations and embedded clusterings and by striving toward more careful Monte Carlo studies; (d) avoiding loss or imposition of structure by selecting objects for nonmetric scaling that are not fewer than 10 in number or obviously grouped into a few psychologically compact clusters; (e) determining the form of the underlying metric (it is demonstrated that purely Euclidean solutions can be robust in the face of marked departures from the assumed Euclidean metric); and (f) representing discrete or categorical structure by using a nonhierarchical method of additive cluster analysis. (4 p ref)—*B. McLean*.

10753. **Smith, Robert B.** (U California, Santa Barbara) **Continuities in ordinal path analysis.** *Social Forces*, 1974(Dec), Vol 53(2), 200-229.—Clarifies and responds to T. P. Wilson's (1974) critique of the interpretations and use of ordinal statistics applied to the regression and path analysis of ordinal variables. First, the logic of R. B. Smith's (1972) technique for the path analysis of ordinals is explicated, and various interpretations for the path coefficient based on M. G. Kendall's tau-b are presented. Second, as an aid to interpretation, the family of tau-b class ordinal statistics are reconceptualized as special cases of generalized product-moment statistics rather than as analogs of interval statistics. Third, the virtues of this approach motivate the development of (a) a generalized regression coefficient in terms of the concepts of generalized pairwise difference, generalized variation, and generalized covariation; (b) a generalized path coefficient in terms of concepts such as the generalized correlation coefficient, the generalized regression coefficient, and the generalized variation; and (c) a generalized residual path coefficient in terms of the generalized correlation coefficient. (45 ref)—*Journal abstract*.

10754. **Somers, Robert H.** (Inst for Research in Social Behavior, Berkeley, CA) **Analysis of partial rank correlation measures based on the product-moment model: 1.** *Social Forces*, 1974(Dec), Vol 53(2), 229-246.—Defines partial rank correlation coefficients as special cases of a generalized product-moment system. The case of 2 independent variables is examined in detail, and the coefficient is partitioned into components summarizing information lying between and within conditional distributions. Probability interpretations are given for 2 basic components. Recent developments identifying the structural assumptions needed for a full probability interpretation and bases for a general theory are briefly summarized. The basic components that do not require

structural assumptions but cannot be calculated from bivariate data are suggested as alternative measures of partial rank correlation. The logic of statistically "partialling out" ordinal covariation is discussed and quantified. (27 ref)—*Journal abstract*.

10755. **Spence, Ian & Domoney, Dennis W.** (U Western Ontario, London, Canada) **Single subject incomplete designs for nonmetric multidimensional scaling.** *Psychometrika*, 1974(Dec), Vol 39(4), 469-490.—Employed Monte Carlo procedures to investigate the properties of a nonmetric multidimensional scaling algorithm when used to scale an incomplete matrix of dissimilarities. Various recommendations are made for users who wish to scale incomplete matrices: (a) Recovery is satisfactory provided that the "degrees of freedom" ratio exceed 3.5, irrespective of error level. (b) Cyclic designs provide best recovery, although random patterns of deletion perform almost as well. (c) Strongly locally connected designs, specifically overlapping cliques, are generally inferior. These conclusions are based on 837 scaling solutions and are applicable to stimulus sets containing more than 30 objects. (28 ref)—*Journal abstract*.

10756. **Wandell, Brian A.; Greeno, James G. & Egan, Dennis E.** (U California, School of Social Sciences, Irvine) **Equivalence classes of functions of finite Markov chains.** *Journal of Mathematical Psychology*, 1974(Nov), Vol 11(4), 391-403.—A matrical representation of a Markov chain consists of the initial vector and transition matrix of the chain, along with matrices that specify which observable response occurs for each state. The likelihood function based on a Markov model is stated in a general way using components of the model's matrical representation. It follows directly from that statement that 2 models are equivalent in likelihood if they are related through matrix operations that constitute a change of basis of the matrical representation. 2 necessary properties of a change matrix associating 2 Markov models that are members of the same equivalence class with respect to likelihood are derived. Examples are provided, involving use of the results in analyzing identifiability of Markov models, including a useful application of diagonalization that provides a connection between the problem of identifiability and the eigenvalue problem. (17 ref)—*Journal abstract*.

10757. **Wang, Ming-Mei; Schönemann, Peter H. & Rusk, Jerrold G.** (U Iowa) **A conjugate gradient algorithm for the multidimensional analysis of preference data.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 45-79.—Continues P. H. Schönemann and M. M. Wang's (see PA, Vol 49:1541) work on a new individual difference model for the multidimensional analysis of preference data, developing a relatively efficient algorithm for applying the model to fallible data. It is based on the Method of Conjugate Gradients and thus does not require storage for 2nd-order derivatives. Several difference versions of such an algorithm are compared for robustness, accuracy, and speed of convergence. Results strongly suggest that the intervening conjugate gradient method (which iterates for only 2 of the 3 sets of unknowns and solves for the 3rd set algebraically at each stage) is the most effective method for most purposes. The algorithm is applied to a



relatively large set of political choice data which had been previously analyzed by a different method. The outcome of this empirical study not only confirms the earlier results but also leads, as a consequence of the stronger metric structure of the present model, to a more detailed and informative description of the data. (20 ref)—*Journal abstract.*

10758. Wilson, Thomas P. (U California, Santa Barbara) **On interpreting ordinal analogies to multiple regression and path analysis.** *Social Forces*, 1974(Dec), Vol 53(2), 196-199.—Criticizes proposals for multivariate analysis with ordinal variables based on analogies with product-moment formulae on the grounds that such analogies do not provide a basis for interpreting the resulting statistics in terms of evidence bearing on an hypothesis concerning the presence or absence of some specified relation in the data. It is concluded that the long-standing problem of multivariate analysis with ordinal data still awaits a satisfactory solution. It is suggested that the fundamental difficulty obstructing work on the problem is the lack of clear, precise formulation of what constitutes a multivariate ordinal relation.—*Journal abstract.*

## PERCEPTION AND MOTOR PERFORMANCE

10759. Allan, Lorraine G. (McMaster U, Hamilton, Ontario, Canada) **Second guesses and the attention-switching model for successiveness discrimination.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 65-68.—Reviews J. Baron's (see PA, Vol 47:8047) data which he has interpreted as providing strong evidence against the account of successive discrimination provided by a class of models known as discrete psychological moment theory. Baron's conclusions are discussed with respect to A. B. Kristofferson's (1967a, 1967b, 1970) attention-switching model and to classical moment theory. It is concluded that Baron's second-guess data are not inconsistent with Kristofferson's model, and it is argued that the attention-switching model should not be classified as a discrete moment model.—*B. McLean.*

10760. Mikaelian, H. H. (U Georgia) **Restricted adaptation to prism rearrangement.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 547-550.—Measured changes in eye-foot and eye-hand coordination in 32 normally seeing college students following 20 min of squint prism viewing (alternate monocular viewing of the movements of each leg with the contralateral eye at 1-min intervals: prism base right for right eye and left for left eye). In different sessions, response changes were measured following the viewing of the left leg with the right eye (prism base right) for periods of 1 min interspersed with 1-min blank periods (periodic viewing). Sensorimotor changes following the alternate exposure condition were smaller and restricted to eye-foot responses.—*Journal abstract.*

10761. Muhich, Dolores. (Southern Illinois U, Carbondale) **Measuring empirical properties of psychomotor skills in different psychological environments.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1315-1330.—The role of decision-making and keystroking in the psychomotor activity of office typing tasks was

assessed for 41 2nd- and 4th-semester high school students and 19 advanced college students under 3 different work conditions: prearranged, unarranged without erasing errors, and unarranged with erasing errors. All differences for main effects for speed and errors were significant ( $p < .01$ ). When office tasks were done under wholly realistic conditions, planning and decision-making were one-half, keystroking was three-eighths, and erasing one-eighth of the task. At low levels of skill, time consumed for keystroking was nearly as salient in contributing toward completion of product as time consumed for decision-making. As psychomotor skill increased, the perceptual skill of decision-making played an increasingly dominant role. The amount of time needed for decision-making took on increasing salience in producing office communications as the difficulty of the task and amount of training were increased. (22 ref)—*Journal abstract.*

10762. Newell, K. M. (U Illinois) **Decision processes of baseball batters.** *Human Factors*, 1974(Oct), Vol 16(5), 520-527.—Examines the human performance characteristics of pitching and batting within the context of baseball game situations to determine their influence on the batter's decision to swing or not at a pitched ball. Signal detection theory techniques are used on generated data to show how the probability of the batter swinging at a "strike" and leaving a "ball" could be optimized. Applications of this approach to game situations and areas for future research are discussed.—*Journal abstract.*

10763. Sälzer, Martin. (Inst für Arbeitswissenschaft der Technischen Hochschule, Darmstadt, W Germany) **[Tremor measurements as a means for predicting aptitude for sensory-motor activities.]** (Germ) *Psychologische Beiträge*, 1974, Vol 16(1), 48-60.—Investigated predictability of aptitude for work involving high hand-eye coordination. Work performance of 22 male Ss at a simulated workshop was correlated with their tremor activity (TA) scores. The range of predictability from the TA scores for the various work tasks was between 12 and 71%. (French & English summaries) (19 ref)—*J. O. Jeske.*

10764. Verrillo, Ronald T. & Capraro, Anthony J. (Syracuse U, Inst for Sensory Research) **Effect of stimulus frequency on subjective vibrotactile magnitude functions.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 91-96.—Determined subjective magnitude functions by the method of magnitude estimation at 60 and 250 Hz at the fingertip and thenar eminence of 6 Ss, both with and without a rigid surface surrounding the contactor. When the surround was in place, the slopes of the curves were independent of stimulus frequency. The slopes became frequency dependent when the surround was removed—the lower frequency produced a steeper slope at both body sites. An explanation of the effect, involving the frequency characteristics and spatial sensitivity of the receptors, is suggested. (18 ref)—*Journal abstract.*

10765. White, Rhea. (East Meadow Public Library, NY) **Sports & ESP.** *Psychic*, 1974(Nov-Dec), Vol 6(1), 44-49.—Discusses the possibility that ESP factors—telepathy, precognition, and psychokinesis—may sometimes operate to produce superior performance in sports and competitive games. Examples are cited from golf,

football, baseball, chess, Zen archery, and the martial arts. Theories are presented regarding the mode of operation of psi in such cases.

### Perceptual Processes

10766. Ball, Frederick; Wood, Christine & Smith, Edward E. (Stanford U) **When are semantic targets detected faster than visual or acoustic ones?** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 1-8.—Employed a total of 81 undergraduates in 3 experiments to explore G. Cohen's (see PA, Vol 45:5550) finding that semantic targets can be detected faster than visual or acoustic ones when searching through meaningful prose. In all experiments, S searched a sentence for a target defined visually, acoustically, or semantically. In Exp I the S detected semantic targets faster than visual- or acoustic-syllable targets, regardless of whether he was instructed to read the sentence for meaning or simply scan it. Exps II and III showed that this advantage of semantic targets over visual or acoustic ones was greatly reduced when all 3 types of targets were words. Results are interpreted as indicating that when words are presented in context, either (a) the unit of word perception is the entire word or (b) the unit of identification or awareness is at least as large as the entire word. (17 ref)—*Journal abstract*.

10767. Bartoshuk, Linda M. (John B. Pierce Foundation, New Haven, CT) **After dinner talk: Taste illusions: Some demonstrations.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 279-285.—Reviews studies in which the 4 primary tastes of sweet, sour, bitter, and salt were modified by exposing Ss first to chemicals that alter taste and then to 1 of the 4 taste stimuli themselves. In this sense, the tongue was temporarily modified so that foods took on different and perhaps more palatable tastes. While conventional seasoning procedures often produce a similar result, this technique has the advantage of requiring only minute quantities of the altering substance. Implications for health are discussed. In particular, a decrease in reliance on any single food additive (some of which may be harmful) is predicted. If dependent on a variety of taste-altering agents instead of only a few, individuals would be less likely to ingest large quantities of any single and potentially dangerous substance and industry would not suffer economic hardship if only one of many taste substitutes were banned from usage. (21 ref)—*R. S. Albin*.

10768. Berglund, Ulf. (Royal Inst of Technology, Acoustical Lab, Stockholm, Sweden) **Dynamic properties of the olfactory system.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 17-27.—Investigated properties of the olfactory system as a measuring device of odor sensation and odor stimulation. The adaptability of the olfactory system that makes it a highly sensitive device is emphasized. Experiments on time-course functions of adaptation and recovery, and effects of time and intensity of adaptation stimuli on perceived odor intensity, are described. In addition, a possible model of odor perception is discussed. (19 ref)

10769. Binnie, Carl A.; Montgomery, Allen A. & Jackson, Pamela L. (Purdue U) **Auditory and visual contributions to the perception of consonants.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4),

619-630.—Studied perceptual confusions of 16 consonant-vowel (CV) syllables with 10 20-42 yr old normal-hearing lipreading teacher-students. Conditions of auditory-visual presentation at various signal-to-noise (S-N) ratios were used, as well as auditory-only and visual-only conditions in quiet. An articulatory feature classification system was used to analyze responses with regard to percentage correct intelligibility and relative information transmission. In the auditory conditions, features of voicing and nasality were least affected by noise, while place of articulation showed the greatest reduction in intelligibility. The auditory-visual confusions indicated that the visual channel in bisensory presentations reduced errors when phonemes differed by place of articulation, with the greatest visual complement occurring at the poorer S-N ratios. Responses from the visual-only condition indicated that the Ss were able to categorize the phonemes into discrete homophenous groups. Part-whole reliability for the visual-only condition was high, indicating that a short form of the test could be used for screening aural-rehabilitation clients. Since the Ss' ability to recognize visually 5 places of articulation was nearly perfect, it is suggested that emphasis in aural rehabilitation be placed on auditory training or use of contextual cues, rather than on lipreading.—*Journal abstract*.

10770. Cain, William S. (Yale U, Medical School) **Contribution to the trigeminal nerve to perceived odor magnitude.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 28-34.—Studied 2 human Ss who had total unilateral destruction of the trigeminal nerve but normal olfactory sensitivity on both sides. A group of 12 normal Ss was used for comparison. The studies were designed to discover the contribution of the trigeminal nerve to perceived odor magnitude. It was found that perceived magnitude was consistently lower via the deficient nostril, even at concentrations too low to produce obvious irritation. The odorants used were propyl alcohol, butyl alcohol, and butyl acetate.—*R. S. Albin*.

10771. Cohen, Malcolm M. & Larson, Carl A. (US Naval Air Development Ctr, Warminster, PA) **Human spatial orientation in the pitch dimension.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 508-512.—Conducted 2 experiments with a total of 11 normal male 21-36 yr old volunteers. In Exp I each S attempted to place himself at 13 different goal orientations between prone and supine. Deviations of achieved body pitch angles from goal orientations were determined. In Exp II each S attempted to align a visual target with his morphological horizon while he was placed at each of the 13 goal orientations. Changes in settings of the target were examined. Results indicate that Ss underestimated body pitch when they were tilted less than 60° backward or forward from the vertical, overestimated body pitch when they were nearly prone, and accurately estimated body pitch when they were nearly supine. In contrast, Ss set the visual target maximally above the morphological horizon when they were tilted 30° forward from the vertical. Findings are discussed in terms of common and different physiological mechanisms that may underlie judgments of these types. (16 ref)—*Journal abstract*.



10772. Cooper, Lynn A. & Shepard, Roger N. (U California, San Diego) **Mental transformation in the identification of left and right hands.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 48-56.—In an experiment with 8 right-handed university students and staff, Ss determined as rapidly as possible whether each line drawing portrayed a left or a right hand when the drawings were presented in any of 4 versions (palm or back of either hand) and in any of 6 orientations in the picture plane. Reaction time varied systematically with orientation and, in the absence of advance information, was over 400 msec longer for the fingers-down orientation. However, when Ss were instructed to imagine a specified (palm or back) view of a specified (left or right) hand in a specified orientation, reaction times to test hands that were consistent with these instructions were short (about 500 msec), independent of orientation, and unaccompanied by errors. It is proposed that Ss determine whether a visually presented hand is left or right by moving a mental "phantom" of one of their own hands into the portrayed position and by then comparing its imagined appearance against the appearance of the externally presented hand.—*Journal abstract*.

10773. Dean, Douglas & Mihalasky, John. (Newark Coll of Engineering, PSI Communications Project, NJ) **Testing for executive ESP.** *Psychic*, 1974(Nov-Dec), Vol 6(1), 21-25.—Computerized tests of top executives for ESP indicate that superior ESP scores are strongly correlated with superior profit-making ability. It is recommended that the usual tests and interviews with potential company presidents should be supplemented by testing for ESP.

10774. Desor, J. A. & Beauchamp, Gary K. (U Pennsylvania, Monell Chemical Senses Ctr) **The human capacity to transmit olfactory information.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 551-556.—Notes that previous estimates of the capacity of the olfactory channel have been uniformly low and posits that either olfaction is considerably more limited than vision and audition or its capacity has been underestimated. The present study hypothesized that underestimation may be due to use of stimuli having low levels of information or lack of laboratory training. Whole odors from objects were used. 26 naive adult Ss performed at levels consistent with earlier reports and evidenced effects of prior experience in identifying the odors. With training, a much greater capacity than found previously was observed. It appears that the odors of single compounds and objects differ in information, dimensionality, or patterning in much the same way that color patches and pictures or tones and words differ.—*Journal abstract*.

10775. Dobervich, Carolyn. **Kirlian photography revealed?** *Psychic*, 1974(Nov-Dec), Vol 6(1), 34-39.—Research at Stanford University supports the theory that the haloes produced in Kirlian photography are not the results of previously unrecognized psychic energies but of physical factors, particularly the spacing between film, object, and electrical source.

10776. Engen, Trygg. (Brown U) **The potential usefulness of sensations of odor and taste in keeping children away from harmful substances.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237,

224-228.—33 4-7 yr old children and 35 adults were asked to judge preference for 1 odorant in each of the 10 pairs studied. Results indicate a smaller variability of preferences for children than for adults. In addition, older children preferred odorants more similar to those preferred by adults than to those preferred by the younger children, indicating developmental changes in preference. A similar experiment was carried out with 50 4 and 6 yr old children to ascertain preference for taste: peppermint, horehound, cinnamon, and cherry. Results show much greater variability for taste preferences than for odor preferences. It is suggested that this modality may be inherently more important in controlling ingestion than smell. Implications are drawn for both the issue of ingestion of dangerous substances and for the significant effect of odor on flavor and taste.—R. S. Albin.

10777. Glidden, Stephen H. **A random-behavior maze test for humans.** *Journal of Parapsychology*, 1974(Sep), Vol 38(3), 324-331.—Replicated W. Levy's (see PA, Vol 50:4097) paper-and-pen maze experiment which introduced the concept of random behavior by human Ss in an ESP test situation. 8 college students or graduates were used in the current study, and on the basis of previous work it was expected that scoring would be higher on random behavior trials (RBTs) than on non-RBTs. Because the Ss became frustrated with the waiting periods which occurred between trials in the earlier experiment, a "no-check" method was used in which the E waited until the completion of a maze to evaluate the results. No significant results were obtained using the "check" method; marginally significant results were found with the "no-check" method. As expected, most of the significant scoring occurred on RBTs.—*Journal abstract*.

10778. Green, Barry G. & Craig, James C. (Indiana U) **The roles of vibration amplitude and static force in vibrotactile spatial summation.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 503-507.—Exp I measured vibrotactile spatial summation at suprathreshold amplitudes, using a matching task to investigate the effect of varying contactor size on sensory magnitude at 3 different vibration frequencies. Unlike the threshold data, increasing contactor size resulted in increases in sensory magnitude at 25 and 40 Hz as well as at 160 Hz. The amount of summation varied directly with amplitude for the 2 lower frequencies. Exp II investigated the effect of increasing static force, independent of contactor size. 3 paid female undergraduate Os participated in both experiments. Results indicate that the spatial summation effects noted in Exp I may be due to increases in static force and not contactor area. Implications for the concept of spatial summation and for the duplex mechanoreceptor hypothesis are discussed.—*Journal abstract*.

10779. Jacobs, Diana E. & Galanter, Eugene. (Columbia U, Psychophysics Lab) **Estimates of utility function parameters from signal detection experiments.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 115.

10780. Koelega, Harry S. & Köster, E. P. (U Utrecht, Psychological Lab, Netherlands) **Some experiments on sex differences in odor perception.** *Annals of the New*

York Academy of Sciences, 1974(Sep), Vol 237, 234-246. —Assessed the differences in odor perception between men and women using a forced-choice method of constant stimuli in which Ss were required to indicate which of 4 flasks containing odorants was different from that of the other 3. A total of 756 adults, adolescents, and children were tested in 7 experiments. Sensitivity was measured in terms of numbers of correct responses. Questions are raised concerning the differences in odor sensitivity found between male and female adults. (No such sex differences were found for the adolescents or children.) Controversial results pertaining to sex differences in olfactory research are discussed. (22 ref)—R. S. Albin.

10781. McCallum, Peter & Goldberg, Henry. (U Melbourne, Austin Hosp, Vic, Australia) **Magnitude scales for electrocutaneous stimulation.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 75-78.—Reviews the application of S. S. Stevens's (see PA, Vol 46:8332) power law to the sensation resulting from electrocutaneous stimulation. Its use for data from individual Os as well as pooled data from several Os is discussed. Magnitude estimates were obtained from 33 normal, young adult Os of the sensation resulting from electrocutaneous stimulation over the median nerve. 7 mathematical functions were applied to the data and tested for goodness of fit. The power function with or without threshold correction factor did not emerge as better than alternative functions. Difficulties in using the power function in studies of individual differences are reviewed. It is concluded that there is no adequate reason at present to discard the linear function in favor of more complex functions in psychophysical scaling of sensation induced by electric shock. (22 ref)—*Journal abstract*.

10782. Moskowitz, Howard R. & Gerbers, Clifford L. (US Army Natick Lab, Pioneering Research Lab, MA) **Dimensional salience of odors.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 1-16.—Applied profiling and proximity analyses of odor quality to 15 odorants selected to be reagent-grade and to span a wide range of olfactory qualities. Initially 5 concentrations of each were presented and magnitude estimates were obtained from 19 Os for each of the 75 concentrations. Os then rated every one of the 15 odors on a profile of 17 attributes. It was concluded that odor quality can be represented by profiles of different attributes and that ratio scaling procedures (magnitude estimation) can yield profile entries possessing ratio properties.—R. S. Albin.

10783. O'Mahony, M. & Godman, L. (Bristol U, England) **The effect of interstimulus procedures on salt taste thresholds.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 459-465.—Sodium chloride detection and recognition thresholds were measured with (Exp I, 2 university student Ss) and without (Exp II, 20 additional Ss) a prior artificial raising of the level of adaptation by a molar salt mouthrinse. In both cases, it was found that an interstimulus procedure involving water mouthrinses yielded lower thresholds than a procedure with no rinses. Results were predicted from adaptation level changes. The literature confirms these results, and difficulties in threshold measurement are discussed. (70 ref)—*Journal abstract*.

10784. O'Mahony, M. & Wingate, P. (U Bristol, England) **The effect of interstimulus procedures on salt taste intensity functions.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 494-502.—Conducted 2 experiments with 5 experienced adults and 20 naive university students, respectively, to study the effects of adaptation to residuals from prior tastings. Taste intensity functions were constructed for the salt taste, using variations of the method of direct magnitude estimation. The prediction that mouthrinsing would reduce residuals, lower the level of adaptation, and thus yield lower exponents was confirmed. The effect of the residuals tended to be reduced, however, when the power functions were adjusted for such threshold changes. Power function deviations from linearity are discussed. The literature on intensity scaling for the salt taste is examined and supports these findings. It is concluded that the interstimulus procedure, by altering residual stimulus levels played a major role in determining salt taste intensity functions. (54 ref)—*Journal abstract*.

10785. Pelletier, Kenneth R. (Langley Porter Neuropsychiatric Inst, San Francisco, CA) **Influence of transcendental meditation upon autokinetic perception.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1031-1034.—20 male and 20 female unpaid, normal volunteers were administered an autokinetic test, the Embedded Figures Test, and the rod-and-frame test prior to meditation instruction. After 3 mo of instruction in transcendental meditation, Ss were retested and demonstrated increased ego distance and field independence on all of the above tests. These variations in an autonomic, enduring response clarify several issues in research on perceptual style and meditation.—*Journal abstract*.

10786. Russell, David G. & Marteniuk, Ronald G. (U Illinois, Children's Research Ctr) **An informational analysis of absolute judgments of torque.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 443-448.—5 paid male university students participated in 7 experiments involving absolute judgments of stimuli selected from a continuum of torque. Exp I required Ss to make judgments on the intensity of 16 stimuli separated by equal intervals. These results were used in the construction of individual scales of equal discriminability. These scales were then used to select the stimuli for the remaining 6 experiments, in which 6, 8, 10, 12, 14, or 16 stimuli, separated by subjectively equal intervals, were used. An informational analysis was performed to determine the capacity of the kinesthetic system to transmit information derived from the inducement of torque. Maximum values of 1.680, 2.050, and 2.524 bits of information transmitted were obtained when the response was considered the output, and the input variables were, respectively, the stimulus, the stimulus and the S, the stimulus, the S, and the previous stimulus. Results are discussed in relation to information theory and the use of torque information in closed-loop control of movement. (27 ref)—*Journal abstract*.

10787. Saxe, Robert. (U California, Graduate School of Management, Los Angeles) **A test of Murdock's D scale technique using an unusual stimulus set.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 585-587.—B. B. Murdock's D scale technique predicts that when



D%, a measure of stimulus discriminability, is plotted against stimulus position, a U-shaped curve will always result, with end stimuli being more discriminable than middle stimuli. This prediction was tested on a stimulus set in which the middle stimuli were widely separated and the end stimuli were closely spaced. Data from 10 college students show that the middle stimuli were the most discriminable. When data were adjusted for response bias by M. E. Doherty's 1966 procedure, they still did not fit the prediction derived from Murdock's method.—*Journal abstract.*

10788. Taylor, M. M. & Lederman, S. J. (Defence & Civil Inst of Environmental Medicine, Downsview, Ontario, Canada) **Tactile roughness of grooved surfaces: A model and the effect of friction.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 23-36.—Develops a model based on the static deformation of the skin touching grooved aluminum tiles as stimuli, and 11 parameters of the deformation are individually compared with the experimental data. All parameters were tested first in an approximate way, and then the better parameters were recalculated in a more exact manner. 3 parameters—the depth to which the finger penetrates the groove, the cross-sectional area of the finger within the groove, and the cross-sectional area of the deviation of the skin from its resting position—all predict the roughness well as a function of finger force and groove width. The last of the 3 predicts roughness best as a function of land width and is tentatively preferred as “the stimulus for roughness.” All predictions from the static model indicate that variation of the coefficient of friction between skin and tile should have little or no effect. This counterintuitive prediction is confirmed by the results of an experiment. (15 ref)—*Journal abstract.*

10789. Tebecis, A. K. & Provins, K. A. (Australian National U, Canberra, ACT) **Accuracy of time estimation during hypnosis.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1123-1126.—14 experimental Ss experienced in self-hypnosis and highly hypnotizable (according to scores on the Barber Suggestibility Scale) were told to estimate a period of 2 min and 11 sec during hypnosis on 2 different occasions and once again during the awake state in a subsequent (imagination) session. Another (random) sample of 14 Ss was told to estimate an identical period while awake in a single (imagination) session. These Ss had never been hypnotized and proved to be significantly lower in waking suggestibility than the experimentals. Both groups underestimated the 131-sec period by up to about 40%. The mean time estimates of the experimental group did not differ significantly between the 2 hypnosis sessions or between either hypnosis session and the imagination session. The random control group appeared to underestimate the time to a greater extent than the experimentals, but the differences between pairs of groups were not statistically significant. Results suggest that hypnosis does not improve the accuracy of estimating short periods of time.—*Journal abstract.*

10790. Telage, Kal M. & Fucci, Donald. (Ithaca Coll) **Concerning intrasubject measurements of successive lingual vibrotactile responses.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1047-1052.—Obtained ascending lingual vibrotactile thresholds for 110 18-36 yr old

normal adults under test-retest conditions. Each condition included 2 different threshold criteria for frequencies 200 and 400 Hz, respectively. Although differential threshold responses were observed between frequencies, means and standard deviations remained consistent for both conditions. Reliability coefficients indicated good intra-S consistency for successive threshold measurements.—*Journal abstract.*

10791. Thomas, Ewart A. & Brown, Irvin. (Stanford U) **Time perception and the filled-duration illusion.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 449-458.—Results of a reproduction design employed with 20 paid 18-22 yr old Ss show that temporal intervals containing brief tones appeared longer than empty intervals of the same duration, the effect being independent of duration. These and previous data are discussed within a theoretical framework which allows for the interrelation of data from different time perception tasks. A reversible encoding model is stated which accounts for much of the data obtained with empty intervals. A “chunking” model, in which tones occurring in an interval serve to segment the interval during encoding, can account for the filled-duration illusion if certain conditions are met. Mechanisms that are consistent with these conditions are stated. (18 ref)—*Journal abstract.*

10792. Vallejo Rulloba, J. & Porta Biosca, A. (Provincial & Clinical Hosp, Barcelona, Spain) [*Perception and Intelligence.*] (Span) *Anuario de Psicología*, 1973, No 8, 21-34.—Divided 100 Ss of military age into groups of high intelligence and low intelligence based on their scores in Raven's Test of Progressive Matrices. Monserat's tachistoscopic technique was then used as a measure of perception in the 2 groups. Findings indicate a correlation between high intelligence and perceptual skill.

10793. Verrillo, Ronald T. & Capraro, Anthony J. (Syracuse U, Inst for Sensory Research) **Effect of simultaneous auditory stimulation on vibrotactile thresholds.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 597-600.—Employed 6 experienced Os to determine vibrotactile thresholds at 250 and 400 Hz in the presence of (a) the sounds emitted by the vibrator, (b) continuous tonal or narrow-band masking noise, or (c) a pulsed tone synchronized with the vibrator signal. The measure of a cross-modality effect was the threshold shift occurring between each condition and the control condition, in which earmuff silencers eliminated the vibrator sounds. Continuous tones or noise had no effect upon vibrotactile thresholds. However, auditory signals synchronized with the vibrator signals did significantly elevate vibrotactile thresholds. (29 ref)—*Journal abstract.*

10794. Witelson, Sandra F. (McMaster U, Medical Ctr, Hamilton, Ontario, Canada) **Hemispheric specialization for linguistic and nonlinguistic tactual perception using a dichotomous stimulation technique.** *Cortex*, 1974(Mar), Vol 10(1), 3-17.—Administered 2 tests involving dichotomous tactile stimulation, one using nonsense shapes and the other letters, to 47 normal right-handed boys 8-16 yrs old. Nonlinguistic tactile information was more efficiently processed in the right (non-speech) hemisphere in neurologically intact individuals, as had been previously inferred from studies of individuals with unilateral brain damage. The right hemisphere

specialization for nonlinguistic tactual perception was found to be present as early as 6 yrs of age. Simple tactile linguistic stimuli such as letters were not processed more efficiently by the left hemisphere. Results are interpreted to indicate that linguistic stimuli presented tactually must be analyzed first in a spatial code and then translated into a linguistic code. This suggests that there is no direct link between input and linguistic analysis in the tactual modality as there appears to be in the visual and auditory modalities.—*R. Gunter.*

10795. Yusim, E. D. (Pedagogical Inst, Kokchetav, Kazakh SSR) [Individual differences in reproducing the speed characteristics of a moving object.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 137-143. —Compared groups of Ss, identified by laboratory and life situation measurements as having a mobile or an inert nervous system, on their ability to reproduce, immediately and after a delay, the speed characteristics of a moving dot. (26 ref)—*L. Zusne.*

10796. Zimmermann, Marc L. (East Texas State U) **Subjective cross-modal stimulation.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1165-1166. —Individually tested 33 male and 33 female undergraduates to determine the correlation between the perceived strength of an auditory and a tactile stimulus as measured by the subjective brightness of an adjustable light. While Ss discriminated between the relative strengths of the stimuli in each condition, there was no agreement as to the brightness of the light for each treatment. Also, there was no difference between responses by males and females.

### Auditory Preception

10797. Aniansson, Gunnar. (U Göteborg, Sahlfren's Hosp, Sweden) **Methods for assessing high frequency hearing loss in every-day listening situations.** *Acta Oto-Laryngologica*, 1974, Suppl 320, 50 p. —Conducted a series of studies to determine the effect of the high-frequency hearing loss on speech intelligibility. Simulated, recorded everyday listening situations, using community noise and competing speakers, were tested with male adults, 22 with normal and 41 with impaired hearing. The validity of the test methods was checked with 6 normally hearing male students and showed that binaural listening via the recordings gave better or as good results as direct listening. Findings show that good speech discrimination in quiet required normal hearing ability up to 2,000 Hz. In everyday situations, however, it required normal bilateral hearing up to 3,000 Hz. Competing voices added to a difficult listening situation caused a significantly larger fall in speech discrimination in hearing-impaired Ss than in normals. The intelligibility of high- and of low-pass filtered speech in everyday noise situations was compared in 66 normally hearing male medical students. Results show that reduced information above 2,300 and 3,100 Hz gave the same speech discrimination as reduced information below 1,500 and 950 Hz, respectively. A method is presented for predicting speech discrimination in everyday noise situations from tone audiograms and by calculating the articulation index. It is suggested that this method, which agrees well with the experimental results, be used for

checking clinical tests for evaluating speech intelligibility in everyday situations. (77 ref)—*Journal summary.*

10798. Bartholomeus, Bonnie. (McGill U, Montreal, Quebec, Canada) **Dichotic singer and speaker recognition.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 407-408. —Conducted a study of 24 undergraduates to test the hypothesis that there is no difference between the recognition of sung and spoken voices. Ss were presented with 2 dichotic voice recognition tests which were similar in all respects except that stimuli were spoken on one and sung on the other. A finding of significantly more accurate speaker recognition indicates differences in the processing of singing and speaking voices. Results of the singer recognition test replicated a previous finding of no significant difference between ears. A similar lack of lateralization for speaker recognition could not be unambiguously interpreted because the absence of ear asymmetry was significantly related to very high levels of overall accuracy.—*Journal abstract.*

10799. Cohen, Gillian & Martin, Maryanne. (U Oxford, England) **Hemisphere differences in an auditory Stroop test.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 79-83. —In Exp I 18 right-handed students were required to judge the pitch of the following stimuli: 2 pure tones, one at a high frequency and one at a low frequency; 2 congruent words, "high," sung at the high frequency, and "low," sung at the low frequency; and 2 noncongruent words, "high" at low frequency and "low" at high frequency. A sequence of these stimuli was presented monaurally first to one ear and then to the other. The Stroop effect (the difference between mean response time (RT) to congruent words, and mean RT to noncongruent words) was larger for right ear (left hemisphere) presentation. Exp II used 8 other Ss in a dichotic repetition of Exp I, with a competing message presented to the opposite ear. Again, the Stroop effect was larger for the right ear, and the ear differences were slightly more marked. The result reflects hemispheric specialization for linguistic and nonlinguistic processing and a model of Stroop conflict in which response competition varies with the relative availability of the conflicting response.—*Journal abstract.*

10800. Cooper, William E. (Massachusetts Inst of Technology) **Selective adaptation for acoustic cues of voicing in initial stops.** *Journal of Phonetics*, 1974(Oct), Vol 2(4), 303-313. —Conducted a study of 10 undergraduates to test whether adaptation with [da]-long and [da]-short syllables would produce different effects on the perception of a typical test series varying in voice onset time (VOT). Results indicate that the original adaptation effects were partly attributable to the presence or absence of the formant transitions after voicing onset, rather than to VOT per se. Results may be attributable to adaptation of a detector sensitive to a weighted combination of the 2 hypothetical cues of VOT and the duration of voiced transitions. (37 ref)—*Journal abstract.*

10801. Cutting, James E. & Rosner, Burton S. (Wesleyan U) **Categories and boundaries in speech and music.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 564-570. —Considers that perceptual categories and boundaries arise when Ss respond to continuous variation on a physical dimension in a discontinuous fashion. It is more difficult to discriminate between members of



the same category than to discriminate between members of different categories, even though the amount of physical difference between both pairs is the same. Speech stimuli have been the sole class of auditory signals to yield such perception; for example, each different consonant phoneme serves as a category label. The present experiments were conducted with a total of 32 undergraduate Ss. Exp I demonstrated that categories and boundaries occurred for both speech and nonspeech stimuli differing in rise time. Exp II showed that rise time cued categorical differences in both complex and simple nonspeech waveforms. Taken together, these results suggest that certain aspects of speech perception are intimately related to processes and mechanisms exploited in other domains. The many categories in speech may be based on categories that occur elsewhere in auditory perception. (23 ref)—*Journal abstract*.

10802. Cutting, James E. (Wesleyan U) **Two left-hemisphere mechanisms in speech perception.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 601-612.—Conducted 4 experiments with a total of 74 right-handed, normally hearing university students. Results show that right-ear advantages of different magnitudes occurred systematically in dichotic listening for different phoneme classes and for certain phonemes according to their syllabic position. It is proposed that such differences cannot be accounted for in terms of a single mechanism unique to the left hemisphere. Instead, at least 2 mechanisms are needed. One such device appears to be involved in the auditory analysis of transitions and other aspects of the speech signal. This device appears to be engaged for speech and nonspeech sounds alike. The other mechanism, the more accustomed "speech processor," appears to make all phonetic decisions in identifying the stimulus. (31 ref)—*Journal abstract*.

10803. Davis, James M.; Weiler, Ernest M. & Gildenblatt, Stuart. (U Connecticut, Psycho-Acoustics Lab) **A pilot study of reaction time and loudness adaptation.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 114-115.

10804. Deutsch, Diana. (U California, Ctr for Human Information Processing, San Diego) **An auditory illusion.** *Nature*, 1974(Sep), Vol 251(5473), 307-309.—Tested 86 Ss participating in a study of auditory illusion. The stimulus configuration received by each S consisted of a sequence of tones alternating in pitch between 400 Hz and 800 Hz. Each tone lasted 250 msec, with no gap between tones, and each sequence was presented at equal amplitude, but the ear of input for each component was switched every 250 msec. None of the Ss obtained the correct percept, reporting a single tone oscillating from ear to ear. Localization patterns associated with handedness also were reported with the higher tone in each pattern localized in the right ear of right-handed Ss.—*A. de la Haba*.

10805. Diehl, Randy L. (U Minnesota) **The effect of selective adaptation on the identification of speech sounds.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 48-52.—Performed an experiment with 6 paid university student Ss to determine the effect of selective adaptation on the identification of synthetic speech sounds which varied along the phonetic dimension, place of articulation. Adaptation with a stimulus of a particular place

value led to a reduction in the number of test stimuli identified as having that place value. An identification shift was obtained even when the acoustic information specifying place value for the adapting stimulus had virtually nothing in common with the information specifying place value for any of the test stimuli. Removing the vowel portion of an adapting stimulus eliminated identification shift only when the resulting stimulus was no longer perceived as speech-like. Results indicate that at least part of the adaptation effect occurred at a site of phonetic, not merely acoustic, feature analysis.—*Journal abstract*.

10806. Duffy, Joseph R. & Golas, Thomas G. (U Connecticut) **Sentence intelligibility as a function of key word selection.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 631-637.—Investigated the relationship between word predictability and sentence intelligibility. This relationship was examined in 60 normal-hearing submarine school candidates by comparing intelligibility scores obtained with frequency-filtered sentences which were scored using key words empirically determined to be representative of 3 different degrees of predictability. It was hypothesized that the scores obtained would be a function of the predictability status of the key words used in scoring. Results indicate significant differences between the 3 scoring procedures for each sentence list under 2 filtering conditions (420- and 360-Hz low pass), and these differences were in the hypothesized direction. Results suggest that use of easy-to-predict words for scoring purposes will increase sentence intelligibility scores, while use of difficult-to-predict words will depress scores. It is concluded that word predictability is a factor influencing sentence intelligibility and that careful selection of key words, based on their predictability status, is a method of controlling or influencing the intelligibility of sentences.—*Journal abstract*.

10807. Duso, A. E. (City of London Polytechnic, England) **Thomas and Legge's matching hypothesis for detection and recognition tasks: Two tests.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 466-470.—E. A. Thomas and D. Legge (see PA, Vol 44:4561) have proposed a matching hypothesis for 2-alternative detection and recognition tasks. Given symmetric payoff, S is supposed to match his unconditional response probabilities to the presentation probabilities. More generally, even when payoff is asymmetric, S is supposed to keep his unconditional response probabilities constant across different discriminability levels. Time series analysis was applied in the present study to the response sequences from 2 auditory amplitude recognition tasks to test both hypotheses. Exp I obtained a single sequence from each of 16 university staff and student Ss. Exp II obtained 2 sequences at different discriminability levels from each of 24 additional Ss. Departures from the matching hypothesis were extremely gross in both cases. In addition, Exp II showed clear changes in the response probabilities across discriminability conditions, though these were not systematic in direction across Ss. (16 ref)—*Journal abstract*.

10808. Fitzgibbons, Peter J.; Pollatsek, Alexander & Thomas, Ian B. (U Massachusetts, Amherst) **Detection of temporal gaps within and between perceptual tonal**

groups. *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 522-528.—Hypothesized that tones widely separated in frequency are processed in separate communication channels. In 2 experiments, a total of 15 undergraduate listeners attempted to detect brief temporal gaps between items in a simple tonal sequence of 2 high tones followed by 2 low tones. Temporal resolution within both the high and low groups was near perfect; between-group detection scores were significantly lower. Results are interpreted as evidence for a processing time delay when shifts of focal attention occur between perceptual structures organized within the frequency domain. (21 ref)—*Journal abstract*.

10809. Henley, S. H. & Dixon, N. F. (University Coll London, England) **Laterality differences in the effect of incidental stimuli upon evoked imagery.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 529-536.—Studied 38 undergraduates to examine the hypothesis that noninterference between attended and unattended information in dichotic listening would fail to occur if the primary task could be facilitated by information on the unattended channel. D. Mackay (see PA, Vol 50:10457) has provided some evidence to support this hypothesis using verbal material on both channels, thus involving, presumably, only 1 hemisphere. By using stimulus materials on the 2 channels that are believed to be processed by the right and left hemispheres respectively, a 2nd hypothesis, that facilitation by the unattended input would depend upon laterality differences, was also tested. Considerable support was found for both hypotheses. (24 ref)—*Journal abstract*.

10810. Heyduk, Ronald G. (Amherst Coll) **Rated preference for musical compositions as it relates to complexity and exposure frequency.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 84-90.—120 undergraduates Ss heard 4 piano compositions that were constructed to represent differing degrees of complexity, as defined by their chordal and rhythmic properties and corroborated by Ss' complexity ratings. In line with the predictions of an optimal complexity model of musical preference, judged liking for the compositions was a unimodal function of their complexity. After each composition was rated for liking, 1 of the 4 compositions was presented and rated an additional 16 times. Also congruent with an optimal complexity model was the finding that the affective consequences of repeated exposure varied depending upon whether the repeatedly exposed composition was more or less complex than the S's preferred complexity level. The latter finding suggests that repeated exposure effects are a function of both situational and individual factors. (27 ref)—*Journal abstract*.

10811. Irvine, D. H. (Polytechnic of Central London School of Management Studies, England) **A new type of speech intelligibility test.** *Ergonomics*, 1974(Nov), Vol 17(6), 783-788.—Describes the construction of the Answer in Sentence (AIS) test which appears to have certain advantages over existing speech intelligibility tests. A preliminary trial was conducted with 90 normally hearing Ss and a validation experiment with 30 additional Ss. Performance on the AIS correlated highly with J. W. Black's multiple-choice test (1953) and with D. B. Fry's single-word test (1961) and had a high

reliability when measured by a split-half correlation method. Because of the relatively small number of Ss used in developing the AIS, it is suggested that the test be used with caution as a measure of individual differences. (French & German summaries)—*Journal abstract*.

10812. Molino, John A.; Zerdy, Gerald A. & Frome, Francine S. (National Bureau of Standards, Inst for Basic Standards, Washington, DC) **Toward a more musical foghorn.** *Human Factors*, 1974(Dec), Vol 16(6), 567-575.—10 college students gave preference judgments for 4 pure tones (120, 300, 500, and 835 Hz) and 11 tone composites constructed from combinations of the pure tones. Equal aversion (tolerance) levels were measured for the 4 pure tones and for 5 of the composites. Sensation-level measures were employed to express aversion thresholds in order to take account of the differential sensitivity of the human ear at different frequencies. Certain operational conclusions are suggested for the design of acoustic navigation aids. The higher frequency pure tones and composites were generally more preferred and were also tolerated at higher sensation levels. The 120-Hz pure tone was a highly nonpreferred signal. The presence of a 120-Hz component in any composite lowered both the preference value and the maintained sensation level. In the case of the moderately preferred 500-Hz pure tone, adding other more-preferred, pure-tone components increased the preference for the signal. (21 ref)—*Journal abstract*.

10813. Nickerson, R. S. & Freeman, B. (Bolt Beranek & Newman, Cambridge, MA) **Discrimination of the order of the components of repeating tone sequences: Effects of frequency separation and extensive practice.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 471-477.—Required 6 paid high school student Ss to identify repeating sequences of pure tones that differed only with respect to the order in which the tones occurred. With tones occurring at a constant rate of 5/sec, performance was better when the tones were widely spaced in frequency than when they were less widely spaced. One S was able, after considerable practice, to distinguish among different sequences whose component tones were presented at rates up to 500/sec. It is tentatively concluded that, in this case, performance was based on temporal (order) information at the slowest presentation rates, primarily on spectral information at the highest rates, and on both order and spectral information at intermediate rates.—*Journal abstract*.

10814. Roeser, Ross J. & Glorig, Aram. (Callier Ctr for Communication Disorders, Dallas, TX) **Pure tone audiometry in noise with Auraldomes.** *Audiology*, 1975(Mar-Apr), Vol 14(2), 144-151.—Obtained pure tone thresholds using a TDH-39 driver mounted in a standard cushion and an Auraldome circumaural enclosure. Thresholds were recorded from 6 trained, normal-hearing young adults in quiet and in the presence of broad band sound field noise at 50, 60, and 70 db sound-pressure level (SPL). No significant differences were observed between the 2 earphone conditions in the presence of any of the ambient broad-band noise levels. However, thresholds were statistically different in the quiet condition. Results raise questions regarding the calibration of intensity for Auraldomes and indicate that this particular circumaural cushion provides no advan-



tage over standard cushions in the presence of ambient noise above 50 db SPL. (French summary)—*Journal abstract*.

10815. Stream, Richard W. & Dirks, Donald D. (U Texas, Medical Branch, Galveston) **Effect of loudspeaker position on differences between earphone and free-field thresholds (MAP and MAF).** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 549-568.—Obtained free-field and earphone measurements from 8 practiced adult listeners under monaural and binaural conditions to assess the hypothesis that a major source of the disparity between minimum audible pressure (MAP) and minimum audible field (MAF) speech thresholds is the position of the loudspeaker relative to the listener's head. Free-field measurements were made at 7 different loudspeaker positions. Stimuli were spondaic words and pure tones at 5 octave intervals from 250 to 4000 Hz. The smallest monaural MAP-MAF difference for spondaes occurred at 0° azimuth (2.7 db) and the largest appeared at the 60° near-ear position (7.1 db). Similar results emerged for spondaic words under binaural conditions, although the magnitude of the changes due to variations in loudspeaker position was reduced considerably from comparable monaural conditions. Results indicate that the disparities in MAP-MAF differences of previous investigations were due principally to the location of the loudspeaker. The differences between MAP and MAF thresholds were compared to other published results on ear-canal pressure measured in free field and under earphone. Data suggest that the MAP-MAF differences observed in this study may be related partially to the differences in calibration techniques used to specify the level of the signal in free field and under earphone. (17 ref)—*Journal abstract*.

10816. Summerfield, A. Q. & Haggard, M. P. (Queen's U Belfast, Northern Ireland) **Perceptual processing of multiple cues and contexts: Effects of followed vowel upon stop consonant voicing.** *Journal of Phonetics*, 1974(Oct), Vol 2(4), 279-295.—Conducted a study of 16 undergraduate and postgraduate students to examine 2 acoustical correlates of voicing, previously combined in the voice onset time concept, that may be considered cues. The 1st correlate of voicing was the time from the burst to the 1st voicing pulse and was measured as the separation of these 2 events; the 2nd was the relative position in the formant transition frame at which voicing onsets and was measured as the amount of voiced first formant (F1) transition. Results show that for velar stops before /a/ both cues played a role in voicing perception although the transition cue was dominant. For velar stops before /i/, where no F1 transition occurs, the separation cue appeared more important than it did in /a/ context. Results point to the need to distinguish between contextual adjustments involving a simple boundary shift and those involving a reweighting of cues according to context. The 2 cues used appeared to be of different types with attendant differences in the effects they generate in perception experiments. A sophisticated view of the processing of different cues may be necessary to give an account of adaptation in the voicing feature in experiments where the percentage of voiced or unvoiced responses is modified following repeated

exposure to a stimulus with a distinct value of the feature. (15 ref)—*Journal abstract*.

### Visual Perception

10817. Alderson, G. J. & Whiting, H. T. (U Leeds, England) **Prediction of linear motion.** *Human Factors*, 1974(Oct), Vol 16(5), 495-502.—Used a motion-prediction paradigm in 2 experiments with a total of 54 17-32 yr old male university students and technicians. Each S viewed a moving tennis ball cross the display and disappear from view and was required to estimate when the ball would reach a target set on the extended motion track. The effects of viewing distance, prediction distance, and stimulus velocity upon the accuracy and variability of performance were examined. Exp I found that both prediction distance and stimulus velocity were significant variables, their additive effects showing a linear relationship between prediction time and both constant and variable errors. Exp II demonstrated that these linear relationships were replicable phenomena and that motion prediction became more accurate when Ss were given knowledge of results and allowed to practice the task. (16 ref)—*Journal abstract*.

10818. Attneave, Fred & Block, Gene. (U Oregon) **The time required to compare extents in various orientations.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 431-436.—In Exp I 3 paid undergraduate Ss compared the lengths of lines that varied in absolute and relative orientation. Ss' reaction times (RTs) showed a constant error pattern of which the familiar horizontal-vertical illusion was a special case, but horizontals were underestimated (relative to other slopes) much more than verticals were overestimated. The effect of difference in orientation was not great, though RT did increase significantly as the difference neared 90°. Exp II, with 3 additional Ss, was similar except that the lengths of lines were compared with the widths of bars in a grating. In this case, no consistent pattern of constant error emerged, and there was no suggestion that difference in orientation affected RT.—*Journal abstract*.

10819. Banks, Martin S. & Stolarz, Stephanie J. (U Minnesota, Ctr for Research in Human Learning, Inst of Child Development) **The effect of head tilt on meridional differences in acuity: Implications for orientation constancy.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 17-22.—G. Horn and R. M. Hill (1969) and others have reported that a small number of units in the cat visual cortex undergo changes in receptive field orientation associated with body tilt. Such units reportedly compensate for tilt and may represent a mechanism for human orientation constancy. To test this, meridional differences in visual acuity for head-vertical and head-tilted viewing conditions were measured with the authors serving as Os. Results of Exp I do not directly support or refute the involvement of tilt-compensatory units. Results of Exp II show that meridional acuity differences correspond to the retinal and not the spatial orientation of the stimulus. It is concluded that tilt-compensatory cortical units are not involved in human orientation constancy. The physiological evidence indicating the existence of tilt-compensatory units in the visual cortex is reexamined. (34 ref)—*Journal abstract*.

10820. Banks, William P.; Bodinger, Deborah & Illige, Martha. (Pomona Coll) **Visual detection accuracy and target-noise proximity.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 411-414.—Examined the proximity effect in a forced-choice visual detection. 5 college students were tachistoscopically presented stimulus arrays that always had as a target either the letter F or T; Ss had to determine on each trial whether an F or a T was presented. Results show that detection accuracy improved as the distance was increased between the target and the noise items in the array that were confusable with it. It is suggested that the proximity effect is a natural prediction of W. Estes's (1964) theory that detection is mediated by feature-detecting receptive fields. Results are explained in terms of perceptual configurations in the array—when the target was grouped with confusable noise its visibility was less than when it was not.—*Journal abstract.*

10821. Blake, Randolph & Fox, Robert. (Vanderbilt U) **Adaptation to invisible gratings and the site of binocular rivalry suppression.** *Nature*, 1974(May), Vol 249(5456), 488-490.—Attempted to clarify the interaction between pattern adaptation and rivalry suppression. By incorporating 2 separate phenomena, binocular rivalry and visual aftereffects, into 1 paradigm, a technique is presented that permits inferential analysis of the intermediate states in the visual process.

10822. Caelli, Terrence M. & Finlay, David C. (U Melbourne, Parkville, Vic, Australia) **Pattern discrimination of Gaussian distributions of orientation and line length parameters.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 489-493.—Notes that the 2 pattern parameters, line length (L) and orientation ( $\Theta$ ), have been salient in microelectrode studies and adaptation experiments with the vertebrate visual system, but have not been systematically examined in a pattern discrimination paradigm. It was argued that, because of their physiological importance, the detection of pattern differences should be predictable with known distributions of L and  $\Theta$ , using 40 naive undergraduate Ss. It was also argued that the discriminability of the concatenation of L and  $\Theta$  (L $\Theta$ ) could be predicted from the individual L and  $\Theta$  performance results. Results indicate support for both hypotheses and also imply that the L discriminations were more difficult than  $\Theta$ , using signal detection theory. (17 ref)—*Journal abstract.*

10823. Cohn, Theodore E. & Lasley, David J. (U California, School of Optometry, Berkeley) **Detectability of a luminance increment: Effect of spatial uncertainty.** *Journal of the Optical Society of America*, 1974(Dec), Vol 64(12), 1715-1719.—The theory of signal detectability (TSD) predicts that uncertainty of the spatial location of a luminance-increment stimulus should influence the detectability of the stimulus. If  $d'$  is the detectability,  $E$  the increment luminance,  $N^2$  the variance of the noise that obscures the signal, and  $M$  the number of equally likely nonoverlapping stimuli, TSD predicts ( $d'$ )<sup>2</sup> = log<sub>e</sub> [1 - 1/M + 1/M exp( $E^2/N^2$ )]. TSD also predicts that the slope of the receiver operating characteristic curve on probability paper should decrease in the presence of stimulus-position uncertainty. Both predictions were confirmed in psychophysical tests of 3 human Os for foveally viewed stimuli.—*Journal abstract.*

10824. Coren, Stanley & Porac, Clare. (U British Columbia, Vancouver, Canada) **The fading of stabilized images: Eye movements and information processing.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 529-534.—Investigated whether controlling the nature of an O's interaction with a stabilized image would control the rate of fading of the image: if the O does not attempt to explore the image, he should rapidly be provided with information which indicates that the image is completely decorrelated with his eye movements. Results of 2 experiments with a total of 100 normally seeing paid volunteers indicate that neural and photochemical satiation processes are inadequate to explain the fading of the stabilized retinal image. When eye movements were attempted over the stimulus, fading occurred more rapidly, indicating an information processing component in the disappearance of the image. (41 ref)—*Journal abstract.*

10825. Davidoff, J. B. (University Coll Swansea, Wales) **Hemispheric differences in the perception of lightness.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 121-124.—Conducted 2 experiments with 12 right-handed and 12 left-handed undergraduates in Exp I and with 48 Ss with normal color vision and either right or left eye and hand dominance in Exp II. Colored and grey stimuli were presented to the left and right visual fields. It was found that which stimulus was seen as lighter depended to some extent on the handedness of the S. In particular, right-handed Ss saw the stimulus on the left as lighter. This provides further evidence for the right hemisphere as being more important for perceptual functions. (French & German summaries) (18 ref)—*Journal abstract.*

10826. Dichgans, J.; Diener, H. C. & Brandt, Th. (U Freiburg, Neurological Clinic, W Germany) **Optokinetic-graviceptive interaction in different head positions.** *Acta Oto-Laryngologica*, 1974(Nov-Dec), Vol 78(5-6), 391-398.—Reports that displacements of the apparent vertical induced by exclusive visual stimulation with the head erect are moderate but increase progressively with larger head tilt angles. Data confirm the hypothesis that visual motion information and graviceptive information are centrally combined for the computation of the apparent orientation of gravity and have functional implications for postural orientation. (German summary) (36 ref)

10827. Engstrom, Ralph W. (RCA, Lancaster, PA) **Quantum efficiency of the eye determined by comparison with a TV camera.** *Journal of the Optical Society of America*, 1974(Dec), Vol 64(12), 1706-1710.—The corneal quantum efficiency of the eye was evaluated by comparing perception of a test chart by 6 30-59 yr old Os using dark-adapted vision, with the perception of the same chart using a solid-state, low-light-level TV camera and a monitor. Monochromatic radiation was used for the test. Irradiance of the scene was balanced for the 2 perception methods so that the same chart information was observed in both cases. The quantum efficiency of the eye was then deduced from the ratio of the 2 irradiance levels, the apertures of the eye and of the camera lens, and the quantum efficiency of the 1st photocathode of the TV tube. Results show the quantum efficiency of the eye to be in the range of 1-4%. The



experiment was limited to radiation levels equivalent to starlight and 2 orders of magnitude higher.—*Journal abstract.*

10828. **Filin, V. A.; Ananin, V. F. & Dymov, M. V.** (Scientific Research Inst of Medical Instrument-Making, Moscow, USSR) [Involuntary eye movements in the recognition of punctiform objects.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 128-132.—Describes the difference in the nature of eye movements obtained with 6 Ss viewing stimuli that subtended angles of 15' under instructions to fixate a spot, to fixate a digit, or to recognize a digit.—*L. Zusne.*

10829. **Foley, J. M.** (U California, Santa Barbara) **Error in visually directed manual pointing.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 69-74.—Errors in pointing at visual targets without sight of the hand or arm were measured in 8 normally seeing young adults for both hands in 2 cue conditions. The existence of large errors of overreaching, which increase as cues are reduced, was confirmed. These varied with target distance but not appreciably with the hand used or the target direction. Large lateral errors were also found. These could be reasonably well described by rotations about the midpoint of the eyes. Their magnitude and direction depended on the S and the hand used but were largely independent of cue condition and distance. The mean angular error across Ss taken without regard to sign was 4.8°. The mean difference between hands was 5.2°. The effect of eye dominance expected under G. L. Walls's (1951) and K. N. Ogle's (1962) hypothesis was not obtained.—*Journal abstract.*

10830. **Fox, John.** (MRC Applied Psychology Unit, Cambridge, England) **The use of structural diagnostics in recognition.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 57-67.—Examines the suggestion of L. E. Krueger (see PA, Vol 50:10310) and others that wholistic processes underlie certain perceptual judgments. It is argued that properties such as bilateral symmetry can have a "diagnostic" significance for visual matching tasks. Diagnosticity means that if the property is present the appropriate response to a stimulus could theoretically be determined without any other analysis of the stimulus. 5 experiments were conducted, using a total of 32 right-handed naval enlisted men. Results of Exps I and II indicate that symmetry is exploited as a diagnostic property for the simultaneous same-different judgment. Displays that show the diagnostic form produce short reaction times. Results also show that the diagnosticity effect can be demonstrated independent of potentially confounding factors such as simplicity or redundancy. Findings of Exps III, IV, and V discount further confounding factors and also show that other properties, notably parallelism and colinearity of stimulus elements, can also be exploited as diagnostics in the simultaneous matching task. Diagnostics can have a structural or relational form. Diagnostic features are viewed as 2-place structural predicates. Whether these diagnostics always have the same underlying form or not, the need for some representation of structure is a prerequisite for understanding even these simple recognition phenomena.—*Journal abstract.*

10831. **Garner, W. R. & Sutliff, Donna.** (Yale U) **The effect of goodness on encoding time in visual pattern discrimination.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 426-430.—Previous results have implied that pattern goodness, as defined by rotation-reflection equivalence set size, is a determinant of encoding time. A direct test of this implication was made via a discrete reaction-time (RT) task using good and poor dot patterns presented to 9 right-handed graduate and undergraduate Ss in a 2-stimulus discrimination. The following discrimination conditions were used: (1) good vs good, (2) poor vs poor, and (3) good vs poor. Overall RTs for Conditions 1 and 3 were equal, but each was significantly faster than Condition 2. In the 1st 2 conditions, there was no difference in RT within pairs and no consistent transitive ordering of the patterns. In Condition 3, however, the good pattern consistently produced the smaller RT. Results indicate that patterns of equal goodness were equally encodable, and the better the pattern, the faster it was encoded. In addition, there was evidence that pattern similarity affects RT.—*Journal abstract.*

10832. **Götz, Karl O. & Götz, Karin.** (Academy of Fine Arts, Dusseldorf, W Germany) **Color preferences of art students: Surface colors: I. Perceptual & Motor Skills**, 1974(Dec), Vol 39(3), 1103-1109.—In K. O. Götz and K. Götz's (see PA, Vol 52:7599) study with imagined colors, the statistical significance of the frequency distribution over the categories of a given preference scale were tested separately for each single color. For art students, only red and blue were pleasant, while gray and pink were unpleasant colors, black and white counted as neutral, and the distributions of all other colors listed were not statistically different from chance. In the present study with 14 surface colors, the results for 113 male and 77 female art students are similar with the exception of yellow and orange, which ranged among the highly preferred colors. The only sex difference was for green. The limitations of the present work are discussed.—*Journal abstract.*

10833. **Hennessy, Robert T. & Richards, Whitman.** (Human Factors Research, Goleta, CA) **Contrast sensitivity and viewing distance.** *Journal of the Optical Society of America*, 1975(Jan), Vol 65(1), 97-98.—Reports experimental findings which confirm those of C. R. Cavonius and R. Hiltz (see PA, Vol 51:4192) which show no change of contrast sensitivity dependent on accommodation and convergence distance of sinusoidal targets ranging from 1-60 c/deg. It is concluded that accommodation and convergence have an effect on sinusoidal contrast sensitivity of less magnitude than does 0 variability.

10834. **James, Carlton T.** (Rutgers State U, New Brunswick) **Vowels and consonants as targets in the search of single words.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 402-404.—Conducted a study of 12 undergraduates to investigate the hypothesis that eliminating lower case cues would destroy the vowel advantage in word recognition search tasks. Ss searched 4- and 6-letter words typed in uppercase for predesignated target letters. Results show that reaction times for vowel targets were faster than to consonant targets for both stimulus lengths; this was true whether or not the

target was contained in the stimulus word. It is suggested that an early stage in word perception is the location of vowels, as proposed by D. Hansen and D. Rogers (1968).—*Journal abstract.*

10835. Judd, Deane B. & Nickerson, Dorothy. **Relation between Munsell and Swedish Natural Color System Scales.** *Journal of the Optical Society of America*, 1975(Jan), Vol 65(1), 85-90.—Discusses the necessity for developing perceptually uniform color scales and uses simple formulas to demonstrate the degree to which Munsell hue, value, and chroma and the Swedish Natural Color System variables of blackness, whiteness, redness, yellowness, greenness, and blueness describe the same color space.

10836. Kitterle, Frederick L.; Kaye, Russell S. & Nixon, Heather. (U Toledo) **Pattern alternation: Effects of spatial frequency and orientation.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 543-546.—F. W. Campbell and E. R. Howell (1972) reported an effect called "monocular pattern alternation." They found that a pattern composed of 2 orthogonal sinusoidal gratings, one horizontal and the other vertical, underwent rivalry when viewed monocularly for a period of time. In the present 2 experiments with 14 undergraduate and 4 graduate students, respectively, it was shown that monocular pattern alternation depended upon the orientation of the pattern and the spatial frequency of its components. Fewer reversals were found for an obliquely oriented pattern than for a pattern with components in the horizontal and vertical meridians. Alternation rate was higher when the gratings were similar in frequency but differed in orientation than when the components of the pattern differed in both dimensions. It is concluded that pattern alternation reflects an antagonistic interaction between interdependent channels in the human visual system that respond to orientation and spatial frequency.—*Journal abstract.*

10837. Krekling, S. (U Trondheim, Inst of Psychology, NLHT, Norway) **Depth matching with visible diplopic images: Stereopsis or vernier alignment.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 114-116.—Notes that, in order to prevent Ss from actually performing a judgment of vernier alignment between the double images rather than matching stereoscopic depth of the test objects, various precautions have previously been taken (e.g., using inexperienced Ss who were ignorant of the experimental situation and possible matching criteria). In the present experiment, an S was given training in observing double images, and the matching problems were also discussed. The S was then instructed to perform stereoscopic depth judgments. The comparison between these data and data based on vernier alignment judgments under similar conditions showed that knowledge about the experimental situation and the vernier alignment criterion did not interfere with the S's task of matching the stereoscopic depth between visible double images.—*Journal abstract.*

10838. Lord, Catherine & Haith, Marshall M. (Harvard U) **The perception of eye contact.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 413-416.—16 male and 16 female college students made judgments of whether or not they were being looked in the eye as an E fixated several points on and off their faces. Distance

between sender and receiver, sex, and whether the sender made a sequence of fixations prior to the terminal fixation were variables of interest. The sender-receiver distance produced less effect than predicted from the hypothesis that receiver judgments were determined solely by the discrepancy between the sender's iris-sclera configuration (ISC) during true eye contact and the current fixation point. There was no stable difference in accuracy as a function of whether the sender's terminal fixation was preceded by other fixations or not. Findings cast doubt on the belief expressed in recent studies that the ISC can be used to accurately discriminate eye gazes from other gazes. Results suggest that fixations on some portions of the face yield a judgment of eye contact which might be predicted on the basis of social experience.—*Journal abstract.*

10839. MacAdam, David L. (Eastman Kodak Co, Research Lab, Rochester, NY) **Uniform color scales.** *Journal of the Optical Society of America*, 1974(Dec), Vol 64(12), 1691-1702.—Judgments of relative magnitudes of color differences exhibited by 128 selected nearest-neighbor pairs of 59 colored tiles were recorded by groups of 49-76 Os with normal color vision. Scale values that represent the perceived magnitudes of the color differences were obtained by statistical analysis of their reports. From colorimetric specifications of the tiles, formulas were devised that define a 3-dimensional euclidean space in which the distances between the points that represent the colors correlate reasonably well with the reported magnitudes of the perceived color differences. Because of the manner of selection of the approximately 500 colors, each except the most saturated will exhibit equal magnitudes of color difference from 12 others. About 2500 equally noticeable color differences can be exhibited by suitable arrangements of those colors, and each except the most saturated can be arranged in 6 different series. Each of those series exhibits from 3 to 10 color differences, all of equal magnitude. Such a series of colors which exhibits equal color differences is known as a uniform color scale. (18 ref)—*Journal abstract.*

10840. Mackavey, William; Curcio, Frank & Rosen, Jeffrey. (Boston U) **Tachistoscopic word recognition performance under conditions of simultaneous bilateral presentation.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 27-33.—Conducted 4 experiments involving the bilateral tachistoscopic presentation of word pairs to a total of 70 right-handed undergraduate volunteers. This paradigm generated a right hemifield recognition advantage across manipulations of word orientation, exposure duration, and fixation control. In 2 of the experiments this recognition asymmetry was maintained in spite of a significant tendency to initiate the verbal report with any available left hemifield content. In 3 of the experiments the strength of the left-to-right order of report tendency was negatively correlated with the magnitude of the right visual field recognition advantage. A hypothesis to account for the more common finding of left hemifield recognition superiority with bilateral displays is offered. (French & German summaries) (20 ref)—*Journal abstract.*

10841. MacLeod, Donald I.; Virsu, Veiho & Carpenter, R. H. (Florida State U, Inst of Molecular Biophysics) **On**



**mathematical illusions.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 417-418.—Criticizes E. H. Walker's (see PA, Vol 51:8284) paper on the grounds that its physiological premises lack support, that it misrepresents the theoretical position of C. Blakemore et al (see PA, Vol 46:2431), and that its theory is contradicted by existing evidence.

10842. Mershon, Donald H. & Gogel, Walter C. (North Carolina State U, Raleigh) **Failure of familiar size to determine a metric for visually perceived distance.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 101-106.—Explored the notion that familiar size cue to distance might be one of the factors responsible for supplying the metric (scalar) characteristics of perceptions of spatial extent within a visual display in which other information concerning scalar extents has been reduced to a minimum. 2 groups of 20 normally seeing undergraduate Os each were presented with realistic objects of the same angular, but different assumed, sizes presented in such a cue-restricted display. Perceptions of size and distance within the display did not differ significantly as a function of the type of object initially presented. This result suggests that scalar perceptions under these conditions probably are determined by a factor known as the specific distance tendency, rather than by the experiential factor of familiar size.—*Journal abstract.*

10843. Murphy, Brian J.; Haddad, Genevieve M. & Steinman, Robert M. (U Maryland) **Simple forms and fluctuations of the line of sight: Implications for motor theories of form processing.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 557-563.—Used a contact lens optical lever to measure 2-dimensional fixation characteristics when 2 experienced Ss fixated at various positions within simple forms small enough to fall entirely on the foveal floor ( $< 80$  min). Fixation stability and the average direction of the line of sight were not markedly or systematically affected by the shape of the fixation stimulus. Similar results were obtained when all saccades were suppressed and the line of sight maintained exclusively by means of slow control. These results cast doubt on motor theories of form perception. (20 ref)—*Journal abstract.*

10844. Oetting, Daniel R. & Oetting, E. R. (Colorado State U) **Preliminary observations on a visual perception illusion.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1290.—Describes an illusion in which, when a moving object is dimly lighted and includes bright-light-emitting diodes, at certain rates the diodes and object appear to move separately. Under some conditions, brighter parts of a visual field may be perceived more rapidly.

10845. Olson, Richard K. (U Colorado) **Children's sensitivity to pictorial depth information.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 59-64.—Tested 16 40-64 mo old children for sensitivity to interposition, height in field, linear perspective, and retinal size under either restricted (monocular, head motionless) or unrestricted (binocular, head free) picture surface viewing conditions. All of the Ss' relative depth responses (near vs far) to 2 toy houses were remarkably accurate with interposition and/or height in field pictorial depth information. Retinal size had relatively little control over

their responses, and the addition of linear perspective resulted in no significant improvement. Performance was nearly equivalent under the 2 viewing conditions, indicating young children's ability to take a "pictorial attitude."—*Journal abstract.*

10846. Pinkerton, Elizabeth & Humphrey, N. K. (Admiralty Research Lab, Applied Psychology Unit, Teddington, England) **The apparent heaviness of colours.** *Nature*, 1974(Jul), Vol 250(5462), 164-165.—10 male and 10 female Ss adjusted a fulcrum-like pointer to indicate subjective relative weight differences between pairs of visual stimuli consisting of 1 colored and 1 white disk, previously equated for subjective brightness, or between pairs of white disks differing in brightness. Relative weight was inferred from the pointer's displacement in centimeters from its original position midway between disks. Results show that colors were judged significantly heavier than white ( $p < .001$ ) while differences between brightness of white disks, or between males' and females' settings were not significant. Judged weight consistently decreased in the following order: red, blue, green, orange, yellow, with red significantly heavier and yellow significantly lighter than the other colors. Data are interpreted in terms of possibly indirect linguistic associations of a color's importance, subjective pleasantness of colors, or color preference.—A. Cerf-Bearre.

10847. Redding, Gordon M. (Illinois State U) **Simultaneous visuomotor adaptation to optical tilt and displacement.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 97-100.—Measured change in visuomotor direction and orientation following simultaneous exposure of 5 separate groups of 16 right-handed Ss each to optical displacement and tilt. Adaptation to both transforms simultaneously was not different from adaptation to each transform separately. Results are consistent with previous work involving purely visual change and suggest that the 2 kinds of adaptation involve independent processes for locus-specific and relational analysis. (15 ref)—*Journal abstract.*

10848. Richards, Whitman & Foley, John M. (Massachusetts Inst of Technology) **Effect of luminance and contrast on processing large disparities.** *Journal of the Optical Society of America*, 1974(Dec), Vol 64(12), 1703-1705.—Conducted a study with the authors as Os in which, although reduced luminance impaired the discrimination of small disparity stimuli, large-disparity discrimination improved. Crossed and uncrossed stimulus disparities of  $4^\circ$  that were not discriminated at photopic levels were easily discriminated at mesopic levels near the color threshold. This improvement of stereo processing appeared to be dependent upon an effective contrast reduction produced neurally, because a physical reduction of contrast without a change of background luminance also improved large-disparity stereopsis.—*Journal abstract.*

10849. Riggs, Lorrin A.; White, Keith D. & Elmas, Peter D. (Brown U) **Establishment and decay of orientation-contingent aftereffects of color.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 535-542.—Conducted a study with 6 Os (the authors, an undergraduate, and 2 research assistants) in which, in achromatic test gratings, green horizontal lines appeared pinkish and





indicate that (a) female Ss showed a greater time-related performance decrement in correct detections than males in the regular-intermittent background condition, (b) RTs increased with time, (c) males responded more rapidly than females, (d) intermittent noise attenuated time-related changes in incorrect detections, (e) males made more incorrect detections than females in the intermittent background conditions but not in the constant-background conditions, and (f) there was a Sex  $\times$  Trial Block interaction ( $p < .01$ ) in the constant noise condition. Several correlations between and within response measures are reported. (30 ref)—*Journal abstract*.

10856. Walker, Evan H. (US Army Ballistic Research Lab, Aberdeen Proving Ground, MD) **On spurious allusions. *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 419-425.**—Demonstrates that the criticisms of E. H. Walker's (see PA, Vol 51:8284) theory by D. I. MacLeod et al (see PA, Vol 53:Issue 6) stem from a too simple reading of the text of the theory, a failure to investigate fully the references cited to support their position, and an effort to bolster the theory of lateral inhibition in orientation detectors. The criticisms are shown to misrepresent the experimental data of various reports. Walker's physiological premises are shown to be sound, and the cases of "contrary evidence" are shown in fact to be in agreement with the theory. Lateral inhibition in orientation detectors as an explanation of optical illusions is shown to fail completely to agree with experimental results. (24 ref)—*Journal abstract*.

10857. Wolford, George & Hollingsworth, Samuel. (Dartmouth Coll) **Retinal location and string position as important variables in visual information processing. *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 437-442.**—Conducted 3 experiments with a total of 33 normally seeing undergraduate Ss to isolate the effects of retinal locus and string position in tachistoscopic letter recognition. Retinal locus proved to be an important variable even when its range was restricted to less than a degree from the center of the fovea. Performance was maximal at the center of the fovea, dropping off rapidly to about 1.5° from the center. From that distance on, the decline in performance was quite gradual. String position was also an important factor. Retinal locus and string position interacted in such a way that the end positions were less affected by retinal locus than the middle positions. It was also found that processing order, as distinct from report order, was a significant component of the string position effect.—*Journal abstract*.

10858. Wong, S. F. & Borresen, C. R. (Wichita State U) **Effect of delay of feedback and type of movement on laterally displaced vision. *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1331-1336.**—144 male and female volunteers were run in an experiment investigating the effects of type of movement (active vs passive), type of feedback (none, delayed, immediate), and the interaction effect on laterally displaced vision. The main hypothesis was that delayed feedback would be particularly effective under the condition of passive movement. While the main hypothesis was not supported, several secondary ones were supported. The hindering effect of the lack of significance of the main effect of type of movement on other hypotheses is pointed out.—*Journal abstract*.

## Motor Processes & Performance

10859. Beggs, W. D.; Sakstein, Ruth & Howarth, C. I. (U Nottingham, England) **The generality of a theory of the intermittent control of accurate movements. *Ergonomics*, 1974(Nov), Vol 17(6), 757-768.**—Develops equations to describe target aiming, accurate line drawing movements, and driving skill, each containing a measure of the angular accuracy of aiming. Employing 12 normally seeing right-handed undergraduates, it was hypothesized that the measures of angular accuracy for the different tasks are related to each other, are a characteristic of the S, and that ability in such tasks is correlated. However, no significant correlation in performance was found in nonvisual target aiming, line drawing, and walking along beams of different width. Despite this failure, the data in each case fitted the theoretical equations very well, both for individual Ss and when collapsed across Ss. It is concluded either that the angular error of aiming is characteristic only of S-task interaction or that other parameters in the equations vary considerably from task to task. (French & German summaries) (17 ref)—*Journal abstract*.

10860. Bense, Carolyn K. & Lockhart, J. M. (US Army Natick Lab, Pioneering Research Lab, MA) **Cold-induced vasodilatation onset and manual performance in the cold. *Ergonomics*, 1974(Nov), Vol 17(6), 717-730.**—Investigated manual dexterity capabilities during whole-body cold exposure as a function of time to vasodilatation during local cooling. 30 male US Army volunteers were divided into 3 equal groups on the basis of the time for a 1.7°C rise in index finger temperature during immersion of the hand in 4.4°C water: <450-sec, 450-900 sec, and >900-sec groups. Subsequently, each S was exposed to ambient temperatures of 15.6° and -6.7°C for 3 hrs while performing a battery of 6 manual tasks bare-handed. Manual performance on all tasks was affected adversely at the -6.7°C ambient and worsened with continued cold exposure. The drop in performance on 3 tasks involving skilled movements of the wrist and fingers was greatest for the <450-sec group. The early onset of vasodilatation in local cooling per se appeared to be associated with initially superior performance and subsequently inferior performance on specific manual tasks with increasing durations of whole-body cold exposure. (French & German summaries) (16 ref)—*Journal abstract*.

10861. Galanter, Eugene & Owens, J. A. (Columbia U, Psychophysics Lab) **The independence of the simple reaction time on key force. *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 115.**

10862. Levy, C. Michael & Bowers, Dawn. (U Florida) **Hemispheric asymmetry of reaction time in a dichotic discrimination task. *Cortex*, 1974(Mar), Vol 10(1), 18-25.**—Manual reaction times (RT) to a verbal target stimulus, embedded in a series of dichotically presented digits, were measured in 40 dextral Ss. The major finding was an asymmetry of RTs: RT to target stimuli was 132 msec faster in the right ear than in the left. The magnitude of the asymmetry was almost 2.5 times greater for this complex discrimination task than that found previously in studies involving simple stimulus detection, suggesting that differential processing time is

an important function of task complexity and mediational demands.—R. Gunter.

10863. Lockhart, John M.; Kiess, Harold O. & Clegg, Thomas J. (US Army Natick Lab, MA) **Effect of rate and level of lowered finger surface temperature on manual performance.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 106-113.—Tested 32 Army enlisted men on 6 manual tasks when the right forefinger surface temperature was either not lowered (control condition) or lowered to temperatures of 65°, 55°, and 48° Fahrenheit (18.3°, 12.8°, and 8.9° Centigrade) after 5 or 50 min of cooling. Performance on all tasks decreased with lowered surface temperature. The level of finger surface temperature associated with impaired performance and the extent of the performance decrements associated with additional cooling varied across tasks and cooling rate. The differential effects of local cooling on manual performance across tasks and cooling rates were analyzed in terms of the differential susceptibility of hand function to parameters of cold exposure and the selective requirements across aspects of manual performance for unimpaired functioning of the hands and arms.—*Journal abstract*.

10864. Metz, L. Daniel. (U Illinois) **The potential for systems theory application to studies of motor performance.** *Human Factors*, 1974(Oct), Vol 16(5), 514-519.—Considers that motor performance calls into play a number of complex physiological and biological systems. An understanding of the function and behavior of such systems is necessary if motor performance is to be properly analyzed and helpful if it is to be improved. The concepts of systems and control theory offer a powerful (though sometimes not fully exploited) methodological technique for achieving such an understanding. Some of the elementary concepts of systems theory as applied to motor performance are discussed, and qualitative discussions of its usefulness in that field are presented. (15 ref)—*Journal abstract*.

10865. Nakamura, R. & Salto, H. (Tokyo Metropolitan Inst for Neurosciences, Japan) **Preferred hand and reaction time in different movement patterns.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1275-1281.—Examined the difference in reaction time (RT) for right and left biceps, acting on the forearm in 2 different movement patterns, flexion and supination, for 7 right-handed and 7 left-handed 25-48 yr old normal adults. The task was to flex or supinate both forearms simultaneously in response to a sound stimulus. Median RTs of each S were computed for each movement task. Analysis indicated that RT of supination was faster than that of flexion. Concerning left-right difference of RT, the flexion of the nonpreferred hand was faster than that of the preferred hand, and the supination of the preferred hand was faster than that of the nonpreferred. Even in a simple movement there were differences in RTs for the right and left hands which did not depend on the muscles but on the movement patterns. It is concluded that hemispheric dominance is not established by comparing the rapid initiation of movement.—*Journal abstract*.

## COGNITIVE PROCESSES AND MOTIVATION

10866. Ackles, Patrick K.; Zimmermann, Robert R.; Manning, Mark & Kazarian, Charles. (Central Michigan U) **Transposition in young monkeys and children.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1291-1298.—Trained 30 young rhesus monkeys with discrimination learning experience and 30 1st graders to discriminate stimulus pairs which differed in either brightness, volume, or volume plus brightness. After achieving the criteria of learning, Ss were tested for transposition on a fixed number of trials with stimulus pairs along the same dimension. The order of the near and far tests of transposition was counterbalanced. Both monkeys and children made the fewest errors in learning and transferring on the compound stimulus dimension. The most errors were made in learning and transfer on the brightness stimuli and on the far test condition. The order of transposition testing, and the interactions of Order  $\times$  Near-Far Test condition, Stimulus Dimension  $\times$  Near-Far condition, and Order  $\times$  Near-Far  $\times$  Stimulus were significant sources of variance for the monkeys. Monkeys tested on the far test first made fewer errors on subsequent tests, and the magnitude of the reductions was most dramatic in the brightness condition. Results are interpreted in terms of stimulus differentiation in perceptual learning which assumes that relative differences among stimuli are valid sources of information. (17 ref)—*Journal abstract*.

10867. Anokhin, P. K. [The problem of decision-making in psychology and physiology.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 21-29.—Presents a paper delivered at the Moscow Institute of Psychology on January 23, 1974. Decision making is viewed not as an isolated problem or an isolated mechanism but as part of a larger system. The actual decision making moment is preceded by complex predecision events. Motivation and memory always enter the picture, determining the form that decision making takes, its type, and its general characteristics. Motivation acts to select from memory all those elements in the individual's life that have corresponded to satisfying the motive. The particular mode of satisfying a motive, however, depends on existing environmental conditions. Physiologically, decision making occurs on the level of single neurons and on the level of the whole brain as an integrated system. The problem is to understand the process of information reduction in the nervous system, so that, as the degrees of freedom available for operation to a single neuron and neuron groups are reduced, a goal-directed, integrated, and organized functioning of the whole brain in the process of decision making is achieved.—L. Zusne.

10868. Banks, William P.; Clark, Herbert H. & Lucy, Peter. (Pomona Coll) **The locus of the semantic congruity effect in comparative judgments.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 35-47.—Tested a 2-stage model for a "semantic congruity effect" in comparative judgments in 2 experiments with 26 undergraduates as Ss. When Ss were asked to choose the higher or the lower of 2 balloons tethered at the ends of strings, they were faster at choosing the higher of the 2, but when asked to choose the higher or the lower of 2 yo-yos hanging at the



ends of strings, they were faster at choosing the lower one. By hypothesis, this occurred because the balloons were coded at a 1st perceptual stage in term of highness and the yo-yos in terms of lowness; then, at the 2nd linguistic stage, the perceptual codes that matched the instructional codes ("choose the higher" or "the lower") resulted in the faster judgments. Results demonstrate that (a) the 2 stages are sequential, since changes in pairwise stimulus discriminability and in instructions had additive effects on the total reaction time and (b) the presence of the semantic congruity effect depended on the actual perceptual codes applied to the stimuli. —*Journal abstract.*

10869. Bossewitsch, Kenneth. (City Coll, City U New York) **The effects of practice and expectation upon productivity in problem solving.** *Graduate Research in Education & Related Disciplines*, 1974(Spr-Sum), Vol 7(2), 5-31.—Sought to determine the influence of practice and expectation on 1 aspect of creativity and originality in problem solving, i.e., productivity. 56 Ss were evenly divided and arbitrarily assigned to 1 of 4 experimental conditions. Each S received the Unusual Uses test (UUT) for a watch problem. Ss in the practice groups received the UUT for a safety-pin problem just before the watch problem. In 2 groups, expectation for many responses was induced by special instructions. Results of a 2-way analysis of variance support the 3 hypotheses that (a) different instructions significantly increase productivity; (b) specific practice significantly increases productivity; and (c) there is no significant interaction between practice and expectations. It is concluded that the ability to develop high quality solutions may be upgraded without extensive training, environmental manipulation, or massive personality changes. (28 ref)—*C. Tatham.*

10870. Dockstader, Steven L. (U Denver) **The blank trials effect: A review of the literature.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 116.

10871. Henderson, Leslie & Henderson, Sheila E. (Hatfield Polytechnic, England) **Visual comparison of words and random letter strings: Effects of number and position of letters different.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 97-101.—12 undergraduates made same-different judgments of tetragrams. Stimuli were either words or consonant strings. In the case of different pairs, the number and position of letters different were controlled. Words were compared faster than random strings under all conditions. Consistent effects of the number and position of letters different suggest that word superiority is not due to phonemic recoding. For both words and consonant strings "same" reaction time (RT) to a given pair was faster when it was from a block in which "different" pairs had 3 rather than 1 letter different. This suggests that the wholistic identity reporter involves a criterion process sensitive to the magnitude of expected differences. Different RTs were faster in all conditions for 3-letter different pairs rather than 1-letter different pairs, ruling out a fixed order self-terminating search process for "different" decisions. (20 ref)—*Journal abstract.*

10872. Kleiter, Gernot D. (U Salzburg, Psychologisches Inst, Austria) **[Multistage decision making models in psychology.]** (Germ) *Psychologische Beiträge*, 1974, Vol

16(1), 93-127.—Reviews theoretical foundations and empirical investigations of multistage decision making. Examples taken from the psychology of thinking and the psychology of motivation are used to point to the relations of the theory to information processing. (French summary) (5 p ref)—*English summary.*

10873. Kuchmenko, A. I. **[The effects of different learning situations on mental performance of high school students as a function of the strength and equilibrium of nervous processes.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 52-58.—Measured the strength and equilibrium of the nervous processes of 54 high school students, using conditioning methods, and observed their performance of well-rehearsed mathematical skills in 6 problem-solving situations differing in the degree of anxiety and motivation involved. The correlations obtained between these 2 sets of measures are interpreted as indicating that individuals with different nervous systems react differently to the same problem situation if the attending conditions differ. Individuals showing a strong nervous excitation process worked faster than individuals with a weak nervous system when the level of motivation and anxiety was moderate or low. In work requiring a high level of motivation no difference between these 2 types was found. The differential effect of the degree of nervous equilibrium appeared only in practice situations and competition for individual honors involving both speed and accuracy. (English summary) (20 ref)—*L. Zusne.*

10874. Lichtenstein, Sarah; Earle, Timothy C. & Slovic, Paul. (Oregon Research Inst, Eugene) **Cue utilization in a numerical prediction task.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 77-85.—Trained 40 male university students to make numerical predictions of a criterion from a cue. Ss were trained on 2 separate cues that differed in validity. Later, the cues were presented together, simultaneously for 20 Ss and successively for the rest. Ss were asked to use both cues to predict the criterion. A regression model provided an adequate fit to the data, and the Ss showed conservatism similar to the conservatism found in previous Bayesian inference studies. However, further analyses showed consistent deviations from the normative model. The post hoc hypothesis that Ss were regressing each cue, then averaging the regressed values, was supported. Searching for heuristic strategies, rather than relying on the apparent fit of normative models, was advocated. (19 ref)—*Journal abstract.*

10875. Marcel, Tony. (MRC Applied Psychology Unit, Cambridge, England) **The effective visual field and the use of context in fast and slow readers of two ages.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 479-492.—Examined the amount read from the second of 2 successive fixations in 30 adults before and after a "speed-reading" course and in 48 fast and slow 11-yr-old readers, as a function of contextual constraint. Faster readers benefited more from increased contextual constraint. Errors related only visually to the display decreased with increased constraint; errors both grammatically and visually related increased more in faster than slower readers, and more so than predicted by the relative increase found in purely grammatically related

errors. It is concluded that more effective use of context enlarges the effective visual field in 2 ways. With greater contextual priming, less sampling of visual information is necessary for word recognition, allowing more capacity for visual processing on the periphery. In addition, faster children, but not adults, showed an advantage even in sequences without contextual constraint. In the fastest readers of both ages, a type of semantically related error was found which suggests a further mechanism of rapid reading. (28 ref)—*Journal abstract*.

10876. McDonald, Roy D. & Smith, John R. (California State U, San Diego) **Trance logic in tranceable and simulating subjects.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 80-89.—Investigated double hallucination and transparency of hallucination as criteria of trance logic. 18 highly tranceable Ss and 17 refractory simulators were chosen from a group of psychology student volunteers, using scores on the Harvard Group Scale for Hypnotic Susceptibility, Form A, and the Stanford Hypnotic Susceptibility Scale, Forms B and C. While no statistically significant differences were found between these 2 groups on these 2 dimensions of trance logic, there are suggestions in the data which support the trance-logic phenomenon. 3 spontaneous reports of transparency of the positive hallucination were made by tranceables, while none occurred in the simulating group. Methodological issues in assessing the uniqueness of the hypnotic state are discussed, and suggestions are made to improve future investigations of the problem. (German, French, & Spanish summaries) (20 ref)—*Journal abstract*.

10877. Messick, Samuel & French, John W. (Educational Testing Service, Princeton, NJ) **Dimensions of cognitive closure.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 3-16.—Investigated the generality of the perceptual factors of speed and flexibility of closure in the cognitive domain. Several experimental measures of both flexibility and speed of closure employing perceptual or figural content, verbal or symbolic content, and semantic content were administered to 541 US Naval Aviation Cadets, along with marker measures for several established factors. In addition to several of these marker dimensions, factors were obtained for both Flexibility and Speed of Figural Closure, of Verbal or Symbolic Closure, and of Semantic Closure, along with a dimension tentatively interpreted as Flexibility of Grammatical Closure. The substantial intercorrelations among these factors yielded 4 2nd-order dimensions, interpreted as Analytical Functioning or General Reasoning, Figural Closure, Symbolic Closure, and Semantic Closure. The latter 3 factors each represent a combination of analytical and structuring skills (a coalescence of flexibility and speed of closure) and are distinguished by the type of content involved (figure, symbol, or meaning). (15 ref)—*Journal abstract*.

10878. Polivanova, N. I. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Functional and structural aspects of the visual components of intuition in problem solving.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 41-51.—Studied the solution of various forms of the travelling salesman problem, with special emphasis on the visual aspects of the solution. It

is concluded that the visual aspects may lead to operations based on readily apparent and directly perceived geometric relationships, which, however, the problem-solver is not aware of. These operations predominate in the problem-solving process or play a role equal to that of the logical and analytical processes. Visual components of problem solving interact with the processes of logic and serve the heuristic function of narrowing down the region of search and of formulating hypotheses that give direction to the search process. They involve visual logic, which orients itself toward points of concentrated information in the problem situation. The identification of such points occurs when problem elements are augmented by the appearance of additional, holistic aspects of the problem situation in the process of visual information encoding. Attention to these holistic aspects allows the simultaneous reckoning of a number of simpler elements which, taken alone, do not guarantee a successful solution of the problem. (English summary)—*L. Zusne*.

10879. Rudestam, Kjell E.; Sherman, Richard C. & Jarnecke, Roy. (Miami U) **Effect of lens-model and outcome feedback in a social judgment analogue.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1223-1233.—96 undergraduates judged the correct category designations of human-like figures which differed with respect to 4 facial cues, a task designed so that the correct category was defined by a linear function of the cues. Ss were randomly assigned to 1 of 4 feedback conditions in which they received (a) traditional "right" vs "wrong" feedback after each trial, (b) the correct category of each figure, (c) the values of each cue for each figure, or (d) the linear function relating the cues to the categories. Results are analyzed by L. Tucker's (1964) modification of the Brunswikian lens model equations. Ss who received "lens" feedback were found to gain significantly more knowledge of the task system than Ss in traditional outcome feedback conditions, exercise significantly greater control over that knowledge, and achieve a significantly higher level of accuracy in their judgments. (16 ref)—*Journal abstract*.

10880. Russell, Paul N. (U Canterbury, Christchurch, New Zealand) **A measure of similarity between separate categorizations of to-be-remembered words.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1150.—Describes a method of quantifying the degree of similarity between separate categorizations in a task which requires an S to recall and organize words, and of determining to what extent the S uses the same modes of categorization on repeated categorization trials.

10881. Shanon, Benny. (Massachusetts Inst of Technology) **The two meanings of a homophone.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 571-574.—12 university students who were native speakers of English were presented with sentences whose main noun was either a homophone or not. Following each sentence, Ss were presented with a single noun and had to indicate whether it was relevant to the sentence. More specifically, irrelevant probes following sentences containing homophones were either irrelevant with respect to both interpretations of the homophone or irrelevant with respect to the present interpretation of the homophone but relevant with respect to its other interpretation. Data



suggest that people compare the main noun and the probe, and that in doing so they compute both entries of the homophone noun. No effect was found due to a variation in the delay between the presentation of the sentence and the presentation of the probe.—*Journal abstract*.

10882. Spoehr, Kathryn T. & Smith, Edward E. (Rutgers State U, Douglass Coll) **The role of orthographic and phonotactic rules in perceiving letter patterns.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 21-34.—Examined the role of orthographic and phonotactic rules in the tachistoscopic recognition of letter strings in 3 experiments using a total of 45 high school, college, and graduate students as Ss. Exp I showed that the presence of a vowel or multiletter spelling patterns facilitates perceptual accuracy. To account for these results a model was proposed in which an input string is first parsed into syllablelike units, which are then recoded into speech. It was demonstrated that the perceptual accuracy for a string is correlated with the number of recoding steps needed to convert that string into speech. Exp II further demonstrated that this recoding process can predict perceptibility differences among strings with varying numbers of phonotactic violations, and Exp III assessed some of the specific assumptions of the recoding process. (17 ref)—*Journal abstract*.

#### Learning & Thinking & Conditioning

10883. Arima, James K. (Naval Postgraduate School, Monterey, CA) **Verbal discrimination learning: An information analysis of randomly presented 2-, 3-, and 4-word items.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 116-117.

10884. Atkinson, Richard C. & Raugh, Michael R. (Stanford U) **An application of the mnemonic keyword method to the acquisition of a Russian vocabulary.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 126-133.—Evaluated the effectiveness of a mnemonic procedure, the keyword method, for learning a foreign language vocabulary. The method used divides the study of a vocabulary item into 2 stages. The 1st stage requires the S to associate the spoken foreign word with an English word, the keyword, that sounds like some part of the foreign word; the 2nd stage requires him to form a mental image of the keyword interacting with the English translation. The experiment compared the keyword method with an unconstrained control procedure using Russian vocabulary. Ss were 52 undergraduates. On all measures the keyword method proved to be highly effective, yielding for the most critical test a score of 72% correct for the keyword group compared to 46% for the control group.—*Journal abstract*.

10885. Bäumlér, Günther. (Technische U München, W Germany) **[An experimental contribution to Ebbinghaus' paradigm for learning "derived lists."]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 499-510.—Avoided methodological objections to Ebbinghaus's experiments with derived lists by presenting as initial learning experience a different random sequence of the same 24 nonsense syllables to each of 46 Ss, asking them to write down as many items

as they could remember in proper sequence. The average performance after 4 repetitions was 67% of the items. In order to prevent Ss from rehearsing after the learning session, they were requested to perform the placing test of the Minnesota Rate of Manipulation Test immediately afterwards. 24 hrs later different groups of Ss relearned parts of the original lists. Group 1a relearned the 1st 8 items of their original sequence again; Group 1b relearned the 2nd 8; Group 1c the last 8 items. Group 2 learned 8 items in a derived 1st-order list, 2a the 1st 8 odd items, and 2b the last 8 even items of their original lists. Group 3 learned 8 items in a derived 2nd-order list; 3a items 1,4, . . . 22; 3b items 2,5, . . . 23; and 3c items 3,6, . . . 24. Comparison of the time needed by Groups 1, 2, and 3 to relearn 8 items and of the errors made confirmed Ebbinghaus's model of remote associations. Group 3 needed significantly more time and made most errors. (English & French summaries)—*W. J. Koppitz*.

10886. Buschke, Herman. (Albert Einstein Coll of Medicine, Yeshiva U) **Two stages of learning by children and adults.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 392-394.—Attempted to show that verbal learning in 10 children (mean age = 9 yrs), 10 young adults (mean age = 22.9 yrs), and 10 older adults (mean age = 42.2 yrs) could be analyzed in terms of 2 stages of (item and list) learning, amplifying previous analysis in terms of storage, retention, and retrieval from long-term storage. Consequently, repeated attempts were made to retrieve a 20-item list without confounding by any further presentation of items after their first recall. 2 separate stages of learning were indicated by the failure of retrieval to increase until the abrupt onset of perfectly consistent spontaneous retrieval.—*Journal abstract*.

10887. Carlson, J.; Goldman, R.; Bollinger, J. & Wiedl, K. H. (U California, Riverside) **[The effect of verbalizing the problem on different problem types and methods of presentation of the Raven Progressive Matrices Test.]** (Germ) *Diagnostica*, 1974, Vol 20(4), 133-141.—Examines the effect of verbalizing the problem on the ability to solve 10 perceptual and 10 conceptual items of the Raven Coloured Progressive Matrices Test. In a test of 32 children 7-8 yrs old the 20 items were presented as pictures and as puzzles. When Ss were instructed to verbalize the problem, better performance was achieved on perceptual items presented as puzzles.—*M. Morf*.

10888. Ciccone, Donald S. & Brelsford, John W. (Rice U) **Encoding specificity: The processing of stimulus attributes.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 60-64.—By holding task and instructional variables constant, an attempt was made to show that the method of stimulus presentation can determine the type of processing an item receives (i.e., which features, semantic, structural, or both, are implicated during encoding). The encoding of semantic vs structural stimulus attributes was manipulated by presenting 20 undergraduates with either a meaningful or a random sequence of common adjectives and nouns. The encoding of semantic information in the meaningful condition and the lack of such processing in the random condition were indicated by their relative

false alarm rates to certain high-associate distractors in a subsequent test of recognition. An analysis of each group's recognition performance indicated that a semantic as compared to a structural processing strategy led to a reduced hit rate but did not significantly increase the overall false alarm rate. It is suggested that if a recognition response depended primarily upon the physical attributes of the stimulus, then a structural rather than a semantic encoding strategy would be most efficient.—*Journal abstract.*

10889. Clement, Marc A. & Anderson, Daniel R. (U Massachusetts, Amherst) **Strategies in learning redundant relevant cues in concept identification.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 209-214.—In 2 experiments a total of 320 undergraduates were given a redundant relevant cues concept identification problem. Results indicate that (a) most Ss who learn about both relevant cues learn them one at a time rather than focusing in on both solutions simultaneously, (b) 2-cue learners take longer to respond than do 1-cue learners, and (c) time allowed to view the stimulus affects both the frequency of multiple-cue learning and the Ss' stated choice of a multiple-look or one-look sampling strategy.—*Journal abstract.*

10890. Cumming, R. W. & Croft, P. G. (Monash U, Clayton, Vic, Australia) **Human information processing under varying task demand.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

10891. Danks, Joseph H. & Gans, Dianne L. (Kent State U) **Acquisition and utilization of a rule structure.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 201-208.—In a paired-associate paradigm, stimulus-response pairs were generated from a rule matrix. In Exp I the matrix was shown to different groups of 80 undergraduates either before, during, or after learning, or not at all. Earlier presentation of the rule matrix facilitated acquisition of the stimulus-response pairs. Likewise, presentation of the matrix either before or during learning enhanced generalization to new rule-governed stimuli. But the point of matrix presentation did not affect a test of the already learned pairs. The process of rule learning was analyzed into 3 components: existence, structure, and content of the rule. Knowledge of these components was manipulated by instructions to 44 undergraduates in Exp II. Knowledge of the rule's structure and content, but not of its existence, facilitated learning and generalization to new items.—*Journal abstract.*

10892. Davey, C. P. (U Melbourne, Parkville, Vic, Australia) **Physical exertion and mental performance.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

10893. Davis, Richard G. (VA Hosp, Tampa, FL) **Acquisition of verbal associations to olfactory stimuli of varying familiarity and to abstract visual stimuli.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 134-142.—Conducted 2 paired-associate (PA) learning studies to observe the acquisition performance of 85 college students with either odors or abstract figures as stimuli and numbers as responses. In both studies visual PA acquisition was

reliably superior to olfactory learning. Since the 2nd study was designed to maximize the learning of associations to the odors and minimize the learning of associations to the figures, it appears that the sense of smell is not as well suited to the PA task as vision when essentially naive Ss are involved. In a 3rd experiment with 60 Ss, the familiarity of odors and figures was judged and reported as a graphic magnitude estimation response. These judged stimulus familiarities were used to select stimuli for the PA task. Subsequently, PA acquisition was facilitated by the use of highly familiar odors. (22 ref)—*Journal abstract.*

10894. Dunathan, Arni T. & Ten Brink, Terry D. (U Missouri, Instructional Media Lab) **Visual mediators as aids to paired-associate learning.** *AV Communication Review*, 1974(Fal), Vol 22(3), 295-302.—Sentences, pictures, and a combination of both were used to facilitate learning of paired associates consisting of a real word and an artificial word. College students (18 per group) in 3 conditions learned the word pairs in fewer trials than a control group. The picture-plus-sentence condition was significantly more facilitating than the control.—*Journal abstract.*

10895. Ebert, Hilmar & Tack, Werner H. [Tasks of completing sequential number patterns and some of their effects upon learning.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 511-529.—Found a general learning effect for such tasks by presenting different types of number series and a specific learning effect if Ss worked repeatedly on the same type of task. 80 female and male students served as Ss. The general learning effect reduced solution time gradually, converging on a minimal time to perform completion of number series. The specific learning effect reduced solution time much faster with convergence upon a much lower minimal time. However, a switch to another type of completion task of number sequences considerably increased the time to find the new solution. Mathematical models for the two types of learning effects are presented. (English & French summaries)

—W. J. Koppitz.

10896. Flaherty, John J. & Shapiro, Bernard J. (Rhode Island Junior Coll) **Concept attainment as a function of method of presentation, training, and concept rule.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1087-1091.—3 factors affecting concept attainment—concept rule, preliminary instruction, and presentation paradigm—were considered in an attribute identification study with 80 undergraduates. A  $4 \times 2 \times 2$  factorial design was employed in which the variables were (a) concept rule (conjunction, disjunction, conditional, or biconditional); (b) pretraining (provided or not provided); and (c) presentation paradigm (reception or selection). Reception was clearly superior to selection, while pretraining in truth-table strategy was effective in reducing the difficulty of the conceptual rules. Pretraining also affected the order of difficulty of the rules.—*Journal abstract.*

10897. Galbraith, Gary G. & Galbraith, Sandra A. (Washington State U) **Norms for discrete free associative responses to aurally presented homophones.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 117.



10898. Ghatala, Elizabeth S.; Levin, Joel R. & Makoid, Lois A. (Weber State Coll) **A clarification of frequency effects in children's discrimination learning.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 1-6.—Conducted 3 experiments to assess the effects of certain stimulus variables on children's discrimination learning. A total of 123 4th and 48 6th graders served as Ss. In general, it was found that word frequency was negatively related to discrimination learning as long as the words were meaningful to Ss. Moreover, the relationship between word frequency and performance reversed in free-recall learning, as was expected. Equivalent relationships between frequency and learning were obtained with both verbal and pictorial materials. (23 ref) —*Journal abstract.*

10899. Giambra, Leonard M. (Gerontology Research Ctr, Baltimore City Hospitals, Md) **Labels for response categories: Do neutral labels make conjunctive and inclusive disjunctive concepts equally difficult.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1155-1159.—In a study with a total of 42 undergraduates, 4 groups of 6 or 7 Ss each ( $n = 26$ ) worked 1 problem involving a different concept rule where directional labels for response categories were used. The concept rules were conjunction, alternate denial, inclusive disjunction, and joint denial. 2 additional groups of 8 Ss each worked 1 problem involving a different concept-rule problem with a neutral pair of labels. The concept rules were conjunction-alternate denial, and inclusive disjunction-joint denial. A complete learning task was used. Significant rule effects were found within directional and neutral labels. Conjunction-alternate denial with neutral labels was intermediate in difficulty between conjunction and alternate denial rule with directional labels. The inclusive disjunction-joint rule was intermediate in difficulty between the inclusive disjunction and joint denial rules. The evidence also suggests that the 1st neutral label seen and/or the neutral label of lesser frequency acted strongly to determine the label upon which S focused attention.—*Journal abstract.*

10900. Jackson, Paul & Warr, Peter. (MRC Social & Applied Psychology Unit, U Sheffield, England) **Instances and inferences.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 547-549.—Studied 20 undergraduates to examine parallels between the combination of particular instances of a cue trait to make a single judgment and the combination of judgments into a compound impression. Predictions derived from a differential weighted averaging model were tested and confirmed, and the implications for theories of impression formation are discussed.—*Journal abstract.*

10901. Kauffman, Dan; Johnson, Mike & Knight, Gene. (Arizona State U) **The empirical derivation of equations for predicting subjective textual information.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 202.

10902. Kellas, George; McCauley, Charley & McFarland, Carl E. (U Kansas) **Reexamination of externalized rehearsal.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 84-90.—Evaluated the validity of D. Rundus and R. C. Atkinson's (see PA, Vol 44:7692) overt rehearsal technique in a study with 40 undergraduates. To assess any

changes in input processing which might result from overt rehearsal, S-paced item presentation was employed that yielded a measure of study time at successive input positions. This measure monitors S's activity during the stage of processing that might be affected by overt rehearsal and is therefore more appropriate to the problem than a recall performance measure. A covert rehearsal control group was included, which enabled an evaluation of the effects of externalized rehearsal. It was shown that overt rehearsal disrupts the cognitive activities normally utilized on standard memory tasks. In particular, overt rehearsal increased the amount of serial processing and required greater study time relative to covert rehearsal. These results are discussed in terms of a depth-of-processing framework.—*Journal abstract.*

10903. Kuntz, Dolores. (Brescia Coll, London, Ontario, Canada) **Effects of faking instructions on the word-association test.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1183-1192.—Investigated the effects of role-playing instructions on 5 word-association behavioral indices. 90 words varying in associative difficulty and in affective connotation were administered as a word-association test to 72 undergraduates. Ss were randomly assigned to 1 of 3 groups and were tested under standard, "fake good," and "fake bad" instructions. Set significantly influenced mean reaction time, response repetition, forgetting, and "misremembering," but did not interact with affective connotation. This lack of interaction was interpreted as favorable for the use of the word-association technique since no evidence was shown that set distorted the influence of affective connotation. All the set mean effects except that of reaction time reflected the influence of the "fake bad" set. (18 ref)—*Journal abstract.*

10904. Matthews, Leroy J. & Patton, James H. (Idaho State U) **Failure to shift following disconfirmation in concept identification.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 91-94.—Investigated the extent to which Ss reject the disconfirmed hypothesis as a function of prior consecutive successes with it. 93 undergraduates were given either 2, 5, or 8 consecutive confirmations with the relevant hypothesis prior to reversal transfer. It was found that (a) maintaining the disconfirmed hypothesis was related to prior success with it and (b) high-efficiency solvers maintained to a greater extent than low-efficiency solvers. Results are interpreted as supporting a hypothesis that Ss assign a probability to the hypothesis based on a success-failure ratio with it.—*Journal abstract.*

10905. Mueller, John H.; Brown, Sam C. & Kausler, Donald H. (U Missouri) **Paired-associate transfer with homograph stimuli.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 167-172.—Investigated the effect of homograph stimuli in paired-associate transfer paradigms in 2 experiments with a total of 120 undergraduates. Exp 1 involved A-D transfer and compared pairs having responses that cued the alternative meanings on Lists 1 and 2 to pairs having responses that cued the same meaning on both lists; other pairs had homograph stimuli with responses unrelated to meaning, and others had nonhomograph stimuli. The 1st 2 pair types did not differ from each

other, although both differed from the latter 2 types, which also did not differ from each other. Exp II compared homograph stimuli with unrelated responses to nonhomograph stimuli in A-Br transfer, but comparable transfer resulted in each case. Results do not support the encoding variability hypothesis in terms of stimulus recoding in transfer.—*Journal abstract.*

10906. Mueller, John H.; Kausler, Donald H.; Yadrick, Robert M. & Pavur, Edward J. (U Missouri, Columbia) **Encoding strategies in double-function verbal discrimination learning.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 55-59.—Conducted 2 experiments with a total of 128 undergraduates to test various encoding strategies with double-function lists. A double-function verbal discrimination list uses each word as a correct term and an incorrect term in different pairs. Frequency and single-image cues were expected to be of limited utility, whereas other strategies that emphasize the right-wrong association were expected to be helpful. Results show that verbal strategy facilitated learning, but that single images, compound images, and logical combination strategies did not.—*Journal abstract.*

10907. Ohnmacht, Fred W.; Brody, Richard & O'Connor, John. (State U New York, Albany) **Relationship of false recognition and paired-associate learning ability with learning of reversal and nonreversal shift.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1279-1283.—Administered a false-recognition task and a paired-associate learning task to 43 undergraduates. Half the Ss were given a reversal shift and the rest a nonreversal task. The paired-associate task was found to be unrelated to both the reversal and nonreversal tasks, while the false-recognition task was significantly related to the reversal shift but not to the nonreversal task. False recognition was also significantly related to the initial discrimination learned in the reversal shift-nonreversal shift paradigm. A 2-stage recognition model is used to explain the results.—*Journal abstract.*

10908. Ohnmacht, Fred W.; Grippin, Pauline C.; O'Connor, John & Brody, Richard. (State U New York, Albany) **Paired-associate learning, false-recognition scores, and performance in a hierarchically arranged concept-learning task.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1207-1210.—Studied 23 undergraduates to test the hypotheses that (a) paired-associate learning would be negatively related to number of acquisition trials for simple concepts but not related to a complex one and (b) false recognition would be positively related to such acquisitions but most strongly related to a relatively complex one. Data provide some support for these predictions.—*Journal abstract.*

10909. Prokasy, William F.; Clark, Craig G.; Williams, William C. & Spurr, Charles W. (U Utah) **A classically conditioned skeletal response can be acquired with a discriminated punishment contingency.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 551-553.—Ex-posed 26 undergraduates to a discriminated punishment contingency with the aversive stimulus being an air puff to the cornea. In most Ss there was an increase in response probability (an eyelid reflex) across trials, and an application of the 2-phase model showed that the increases, though not great, were reliable. An analysis of

the estimated parameter values showed that for only 5 of the 26 Ss did the pattern of parameter values conform to what would be expected on the basis of either 2-factor or relative reinforcement theory. Results are, however, consistent with what might have been expected from giving Ss a low ratio intermittent reinforcement schedule in a more traditional classical conditioning arrangement.—*Journal abstract.*

10910. Rollins, Howard A.; Schurman, Don L.; Evans, Mary J. & Knoph, Kathy. (Emory U) **Auditory versus visual processing of three sets of simultaneous digit pairs.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 173-181.—Conducted 2 experiments with a total of 22 undergraduates and graduate students to determine whether the auditory and visual systems process simultaneously presented pairs of alphanumeric information differently. In Exp I different groups of Ss were given extensive practice recalling pairs of superimposed visual or auditory digits in simultaneous order (the order of arrival) or successive order (one member of each digit pair in turn, followed by the other pair member). For auditory input, successive order of recall was more accurate, particularly for the last 2 of 3 pairs presented, whereas for visual input, simultaneous order of recall was more accurate. In Exp II, Ss were cued to recall in one or the other order either immediately before or after stimulus input. Recall order results were the same as for Exp I, and precuing did not facilitate recall in either order for both modalities. Results suggest that processing in the auditory system can only occur successively across time, whereas in the visual system processing can only occur simultaneously in space.—*Journal abstract.*

10911. Schmitt, Neal & Dudyka, Arthur L. (Michigan State U) **Positive and negative cue redundancy in multiple cue probability learning.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 78-84.—In 2 separate experiments, 80 undergraduates completed a 2-cue probability learning task in which cue intercorrelation was positive or negative and cue validities were positive or negative. Results indicate that Ss did not learn the negative validity tasks. In addition, there were no significant differences between groups in achievement due to cue intercorrelation in any one experiment. However, the positive redundancy groups were significantly more consistent in the employment of their decision strategy than the negative redundancy groups when cue validities were positive. The negative redundancy groups were superior to positive redundancy groups in matching; again, when cue validities were positive.—*Journal abstract.*

10912. Siegel, Paul S.; Stenmark, David E.; Rickard, Henry C. & Eastman, Raymond L. (U Alabama) **Vicarious reinforcement or discrete free association?** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 153-159.—Argues that the vicarious reinforcement account of F. H. Kanfer and A. R. Marston (see PA, Vol 37:7599) reduces to an associative control (word linkage) paradigm; no appeal need be made to reinforcement, modeling, imitation, or matching. 36 male undergraduates in Exp I, in the absence of vicarious reinforcement, responded proportionately to model lists that increased, decreased, or held



constant the frequency of critical response words (animal nouns). Exp II, with 36 Ss, included a vicariously reinforced group, a group of controls that received a bell of brief duration following each critical response word verbalized by the model, and a group for which no stimulus change accompanied the model's presentation. The 3 groups failed to separate in the production of critical responses. 67 Ss in Exp III were presented the same critical response words within a discrete free association test. These responses were then compared with those yielded by the Ss of Exp II. All 4 groups yielded about the same number of critical responses. A limited content analysis also revealed striking similarities in the responses of the 4 groups.—*Journal abstract.*

10913. Taplin, John E. (U New South Wales, Kensington, Australia) **Evaluation of hypotheses in concept identification.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 85-96.—Investigated hypothesis evaluation in bidimensional conceptual tasks in 3 experiments with a total of 368 undergraduates. In Exp I, Ss were given an initial hypothesis involving 1 of 8 rules and required to test it to find a concept. When this given hypothesis was true (i.e., the concept), no difference was found between rules for the number of instances selected to the criterion of solution. Moreover, there was a tendency for Ss to choose instances which were predicted to be positive according to the hypothesis under test. Exp II examined the role of memory in hypothesis testing. Immediate recall of instances selected revealed no difference between true and false hypotheses. Both primacy and recency effects were evident in recall. The number of instances correctly recalled was more than expected by models of hypothesis sampling and evaluation, and this was attributed to Ss having a low criterion for recall without intrusions. Differences between rules and positive and negative instances on recall were suggested to be due to different amounts of information processing when classifying each type of instance for each rule; the results of Exp III support this suggestion. (31 ref)—*Journal abstract.*

10914. Tversky, Amos & Kahneman, Daniel. (Hebrew U, Jerusalem, Israel) **Judgment under uncertainty: Heuristics and biases.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 182.

10915. Underwood, Benton J.; Reichardt, Charles S. & Malmi, Robert A. (Northwestern U) **Sources of facilitation in learning conceptually structured paired-associate lists.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 160-166.—In an experiment with 210 undergraduates, the concepts in a hierarchically structured list consisting of 24 number-word pairs were aligned systematically with position and numbers, or with the number stimuli only. Some lists involved an alignment appropriate only to the lowest conceptual level. Other lists were completely unstructured when viewed in terms of either position or number. The lowest level concepts in the hierarchy were most heavily involved in learning, although the concepts at the higher levels had a small influence. When the hierarchy was aligned with the number series only, the structure was apparent to Ss but their learning was not greatly influenced. Results suggest that conceptual structure facilitates learning most effectively when the

order of the instances of the concepts is held constant.—*Journal abstract.*

10916. Vendrell Brucet, José & Vendrell Gómez, D. Pedro. [Sensory input, information, and communication.] (Span) *Anuario de Psicología*, 1973, No 8, 3-20.—Constructed an experimental language and compared the progress of 2 groups of adults who learned it by visual and by audio methods. Results reveal no significant differences between the groups. It is concluded that learning a natural language is basically independent of the way its signs have been assimilated. (English summary)

10917. Wason, P. C. & Golding, Evelyn. (University Coll London, Psycholinguistics Research Unit, England) **The language of inconsistency.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 537-546.—Studied 75 undergraduates to examine Ss' inconsistent remarks in explaining their erroneous solutions to a difficult deductive problem. 4 half-masked cards of the following types were presented: (a) a number in the lower half, (b) a blank in the upper half, (c) a letter in the upper half, and (d) a blank in the lower half. Ss were required to determine which cards needed to be unmasked to determine decisively whether a sentence like "A letter is above each number" was true or false. The original aim was to determine the possible effects of varying the order of the terms in the test sentence. Results are inconclusive. However, the Ss' protocols were of interest. When asked to justify their incorrect solutions, their remarks revealed the operation of irreversible thought processes. 3 possible hypotheses about them are considered, and it is argued that one involving dissociation of attention is most plausible. (18 ref)—*Journal abstract.*

10918. Wiegand, Dieter. [Quantitative measurement of psychological stress while driving by means of a simultaneous secondary task.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 679-690.—Investigated driving stress by measuring performance decline in a number reversal task while driving in rural and city traffic. 15 test drivers of military vehicles, 15 civilian drivers, and a control group who did not perform the number rehearsal task while driving served as Ss in the experiment. Results show a significant reduction of channel capacity under driving stress. The experiment demonstrated that the method used is suitable to measure psychological stress under driving conditions with sufficient differentiation. (English & French summaries)—*W. J. Koppitz.*

10919. Williams, Ian D. (U Waterloo, Ontario, Canada) **Practice and augmentation in learning.** *Human Factors*, 1974(Oct), Vol 16(5), 503-507.—A linear-positioning task was learned by 60 right-handed undergraduate volunteers over 1, 3, or 10 practice trials under high feedback (HFB—augmented position cues) or low feedback (LFB—no positional cue augmentation). Ss' abilities to sustain accurate performance without information feedback and to appraise the magnitude and direction of errors were examined during 10 further test trials. Absolute errors were least after 10 practices with HFB, as predicted by closed-loop theory. However, HFB apparently caused performance inferior to LFB when only 1 practice trial was permitted.—*Journal abstract.*

## Attention &amp; Memory

10920. Barrett, Terry R. & Ekstrand, Bruce R. (U Colorado) **Second-order associations and single-list retention.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 41-49.—Conducted 2 experiments with a total of 144 undergraduates to determine whether or not the presence of a rule structure in a paired-associate list would affect forgetting over a 1-wk retention interval. In these experiments, the rules were 2nd-order associations that related stimulus-term categories to response-term categories (e.g., if the stimulus is an instance of the concept "animal," then the response is an instance of the concept "fruit"; a sample pair for this rule might be "dog-apple"). In both experiments there was evidence that Ss learn and utilize these rules, consequently reducing long-term forgetting. The rules did not affect the speed of learning. It is suggested that the rules might operate by increasing the Ss' ability to reconstruct the nature of the list after a long retention interval. Alternatively, 1st-order associations may be less susceptible to extra-experimental interference if they are stored hierarchically under unique higher-order associations.—*Journal abstract.*

10921. Bencomo, Armando A. & Daniel, Terry C. (Dept of Economic Security, Phoenix, AZ) **Recognition latency for pictures and words as a function of encoded-feature similarity.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 119-125.—In separate trials of a same-different recognition task, a single target item presented to 24 undergraduates as either a picture or a word was followed after a 30-sec delay by a single test item, either a picture or a word. Test items were either nominal matches for the target (same) or 1 of 5 related distractor items. Distractors were selected to resemble the target item on 1 of 5 dimensions: orthographic, acoustic, conceptual (functional or categorical), schematic (similar in shape), or neutral. Same-different reaction times varied systematically as a function of depiction mode of target and/or test items and by distractor type. Verbally related distractors (orthographic and acoustic) produced longer reaction times when target or test items or both were presented as printed words. When target or test items were presented as pictures, schematic and conceptual distractors produced the longest rejection latencies.—*Journal abstract.*

10922. Bernbach, Harley A. (Purdue U) **Rate of presentation in free recall: A problem for two-stage memory theories.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 18-22.—Notes that the lack of any effect of rate of presentation at the recency end of the free-recall serial position curve has long been taken as a strong point of evidence for a 2-stage model of memory. The present 3 experiments with a total of 127 undergraduates demonstrate that this finding is (a) not generally reproducible, (b) not consistent with the most common form of the 2-stage theory, and (c) is reproducible under circumstances that have nothing to do with the structure of the memory system. The pattern of findings is taken as posing a serious problem for 2-stage theories of memory.—*Journal abstract.*

10923. Blowers, Geoffrey H. (U Hong Kong) **Field dependence and distraction in a simple psychomotor task with a constant foreperiod.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1239-1244.—Notes that rod-and-frame test errors are thought to reflect differential abilities in selective attention and argues that a study of the relationship of field dependence to distraction should involve Ss whose field-dependence scores have been determined specifically by the rod-and-frame test. The present study involved distraction in a simple reaction-time paradigm using 10 field-dependent and 10 field-independent psychology students. There was no correlation between distraction and field dependence, although it may be that a larger difference in field-dependence scores between groups is required to detect differences in susceptibility to distraction.—*Journal abstract.*

10924. Castaldo, Vincenzo; Krynicki, Victor & Goldstein, Jared. (Albany Medical Coll, Union Coll & U) **Sleep stages and verbal memory.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1023-1030.—Performed 2 experiments in an attempt to relate sleep stages with overnight memory of consonant trigrams and paired-associates. In Exp I a 20-min learning task before sleep did not alter sleep patterns of 14 high school and university students. Further, neither delta sleep nor REM sleep nor their interaction reliably correlated with recall in the morning. In Exp II the effect of pharmacological alteration of the sleep pattern with imipramine hydrochloride was assessed in 8 medical students. Despite a large suppression of REM sleep and concomitant elevation of Stage 2, recall and relearning in the morning were not different from non-drug values. Results indicate that no sleep stage is uniquely favorable or unfavorable to verbal memory. (23 ref)—*Journal abstract.*

10925. Coltheart, Max. (U Reading, England) **Iconic memory: A reply to Professor Holding.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 42-48.—Discusses D. H. Holding's (see PA, Vol 53:Issue 6) article which argued that the partial report superiority normally taken as evidence for the existence of iconic memory might instead be due to cue anticipation or output interference. It is suggested that both of these alternative explanations are inconsistent with the finding that the partial report superiority diminishes rapidly with increasing cue delay. Previous studies are cited which indicate that output interference effects are absent or negligible in tachistoscopic experiments. Consequently, it is concluded that the partial report superiority, and especially its decline with increasing delay, remains strong evidence in favor of the conventional view of iconic memory. Furthermore, if this view were wrong, there would remain no way of giving a satisfactory account of "direct" investigations of visual persistence or integration and interruption effects in backward visual masking. (19 ref)—*Journal abstract.*

10926. Denis, Michel. [Recall of complex film or verbal material by the child: Dispersion and originality of responses as a function of age and material.] (*Fren*) *Enfance*, 1974(Jan-Apr), No 1-2, 131-142.—Children's ability to recall information presented verbally was compared with their recall of information given by film.



Ss were 60 boys in 3 groups of mean ages 6.6, 8.7, and 10.7 yrs. All had IQs within 1 interquartile range and the means were 98, 99, and 100. As age increased, reports of what was seen or heard were longer and included more of the material, but originality decreased. Material presented by film was recalled less completely than that presented verbally, except by the youngest Ss. Data presented by film produced imaginative responses, common to the whole group, with less interindividual variation. Long-term results were better for film presentation than for verbal presentation.—S. S. Marzolf.

10927. Dhanens, Thomas P. & Lundy, Richard M. (Pennsylvania State U) **Hypnotic and waking suggestions and recall.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 68-79.—Selected, from a group of undergraduate volunteers, 61 high susceptible and 57 low susceptible Ss according to scores on the Harvard Group Scale of Hypnotic Susceptibility, Form A. Motivating and regression suggestions were administered to all Ss with and without hypnotic induction in an effort to improve the recall of contextual and nonsense material. Relaxation-only and control groups were included. The only Ss to improve recall over control were high susceptible Ss in the hypnosis-plus-motivation condition when contextual material was used. Data fail to support previous explanations of hypnotic hypermnnesia based on regression and/or relaxation. (German, French, & Spanish summaries) (19 ref)—*Journal abstract*.

10928. Dick, A. O. (U Rochester) **Iconic memory and its relation to perceptual processing and other memory mechanisms.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 575-596.—Reviews research on iconic memory. Specific issues discussed include the duration of the icon, effects of stimulus variables, types of information lost, selection, processing capacity, and scanning. More general issues include the level of encoding in the icon and its relation to short-term memory. It is argued that a number of experiments do not show what they were intended to show because of possible methodological problems. The view is developed that iconic memory is postretinal but uncoded and that it is not influenced directly by strategies or subsequent mechanisms. (149 ref)—*Journal abstract*.

10929. Epstein, Michael L.; Phillips, W. Daniel & Johnson, Shirley J. (Rider Coll) **Recall of related and unrelated word pairs as a function of processing level.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 149-152.—Conducted 2 experiments with 75 high school and 26 college students to study the effects of 3 processing tasks on cued recall of related and unrelated word pairs. Ss were given either incidental-semantic, incidental-nonsemantic (orthographic), or intentional ("try to learn") processing instructions. Incidental-semantic Ss found a similarity or a difference between paired words. Overall recall was highest in the semantic and lowest in the nonsemantic conditions. Related pairs were better recalled than unrelated pairs in all conditions. In the incidental-semantic condition, pair relationship and processing task interacted—finding differences and similarities facilitated recall of related and unrelated pairs, respectively. Similar findings shown on a 24-hr delayed-recall test.

Results are interpreted in terms of a "levels of processing" model of memory.—*Journal abstract*.

10930. Eriksen, Charles W. & Hoffman, James E. (U Illinois) **Selective attention: Noise suppression or signal enhancement?** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 587-589.—Obtained reaction times (RT) of 4 college students to single letter displays when an indicator, designating in which of 4 possible positions the letter would appear, preceded the display by intervals of 0-150 msec. Prior information, even by as little as 50 msec as to the letter's position, resulted in reduction in RT. Controls ruled out the possibility that the effect was attributable to changes in fixation, masking, or facilitating effects of a first signal. Instead, the effect appears to reflect characteristics of a central selective attentional mechanism.—*Journal abstract*.

10931. Eysenck, Michael W. (U London, Birkbeck Coll, England) **Effects of noise, activation level, and response dominance on retrieval from semantic memory.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 143-148.—44 undergraduates low or high in activation, as measured by the Activation-Deactivation Adjective Check List, participated in two semantic memory tasks, one involving speed of recall and the other speed of recognition. While noise was presented on half the trials. There was an interaction between noise and activation under the recall condition only. High activation facilitated recall performance with high dominance items, but had a detrimental effect with low dominance items. The differential effect of arousal on recall and recognition suggests that arousal affected the retrieval component of recall. Findings are interpreted in light of D. E. Broadbent's hypothesis that high arousal enhances the probability of sampling information from dominant sources. (22 ref)—*Journal abstract*.

10932. Fisher, Dennis F.; Jarombek, Jerry J. & Karsh, Robert. (Human Engineering Lab, Aberdeen Proving Ground, MD) **Short-term memory (1958-1973): An annotated bibliography.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 181.

10933. Galbraith, Richard C. (Northwestern U) **On the independence of attributes of memory.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 23-30.—Investigated the degree of independence of memory attributes in determining performance. Results of a demonstration experiment with 160 college students indicate that memory can carry an associative attribute and a frequency attribute simultaneously with little interaction between the two (i.e., these attributes were independent in their influence on performance). The discussion centers on attribute control as a function of perceived task demands, on the distinction between attribute composition and attribute utilization, and on certain problems inherent in the analysis of memory and the corresponding problems in theory construction.—*Journal abstract*.

10934. Garten, Joseph A. & Blick, Kenneth A. (Virginia Commonwealth U) **Retention of word-pairs for experimenter-supplied and subject-originated mnemonics.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1099-1104.—In a study of 120 undergraduates, the effectiveness of descriptive sentences and mediation

mnemonics supplied by E and originated by S was compared with simple repetition. All mnemonic conditions excelled the control condition, and at the shorter retention intervals (2 days and 1 wk), S-originated devices were significantly superior to E-supplied conditions. At the 8-wk interval all mnemonic conditions, except for the mediation E supplied, produced significantly higher retention than the control condition. —*Journal abstract.*

10935. Gruneberg, Michael M.; Monks, Joseph; Sykes, Robert N. & Osborne, David J. (University Coll Swansea, Wales) **Some correlates of rated memorability of sentences.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 519-527.—Studied 36 undergraduates to examine the effect of instruction to generate memorable as opposed to grammatical sentences from letter strings of varying lengths. Results indicate that the effect of instruction was limited, but where it was effective higher rated memorability was associated with higher rated sentence simplicity and positive affect. Correlations between the characteristics examined in the study and memorability failed to reveal any relationship between rated bizarreness and memorability, but correlations were found between rated memorability and rated imageability, meaningfulness and sentence simplicity, characteristics found by independent research to be related to memorability. Other correlations between characteristics examined in the study are also discussed. —*Journal abstract.*

10936. Guenther, R. Kim & Linton, Marigold. (U Utah) **Mechanisms of temporal coding.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 182-187.—Presented a series of highly salient, complex visual stimuli to 72 undergraduates in an uninterrupted sequence. Afterward, Ss judged which member of a pair of stimuli occurred earlier and estimated temporal location in the inspection series for each. It was found that (a) presentation time for critical items did not affect accuracy of judgments; (b) presentation time for filler items had no differential effect on accuracy; (c) increased number of items produced poorer performance; (d) the framework of a brief auditory story with no intentional connection to the pictures enhanced performance; and (e) judgments were better on an immediate than on a 24-hr delayed test, particularly for pictures near the end of the original series. A verbal story line may provide an effective framework for recalling the temporal order of events that occur concurrently. —*Journal abstract.*

10937. Hanley, Michael J. & Scheirer, C. James. (State U New York, Binghamton) **Proactive inhibition in memory scanning.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 81-83.—Studied release from proactive inhibition using a memory-scanning paradigm. 32 undergraduate Ss were presented with 4 blocks of 3-item lists of letters and numbers alternately, and reaction time was measured as a function of number of prior lists with a given type of material. It was found that reaction time on shift trials was substantially shorter than reaction time for other trials, indicating a rapid buildup of proactive inhibition in the scanning paradigm. —*Journal abstract.*

10938. Hastie, Reid. (Harvard U) **Intralist repetition in free recall: Effects of frequency attribute recall instructions.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 3-12.—Previous research has shown that when some to-be-remembered words occur twice in a list, free recall of words occurring only once in the same list is impaired in relation to recall of words from comparable lists in which all words occur once. In the present research 2 experiments were conducted to specify the conditions that produced the inhibition of recall of once-presented words accompanied by twice-presented words. A total of 114 undergraduates served as Ss. It was found that free recall of once-presented words accompanied by twice-presented words was inhibited only when the S was instructed, before list presentation, to distinguish between once- and twice-presented words during free recall. In contrast to free-recall performance, recognition memory for once-presented words occurring in lists containing twice-presented words was not impaired. (17 ref) —*Journal abstract.*

10939. Hintzman, Douglas L.; Summers, Jeffrey J. & Block, Richard A. (U Oregon) **Spacing judgments as an index of study-phase retrieval.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 31-40.—Investigated the hypothesis that the ability of Ss to judge the distance between 2 presentations of a word in a list reflects study-phase retrieval of the trace of the 1st presentation of the word by its 2nd presentation. 2 experiments were conducted using a total of 153 Ss recruited through a university newspaper. Exp I supported the hypothesis by demonstrating that the accuracy of spacing judgments for associatively related pairs of words, like that for repeated words, was high compared to that for unrelated words. Exp II used spacing judgments to measure retrieval upon repetition of a homograph. In 3 conditions, context words accompanying a homograph on its 2 presentations were either the same, biased the same meaning, or biased different meanings. In all 3 conditions, later spacing judgments were more accurate than in an unrelated-word control. Accuracy did not depend on whether the 2 context words biased the same meaning or different meanings of the homograph. —*Journal abstract.*

10940. Holding, Dennis H. (U Louisville) **Sensory storage reconsidered.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 31-41.—Suggests that models of sensory storage incorporate 3 features: capacity in excess of short-term memory, rapid decay of information and an unprocessed trace as the storage medium. The evidence for each is examined in the visual and the auditory modes. The excess capacity hypothesis is rejected on the grounds that negative results are obtained when output interference and cue anticipation mechanisms are excluded. Rapid decay is seen as a minor effect which may not result from sensory storage. Limited trace storage appears to exist in the form of extremely brief sensory persistence, but applies only to normally attended stimuli; the pivotal concept of subsequent random access to a trace appears unsupported. (78 ref) —*Journal abstract.*

10941. Homa, Donald & Fish, Robert. (New Coll, Div of Natural Sciences) **Recognition reaction time in long-**



term memory as a function of repetition, lag, and identification of positive and negative search sets. *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 71-80.—Investigated, in 2 experiments, the effect of repeated presentations on recognition latency for positive and negative words. In Exp I, using 20 college students, an initial positive list of 20 words was memorized prior to recognition testing; during the testing sequence, positive and negative words were presented 4 times each, with certain words always appearing at predefined lags. In Exp II, with 20 college students unfamiliar with Exp I, a list of 10 negative words was memorized in addition to the 20 positive words. Results indicate that latencies for all stimulus types (positive, unlearned negative, and learned negative) decreased with repeated presentations, whereas the effect of different lags was unimportant. Error rates for unlearned negatives in both experiments were nearly zero; for positive and learned negative items, error rates systematically declined with repeated presentations and were independent of lag size. Results of the 2 experiments are interpreted as providing little support for the recognition model based on familiarity criteria developed in 1974 by R. C. Atkinson and J. F. Juola.—*Journal abstract*.

10942. Johnson-Laird, P. N.; Robins, C. & Velicogna, Lucy. (U Sussex, Lab of Experimental Psychology, Ctr for Research in Perception & Cognition, England) **Memory for words.** *Nature*, 1974(Oct), Vol 251(5477), 704-705.—Tested 2 groups of Ss to determine their recall of sentence meaning and whether a certain element of meaning was conveyed by a noun or a verb. One group was told they would be given a memory test for the theme of a short spoken passage; the 2nd group heard the same passage but was not informed of the memory test. Results indicate that those who knew of the test retained more verbatim information than the group unaware of the memory test. It appears that lexical categories tend to be rapidly forgotten along with the superficial and underlying syntax of the sentence.—*A. de la Haba*.

10943. Jongeward, Robert H.; Woodward, Addison E. & Bjork, Robert A. (U Michigan) **The relative roles of input and output mechanisms in directed forgetting.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 51-57.—Conducted a free recall experiment with 40 undergraduates in which cues to remember all, only 2, or none of the items in each of 8 successive 4-word blocks were presented either before or after a 3-sec rehearsal period. Even though the search set at output was constant (16 to-be-recalled words), there was an "only" effect (i.e., when a 1st set of items (Set A) is followed by a 2nd set (Set B), a post-input cue to recall only Set B produces better recall than does a cue to recall Set B then Set A) for blocks followed by selective (postcue) rehearsal, whereas nonselective (precue) rehearsal produced no such effect. More striking than that result was the ability of Ss, whatever the condition, to differentiate to-be-remembered and to-be-forgotten items. Set differentiation during input appears much more important as a mechanism of directed forgetting than either selective search or selective rehearsal.—*Journal abstract*.

10944. Kolars, Paul A. (U Toronto, Ontario, Canada) **Addendum to "Remembering operations."** *Memory & Cognition*, 1975(Jan), Vol 3(1), 29-30.—Corrects a computational error which modified a result reported in P. A. Kolar's (see PA, Vol 51:10378) study of typographical effects on memory for sentences. Recalculations of the data are described, emphasizing that the main finding, that more is remembered of a sentence than its semantic content, still stands.

10945. Kristofferson, Marianne W. (McMaster U, Hamilton, Ontario, Canada) **On the interaction between memory scanning and response set.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 102-106.—Conducted 2 item recognition studies with a total of 48 undergraduates. Exp I replicated a previous study by H. Egeth et al (see PA, Vol 49:8377) but with a within-S design. Consistent with their findings, analogous differences obtained between mean reaction times (RTs) to positive set sizes of 1 and 3 were significantly greater when Ss pressed 2 different keys to indicate whether a test letter was a member of the positive set (2-response condition) than when Ss pressed a single key to indicate only that a test letter was a positive set member (1-response condition). In Exp II, those item recognition procedures which are known to allow serial exhaustive search to occur were used, and data were collected for 4 positive set sizes. RT was a linear function of set size for both response conditions, the slopes of the functions did not differ significantly, and absolute slope values were consistent with previously reported findings for the 2-response condition and letter stimuli. It is concluded that response requirements sometimes have effects on memory scanning (the slope of the item recognition function).—*Journal abstract*.

10946. Kroll, Neal E.; Kellicut, M. H. & Parks, Theodore E. (U California, Davis) **Rehearsal of visual and auditory stimuli while shadowing.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 215-222.—Presented memory trigrams to 24 undergraduates using 1 of 3 methods: visual-concurrent (all 3 letters appeared simultaneously), visual-successive, and auditory-successive. During the 12-sec retention interval, Ss shadowed and reported their rehearsals and mnemonic associations via switches. On trials without associations, recall performance supported the hypothesis that the form of rehearsal is related to presentation modality. However, the frequency and temporal patterning of the rehearsals over the retention interval were virtually identical for all 3 presentation conditions, suggesting that the "control processes" were relatively independent of both method of presentation and modality of rehearsal. Data suggest that the efficiency of each rehearsal was also independent of those same factors, in each case quite comparable to that of a concurrent visual stimulus. (17 ref)—*Journal abstract*.

10947. LaBerge, David & Brownston, Lee S. (U Minnesota) **Control of visual processing by color cuing.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 417-418.—Conducted a study of 8 adult Ss to determine whether color cuing would improve Ss' performance on target letter recognition tasks. Ss tachistoscopically viewed letter arrays containing 5, 10,

15, 20, or 25 letters inserted into a  $5 \times 5$  matrix. Each array contained 1 target letter, either an *F* or an *H*. The S's task was to identify which target letter was present in each display. Within an array, a subset of the letters was typed in red ink, and the remaining subset in black ink. In the cued condition, S was told the color of the target letter; in the uncued condition this information was withheld. Results indicate that color cuing significantly increased the accuracy of letter detection. Also significant were total display size, color of cue, and, within the cued condition, size of the target-color subset.—*Journal abstract*.

10948. Light, Leah L.; Berger, Dale E. & Bardales, Marlene. (Pitzer Coll) **Trade-off between memory for verbal items and their visual attributes.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 188-193.—In an experiment with 96 high school students, instructions to attend to the case and color in which words were presented led to improved retention of these visual attributes but depressed recognition performance. This trade-off between item and attribute memory occurred at 3 presentation rates (1.5, 5.5, and 10.5 sec/item), suggesting that visual attributes of verbal stimuli are rarely stored unless Ss expect that knowledge of physical form will be useful later. Visual attributes of high-imagery words were retained better than visual attributes of low-imagery words by Ss instructed to attend to case and color, but not by Ss asked only to attend to word meaning. Implications for the hypothesis that visually presented verbal stimuli are stored as literal copies are discussed.—*Journal abstract*.

10949. Loftus, Geoffrey R. & Bell, Susan M. (U Washington) **Two types of information in picture memory.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 103-113.—Conducted 2 experiments to study (a) the extent to which recognition responses to pictures are based on specific detail vs general visual information, (b) whether the amount of specific detail information may be manipulated by varying the complexity of a target picture, and (c) the rate at which the 2 types of information are acquired. A total of 195 undergraduates served as Ss. Results indicate that the rate of encoding specific details varies with the number of potential informative areas in a picture and, given that a detail is encoded, memory performance is not substantially affected by target complexity, exposure time, or presence or absence of a mask. (25 ref)—*Journal abstract*.

10950. Madigan, Stephen. (U Southern California) **Representational storage in picture memory.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 567-568.—Administered free recall tests to 70 Ss after they had viewed lists of picture and word pairs in various combinations (e.g., picture-picture, word-word, word-picture) using unlabeled slides and auditory labeling procedures. Results show that just as Ss can be highly accurate in identifying the original sense modality of presentation of words, they are also easily able to remember whether items were originally presented in verbal or pictorial form. This finding suggests some representational storage in terms of symbolic as well as sensory modality.—*Journal abstract*.

10951. Manning, Susan K. (Hunter Coll, City U New York) **An effect of context on free recall of categorized words.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 405-407.—Conducted a 3-trial study of 48 undergraduates to examine the effects of context on the learning of specific items in a list. 15 words from 3 categories were embedded in lists containing 15 additional items from the same 3 categories. These additional items were either high- or low-level associates to the category names. Results show that Ss' recall was enhanced on Trials 1 and 2 of experimental words when embedded in the list containing words of low associative level. Results are interpreted as evidence for a contextual dependency view of item learning and a result of the effects of a limited processing capacity.—*Journal abstract*.

10952. Meiselman, Karin C. (Pitzer Coll) **Time taken to switch attention between modalities as a function of mental effort.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1043-1046.—Required 15 paid male college students to perform a reaction-time (RT) task having conditions of certainty and uncertainty. The task was repeated twice with positive and negative reinforcement contingent upon giving faster RTs than in the previous session. RTs were reduced ( $p < .01$ ), and the measure of switching time also decreased ( $p < .05$ ). It is suggested that the effort induced by the reinforcement conditions decreased the time taken to switch attention between modalities (light and tone).—*Journal abstract*.

10953. Mercer, Neil M. (U Leicester, England) **Cues to retrieval from long-term verbal memory.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1234.—Conducted a study with 30 Ss to investigate the effects of different cues on response latency for naming objects. Results support models of long-term memory in which the first letter or phoneme is used in the encoding of words.

10954. Meunier, Gary F.; Millsbaugh, John & Meunier, Jo A. (Ball State U) **Effects of different level processing on retention.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 562-564.—Examined memorial effects of continued stimulus processing at either a deep or shallow level. 128 undergraduates were divided into 2 groups according to whether they knew about a recall test that followed stimuli presentation; stimuli were 36 words placed in 4 groups based on their meanings. Depth and amount of processing were manipulated within Ss. Recall performance improved with extra processing at both levels, although the extent of this improvement was greater following the deeper analysis. Difficulties in experimentation which are unique to this formulation were also noted.—*Journal abstract*.

10955. Murray, D. J. (Queen's U, Kingston, Ontario, Canada) **Graphemically cued retrieval of words from long-term memory.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 65-70.—Examined the effects and interactions of 3 variables upon retrieval, given a graphemic cue. The variables were vocabulary size, ease or difficulty of the retrieval cue, and word frequency. 32 undergraduates were asked to produce in 2 min as many words as they could in which the 1st, 2nd, 3rd, 4th, or 5th letter was A or B or . . . Z. Results show that the number of words



produced was a power function of the number of words it was estimated they would know in which the 1st, 2nd, 3rd, 4th, or 5th letter was A or B or . . . Z (the vocabulary size). Also, with easy retrieval cues, high-frequency words were produced first, which was not the case for difficult retrieval cues. The relationship between word frequency and vocabulary size was also examined. —*Journal abstract.*

10956. Murray, D. J.; Leung, C. & McVie, D. F. (Queen's U, Kingston, Ontario, Canada) **Vocalization, primary memory and secondary memory.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 403-413.—Conducted 3 experiments with a total of 184 undergraduates to determine whether vocalization of verbal items at presentation affects primary memory (PM) rather than secondary memory (SM). In Exp I vocalization affected the PM component of free recall but not the SM component. Imagery value on the other hand affected SM but not PM. In Exp II vocalization hindered the retention of stories in comparison with silent reading. The effects of structural importance were about equal for the 2 conditions. In Exp III paired-associate learning was uninfluenced by vocalization; furthermore, vocalization did not interact with meaningfulness or presentation rate in determining learning. It is concluded that the effects of vocalization are confined mainly to primary memory. (36 ref)—*Journal abstract.*

10957. Murray, Frank S. (Randolph-Macon Woman's Coll) **Effects of narrative stories on recall.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 577-579.—Studied the effects of narrative stories on recall of words using lists of different interitem associative strength after different delayed intervals of recall. 16 lists of 10 nouns were presented to 36 female undergraduates. Each S studied lists of different interitem associative strength. 4 of the 16 lists were narrative report lists and were used only to control narrative Ss following instructions. Control Ss received a study time equal to that of their yoked narrative Ss. Ss were required to recall the lists immediately after learning, at the end of session, and either 7, 14, or 28 days later. Significant differences were obtained between the 2 study groups on a session recall test and on the delayed recall interval tests but not on immediate recall test. Recall was greater from lists of high interitem associative strength than from either zero or low interitem associative strength. —*Journal abstract.*

10958. Nilsson, Lars-Göran. (U Uppsala, Sweden) **Locus of the modality effect in free recall: A reply to Watkins.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 13-17.—Argues against the conclusion of M. J. Watkins (see PA, Vol 49:6078), who assumed word length to be a sensitive variable for investigating the locus of the modality effect in free recall (superior recall of auditorily presented words as opposed to visually presented words). It is pointed out that the possible role of word frequency was overlooked. The present article reports a free-recall experiment in which 2 levels of word length and 2 levels of word frequency were orthogonally combined. Ss were 88 undergraduates. The modality effect was found for common words independently of word length. For rare words, the modality effect was found for short but not

for long words. It is therefore suggested that, in order to discuss the locus of the modality effect in terms of pre- and postcategorical stores, the interaction between word length and word frequency has to be considered. The definitions of these pre- and postcategorical stores are also discussed in the light of other memory data concerning modality effects.—*Journal abstract.*

10959. Pellegrino, James W.; Siegel, Alexander W. & Dhawan, Meena. (U Pittsburgh, Learning Research & Development Ctr) **Short-term retention of pictures and words: Evidence for dual coding systems.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 95-102.—Studied the recall of picture and word triads in 3 experiments that manipulated the type of distraction in a Brown-Peterson short-term retention task. 16 undergraduates served as Ss in each experiment. In all 3 experiments recall of pictures was superior to words under auditory distraction conditions. Visual distraction produced high performance levels with both types of stimuli, whereas combined auditory and visual distraction significantly reduced picture recall without further affecting word recall. Results are interpreted in terms of the dual coding hypothesis and indicate that pictures are encoded into separate visual and acoustic processing systems while words are primarily acoustically encoded. (24 ref)—*Journal abstract.*

10960. Petrich, Judith A. (U Pittsburgh) **Storage and retrieval processes in unlearning.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 63-74.—Presents a revised interference theory interpretation of unlearning based on an explicit storage-retrieval model. The theory holds that the 1st and 2nd lists are stored as separate memory units. Intrusions of 1st-list items during 2nd-list learning are viewed as allowing the opportunity for dual storage of the 1st-list item within both memory units. 3 experiments with a total of 76 undergraduates are reported to test the theory. Results show that in standard retroactive inhibition experiments in which no special cues for list discrimination are provided, the major factor which produces unlearning is S's inability to retrieve the 1st-list memory unit. (21 ref)—*Journal abstract.*

10961. Pisoni, David B. (Indiana U) **Auditory short-term memory and vowel perception.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 7-18.—Reports 3 experiments that examined the role of auditory short-term memory in the discrimination of brief 50-msec vowels and longer 300-msec vowels. A total of 52 undergraduates were Ss. Results show that although vowels may be perceived in a categorical-like mode, differences still exist in perception between stop consonants and steady state vowels. Findings are discussed in relation to auditory and phonetic coding in short-term memory. (25 ref)—*Journal abstract.*

10962. Polzella, Donald J. (U Dayton) **Effects of sleep deprivation on short-term recognition memory.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 194-200.—Used a probe-recognition short-term memory paradigm with 5 21-32 yr old males to study the precise effects of sleep deprivation on human memory. It was found that recognition performance, as measured by the sensitivity parameter  $d'$ , was generally impaired for each S after 24

hrs of sleep deprivation. While  $d'$  decreased exponentially as the number of items intervening between the target and the probe increased, this decay rate was not affected by sleep loss. In addition there was confirmation of a previously observed increase in the positive skewness of reaction times after wakefulness. Data support the hypothesis that sleep deprivation increases the occurrence of lapses, periods of lowered reactive capacity, which prevent the encoding of items in short-term memory.—*Journal abstract.*

10963. Rakover, Sam S. (U Haifa, Israel) **Voluntary forgetting before and after learning has been accomplished.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 24-28.—Measured voluntary forgetting in 2 experiments with a total of 190 undergraduates. In both experiments, lists of randomly mixed syllables and numbers were projected on a screen, and Ss were instructed before projection which part of the lists to remember or to forget. In the 1st experiment, the syllables were cued as items to be forgotten in one group, and to be remembered in the other one. At the end of the projection, Ss were instructed to recall freely only the syllables. For the former group, this was an unexpected test. The same list was projected for different groups: 1, 3, 5, 7, and 14 times, with new randomly mixed items each time. Syllable recall increased with an increase of times of projection of the list in the 2nd group, but not in the 1st one. Recall of syllables in the 1st group was, however, above the chance level. Exp II was designed to find the locus of voluntary forgetting mechanisms. It was found that voluntary forgetting after learning had been achieved was ineffective. Results support the hypothesis that voluntary forgetting processes do not operate in the long-term store and that Ss can block the transmission of to be forgotten items from the short-term store to the long-term store. (17 ref)—*Journal abstract.*

10964. Rowe, Edward J. (Memorial U Newfoundland, St John's, Canada) **Ordered recall of sounds and words in short-term memory.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 559-561.—Compared ordered recall of 7-item sequences of sounds and words in 2 experiments with a total of 36 undergraduates. Bow-shaped serial position curves were found for both types of sequences, but more errors occurred with sounds at all serial positions. This inferior recall of sounds was independent of whether a verbal (Exp I) or nonverbal (Exp II) response procedure was used. Results confirm the superiority of verbal memory processes in the retention of order information.—*Journal abstract.*

10965. Squire, Larry R. & Slater, Pamela C. (U California, San Diego) **Forgetting in very long-term memory as assessed by an improved questionnaire technique.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Jan), Vol 104(1), 50-54.—Describes a new questionnaire technique that avoids sampling bias and therefore permits memories for events of different time periods to be compared with each other. The technique was used in a study with 29 high school students, 16 college students, and 154 26-71 yr old adults (including Veterans Administration volunteers and patients). Results indicate that forgetting can occur gradually over several years when little opportunity

exists for relearning. Beyond several years, there appears to be little additional forgetting.—*Journal abstract.*

10966. Stelmach, George E. & Kelso, J. A. (U Wisconsin, Motor Behavior Lab, Madison) **Memory trace strength and response biasing in short-term motor memory.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 58-62.—Conducted 2 experiments with a total of 85 undergraduates to create differential memory trace strengths in a response biasing paradigm. After the presentation of the criterion location, an interpolated target was presented which was either  $\pm 40^\circ$  from the criterion. S's task was to attend to both targets and recall each when instructed. The 1st experiment involved strengthening the criterion trace via repetition (0, 5, or 14 repetitions), while the 2nd involved providing additional feedback via visual, auditory, and heightened kinesthetic cues. In the initial experiment, a Repetition  $\times$  Response Biasing interaction revealed that repetition systematically reduced error shifts at recall. The 2nd experiment found that, in the combined feedback and visual conditions, response biasing was reduced. It is suggested that memory trace strength appears to be one determiner of error shifts at recall. (15 ref)—*Journal abstract.*

10967. Stratton, R. Paul; Jacobus, Kenneth A. & Brinley, Bonnie. (U Kentucky) **Age-of-acquisition, imagery, familiarity and meaningfulness norms for 543 words.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 1-6.—The age at which words are first learned appears to be more influential in determining the ease of retrieving words from semantic memory than are objective frequency, familiarity, imagery, and meaningfulness. To facilitate research on a wider variety of tasks, a total of 1,083 undergraduate volunteers contributed to norms for 543 words for age-of-acquisition, imagery, familiarity, and meaningfulness. Most of the words form single-solution anagrams. There are 471 6-letter nouns and 72 5-letter words. Also reported are the means, standard deviations, and ranges for each dimension and the intercorrelations between dimensions. Intergroup reliabilities ranged from .847 to .982.—*Journal abstract.*

10968. Thios, Samuel J. (Denison U) **Memory for general and specific sentences.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 75-77.—Investigated memory for sentences which contained either specific or general verbs. It was predicted that specific sentences would be remembered better than general ones because they specify more attributes of the interacting nouns. The relative effectiveness of different types of retrieval cues (subject or object nouns or verbs) was also examined. Data from 60 undergraduates show that memory was better for sentences with specific verbs (e.g., *scratched*) than those with general verbs (e.g., *injured*). When synonymic verbs were included, however, the general-specific difference was not found. For complete sentence recall, subject nouns were better retrieval cues than verbs or object nouns.—*L. Gorsey.*

10969. Till, Robert E.; Diehl, Randy L. & Jenkins, James J. (U Minnesota, Ctr for Research in Human Learning) **Effects of semantic and nonsemantic cued orienting tasks on associative clustering in free recall.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 19-23.—Dur-



ing presentation of a randomized list of nonadjacent associative pairs, 42 undergraduates heard a cue after each word designating the task to be performed. All Ss performed 2 tasks. In the identical condition, Ss performed the same task on both members of an associative pair. In the nonidentical condition, Ss never performed the same task on pair members. Semantic tasks led to greater recall than did nonsemantic tasks. Also, percentage of clustering was greater when the 2nd member of a recalled cluster had been used in a semantic task rather than a nonsemantic one. Identical and nonidentical conditions did not differ in the measure of recall. When the 2 tasks were a combination of 1 semantic and 1 nonsemantic task, the identical condition showed a greater percentage of clustering than the nonidentical condition. However, when the 2 tasks were both semantic, no difference in clustering was obtained.—*Journal abstract.*

10970. Tversky, Barbara & Sherman, Tracy. (Hebrew U, Jerusalem, Israel) **Picture memory improves with longer on time and off time.** *Journal of Experimental Psychology: Human Learning & Memory*, 1975(Mar), Vol 104(2), 114-118.—Administered a picture recognition task to 32 undergraduates using 4 picture durations (on time) of .25, .5, 1, and 2 sec and 2 interstimulus intervals (off time) of 1.5 and 3 sec. 60 slides were used and a 6-min free recall period was given before the recognition test in which the original pictures and distractors appeared on either the right or left side of the screen. Results show that both recognition and recall of pictures improve as picture presentation time increases and as time between pictures increases. Processing of the pictures, rehearsal and/or encoding, continued after the picture had disappeared, just as for verbal material.—*Journal abstract.*

10971. Tversky, Barbara. (Hebrew U, Jerusalem, Israel) **Retrieval of pictorial and verbal stimulus codes.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 580-582.—An experiment that required same-different comparisons of successive pairs of geometric figures represented pictorially or verbally demonstrated that Ss (8 undergraduates) could, even after 8 sec, recode to or retrieve the alternative code of a stimulus in memory such that it was as effective for judgment reaction times as in the original representation. Thus, where both pictorial and verbal codes were available, either could be accessed as needed for the task. There was no tendency to revert to verbal codes; in fact, comparisons to pictures were faster than comparisons to words.—*Journal abstract.*

10972. Vanderhaeghen, Claude & Bertelson, Paul. (U libre de Bruxelles, Lab de Psychologie expérimentale, Belgium) **The limits of prior entry: Nonsensitivity of temporal order judgments to selective preparation affecting choice reaction time.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 569-572.—On each trial, a reference tactile stimulus and another stimulus, which was unpredictably either a sound or a light-pulse, were presented with a variable time interval. The Ss (5 students) had to give a fast choice reaction to the uncertain stimulus and also to judge its temporal position relative to the reference stimulus. Manipulation of the relative frequency of occurrence of the uncertain

stimuli affected choice reaction time in the usual way, but produced unsystematic effects on apparent order. It is concluded that selective preparation which influences response latency does not necessarily produce a prior entry effect. (18 ref)—*Journal abstract.*

10973. Vardanyan, L. S. (Abovyana Pedagogical Inst, Yerevan, USSR) **[Retroactive inhibition as a function of the type of similarity between learned materials.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 133-136.—Conducted an experimental study of the effects on retention of materials that are dissimilar, similar in content but not in form, similar in form but not in content, and similar in both content and form.—*L. Zusne.*

10974. Wayman, Ronald & Scott, William C. (Oklahoma State U) **The role of facial areas in facial recognition.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 115-116.

10975. Wells, J. Elisabeth & Kirsner, K. (Massey U, Palmerston North, New Zealand) **Repetition between and within modalities in free recall.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 395-397.—Conducted a repetition study with 34 undergraduates to test the effects of lag and modality changes on free recall. Results show a powerful lag effect over the range of 0-9 items; there were no differences in recall between items repeated in the same or different modality in the 56-item list. It is suggested that either the encoding variability hypothesis is wrong or it applies only to variation in semantic attributes, not to variation in physical attributes such as modality.—*Journal abstract.*

10976. Westman, Alida S. & Delprato, Dennis J. (Eastern Michigan U) **Effect of presentation mode on organization and recall.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 415-416.—Presented 6 instances of each of 6 taxonomic categories, using photos and words, to 48 undergraduates under incidental learning set. Ss were unexpectedly asked to free recall the items either 3 min or 1 wk after seeing them. Results show that items in recall were grouped by taxonomic category. Picture or word presentation was used, at best, only for forming subgroups. However, items presented as photos were recalled better than those presented as words, at least after a 1-wk retention interval.—*Journal abstract.*

### Motivation & Emotion

10977. Arnau Gras, Jaime. (U Barcelona, Spain) **[Motivation and behavior: A review and the bases for a scientific conceptualization of motivation.]** (Span) *Anuario de Psicología*, 1973, No 8, 35-51.—Presents a conceptual review, based on analysis of experimental evidence, of the most important interpretations concerning the phenomenon of motivation. Main outlines for further experimental development in this field are formulated. (English summary) (27 ref)

10978. Hiroto, Donald S. & Seligman, Martin E. (U California, Medical Ctr, Ambulatory Psychiatric Services, San Francisco) **Generality of learned helplessness in man.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 311-327.—Notes that learned helplessness—the interference with instrumental responding following inescapable aversive events—has

been found in animals and man. The present study tested for the generality of the debilitation produced by uncontrollable events across tasks and motivational systems. 4 experiments with a total of 96 college students were simultaneously conducted: (a) pretreatment with inescapable, escapable, or control aversive tone followed by shuttlebox escape testing; (b) pretreatment with insoluble, soluble, or control discrimination problems followed by anagram solution testing; (c) pretreatments with inescapable, escapable, or control aversive tone followed by anagram solution testing; and (d) pretreatments with insoluble, soluble, or control discrimination problems followed by shuttlebox escape testing. Learned helplessness was found with all 4 experiments: Both insolubility and inescapability produced failure to escape and failure to solve anagrams. It is suggested that inescapability and insolubility both engendered expectancies that responding is independent of reinforcement. The generality of this process suggests that learned helplessness may be an induced "trait." (24 ref)—*Journal abstract*.

10979. Kirkland, John. (U London, Inst of Education, England) **A subset of interest: Aesthetic pleasure.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1306. —In a study in which 2 groups of Ss each viewed the same randomly generated polygons twice, an Instructional Order  $\times$  Polygon Complexity interaction reached significance for the Aesthetic Pleasure-to-Interest group but not when instructions were presented in the reverse order. It is suggested aesthetic pleasure may be a subset of interest.

10980. Liebhart, Ernst H. (Ealing Technical Coll, England) **Choice as a value.** *European Journal of Social Psychology*, 1973, Vol 3(4), 485-489. —Tested the hypotheses that choice deprivation results in (a) an increase of favorable evaluation of the opportunity to choose, (b) a tendency to implicitly re-establish freedom, and (c) an arousal of the control component of effectance. In Exp I, 56 male Ss were deprived of a previous opportunity to choose and compared with a control group which had not had that opportunity. In Exp II, 40 Ss engaged in a procedure whereby choice was eliminated after 10 trials and compared with a control group which did not exercise choice. Results show that eliminating an opportunity to choose led Ss to prefer an option which still permitted choice to one which did not. Choice deprivation led to negative affective states corresponding to the control component of effectance. Findings are seen as consistent with the notion of choice value.—M. K. Phifer.

10981. Makarovič, Jan. **[A classification of human needs.]** (Sloe) *Anthropos*, 1972, No 3-4, 27-36. —Presents a new 2-dimensional classification of human needs: along the 1st dimension, needs are classified into the categories of preservation and expansion, and along the 2nd, into the categories of private needs and social or interhuman needs, making a total of 4 categories. This classification is functional, in contrast to traditional genetic classifications involving distinctions between primary and secondary needs. The classification is discussed in the context of traditional European philosophy, including dialectical materialism, and in the

framework of modern theories of alienation. (20 ref)—S. Slak.

10982. Payne, John W. (Carnegie-Mellon U) **Relation of perceived risk to preferences among gambles.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 86-94. —Investigated the concept of risk and its role in determining preferences, using pairs of specifically constructed 3-outcome gambles. Ss were 47 undergraduates. The risk dimensions, probabilities of winning and losing, and amounts to be won or lost were different for each gamble in a pair, but the expected values and variances were approximately equal. The probability of losing was most important in determining judged risk. The likelihood that the more risky gamble in a pair would be chosen as the preferred gamble was related to the probability relationship within the gambles in a pair. The relative importance of the probabilities and amounts in preference choices was also contingent on the probability relationships. Amounts were more closely associated with preference choices when the probability of winning was greater than the probability of losing within each gamble, and the probabilities were more closely associated with the choices when the probability of winning was less than the probability of losing. The relevance of these findings to other theories of risk and the evidence for contingent processing of information in risky decision making are discussed.—*Journal abstract*.

10983. Pečjak, Vid. **[New theories of motivation.]** (Sloe) *Anthropos*, 1972, No 3-4, 9-16. —Describes and characterizes traditional and contemporary theories of motivation, from instinctivist, learning, and analytic theories through modern cybernetic approaches, and traces their historical roots. Major shortcomings of each approach are discussed. (35 ref)—S. Slak.

10984. Pittman, Thane S. (Gettysburg Coll, Smoke Psychological Lab) **Attribution of arousal as a mediator in dissonance reduction.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 53-63. —Tested the hypothesis that the attribution of arousal to a source is an important step in the dissonance reduction process in a counterattitudinal advocacy paradigm. Specifically, it was hypothesized that the extent to which arousal is attributed to dissonance-producing inconsistency directly affects the amount of dissonance-reducing behavior. If the amount of arousal attributed to inconsistency increases, attempts to reduce dissonance will increase; if the amount of arousal attributed to inconsistency decreases, attempts to reduce dissonance will decrease. The  $2 \times 2 \times 2$  factorial designed to test these predictions involved manipulations of 2 independent sources of arousal (dissonance and fear of shock) and type of arousal attribution cue (delivered by a confederate of the E). Data from 112 female undergraduates support the hypothesis. (22 ref)—*Journal abstract*.

10985. Redd, William H.; Amen, Donald L.; Meddock, Terry D. & Winston, Andrew S. (U Illinois, Children's Research Ctr) **Children's compliance as a function of type of instructions and payoff for noncompliance.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 597-599. —Studied the role of reinforcement loss and instruction type (positive and negative) in children's compliance with adult instructions. During daily sessions



32 1st- and 2nd-grade children played a 2-choice discrimination game in which 1 response earned 2 tokens (redeemable for toys) and the other earned either 1 or 0 tokens. On successive trials either one or both responses were available. After S showed a preference for the response that paid higher magnitude reinforcement, the adult entered and gave either positive or negative instructions. After these instructions E left and S played alone. Compliance with either instruction involved S's choosing the lower paying response. Results show that the adult's negative instructions were more effective than positive instructions, regardless of whether compliance meant the child's forfeiting 1 or 2 tokens. Boys were significantly more compliant than girls.—*Journal abstract*.

10986. Welford, A. T. (U Adelaide, SA, Australia) **Stress and performance.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.—Discusses the effects on performance of varying types of stress deriving from imbalance between capacity and the demands of tasks, environmental conditions, and social situations which either overload or underload the individual. A model which ties together 3 existing models in this field (the inverted-U hypothesis, signal detection theory, and the Yerkes-Dodson law) is proposed and discussed in terms of personality differences and the problems of talent conservation and heavy responsibility. (French & German summaries) (27 ref)

10987. Zarcone, V.; de la Pena, A. & Dement, W. C. (Stanford U, Medical School) **Heightened sexual interest and sleep disturbance.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1135-1141.—10 17-24 yr old normal male paid Ss were selectively REM-deprived for 2 nights by awakening them at the onset of REM sleep. In addition, there were baseline and non-REM awakening conditions. Heightened sexual interest was defined by the number of film frames in which Ss fixated on parts of the female figure in photographs. The largest mean difference in sexual interest was found between baseline and REM-deprivation. Both the non-REM awakenings and REM-sleep deprivation enhanced sexual interest. The failure to demonstrate a significant difference between REM-deprivation and non-REM awakenings may be due to the fact that Ss were REM-sleep-deprived in both conditions. It is suggested that REM-sleep loss may lead to increased selective attention and preoccupation with any cues which are usually interesting.—*Journal abstract*.

## NEUROLOGY AND PHYSIOLOGY

10988. Collins, Robert L. (Jackson Lab, Bar Harbor, ME) **When left-handed mice live in right-handed worlds.** *Science*, 1975(Jan), Vol 187(4172), 181-184.—Tested 709 C57BL/6J inbred mice for paw preference in biased and unbiased worlds to learn how lateral sense develops and what influences affect its expression. It was found that in unbiased worlds, half were left-handed, and females were more strongly lateralized. In biased worlds, approximately 10% exhibited lateral preferences inconsistent with the world bias, and males were more strongly lateralized. Influences of world-bias appear to be superimposed

upon an already laterally dichotomized population. Initial left-right sense, it is posited, arises as an outcome of a seemingly random process.—*Journal abstract*.

10989. DeFeudis, F. V. (Indiana U, Inst of Psychiatric Research) **Differences in brain and body weights of mice caused by differential housing.** *Experientia*, 1974, Vol 30(5), 521-522.—For periods of 4-11 wks, 496 male Black mice were exposed to either isolated ( $n = 245$ ) or aggregated ( $n = 251$ ) living conditions. Subsequent results show that the brain weights of the aggregated Ss were slightly smaller than those of isolated Ss. In addition, this small significant difference ( $p < .001$ ) in brain weight was correlated with a much greater difference in total body weight. Thus, the brain weight/body weight ratio was significantly greater for aggregated than for isolated Ss. It is concluded that these ratio differences could be a fundamental variable in explaining the effect of environmental factors on brain chemistry and behavior. (French summary)—*R. S. Albin*.

10990. Dunn, Adrian J. & Bondy, Stephen C. (U Florida, Medical School) **Functional chemistry of the brain.** Flushing, NY: Spectrum, 1974. xiv, 272 p. \$14.95.—Constitutes a concise overview of the present state of brain biochemistry, providing an integrated approach which incorporates a spectrum of information from a variety of disciplines, e.g., biochemistry, anatomy, physiology, neurology, and psychology. The general approach taken is that the brain should ultimately be studied in relation to its output in the form of behavior. (20% p ref)

10991. Gessa, G. L. et al. (U Cagliari, Istituto di Farmacologia, Italy) **Norepinephrine and dopamine concentrations in the cerebral cortex of man, monkeys and other mammals.** *Experientia*, 1974, Vol 30(11), 1295-1296.—Studied brain tissues of 8 male human Ss, Wistar rats, cats, and rhesus monkeys. Findings indicate that most cortical dopamine (DA) is not localized in noradrenergic nerve terminals, but in dopaminergic neurons. DA's primary role in the cortex is that of a neurotransmitter, rather than as a precursor for norepinephrine. (Italian summary)

10992. Gottfries, C. G.; Roos, B. E. & Winblad, B. (U Umea, Sweden) **Determination of 5-hydroxytryptamine, 5-hydroxyindoleacetic acid and homovanillic acid in brain tissue from an autopsy material.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 496-507.—Determined 5-hydroxytryptamine (5-HT), 5-hydroxyindoleacetic acid (5-HIAA), and homovanillic acid (HVA) levels in different parts of the human brain in autopsy material of 20 cases (12 male and 8 female). The highest values of 5-HT and 5-HIAA were found in the brain stem, basal ganglia, and medulla oblongata. In the cortex, the phylogenetic older parts belonging to the limbic structures had higher concentrations of 5-HT and 5-HIAA than the neocortex. There was a positive correlation between the 5-HIAA levels in the different regions of the brain. The same correlation, but weaker, was found for the 5-HT levels. There was no positive correlation between age and the chemical variables. The female group had, at least in some areas of the brain, significantly higher levels of 5-HIAA and HVA than the male group. If patients had suffered final hypoxia there

seemed to be reduced concentrations of 5-HIAA. (34 ref)—*Journal abstract.*

10993. **Hamburg, Beatrix A.** (Stanford U, Medical School, Child Psychiatric Clinic) **The psychobiology of sex differences: An evolutionary perspective.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

10994. **Hoffmann, K.-P. & Sherman, Murray.** (Max-Planck-Inst für Psychiatrie, Munich, W. Germany) **Effects of early monocular deprivation on visual input to cat superior colliculus.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1276-1286.—Investigated the effects of monocular deprivation from the 8th postnatal day on afferentiation to the superior colliculus (SC) through the W-direct retinotectal, Y-direct retinotectal, and Y-indirect pathways. Electrically and visually elicited responses were recorded with 4 M NaCl micropipettes or sharpened tungsten wire electrodes from a total of 419 SC neurons in 6 cats ranging in age from 6 to 12 mo. It was found that the nondeprived eye had grossly normal input to the SC, but a possible slight overdevelopment of the Y-indirect pathway was indicated. Afferentation was normal along the 2 retinotectal pathways in the deprived eye, but afferentation through the Y-indirect pathway was lost. It is suggested that the abnormalities in visual afferentiation to the SC in monocular deprivation cats are located in the binocular segment of the geniculocortical system. (25 ref)—*J. Kelly.*

10995. **Nováková, V.; Flandera, V. & Sandritter, W.** (Czechoslovak Academy of Sciences, Inst of Physiology, Prague) **Aggressive rats: Some properties of learning, memory and of the limbic system.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 729-733.—10 mouse-killing male Wistar rats elaborated an acoustic conditioned reflex more slowly than 10 nonkillers. The re-elaboration of the conditioned reflex after a 3-mo pause was also slower in killer Ss. It was necessary to repeat the connection between the conditioned and unconditioned stimulus the same number of times as during the elaboration of the reflex in nonkillers. When the killer Ss were allowed a free choice between a mouse, an estrous female rat, water, and food after a 24-hr period of hunger and thirst, they first killed the mouse, then their 2nd and 3rd reactions were feeding and drinking. Nonkillers took food and water in the 1st, 2nd, and 3rd place. The total content of ribosomal RNA, measured in individual cells of the limbic system, was different in the 2 groups. Mousekillers had a higher content of RNA in the pyramidal cells of the dorsal hippocampus and neurons of the central amygdaloid nucleus, and a lower content in the neurons of the medial and lateral hypothalamus and in septal neurons. The differences were apparent only in neurons, not in interneurons or glia. (31 ref)—*Journal abstract.*

10996. **Peisakhov, N. M.** (Kazan State U, USSR) **[Some specific features of the middle type on the weakness-strength continuum.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 30-40.—Studied the characteristics of individuals who fall in the middle of the Pavlovian strength-weakness continuum of the nervous system, between the extremes. Several different measures

of the strength of the nervous system were taken on 3,217 Ss. The distribution of the values of these measures did not differ statistically from the theoretically expected normal distribution. Results also suggest that the "strong" type of nervous system is characterized by high sensory thresholds and good ability to withstand the effect of strong or prolonged stimuli. The "weak" type shows low thresholds, high sensitivity and therefore greater susceptibility to nervous fatigue, and inability to sustain performance under prolonged or very strong stimulation. The intermediate type shows highly reliable performance under all kinds of stimulus conditions. While the weakness of the strong type lies in its insensitivity and that of the weak type in its excessive sensitivity, the biologically negative aspect of the intermediate type lies in its lower ability to adapt to changing stimulus situations as compared with the strong and the weak type. (English summary) (16 ref)—*L. Zusne.*

10997. **Whalen, Richard E.** (U California, Irvine) **Sexual differentiation: Models, methods and mechanisms.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

#### Neuroanatomy & Electrophysiology

10998. **Albert, Ira B.; Simmons, James & Walker, Jerry.** (Old Dominion U) **Massed and spaced practice in alpha enhancement.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1039-1042.—Conducted an experiment in which spaced practice (20 min work, 24 hrs rest) was more efficient for 10 female undergraduates over 4 trials than massed practice (20 min work, 90 sec rest) was for 10 other Ss in the learning of alpha enhancement. While the spaced group doubled their production of alpha, the massed group demonstrated almost no improvement. (16 ref)—*Journal abstract.*

10999. **Alegria, F. Abad.** (U Navarra, Facultad de Medicina, Spain) **[A stereotaxic method for electroencephalography with the rat.]** (Span) *Revista de Medicina de la Universidad de Navarra*, 1973(Jun), Vol 17(2), 79-83.—Constructed a stereotaxic map of the cortical areas in rats, based on anatomical and physiological data. 30 male Wistar rats weighing 250 g each were used to map the cortical areas, to locate the venous sinuses, to study the thickness of the cranial vault, and to obtain EEG records. The application of stereotaxic maps in obtaining EEGs in acute or chronic rats is explained. (English summary)—*C. Albizu-Miranda.*

11000. **Barrett, T. W.** (U Tennessee, Ctr for Health Sciences, Memphis) **Four parameters of information processing in the cochlea.** *Experientia*, 1974, Vol 30(11), 1287-1288.—Investigated cochlear potentials in guinea pigs, and the role they play in information processing. (German summary)

11001. **Bauer, Jay W. & Galambos, Robert.** (U California, San Diego) **Evoked potentials in cat auditory nerve: Suppression by prior tonal stimulation.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 43-47.—Action potentials (AP) recorded from the eighth nerve of a female cat to a tone pip (S<sub>i</sub>) were suppression when preceded by a monotic or dichotic conditioning tone (T<sub>c</sub>). The suppression increased when (a) the interval



between Tc and S, was decreased, (b) either the intensity or the duration of Tc was increased, or (c) the difference in frequency between the 2 stimuli was reduced. Thus the nerve action potential amplitude correlates strongly, but inversely, with the loudness enhancement effects seen in man (R. Galambos et al, 1972). Since A. Coats and J. Dickey (see PA, Vol 50:2359) found the human AP can be diminished by a preceding noise without reducing the loudness of a click, the available results suggest that a central mechanism functions to compensate for the reduction in AP amplitude. The dichotic effects could be accounted for by cross-hearing, thereby providing no evidence for a role of the olivocochlear bundle in the effects observed. (21 ref)—*Journal abstract*.

11002. Blank, David L. (State U New York, Upstate Medical Ctr, Syracuse) **Mechanism underlying the analysis of odorant quality at the level of olfactory mucosa: II. Receptor selective sensitivity.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 91-101.—Studied site specificity, using single unit recording techniques in the olfactory mucosa of the frog, and investigated the possibility of a multiplicity of the types of sites on each receptor. Grass frogs were monitored. It was found that different odorants produced different patterns of firing across the population of receptor neurons. (23 ref)

11003. Clopton, Ben M. & Winfield, Jeffrey A. (U California, Santa Barbara) **Tonotopic organization in the inferior colliculus of the rat.** *Brain Research*, 1973, Vol 56, 355-358.—Recordings along tracks of different angles in the right inferior colliculus of 5 rats demonstrated a continuous dorsoventral frequency map. Characteristic frequencies ranged from 3.5 kHz to approximately 32 kHz, with some cells going up to 56 kHz.

11004. Crider, Andrew. (Williams Coll) **Tonic arousal correlates of individual differences in electrodermal lability.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 183.

11005. Dickson, John W. & Gerstein, George L. (U Pennsylvania) **Interactions between neurons in auditory cortex of the cat.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1239-1261.—Studied the patterns of functional connectivity between individual auditory cortex neurons. 3 electrodes were implanted in the auditory cortex in each of 20 paralyzed, locally anesthetized cats. Simultaneous recordings of cortical neuronal responses to repeated noise bursts, frequency scans, and tones of a given frequency were analyzed for functional connectivity by cross-correlation of the spike trains. It was found that shared input neural coordination occurred in about half of the observed neuron pairs. Functional interaction between neurons was rare, and stimulus conditions had little effect on strength of shared input. It is suggested that functional connectivity within the auditory cortex consists of a pattern of shared input to cortical neurons which are in close proximity to each other. (77 ref)—J. Kelly.

11006. Fohlmeister, J. F.; Poppele, R. E. & Purple, R. L. (U Minnesota, Lab of Neurophysiology, Minneapolis) **Repetitive firing: Dynamic behavior of sensory neurons reconciled with a quantitative model.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1213-1227.—Com-

pared the repetitive-firing behaviors of 2 types of sensory neurons with 2 mathematical models. A sinusoidally varying sensory stimulus was applied to a cat muscle spindle and a sinusoidally varying current was intracellularly applied to a crayfish's slowly adapting stretch receptor. The resulting input-output configurations were computer analyzed and expressed as functions of the modulation frequency. These results were compared with computer simulations of 2 models: a leaky integrator with exponential depolarization and a model with voltage and time dependent variables. The comparisons indicate that to describe the basic mechanisms leading to repetitive neuron firing, the rate constant of the leaky integrator model must be considered a variable. The leaky integrator is considered a valid model to describe the dynamics of pulse modulation. (27 ref)—R. Tomaska.

11007. Galin, David & Ellis, Ron R. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Asymmetry in evoked potentials as a index of lateralized cognitive processes: Relation to EEG alpha asymmetry.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 45-50.—Flash evoked potentials and background EEG were recorded from left and right temporal and parietal areas while 6 20-40 yr old right-handed Ss performed verbal and spatial tasks. Changes in asymmetry of evoked potential power and peak-trough amplitudes paralleled the task-dependent asymmetry of the EEG alpha power. Both the EEG and evoked potential asymmetry measures reflected the hemispheric specialization for these cognitive tasks. (French & German summaries) (23 ref)—*Journal abstract*.

11008. Gambardella, G. (U Genoa, Istituto di Elettrotecnica, Italy) **Representation of the spatial-frequency analysis performed by the visual system.** *Journal of the Optical Society of America*, 1975(Jan), Vol 65(1), 99-100.—Puts the human visual nervous system's mechanism for frequency analysis into mathematical terms consistent with its property of constant-percentage resolution in the frequency domain and with the frequency-response curves of a set of "cortical simple cells" hypothesized to be "the neutral substrate of the spatial-frequency channels."

11009. Garcia-Rill, Edgar & Dubrovsky, Bernardo. (McGill U, Neurophysiological Lab, Montreal, Quebec, Canada) **Topographical organization of visual input to precruciate cortex of cat.** *Brain Research*, 1973, Vol 56, 151-163.—Extracellular recording of precruciate neurons in 25 chloralose anesthetized cats showed that trunk and proximal body regions but not distal areas of the limbs received binocular visual afferents. (46 ref)—*Journal abstract*.

11010. Getchell, Thomas V. & Getchell, Marilyn L. (Yale U, Medical School) **Signal-detecting mechanisms in the olfactory epithelium: Molecular discrimination.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 62-75.—Reviews recent research characterizing discriminatory mechanisms at the molecular and receptor cell levels in the vertebrate olfactory system. 3 mechanisms emerge: (a) the translation into electrical signals of the interaction of odorant molecules with receptor proteins in the olfactory receptor cell membrane; (b) the differential thresholds to a single stimulus of the individual receptors; and (c) the fact that

differences in the details of spike patterns elicited by different stimuli recorded from the same cell probably convey at least a fraction of the information about the identity of these stimuli. (62 ref)—*R. S. Albin.*

11011. Gur, Raquel E.; Gur, Ruben C. & Harris, Lauren J. (Stanford U) **Cerebral activation, as measured by subjects' lateral eye movements, is influenced by experimenter location.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 35-44.—Investigated the direction of eye movements during problem-solving by 32 right-handed and 17 left-handed male undergraduates. When facing the questioner, Ss moved their eyes predominantly in 1 direction, either right or left, regardless of the type of question. Therefore, within any given S, 1 hemisphere seemed to be activated preferentially, regardless of problem type. When the questioner sat behind the same Ss, right-handers moved their eyes leftward when solving spatial problems, rightward for verbal problems. Under these circumstances problem-type took precedence over individual movement preferences. Left-handers' eye movements were haphazard when the experimenter sat behind, hence uncorrelated with the type of problem. This result is consonant with the view that right-handers are better lateralized for hemispheric functioning than are left-handers. (French & German summaries) (29 ref)—*Journal abstract.*

11012. Henry, G. H.; Dreher, B. & Bishop, P. O. (Australian National U, John Curtin School of Medical Research, Canberra, ACT) **Orientation specificity of cells in cat striate cortex.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1394-1409.—Studied the orientation specificity to extended bars and single light and dark edges of simple, complex, and hypercomplex cells in the cat striate cortex. Responses of single units in the striate cortex to a moving bar of light angled over a range of orientations and projected onto a screen in front of the S were recorded with microelectrodes positioned at the cortical projection of the visual axis. Average response histograms were determined for each test angle. It was found that orientation specificity curves for all 3 types of cells were bell-shaped. For most cells, the shape of the curve was dependent on the length of the stimulus, the curve sharpening with increasing length. The shape of the curve remained the same regardless of the stimulus. It is suggested that components of the receptive field of simple cells provide satisfactory explanations of the cell's orientation specificity characteristics, but that the orientation specificity of complex cells is not accounted for by the organization of their receptive fields. (23 ref)—*J. Kelly.*

11013. Hobson, J. Allan; McCarley, Robert W.; Freedman, Robert & Pivik, R. Terry. (Harvard U, Medical School, Lab of Neurophysiology, Boston) **Time course of discharge rate changes by cat pontine brain stem neurons during sleep cycle.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1297-1309.—Studied discharge rate changes in individual neurons of the gigantocellular tegmental field (FTG) of the cat pontine reticular formation during the period of transition from synchronized to desynchronized sleep. Extracellular recordings of action potentials from individual FTG neurons of unanesthetized, restrained cats were obtained during periods ranging from 2 to 11 successive sleep

cycles. Discharge levels during transitions to desynchronized sleep, as indicated by EEG and electromyogram activity, were compared with baseline neuronal discharge levels. Individual FTG neurons showed increasing discharge rates in the 2 min before onset of desynchronized sleep. Long-term measures of pooled brainstem neuronal activity revealed increasing discharge rates during the 1st half of desynchronized sleep, followed by step-like decreases and a low discharge rate during the 5-min period following desynchronized sleep. Results indicate that brainstem neurons operate as a regulatory system for desynchronized sleep. (19 ref)—*J. Kelly.*

11014. Holley, André et al. (U Claude Bernard, Lab d'Electrophysiologie, Lyon, France) **Qualitative and quantitative discrimination in the frog olfactory receptors: Analysis from electrophysiological data.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 102-114.—Evaluated the single olfactory nerve response and determined the number of olfactory receptors from this. It is concluded that many receptor cells are almost devoid of activity in the absence of excitation by stimuli. Other properties of the receptor cells are also discussed.

11015. Ingram, Diana. (U Western Ontario, London, Canada) **Motor asymmetries in young children.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 95-102.—84 right-handed and 19 left-handed 3-5 yr old children showed strongly established hand preferences when tested on a variety of manual tasks. However, the preferred right hand did not possess universally superior manual skill. Although gesture-like activity during speaking was predominantly right-handed, and the right hand showed superior performance on hand strength and finger tapping tasks, it was the left hand that performed better at hand posture and finger spacing tasks. The observed dissociation between hand preference and the ability to perform hand posturing tasks is discussed. (French & German summaries) (39 ref)—*Journal abstract.*

11016. Ingram, Diana. (U Western Ontario, London, Canada) **Cerebral speech lateralization in young children.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 103-105.—Tests of 3-5 yr old children distinguished a right-ear superiority on a dichotic listening task as early as age 3, suggesting that the left hemisphere is to some extent specialized for speech functions by this age. (French & German summaries)

11017. Kress, Gary. (Regis Coll) **Area-luminance effects and the visual evoked brain response.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 37-42.—Psychophysical and electrophysiological studies report that luminance must be systematically increased as stimulus area is decreased if a constant response is to be elicited. The visual evoked brain response (VEBR) was recorded from 3 young adult Ss as a function of 8 stimulus intensities for 5 different areas. Results indicate that (a) the amplitude of the B-C component of the VEBR increased in a linear fashion as a function of increases in log luminance, (b) there was a linear reciprocal relationship between the magnitude of log area and log luminance for targets up to 10°, and (c) substituting total number of receptors in an area for stimulus size resulted in receptor-luminance functions identical to the corre-



- sponding area-luminance function. Results are discussed in terms of neural summation. (18 ref)—*Journal abstract*.
11018. Kubota, Kisou; Iwamoto, Takashige & Suzuki, Hisao. (Kyoto U, Primate Research Inst, Japan) **Visuokinetic activities of primate prefrontal neurons during delayed-response performance.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1197-1212.—Investigated the role of the dorsolateral prefrontal cortex in the performance of delayed response behaviors in 4 macaque monkeys. 91 units of behavior were correlated to the Ss' 2-choice delayed responses to a 2-lamp visual signal with an orange juice reward triggered by the delayed depression of 1 of 2 levers placed below each lamp. After training, a cylinder was implanted in the S's skull over the dorsolateral frontal cortex and an electromyogram taken of the triceps brachii. 63 of the behavior units were activated when the visual cues were presented and also, in the response phase, the S pressed the pre-indicated lever. These are considered visuokinetic units. Results suggest that the visuokinetic units showing differential rates of discharge when the cue is on the S's left or right side indicate participation in the spatial mnemonic function necessary for correct level selection in the experiment's response phase.—*R. Tomasko*.
11019. Murray, M. J. (Princeton U) **A remark on sensory encoding of two-parameter signals.** *IEEE Transactions on Biomedical Engineering*, 1974(Nov), Vol 21(6), 501-502.—In a sensory system with 2 neurons, a stimulus is coded by means of an ordered pair of firing rates. Ambiguity occurs if 2 distinct signals yield the same ordered pair. However, this sensory system can distinctly code all 2-parameter stimuli, even though the "best value" of 1 parameter is the same for both neurons. Provided these signals are above threshold for both neurons, distinct coding is ensured if the slopes of the threshold (and/or equal rate) curves are different for the different neurons.—*R. S. Kennedy*.
11020. Näätänen, Risto & Gaillard, Anthony W. (U Helsinki, Inst of Psychology, Finland) **The relationships between certain CNV and evoked-potential measures within and between vertex, frontal and temporal derivations.** *Biological Psychology*, 1974, Vol 2(2), 95-112.—Contingent negative variations (CNVs) and evoked potentials were recorded over the vertex, frontal, and temporal area of 3 highly experienced adult Ss in a simple reaction-time task with a constant interstimulus interval of 1 sec. Several amplitude measures of the CNV were taken both from averaged and single CNVs. The main findings are: (a) The intrachannel correlation coefficients between amplitude measures of the CNV taken at different latencies were statistically highly significant but relatively low. (b) The interchannel correlation coefficients between the corresponding amplitude measures of the CNV were generally higher. The interchannel relationship for the shortest latency was the strongest. (c) The peak amplitude of the CNV was reached well before the S<sub>i</sub> moment within each channel; this latency was the longest for the vertex CNV. (d) The differences in the peak amplitude of the CNV seemed to be also associated with its longer growth rather than merely with a sharper rise. (e) There was a good correspondence between the results from the averaged and single CNVs. (f) The interchannel correlation coefficients between the amplitudes of the evoked potentials were high. (27 ref)—*Journal abstract*.
11021. Nunez, Paul L. (U California, EEG Lab, San Diego) **Wave-like properties of the alpha rhythm.** *IEEE Transactions on Biomedical Engineering*, 1974(Nov), Vol 21(6), 473-482.—Considers apparent similarities between brain waves and physical waves. The distribution of power in the alpha rhythm over frequency and spatial wavelength was measured in several Ss by means of spatial-temporal Fourier analyses of scalp surface potentials, using multichannel recordings from electrodes placed along the midline. It was found that the spectrum of midline alpha oscillations peaked for long wavelengths (20 cm). A dispersion relation between frequency and spatial wavelength apparently existed for frequencies near the peak alpha frequency. That is, in all 13 records, frequency components just above the peak alpha frequency had shorter midline wavelengths than low alpha frequency components. The relationship of these results to theoretical descriptions of the EEG and to other experiments is discussed.—*R. S. Kennedy*.
11022. Oatman, Lynn C. (US Army Human Engineering Lab, Aberdeen Proving Ground, MD) **Electrophysiological measures of cross-sensory interaction in the central nervous system.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 183-184.
11023. Oatman, Lynn C. (US Army Human Engineering Lab, Behavioral Research Directorate, Aberdeen Proving Ground, MD) **Effects of appetitive drive on auditory evoked potentials: A replication.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1092-1099.—Reexamined click-evoked potentials in 6 female cats during periods of increased food deprivation under 3 experimental procedures. The amplitudes of click-evoked potentials recorded from the round window, cochlear nucleus, and auditory cortex remained constant as deprivation time increased from 0 to 24 hr regardless of the experimental procedures used. Increased food-deprivation time had no systematic effect on EEG activity recorded from the auditory cortex under the 3 procedures. It is suggested that since increased food-deprivation time under the experimental procedures did not produce a state of heightened EEG arousal, the lack of effect on auditory evoked potentials is related to the amount of environmental stimulation an animal receives during food deprivation.—*Journal abstract*.
11024. Oswald, Wolf D. & Roth, Erwin. (U Erlangen-Nürnberg, W Germany) **[Relationships between EEG and intelligence variables.]** (Germ) *Psychologische Beiträge*, 1974, Vol 16(1), 1-47.—Reviews research on the relationships between intelligence variables and EEGs. The different and even conflicting results seem to be due to methodological and sampling problems. Problems of measurement, scoring, and sampling are discussed. (French summary) (10 p ref)—*English summary*.
11025. Payne, T. L. (Texas A&M U, Coll of Agriculture) **Pheromone and host odor-stimulated potentials in *Dendroctonus*.** *Experientia*, 1974, Vol 30(5), 509-510.—Conducted electrophysiological investigations of antennal olfactory responsiveness to pheromones and host odors among 2 species of *Dendroctonus* (bark beetles). Recordings were made from both males and

females of the species *D. frontalis* Zimm. and *D. brevicornis* LeC. in response to the aggregation pheromones frontalin, exobrevicornin, and to 2 host tree terpenes. Results were electroantennograms (EAGs) that were typical for these species but on which were superimposed potentials apparently from antennal muscle movement. Increased concentration of any one of these compounds also increased both EAG and muscle potential amplitude. It is suggested that these electrophysiologically recorded responses are related to antennal movement (i.e., both antennal raising and orientation) displayed by these species when stimulated by the pheromones and terpenes. (French summary)—R. S. Albin.

11026. Prochazka, V. J.; Tate, K.; Westerman, R. A. & Ziccone, S. P. (Monash U, Clayton, Vic, Australia) **Remote monitoring of muscle length and EMG in unrestrained cats. *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 649-653.**—Describes a system for the remote recording of electromyogram (EMG) and muscle length in freely moving cats which uses a small telemeter attached to the animal's head to amplify and transmit the EMG and encoded length-gauge signals. (French summary)

11027. Proenza, Luis M. & Morton, Ralph E. (U Georgia, Vision Research Lab) **Overlapping advance control systems for microelectrode positioning. *Electroencephalography & Clinical Neurophysiology*, 1974 (Dec), Vol 37(6), 659-662.**—Discusses overlapping advance control systems in relation to the problems of resolution, compactness, and speed of response which are now present in varying degrees in commercially available, rolling diaphragm, hydraulic microdrives. Applications to electrode positioning for various systems are examined. (French summary)

11028. Rizzolatti, G.; Camarda, R.; Grupp, L. A. & Pisa, M. (U Parma, Istituto di Fisiologia Umana, Italy) **Inhibitory effect of remote visual stimuli on visual response of cat superior colliculus: Spatial and temporal factors. *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1262-1275.**—Studied the influence of visual stimuli, located very far from the excitatory part of the unit receptivity field, on the responses of superior colliculus (SC) neurons to moving visual stimuli. 123 neurons were extracellularly recorded in an unanesthetized curarized cat as a visual stimulus was introduced at the moment in which a collicular unit was triggered by another visual stimulus. In more than 80% of the units tested the introduction of the second stimulus strongly inhibited the unit response to the first. Results indicate that the SC is the place 2 or more simultaneous sensory messages requiring incompatible motor responses interact, and that this interaction is an inhibitory one. (34 ref)—R. Tomasko.

11029. Sakai, Kazuya. (U Lyon, Faculty of Medicine, France) **Phasic electrical activity in the brain associated with eye movement in waking cats. *Brain Research*, 1973, Vol 56, 135-150.**—Eye movement potentials (EMP) recorded from the oculomotor nucleus (nucl. III), the lateral geniculate body (LGB), and the visual cortex were analyzed in 10 chronically implanted adult cats. A nucl. III EMP preceded each eye movement by 10-20 msec, and the EMP was independent of visual or

proprioceptive inputs. Both LGB and cortical EMPs were composed of 3 components. The 1st component is discussed in terms of "lambda waves," while the 2nd and 3rd components are discussed in terms of "corollary discharge" from the mesencephalic and pontine oculomotor centers. (48 ref)—*Journal abstract*.

11030. Siddle, David A. & Smith, David G. (U Southampton, England) **Effects of monotonous stimulation on cortical alertness in fast and slow habituation groups. *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 324-334.**—Investigated cortical alertness in 28 undergraduate volunteers displaying fast and slow habituation of the evoked skin conductance response (SCR). It was predicted that during monotonous stimulation, Ss displaying rapid habituation of the evoked SCR would show a more rapid decline in cortical alertness than Ss displaying slow habituation. Quantified EEG and electrodermal measures of cortical alertness were obtained from fast and slow habituation groups of Ss tested under conditions of either repetitive auditory stimulation or reduced sensory input. Results indicate that 8-13 Hz EEG abundance declined more rapidly in fast than in the slow habituation groups under both conditions of monotonous stimulation. No differences were obtained for the lower EEG frequencies (4-8 and 2-4 Hz) or for tonic electrodermal measures. (18 ref)—*Journal abstract*.

11031. Sohmer, H. & Pratt, H. (Hebrew U, Hadassah Medical School, Jerusalem, Israel) **Electrocochleography during noise-induced temporary threshold shifts. *Audiology*, 1975(Mar-Apr), Vol 14(2), 130-134.**—The responses of the auditory nerve and brain-stem auditory nuclei were recorded nontraumatically in 10 normal-hearing adults by means of electrocochleography before, during, and after exposure to white noise intensities which produced temporary threshold shifts. The largest decrement (amplitude decrease and latency increase) was seen in the response of the auditory nerve. Large inter-S variability was seen in the effects of the noise exposure on response amplitude, latency, and recovery rates. (French summary)—*Journal abstract*.

### Physiological Processes

11032. Amore, John E. (US Dept of Agriculture, Western Regional Research Ctr, Berkeley, CA) **Evidence for the chemical olfactory code in man. *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 137-143.**—Hypothesizes that the olfactory epithelium of some people lacks the specific receptor protein for detecting 1 whole family of odorants that belong to 1 of the primary odors. The domains of 2 such fundamental odors are mapped by determining thresholds for human Ss. Supporting evidence among other research, correlations between odor and molecular shape, and possible applications for a theory of primary odors are discussed. (15 ref)—R. S. Albin.

11033. Bloom, Richard F. (Dunlap & Assoc, Darien, CT) **Validation of suggestion-induced stress. *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 155-156.**

11034. Cameron, C. (Australian Road Research Board, Vermont, Vic, Australia) **A theory of fatigue. In A. T. Welford (Ed), *Man under stress*. New York, NY:**



John Wiley & Sons, 1974. 140 p. \$10.95.—Presents an historical review of fatigue research and discusses problems of definition, measurement and interpretation of fatigue research findings. The need to extend the time scale of fatigue studies to allow for cumulative effects over days, weeks, or months and for the effects of disturbed sleep habits is stressed, and it is suggested that the time required for recovery may be a useful method of quantifying the severity of fatigue. (French & German summaries) (39 ref)

11035. Carroll, D. (Australian National U, Canberra, ACT) **Physiological response to relevant and irrelevant stimuli in a simple reaction time situation.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

11036. Caul, William F.; Freeman, Betty J. & Buchanan, Denton C. (Vanderbilt U) **Effects of differential rearing condition on heart rate conditioning and response suppression.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 63-68.—Reared a total of 42 male and 42 female Sprague-Dawley rat pups in either an enriched or isolated environment for 60 days following weaning. Neither rearing environment nor sex affected heart-rate conditioning. However, when the conditioned stimulus used during conditioning was subsequently presented in a drinking situation, males reared in isolation showed a greater degree of response suppression than did similarly reared females. Males and females reared in the enriched environment did not differ in degree of response suppression.—*Journal abstract*.

11037. Coles, Michael G. (U Illinois) **Physiological activity and detection: The effects of attentional requirements and the prediction of performance.** *Biological Psychology*, 1974, Vol 2(2), 113-125.—Cardiac and electromyographic measures were taken from 10 paid, male undergraduate Ss while they performed a total of 1,800 detection trials over 15 sessions. Ss indicated their judgment on a 4-point rating scale as to whether a deflection occurred in the beam of an oscilloscope. On deflection trials, the beam always deflected at the same place, 6 sec after a warning tone. Task difficulty was manipulated by using 3 different deflection durations. Cardiac deceleration was related to task difficulty in accordance with J. I. Lacey's (1959, 1963) intake-rejection hypothesis. Averaged electromyographic activity did not show this relationship, although it showed similar within-task trends to heart rate. Heart-rate level predicted both the accuracy and confidence of the Ss' judgments, and may have reflected fluctuations in the Ss' motivational state. There was an inverted-U relationship between performance measures and heart-rate variability, and this relationship showed some of the changes with task difficulty predicted from the Yerkes-Dodson law. (19 ref)—*Journal abstract*.

11038. Cooper, C. J. (U Adelaide, SA, Australia) **Anatomical and physiological mechanisms of arousal, with special reference to the effects of exercise.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

11039. Doering, Charles H. et al. (Stanford U, Medical School) **Plasma testosterone levels and psychologic measures in men over a 2-month period.** In R. C.

Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11040. Elias, Jeffrey W.; Elias, Merrill F. & Schlager, Gunther. (Texas Tech U) **Aggressive social interaction in mice genetically selected for blood pressure extremes.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 155-166.—In 4 experiments mice genetically selected for blood pressure (BP) extremes from an 8-way cross of 8 inbred strains were compared with regard to aggressive social behavior. Aggressor Ss from the high and low BP lines were pitted against Ss from the high and low lines (targets). High BP Ss were less aggressive socially than low BP Ss. The low BP Ss exhibited the highest social aggression scores when pitted against high BP targets. Examination of extreme BP groups chosen from the segregating F<sub>2</sub> generation resulting from crosses of the high and low lines indicated that aggressive social behavior and BP were influenced by the same genes or linked genes. (15 ref)—*Journal abstract*.

11041. Foutz, A. S.; Ternaux, J. P. & Puizillout, J. J. (INSERM, Unité de Recherches Neurobiologiques, Marseille, France) **[Sleep in acute "encéphale isolé" cat: II. Paradoxical stages and sleep-waking cycle: Their triggering by baroreceptive fibre stimulation.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 577-588.—Data from "encéphale isolé" preparations of adult cats show that different sleep stages can be triggered almost at will by adequate vago-aortic nerve stimulation. However, these provoked stages are not always linked exactly like spontaneous ones: phasic slow-wave sleep or paradoxical sleep (PS) can be provoked directly with the onset of stimulation; the appearance of a provoked stage of PS from a wakeful state results in a genuine experimental narcolepsy. Moreover, after the PS stage, as in the normal S, a refractory period occurs during which another paradoxical activity cannot be triggered. (31 ref)—*English summary*.

11042. Frankenhauser, Marianne & Lundberg, Ulf. (U Stockholm, Psychological Lab, Sweden) **Immediate and delayed effects of noise on performance and arousal.** *Biological Psychology*, 1974, Vol 2(2), 127-133.—Exposed 14 male university students to intermittent, aperiodic noise of 65-85 db(A) while performing mental arithmetic. Measures of performance, subjective stress, catecholamine excretion, and heart rate obtained during and/or after noise exposure were compared with corresponding data from a noise-free session. Performance was not impaired by noise, but the physiological and subjective measures reflected noise-induced changes in arousal level. The time pattern differed between variables, so that the increase in subjective arousal was most pronounced during noise exposure and that of adrenaline excretion after noise exposure.—*Journal abstract*.

11043. Geisler, C. Daniel; Rhode, William S. & Kennedy, Duncan T. (U Wisconsin, Madison) **Responses to tonal stimuli of single auditory nerve fibers and their relationship to basilar membrane motion in the squirrel monkey.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1156-1172.—Investigated the relationships between the mechanical and neural behavior of the inner

ear of the squirrel monkey. The cochlear nerves of 31 Ss were surgically exposed. An electronic apparatus was used to generate stimulus tones at variable decibel levels for each frequency chosen, and the responses of the nerve fibers were measured. The differences between the slopes of the neural and basilar curves indicate that basilar membrane displacement is not the only input to a nerve fiber. The neural data taken from any one fiber at difficult frequencies suggest that a fixed relationship exists between a linear transformation of the basilar membrane displacement and the discharge rate of a cochlear neuron. (27 ref)—*R. Tomasko.*

11044. Gerdes, Eugenia P. & Kinsbourne, Marcel. (Duke U) **Lateral eye movements and state anxiety.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 118-119.

11045. Goodyear, M. D. (Monash U, Clayton, Vic, Australia) **Stress, adrenocortical activity and sleep habits.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

11046. Horn, G.; Rose, S. P. & Bateson, P. P. (U Cambridge, England) **Monocular imprinting and regional incorporation of tritiated uracil into the brains of intact and "split-brain" chicks.** *Brain Research*, 1973, Vol 56, 227-237.—Unilateral imprinting in 12 chicks 14-19 hrs old was correlated with right-left asymmetry of incorporation of tritiated uracil into presumed RNA in the forebrain roof. No hemispheric differences were found in intact chicks. (27 ref)—*B. Preilowski.*

11047. Kaplan, B. B.; Dyer, J. C. & Sirtlin, J. L. (Cornell U, Coll of Medicine, New York) **Macromolecules and behavior: Effects of behavioral training on transfer RNAs of goldfish brain.** *Brain Research*, 1973, Vol 56, 239-248.—Taught goldfish a new swimming skill by attaching a float to their ventral surface. The effect of training on the in vitro aminoacyl acceptor activity of transfer RNA (tRNA) from whole brain was studied. The total functional amount of tRNA remained constant 0-8 hrs after training. Consistent and significant increases in leucyl-tRNA activity were observed in trained fish 2-8 hrs after training. This change was not caused by (a) the stress or intense physical exertion attendant on training, (b) the minor surgical procedures involved, or (c) variation in the enzyme preparations employed. No differences were found in the activities of several other tRNA species tested. (25 ref)—*Journal summary.*

11048. MacPherson, R. K. (U Sydney, NSW, Australia) **Thermal stress and thermal comfort.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.—Discusses factors which determine the level of heat stress and difficulties in its measurement. The degree of thermal comfort or its measurement is shown to be a useful measure of thermal stress and methods for determining the preferred temperature are outlined, along with methods for the mitigation of heat stress in hot climates. (French & German summaries) (20 ref)

11049. Mora, J. Damas; Vlissides, D. & Jenner, F. A. (MRC Unit for Metabolic Studies in Psychiatry, Middlewood Hosp, Sheffield, England) **Glucose and adenosine triphosphate level in normal subjects.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 459-460.—Attempted to replicate W. Beebe and O. Wendel's (1973) findings that

glucose levels in serum and adenosine triphosphate levels in blood are highly correlated in normal persons compared to anxious schizophrenics. No correlation was found in 59 normal 19-53 yr old Ss.—*Journal summary.*

11050. Mozell, Maxwell M. & Jagodowicz, Morris. (State U New York, Upstate Medical Ctr, Syracuse) **Mechanisms underlying the analysis of odorant quality at the level of the olfactory mucosa: I. Spatiotemporal sorption patterns.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 76-90.—Discusses the possibility of an olfactory discrimination mechanism based upon the different space-time patterns by which the molecules of different chemicals spread across the mucosa. It is concluded that there is adequate demonstration of a chromatographic-like process occurring along the olfactory mucosa. (18 ref)

11051. Naparstek, A.; Romette, J. L.; Kernevez, J. P. & Thomas, D. (Weizmann Inst of Science, Rehovot, Israel) **Memory in enzyme membranes.** *Nature*, 1974(May), Vol 249(5456), 490-491.—Describes research done to demonstrate the existence of hysteretic phenomena, through simple kinetic mechanisms which are shared by most enzymes: autocatalysis by the product and inhibition by excess substrate. Hypotheses are developed to describe the problem of information storage in short term memory, in which phase transitions are thought to require structural changes in macromolecular components or in the membrane permeability of the information storage unit.

11052. Nelson, Arnold E. & Simpson, D. Dwayne. (Texas Christian U, Inst of Behavioral Research) **Alteration of respiration during a reaction-time task.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 184.

11053. Netsell, Ronald & Daniel, Billie. (U Wisconsin, Madison) **Neural and mechanical response time for speech production.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 608-618.—Determined the reaction time of 10 neurologically normal young adults for a speech production task. The response was production of a consonant-vowel-consonant word following the offset of an auditory stimulus tone. Electromyography (EMG) was used to mark the onset of orbicularis oris activity in the response, and the interval between stimulus and EMG onset was designated as neural time. Mechanical response time was measured as the interval between EMG onset and the rise in intraoral air pressure marking the completion of the movement in the response. Group neural times and mechanical response times were approximately 140 and 60 msec, respectively, yielding a 200-msec reaction time. The usefulness of the reaction time paradigm is discussed in relation to studies of sensorimotor control in normal and dysarthric speech. (19 ref)—*Journal abstract.*

11054. Ohman, Arne et al. (U Uppsala, Sweden) **Habituation of the electrodermal orienting reaction to potentially phobic and supposedly neutral stimuli in normal human subjects.** *Biological Psychology*, 1974, Vol 2(2), 85-93.—In Exp 1 2 groups of 20 university psychology students each were given either 16 presentations of snake pictures or 16 presentations of pictures of houses. The pictures differed between Ss, but a certain S saw the same pictures throughout the experiment.



Results show no significant difference between groups in response magnitude but significantly fewer trials to habituation in the group given neutral pictures. Exp II with 48 Ss used a within-S design, with mixed presentation of either a snake and a house picture or a spider and house picture. The responses to phobic stimuli were larger than those to neutral ones, and the latter took significantly fewer trials to habituate. Exp III with 40 Ss used a between-S design where some shocks were given before the experiment, and the S was threatened that some shocks would also be given during the experiment. This procedure potentiated the difference between the stimuli, so that the responses to the phobic pictures were about 4 times as large as those to the neutral stimuli. (17 ref)—*Journal abstract*.

11055. Pare, William P. (VA Hosp, Pavlovian Research Lab, Perry Point, MD) **Feeding environment and the activity-stress ulcer.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 546-548.—Male Sprague-Dawley rats were housed in standard activity cages and fed 1 hr each day. 18 Ss were fed in their activity cages and 12 Ss in the colony home cages in which they resided before being moved to the activity wheel. The latter operation was designed to eliminate novelty stress inherent in the activity wheel environment which would suppress feeding. However, home cage feeding Ss ate less than controls ( $n = 12$ ) and had as many ulcers as activity Ss fed in the activity wheel. Novelty stress did not contribute significantly to the development of the activity-stress ulcer.—*Journal abstract*.

11056. Persky, Harold. (U Pennsylvania) **Reproductive hormones, moods, and the menstrual cycle.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11057. Plutchik, Robert & Conte, Hope. (Albert Einstein Coll of Medicine, Yeshiva U) **Sex differences in reported psychophysiological reactivity.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1221-1222.—On a self-report questionnaire, 9 out of 18 items presumed to reflect sympathetic or parasympathetic dominance differentiated between males and females.

11058. Provins, K. A.; Glencross, D. J. & Cooper, C. J. (Australian National U, Canberra, ACT) **Thermal stress and arousal.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.—Describes 2 series of experiments with male graduate students on the effect of different body temperatures on 2 measures of EEG arousal level and thermal comfort. Findings suggest that the arousal level as indicated by both the subjective and EEG records is not determined solely by either the body temperature or ambient conditions but is a result of their combined influences. (French & German summaries)

11059. Puizillout, J. J.; Ternaux, J. P.; Foutz, A. S. & Fernandez, G. (INSERM, Unité de Recherches Neurobiologiques, Marseille, France) **[Sleep in acute "encéphale isolé" cat: I. Triggering of ponto-geniculo-occipital waves (PGO) and phasic slow wave sleep role of the raphe nuclei.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 561-576.—Reports that "encéphale isolé" cat preparation spontaneously elicits alternations of sleep-wakefulness cycles:

sleep stages observed were the same as those previously described in normal cats—light slow-wave sleep (SSL), deep slow-wave sleep (SOLP), phasic slow-wave sleep (SPOL), and paradoxical sleep (PS). However, occurrence of the PS stage was infrequent because S usually awoke during the SPOL stage which precedes PS in unrestrained normal Ss. Large amplitude waves were recorded from the lateral geniculate bodies; these were easily distinguished by their position in the sleep-wakefulness cycles, their morphology, and their responses to different stimuli. Low voltage stimulation of the central cut end of vago-aortic nerves frequently induced rapid succession of the 1st 2 stages of sleep up to the SPOL stage. Data on the function of tryptaminergic mechanisms in the sleep-wakefulness cycle are also presented. (49 ref)—*English summary*.

11060. Schneider, Robert A. (U Oklahoma, Medical School, Oklahoma City) **Newer insights into the role and modifications of olfaction in man through clinical studies.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 217-223.—Describes recent research in olfaction concerned with the modification of this sense by such phenomena as zinc depletion, low estrogen levels, and low adrenal corticosteroid values. Abnormalities of olfactory acuity are discussed. Research concerned with decreased sensitivity of smell (hyposmia), absence of the sense of smell (anosmia), and heightened acuity of the sense of smell (hyperosmia) is reviewed. Adaptation as a unique characteristic of the smell sense is summarized. Genetic determinants of body odor are postulated and the relevant research is discussed. Pheromones, chemicals (odors) emitted by one individual and perceived by a second, act on the hypothalamus of the perceiver causing hormonal effects. In other mammals, this phenomenon relates to sexual behavior and it now seems likely that a similar effect is to be found in man. It is suggested that odors activate hypothalamic-releasing factors which in turn effect release of pituitary hormones that act on the hormonal secretion of gonads and the adrenal cortex. Thus, odors are involved in the reproductive physiology of both human and nonhuman forms. (23 ref)—*R. S. Albin*.

11061. Shapiro, C. M.; Moore, A. T.; Mitchell, D. & Yodaiken, M. L. (U Witwatersrand, Johannesburg, South Africa) **How well does man thermoregulate during sleep?** *Experientia*, 1974, Vol 30(11), 1279-1281.—Tested a 22-yr-old male S. Results indicate that REM sleep and precise thermoregulation are mutually exclusive, with sweating being depressed during active sleep. (German summary)

11062. Siegler, Melody V.; Mpitsos, George J. & Davis, William J. (U California, Thimann Lab, Santa Cruz) **Motor organization and generation of rhythmic feeding output in buccal ganglion of *Pleurobranchaea*.** *Journal of Neurophysiology*, 1974(Nov), Vol 37(6), 1173-1196.—Investigated the role that the buccal ganglion of the marine mollusk plays in generating rhythmic feeding output. The nervous systems of 150 Ss were removed and the motoneuron somata were mapped using both dye injection and intracellular stimulation/recording methods. The motoneurons identified with the mollusk's feeding activity were studied during rhythmic feeding output. The intracellular recording identified 4

mechanisms producing motor bursts: excitatory postsynaptic potentials, inhibitory postsynaptic potentials, burstiness of the motoneurons during sustained depolarization, and postinhibitory rebound of action potentials. Results indicate that extrinsic mechanisms play the principal pattern-generating role in shaping the motor output. (52 ref)—*R. Tomasko.*

11063. Steinberg, Alan B. (Richard Stockton State Coll, Faculty of Natural Sciences & Mathematics) **Individual patterns of excretion of metanephrine and normetanephrine by children.** *Biological Psychology*, 1974, Vol 2(2), 135-149.—Examined the excretion of free and conjugated metanephrine and normetanephrine by 16 9-12 yr old children for possible diurnal variations over a 48-hr period of collection. Behavioral ratings and intelligence test scores were examined for possible correlations with both the level and variability of each S's amine excretion. Excretion rates of the amines, expressed as micrograms of amine per 100 mg creatinine, followed a diurnal pattern, exhibiting a daytime peak and nighttime nadir; the observed periodicity could not be attributed to any overall periodicity in creatinine excretion. Effort on mastery of fine motor skills was negatively correlated with the level of conjugated normetanephrine; physical and verbal aggression, as well as response to such aggression, were positively correlated with both the level and variability of this amine. For conjugated metanephrine, only response to aggression was significantly correlated, though there was correspondence between the coefficients obtained for both conjugated amines.—*Journal abstract.*

11064. Susswein, Abraham J. & Kupfermann, Irving. (New York U, Medical School) **Bulk as a stimulus for satiation in *Aplysia*.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 203-209.—In Exp I 10 *Aplysia californica* mollusks, when prefed a partial meal of nonnutritional bulk, ate significantly less food compared to controls. The total mass of material consumed by Ss fed bulk and then fed to satiation with seaweed was not significantly different from the mass consumed by Ss fed to satiation with seaweed alone. In Exp II Ss were fed daily, alternating weekly periods of feeding Ss 50% diluted food with periods of feeding Ss nutritionally normal meals. The nutritional content of diluted meals was significantly less than the nutritional content of undiluted meals. The mass of material consumed was not significantly different for diluted compared to nondiluted meals. Results indicate that the bulk properties of food play an important role in producing satiation in *Aplysia*.—*Journal abstract.*

11065. Taylor, Leslie R. & Costanzo, Dominic J. (Muskingum Coll) **Social dominance, adrenal weight, and the reticuloendothelial system in rats.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 167-174.—22 weanling male Long-Evans rats were chronically paired and as adults were induced to compete daily for food. 6 pairs which demonstrated stable dominance-subordinate relationships served as experimental Ss, while a comparable group of 6 singly housed Ss served in an isolate control group. Activity of the reticuloendothelial system (RES) was measured, the Ss sacrificed, and their adrenal weights recorded in an effort to determine the relative extent of stress associated with these experimental

conditions. In general the greatest stress response was indicated among the dominant Ss, and the least amount of stress was found among the isolate-reared Ss. The RES measure proved to be particularly sensitive to this effect and discriminated among treatment groups quite as well as the more traditional adrenal weight index. (25 ref)—*Journal abstract.*

11066. Ward, Ingeborg L. (Villanova U) **Sexual behavior differentiation: Prenatal hormonal and environmental control.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974, xvi, 495 p.

11067. Wirz-Justice, Anna. (Psychiatrische Universitätsklinik, Basel, Switzerland) **Possible circadian and seasonal rhythmicity in an in vitro model: Monoamine uptake in rat brain slices.** *Experientia*, 1974, Vol 30(11), 1240-1241.—Investigated a factor possibly causing periods of increased susceptibility characteristic of manic-depressive illness. Alterations in sleep-waking patterns, corticosteroid rhythms, and seasonal increases in depressions are associated with the metabolic rhythmicity of the amines. (German summary)

11068. Woolf, C. J.; Willies, G. H.; Hepburn, H. R. & Rosendorff, C. (U Witwatersrand, Medical School, Johannesburg, South Africa) **Time dependence of a neurochemical correlate of a learning task: A non-disruptive approach to memory consolidation.** *Experientia*, 1974, Vol 30(7), 760-762.—Studied changes in the ratio of uridine to cytidine (u/c) in the carp's brain RNA as a neurochemical correlate of a continuous learning task. The task involved the S relearning to swim upright after the attachment of a float to its ventral surface. After the relearning the brains were removed and assayed using thin layer chromatography. Changes in u/c were measured at 2, 4, 6, 8, 16 and 24 hrs after the relearning. Changes noted at 2 and 8 hrs indicate a measure-variable for a nondisruptive study of memory consolidation. (German summary)—*R. Tomasko.*

### Genetics

11069. Alder, Elizabeth M. (U Edinburgh, Scotland) **Genetic and maternal influences on docility in the Skomer vole, *Clethrionomys glareolus skomerensis*.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 251-255.—Study of the *skomerensis* race of the bank vole, *Clethrionomys glareolus*, showed it to be exceptionally docile when handled, compared with the mainland race, *C. g. britannicus*. Laboratory-reared hybrids were all active in temperament like *britannicus*. Cross-fostering *skomerensis* to *britannicus* produced an active temperament, but the reciprocal cross-fostering had no effect. Results are relevant to the evolution of the 2 races. —*Journal abstract.*

11070. Blizard, David A. & Randt, Clark T. (New York U, Medical School, Milbank Research Lab) **Genotype interaction with undernutrition and external environment in early life.** *Nature*, 1974(Oct), Vol 251(5477), 705-707.—Examined the interaction of genetic background with both early life undernutrition and different environmental conditions. Mice of 2 different genetic strains, the C57BL/6J and the DBA/2J, were raised in normal and undernourished nutritional conditions and



in either enriched, normal, or impoverished environments. It was demonstrated that although early life undernutrition in the C57BL/6J strain had a greater effect than in the DBA/2J strain, the occurrence of interaction of the various conditions emphasizes the relative nature of the dependence of nutritional and environmental influences on genotype. The fact that genetic factors can influence an organism's response to undernutrition suggests a possible explanation of why undernutrition seems to affect some human groups while leaving others apparently unaffected. (18 ref)—*A. de la Haba*.

11071. Fuller, John L. (State U New York, Binghamton) **Independence of inherited susceptibility to spontaneous and primed audiogenic seizures in mice.** *Behavior Genetics*, 1975(Jan), Vol 5(1), 1-8.—Reports an experiment in which the familial distribution of spontaneous and primed audiogenic seizures was found to be independent in 301 Binghamton HET mice. No sex or litter differences were found in seizure incidence on either priming or test trials. It is suggested that spontaneous susceptibility may be attributable to homozygosity for audiogenic seizure proneness. A strong genetic influence on sensitivity to priming is also indicated. (21 ref)—*Journal abstract*.

11072. Groszwald, Douglas E. & Luttges, Marvin W. (U Colorado) **Developmental and genetic variables in mouse startle response habituation.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 41-48.—Used a behavioral task insensitive to inherent sensory and motor limitations—a startle response habituation technique—to investigate genetic (strains) and developmental (age) effects on behavior. Ss were a total of 160 HS, DBA/2J, C57BL/6-Hs outbred, house, and feral deer mice. All Ss tested using 2 procedures exhibited evidence for habituation which was dependent on strain, age, and length of the testing process. Exploitation of this simple technique may permit clarification of more complex types of behavior.—*Journal abstract*.

11073. Halperin, S. L.; Rao, D. C. & Morton, N. E. (Tripler Army Medical Ctr, Honolulu, HI) **A twin study of intelligence in Russia.** *Behavior Genetics*, 1975(Jan), Vol 5(1), 83-86.—Briefly presents twin data from prewar Russia which show the same effect of family environment on intelligence as in contemporary America.

11074. Parsons, P. A. (La Trobe U, Bundoora, Vic, Australia) **Phototactic responses along a gradient of light intensities for the sibling species *Drosophila melanogaster* and *Drosophila simulans*.** *Behavior Genetics*, 1975(Jan), Vol 5(1), 17-25.—Measured the phototactic responses of 4 recently collected isofemale strains of *Drosophila melanogaster* and *Drosophila simulans* in a light gradient from 590 to 10 lux. High light intensities were preferred by most flies, but a small proportion of flies preferred the lowest light intensity. Based on the strains tested, *D. simulans* showed greater phototaxis than *D. melanogaster*, and within each species variability was found. The niche breadth of *D. melanogaster* appears likely to be greater than that of *D. simulans* for phototaxis in the light gradient. Results are in general qualitative agreement with earlier results published on dispersal activities from the same populations. (16 ref)—*Journal abstract*.

11075. Sprott, Richard L. & Staats, Joan. (Jackson Lab, Bar Harbor, ME) **Behavioral studies using genetically defined mice: A bibliography.** *Behavior Genetics*, 1975(Jan), Vol 5(1), 27-82.—Presents a bibliography of 1,222 references of studies using specific inbred strains of mice, emphasizing 3 general areas—studies in which a behavioral measure was the primary variable of interest (e.g., activity, aggression, memory, or audiogenic seizures); those studies in which treatment effects on behavior were primarily measured (e.g., age, central nervous system, or pharmacological treatments); and review and theoretical articles.—*L. Gorsey*.

## PSYCHOPHARMACOLOGY AND PHYSIOLOGICAL INTERVENTION

11076. Barnett, S. A.; Cowan, P. E.; Radford, G. G. & Prakash, I. (Australian National U, Canberra, ACT) **Peripheral anosmia and the discrimination of poisoned food by *Rattus rattus* L.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 183-190.—24 black (or roof) rats, of the 1st generation bred in the laboratory, were given a choice between millet seed plus vegetable oil and the same mixture with zinc phosphide added. Dosage was based on an experimentally established lethal dose for zinc phosphide of 40.1 mg/kg. Exposure to the poison led first to a total decline in food consumption, but after 6-8 days there was a strong tendency to avoid the poisoned millet in favor of the harmless mixture (poison shyness). Half the Ss were then made anosmic by treatment of the nasal mucous membrane with a solution of zinc sulfate. This had no effect on the discrimination of the poisoned food. It is concluded that although zinc phosphide, when damp, has a distinctive odor, this type of poison shyness evidently does not depend on the olfactory sense.—*Journal abstract*.

11077. Buckholtz, Neil S. (Medical U South Carolina) **Anticonvulsant effects of 6-methoxy-1,2,3,4-tetrahydro- $\beta$ -carboline on audiogenic and electroconvulsive seizures in mice.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 65-68.—Tested 6-methoxy-1,2,3,4-tetrahydro- $\beta$ -carboline (6-MeO-THBC) for its anticonvulsant properties against audiogenic seizures in DBA/2J and primed C57BL/6J mice (i.e., mice given a prior auditory exposure) and against electroconvulsive seizures in DBA/2J mice ( $N = 58$ ). 6-MeO-THBC (100 mg/kg) was found to attenuate both types of behavioral seizures 2 hrs after injection as compared to 58 saline controls. In addition, 6-MeO-THBC increased whole brain serotonin and decreased whole brain 5-hydroxyindoleacetic acid 2 hrs after injection. Results suggest a serotonergic involvement in behavioral seizures. (22 ref)—*Journal abstract*.

11078. Cannon, Dale S.; Baker, Timothy B.; Berman, Robert F. & Atkinson, Carol A. (VA Hosp, Alcohol Rehabilitation Unit, Salt Lake City, UT) **A rapid technique for producing ethanol dependence in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 831-834.—Demonstrated ethanol dependence in 4 groups of 6 male Long-Evans rats following 2-4 days of intragastric intubation with 8-12 g/kg/day. Withdrawal symptoms included tremulousness, hyperactivity,

and seizures. Nutritional deficiency is shown to be an insufficient explanation of the withdrawal symptoms produced. (19 ref)—*Journal abstract*.

11079. Costall, Brenda & Naylor, Robert J. (U Bradford, Postgraduate School of Studies in Pharmacology, England) **Stereotyped and circling behaviour induced by dopaminergic agonists after lesions of the midbrain raphe nuclei.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 206-222.—Studied the role of 5-hydroxytryptamine in the mediation of stereotyped and circling behavior observed after peripherally administered dopaminergic agonists, apomorphine, dextro- and levoamphetamine, methylphenidate, and piribedil, and intrastriatal dopamine in male Sprague-Dawley CFE rats. Lesions of the medial and/or dorsal raphe nuclei reduced the stereotypic effects of all agents, especially apomorphine. Following asymmetric lesions of the medial raphe nucleus, all agents except piribedil enhanced or induced a contralateral circling behavior in a dose-dependent manner. Apomorphine and dextroamphetamine induced an ipsilateral circling in Ss with substantia nigra lesions. Haloperidol and methiothepin inhibited the circling induced by apomorphine and dextroamphetamine in both substantia nigra- and raphe-lesioned Ss in similar doses to those inhibiting stereotyped behavior. Lesions of the raphe nuclei reduced the stereotypic effectiveness of bilateral intrastriatal dopamine but did not significantly modify the asymmetries induced by unilateral intrastriatal dopamine. It is concluded that the medial and dorsal raphe nuclei play an important role in the development of stereotyped behavior and that the medial nucleus is important for the control of circling. The demonstrated relationship between dopamine and 5-hydroxytryptamine (possibly within the striatum) in the mediation of behavioral states indicative of antiparkinson activity may be relevant to the disease state. (32 ref)—*Journal abstract*.

11080. Creese, Ian & Iversen, Susan D. (Johns Hopkins U, Medical School) **The role of forebrain dopamine systems in amphetamine induced stereotyped behavior in the rat.** *Psychopharmacologia*, 1974, Vol 39(4), 346-357.—The caudate nucleus or the tuberculum olfactorium of 30 male Wistar albino rats was lesioned by bilateral stereotaxic injection of 6-hydroxydopamine. 18 other Ss were sham- or noninjected controls. The degree of dopamine depletion was assessed by a sensitive regional dopamine assay and revealed severe depletions in the lesioned areas. The locomotor response to a low dose of dextroamphetamine was not modified by either lesion. However, the stereotypy response to a high dose of amphetamine was abolished by the caudate lesion. The stereotypy response was not modified by lesion to the tuberculum olfactorium. Neither lesion abolished the stereotypy response to apomorphine. Results therefore demonstrate that amphetamine is an indirect sympathomimetic agent and further emphasize the critical role of the dopaminergic nigrostriatal pathway in amphetamine-induced stereotypy. (32 ref)—*Journal abstract*.

11081. Dai, Soter & Ogle, Clive W. (U Hong Kong, Faculty of Medicine) **Effects of stress and of autonomic blockers on gastric mucosal microcirculation in rats.** *European Journal of Pharmacology*, 1975(Jan), Vol 30(1),

86-92.—Studied changes in gastric mucosal microcirculation in Wistar rats by using the method of intra-aortic injection of India ink, followed by microdissection of the mucosa. Acute stress, induced by restraint and exposure to cold for 2 hr, caused marked and significant vasodilatation in the gastric mucosa. This vasodilatation was prevented by pretreatment with atropine or chlorpromazine, but not by  $\alpha$ - or  $\beta$ -adrenoceptor blocking agents. Phentolamine caused significant vasoconstriction in the gastric mucosa of nonstressed Ss, but when Ss were stressed phentolamine induced a greater vasodilatation than was obtained with stress alone. These observations provide added support for the hypothesis that stress induces vagal overactivity, probably of central origin. The resulting strong contractions of the gastric wall and compression of the intramural vessels are probably responsible for degeneration of the mucosal cells leading to the formation of stress-induced ulcers in the rat. (21 ref)—*Journal abstract*.

11082. Donovan, Peter J.; Burrig, Richard G. & Bentsen, Ellen O. (State U New York, Binghamton) **Presurgical dietary history and the behavior of control and septal lesioned rats.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 13-25.—40 male Sprague-Dawley albino rats reared under dietary enrichment or standard diet from 25 days of age underwent septal or control surgery 2 mo later. Enrichment differentially altered septal or control behavior as measured by (a) exploration tests; (b) fluid consumption of water, saccharin, and quinine; and (c) acquisition of an active avoidance task. (22 ref)—*Journal abstract*.

11083. Drucker-Colin, Rene R. (I. Miles de Terapeutica Experimental, Mexico City, Mexico) **Crossed perfusion of a sleep inducing brain tissue substance in conscious cats.** *Brain Research*, 1973, Vol 56, 123-134.—Perfusate extracted from the mesencephalic reticular formation (MRF) of a sleeping donor increased the formation and decreased the latencies of slow wave sleep in recipient cats ( $N = 26$ ). No effect was seen on fast wave sleep. Perfusion with Janus Green showed that diffusion was restricted to a very small area of the MRF. Results are discussed in terms of the possible role of a humoral neurotransmitter in inducing sleep. (21 ref)—*Journal summary*.

11084. Drucker-Colin, R. R.; Jaques, L. B. & Cunningham, T. A. (U Nacional Autónoma de México, Inst de Biología, Mexico City) **Anemia from sleep deprivation with anticoagulants in rats with enhancement by PCPA.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 817-826.—Profound anemia occurred in 5-8 days in male Wistar rats fed the anticoagulants phenylindanedione and dicumarol, when fast-wave sleep (FWS) was prevented by the inverted flower pot technique. No anemia occurred in groups of Ss deprived of FWS or receiving anticoagulants only. Anemia was accelerated by intraperitoneal parachlorophenylalanine (PCPA). Anemia was slight when limited FWS was allowed by use of a larger platform or a continuous feeding period. Red blood cell, hemoglobin, and hematocrit values all fell dramatically. There was little evidence of hemorrhage grossly, such as occurs in anticoagulant-treated rats with stress. Histologic study failed to display bleeding or stress involution of



lymphoid tissue but did show diminished splenic iron depots and diminished haemopoietic activity in the splenic red pulp. Electroencephalography showed, with sleep deprivation, a greater amount of brain waves of the type normally associated with slow-wave sleep. This effect was partially blocked by serotonin depletion through PCPA injections. It is suggested that the development of anemia is due to the combined effects of several mechanisms. Results support the view that FWS-deprivation is not a stress. (20 ref)—*Journal abstract*.

11085. Edwards, M. J.; Lyle, J. G.; Jonson, K. M. & Penny, R. H. (U Sydney, NSW, Australia) **Prenatal retardation of brain growth by hyperthermia and the learning capacity of mature guinea-pigs.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 579-584.—Compared the whole- and part-brain weights of guinea pigs used in earlier experiments and related them to the error scores in the serial discrimination reversal task reported in those studied. Mature guinea pigs from mothers heat-stressed on Days 20-24 of gestation had smaller whole- and part-brain weights and made more initial and perseverative errors in the original and reversal tasks on a serial discrimination task than control guinea pigs. Offspring from mothers heated on Days 40-44 had smaller whole-brain, brain-stem, and cerebellar weights and made more perseverative errors on the reversal task than controls. No differences in whole or part-brain weights and learning capacity were found between progeny from mothers heated on Days 56-60 and control Ss.—*Journal abstract*.

11086. Eterović, Vesna A. & Ferchmin, Pedro A. (U Nacional de Cordoba, Facultad de Ciencias Químicas, Argentina) **Interaction of environment and injections on brain weight in rats.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 515-517.—Exposed male albino rats to environmental complexity (EC) for 4 days. Results show that experimental Ss had heavier cerebra than controls maintained in an impoverished condition (IC). Such a difference did not occur when the EC-IC pairs were given a subcutaneous injection of distilled water or an intracranial injection of saline on the 3rd day of treatment. It is suggested that injecting animals in psycho-biochemical experiments is a procedure whose effects should be determined in every case.—*Journal abstract*.

11087. Golter, Marianne & Michaelson, I. Arthur. (U Cincinnati, Coll of Medicine) **Growth, behavior, and brain catecholamines in lead-exposed neonatal rats: A reappraisal.** *Science*, 1975(Jan), Vol 187(4174), 359-361.—Daily oral administration of lead to newborn Sprague-Dawley rats had no adverse effect on their body growth, although lead-treated rats were more active than age-matched controls. Endogenous levels of brain dopamine were unchanged, whereas norepinephrine was increased, suggesting a possible relationship between lead exposure during earliest developmental periods, increased motor activity, and brain norepinephrine, and not brain dopamine as previously postulated.

11088. Harrison, S. D.; Bosin, T. R. & Maickel, R. P. (Southern Research Inst, Birmingham, AL) **Physiological disposition of atropine in the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 843-845.—Used a specific assay method to study the

physiological disposition of atropine in a total of 68 male Sprague-Dawley rats killed at various times after intraperitoneal administration of <sup>3</sup>H-atropine. At doses of 1.25-10 mg/kg, the greatest localization was seen in kidney and liver, with tissue-plasma ratios of >10:1. Tissue half-lives over the period .5-4 hrs ranged from 40-46 min in plasma to 97-106 min in adipose tissue.—*Journal abstract*.

11089. Hendley, Edith D. & Welch, Bruce L. (U Vermont, Coll of Medicine) **Electroconvulsive shock: Sustained decrease in norepinephrine uptake affinity in a reserpine model of depression.** *Life Sciences*, 1975(Jan), Vol 16(1), 45-54.—Gave electroconvulsive shock (ECS) once daily for 9 consecutive days to chronically reserpinized male Swiss CD-1 albino mice. Shocked Ss explored more actively than controls in an open field 18-20 hrs after the last ECS, suggesting a reversal of reserpine "depression." The apparent  $K_m$  for the high-affinity active uptake of norepinephrine into crude synaptosome-rich homogenates of Ss' cerebral cortices was higher. This suggests that repeated ECS lowered affinity for norepinephrine uptake. The  $V_{max}$  for norepinephrine uptake was also elevated, suggesting that the number of uptake sites had increased as well. (24 ref)—*Journal abstract*.

11090. Mah, C. J. & Albert, D. J. (U British Columbia, Vancouver, Canada) **Reversal of ECS-induced amnesia by post-ECS injections of amphetamine.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 1-5.—Trained black-bodded male water-deprived rats to drink from a water spout within an apparatus on each of 2 days. On the 3rd day, passive avoidance of the spout was induced by giving the S a .3-sec, 5 mA footshock after 1 lick at the spout. A test for retention of the avoidance learning was given 48 hrs following training. Electroconvulsive shock (ECS) administered through cortical electrodes at 15 sec following the footshock impaired retention. The amnesia was attenuated when amphetamine (1 mg/kg) was injected immediately but not at 6 hrs following the ECS. In a 2nd experiment, attenuation of amnesia by amphetamine was not found when the ECS occurred at 4 sec instead of 15 sec following the footshock. Results are interpreted in terms of reactivation by amphetamine of a consolidation process that was interrupted by ECS. (30 ref)—*Journal abstract*.

11091. Martinez-Vargas, Marie C. (Lab for Reproductive Biology, Chapel Hill, NC) **The induction of nest building in the ring dove (*Streptopella risoria*): Hormonal and social factors.** *Behaviour*, 1974, Vol 50(1-2), 123-151.—The effects of sex steroids on the nest building behavior of male ring doves were investigated by means of castration and androgen and estrogen treatments. 21 days after castration males were divided into 3 groups of 11 each and given daily injections of sesame oil (SO), testosterone propionate (TP) or estradiol benzoate (EB) for a period of 23 days. Males were tested for courtship and nesting on days 21-23 of hormone treatment in the presence of a sex steroid treated female. The TP- and EB-treated males but not the SO-treated males exhibited high levels of nest building and nest soliciting. Females tested with SO-treated males were delayed in occupying the nest site and performed less

nest soliciting than females tested with hormone-treated males. The interaction of neural and hormonal factors in regulating reproductive behavior is discussed. (French summary) (52 ref)—S. R. Goldstein.

11092. Maruniak, J. A.; Owen, K.; Bronson, F. H. & Desjardins, Claude. (U Texas, Austin) **Urinary marking in female house mice: Effects of ovarian steroids, sex experience, and type of stimulus.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 211-217.—2 experiments with a total of 117 female CF-1 strain mice compared urination rates in (a) naive and sexually experienced females, (b) diestrous and proestrous females, and (c) ovariectomized and estradiol benzoate-treated ovariectomized females, all when exposed to the presence of a male, an ovariectomized female, or an empty chamber. Females deposited urine at mean rates varying from 25-95 marks/hr depending on the stimulus situation. All females deposited urine at significantly higher rates in the presence of males than in the presence of ovariectomized females or the empty chamber. Sexual experience did not significantly alter the frequency of urination by females. There was no significant difference between the urination responses of proestrous and diestrous females or between ovariectomized females and estradiol benzoate-treated ovariectomized females, indicating that this is an ovarian hormone-independent response. The high rates of urine deposition by females in the presence of males could be elicited using only urine from intact but not castrated males. The data taken as a whole strongly suggest that female mice urine mark (i.e., use urine in a communicatory capacity). (26 ref)—*Journal abstract*.

11093. Massaro, Thomas F.; Levitsky, David A. & Barnes, Richard H. (Cornell U, Div of Nutritional Sciences) **Protein malnutrition in the rat: Its effects on maternal behavior and pup development.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 551-561.—Used repeated time-lapse photographic observations to examine the maternal behavior and pup development of 8 female Holtzman rats maintained on either a low-protein (12% casein by weight) or a high-protein (25% casein) diet throughout the period of lactation. Dams fed the low-protein diet were observed to spend more time in the nesting area with their pups than dams fed the high-protein diet. Locomotor activity of the dams did not differ between the 2 groups. The behavioral development of the pups suckling the dams receiving the low-protein diet was markedly depressed compared with the controls. Results indicate that feeding a low-protein diet to a lactating dam results in behavioral changes in both the dam and pups that tend to minimize the exposure of the pups to the immediate environment. (20 ref)—*Journal abstract*.

11094. Mueller, R. A.; Millward, D. K. & Woods, J. W. (U North Carolina, Medical School, Chapel Hill) **Circulating catecholamines, plasma renin and dopamine-beta-hydroxylase activity with postural stress.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 757-761.—Studied changes in plasma renin activity, catecholamines, and dopamine-beta-hydroxylase (DBH) activity as a result of head-up tilt and low salt diet in 8 healthy, normotensive, 21-25 yr old male volunteers. Salt restriction and head-up tilt increased plasma renin activity, and these responses appeared to

summate. Head-up tilt increased plasma norepinephrine and epinephrine, but sodium restriction was without effect. Neither stimulus produced significant alterations in plasma DBH catalytic activity. No correlation between DBH activity and either circulating catecholamine was observed. Results indicate that plasma DBH catalytic activity is not a good indicator of acute relatively mild changes in sympathetic activity in humans. (23 ref)—*Journal abstract*.

11095. Popov, Pavel; Dimitrov, Yordan; Georgiev, Stanko & Iliev, Lyubomir S. ("K. Malkov" Agricultural Experimental Station, Plovdiv, Bulgaria) **Indigenous and foreign poppy varieties characterized by the morphine content of their dry capsules.** *Bulletin on Narcotics*, 1973(Jul-Sep), Vol 25(3), 51-56.—Suggests that hybrid combinations of various poppy plants may develop a new strain of plants with the highest morphine yield thus far obtained.

11096. Radcliffe, G. J. & Shelton, J. W. (Baylor Coll of Medicine, Houston, TX) **Molecular coding of maze learning: Demonstration by bioassay.** *Experientia*, 1974, Vol 30(11), 1284-1286.—Used the behavioral bioassay to investigate the molecular coding of maze learning in Swiss albino male mice. 3 experiments were conducted involving training Ss to run a maze, freezing and homogenizing their brains, and injecting the solution into untrained Ss. In all tests, the recipient Ss ran the maze faster than the untrained control group. The active material in the brain was shown to be inactivated by trypsin or chymotrypsin, indicating it is probably a peptide. Results indicate that the active material contained in the extracts of brain taken from maze-trained mice may encode a considerable amount of specific information. (French summary)—R. Tomasko.

11097. Roberts, Warren W. & Martin, James R. (U Minnesota, Minneapolis) **Peripheral thermoreceptor control of thermoregulatory responses of the rat.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1109-1118.—Describes a study of 60 Long-Evans male rats in which a warm cage floor or localized heaters in the subcutaneous fascia, nasal cavity, pharynx, esophagus, or abdominal cavity consistently elicited the grooming, locomotion, and tail vasodilation components of the S's heat-loss repertoire, but never the prone body extension component. All thresholds were below the cutaneous pain escape threshold, and most were below normal local temperatures during heat stress. Spatial summation was marked. It is concluded that peripheral thermoreceptors do not produce a general "heat drive," but preferentially activate grooming, locomotion, and vasodilation, leaving body extension dependent on central thermoreceptors. Thus, the relative proportions of extension and other responses are adjusted to the distribution of hyperthermia in the body, varying with the acuteness or chronicity, and the exogenous or endogenous origin, of the heat. (20 ref)—*Journal abstract*.

11098. Rommelspacher, Hans & Kuhar, Michael J. (Johns Hopkins U, Medical School) **Effects of dopaminergic drugs and acute medial forebrain bundle lesions on striatal acetylcholine levels.** *Life Sciences*, 1975(Jan), Vol 16(1), 65-70.—Experimental results suggest that the action of chlorpromazine, haloperidol, pimozide, and



apomorphine on the cholinergic system in the striatum of rats is primarily due to the drugs' action at dopamine receptors rather than a direct action on cholinergic receptors which would be due to their anticholinergic activity. (22 ref)

11099. Schwartzbaum, J. S. & Kreinick, Carol J. (U Rochester) **Electrophysiological and behavioral reactivity to photic stimuli following septal lesions and pharmacological treatments in rats.** *Journal of Comparative & Physiological Psychology*, 1975(Jan), Vol 88(1), 128-146.—Conducted 4 experiments, with a total of 86 male Holtzman albino rats, which investigated behavioral reactivity and cortical visual evoked response (VER) to photic stimulation. Analysis revealed 2 patterns of lesion-induced changes. One pattern of VERs reflected a hypoarousal electrophysiological condition. This pattern, present initially under all conditions, could be simulated with administration of scopolamine. A 2nd pattern of VERs developed gradually and appeared to reflect a hyperarousal electrophysiological condition. This pattern could be simulated with dextroamphetamine. While both lesion-induced electrophysiological patterns were associated with augmented behavioral reactivity to flashes, the hyperarousal pattern related to more intense conditions of stimulation and more sustained behavioral reactivity. Scopolamine, as opposed to dextroamphetamine, reproduced the heightened behavioral reactivity to the flashes. Results are interpreted in terms of a hypoarousal hypothesis of sensory hyperreactivity. (42 ref)—*Journal abstract*.

11100. Schwille, P. O.; Schellerer, W.; Reitzenstein, M. & Hermanek, P. (U Erlangen-Nürnberg, W Germany) **Hyperglucagonemia, hypocalcemia and diminished gastric blood flow: Evidence for an etiological role in stress ulcer of rat.** *Experientia*, 1974, Vol 30(7), 824-826.—Studied the effect of pancreatic glucagon (pGI) on the formation of mucosal lesions and ulcers in male SPF Wistar rats. Ss were divided into groups of intact, sham-operated, and adrenalectomized animals. Half of each were stressed by the restraint technique. Local oxygen pressure was measured by polarography and pGI by radioimmunoassay. Results indicate that stress induced mucosal lesions and that the pGI level in stressed Ss is elevated. The highest pGI occurs in adrenalectomized Ss during stress. (German summary)—*R. Tomasko*.

11101. Snyder, James J. & Levitt, Robert A. (Southern Illinois U, Carbondale) **Neural activity changes correlated with central anticholinergic blockade of cholinergically-induced drinking.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 75-79.—In 54 male Long-Evans rats, microinjections of carbachol into the septal area elicited water ingestion and increased multiple unit activity at this site and also the noninjected lateral hypothalamus. Carbachol injection into the lateral hypothalamus also elicited water ingestion, but multiple unit activity did not increase in this structure, although it did in the noninjected septal area. If carbachol was injected into one of these sites and isotonic saline into the other, increased multiple unit activity was still found. However, if carbachol was injected into one of these sites and atropine into the other, the increases in multiple unit activity were blocked. Carbachol-elicited drinking may result from

neural activity changes similar to those recorded in this study, and atropine may inhibit carbachol-elicited drinking by inhibiting such neural firing changes. (20 ref)—*Journal abstract*.

11102. Stinus, Louis; Thierry, Anne-Marie & Cardo, Bernard. (U Bordeaux, Talence, France) **Self-stimulation and local injections of 6-hydroxydopamine into the rat brain: Enhanced behavioral depressive effects of  $\alpha$ -methylparatyrosine.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 19-23.—Studied the effects of intracerebral injection of 6-hydroxydopamine (6-OHDA) on self-stimulation in 29 male Sprague-Dawley rats. Small amounts of 6-OHDA were injected either in the area ventralis tegmenti (AVT) or laterally in the pedunculus cerebellaris superior (PCS); then all Ss were implanted in the AVT. In spite of marked depletion of brain catecholamines, self-stimulation learning was not altered by PCS 6-OHDA injections, whereas, AVT 6-OHDA injections produced a small perturbation. The administration of low doses of AMPT which had no observable effect in control Ss, produced a severe depression of self-stimulation rates in 6-OHDA pretreated Ss. The depressive effect of AMPT is always more important in rats injected with 6-OHDA in the AVT than those injected at the level of PCS. The respective role of noradrenergic and dopaminergic neurons in AVT self-stimulation are discussed. (42 ref)—*Journal abstract*.

11103. Stone, T. W. (U Aberdeen, Marischal Coll, Scotland) **On the antagonism of ergot alkaloids and dopamine by phenothiazines.** *Experientia*, 1974, Vol 30(7), 827-829.—Discusses the mechanism responsible for the antagonism of LSD by the phenothiazines. Molecular models were constructed of both D-LSD and several phenothiazine derivatives. The models indicate the overlap area of the 2 types of molecules to cause antagonism by enabling each to act at the same receptor site. Implications are drawn for the potential identification of the primary cause of psychotic disorders by the investigation of the dopamine antagonist's molecular site of action. (French summary)—*R. Tomasko*.

11104. Szilávk, László & Tóth, Sándor. (Eötvös Lóránd U, Budapest, Hungary) **New headholder for sensory stimulation and stereotaxic operations in small animals.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 849-853.

11105. Vrbanc, J. J.; Tilson, H. A.; Moore, K. E. & Rech, R. H. (Michigan State U) **Comparison of 2,5-dimethoxy-4-methylamphetamine (DOM) and d-amphetamine for in vivo efflux of catecholamines from rat brain.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 57-64.—Compared the neurochemical effects of DOM and dextroamphetamine under several conditions in unanesthetized male albino Sprague-Dawley rats implanted with chronic-indwelling push-pull cannulae in a cerebral lateral ventricle. Brain catecholamine storage sites were previously pulse-labeled with  $^3$ C-norepinephrine administered intraventricularly. During the perfusion of the lateral ventricles with artificial cerebrospinal fluid, Ss were injected intraperitoneally with 1.5 mg/kg of DOM, 2.0 mg/kg of dextroamphetamine, or 1.0 ml/kg of isotonic saline. Results suggest DOM and dextroamphetamine share qualitatively similar effects in releasing and/or blocking the

reuptake of catecholamines at brain periventricular nerve terminals. Nevertheless, DOM appears to differ from dextroamphetamine in the temporal pattern of net catecholamine release. (25 ref)—*Journal abstract*.

11106. Zaborik, Donna M.; Maier, Steven F. & Pies, Ronald W. (Cornell U) **Preferences for tastes paired with recovery from thiamine deficiency in rats: Appetitive conditioning or learned safety?** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1083-1091.—Conducted a study of 80 male Sprague-Dawley rats to investigate earlier findings that rats develop learned preferences for flavors paired with recovery from vitamin deficiencies. Results show that thiamine deficient Ss preferred flavors paired with recovery from deficiency to other familiar flavors, suggesting that part of the preference for flavors paired with recovery was the result of appetitive conditioning. Data are discussed in relation to "learned safety," specific hungers, illness-induced neophobia, and other phenomena in the taste-aversion literature. (16 ref)—*Journal abstract*.

### Brain & Electrical Stimulation & Lesions

11107. Aghajanian, George K. & Davis, Michael. (Yale U, Medical School) **A method of direct chemical brain stimulation in behavioral studies using microiontophoresis.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 127-131.—Describes a method of microiontophoresis for direct chemical brain stimulation in chronic, awake animals. Carbachol-induced drinking was employed to test the method with 20 male albino Sprague-Dawley rats. Fluid-filled micropipettes (tip diameters: 5-15  $\mu$ ) were stereotaxically implanted in the region of the nucleus of the diagonal band. Up to 3 wks after recovery, ions could be ejected directly into the brains of awake Ss by passing a direct current through the pipette. Iontophoretic ejection of carbachol in doses as low as .05  $\mu$ g elicited drinking. This effect could be blocked by intraperitoneal injection of .5 mg/kg scopolamine. Passage of choline ions produced no detectable effect. The microiontophoretic technique allows direct chemical brain stimulation in chronic, awake animals without major changes in tonic or volume that can occur with crystalline or fluid implants through cannulae. (15 ref)—*Journal abstract*.

11108. Arikuni, T. & Ban, T. (Osaka U, Medical School, Japan) **Excitation and inhibition of hypothalamic neurons by cerebellar stimulation in rabbits.** *Experientia*, 1974, Vol 30(5), 504-505.—Studied 17 rabbits to elucidate further the effects of cerebellar stimulation on unitary activity in the hypothalamus. Electrodes were inserted in their cerebellums prior to electrical stimulation. Results show that in the 62 units recorded, the rate of spontaneous hypothalamic discharge in the control stage ranged from .5 to 38.7 spikes per second while stimulation within the cerebellum was excitatory in 22 units, inhibitory in 16 units, and evoked no response in the remaining 24 units. 2 criteria were used to evaluate the excitatory effect of cerebellar stimulation: (a) unitary spikes were evoked by stimulation and (b) the spontaneous firing rate increased 50-100% of the control rate during cerebellar stimulation and returned to the control rate when excitation ceased. It is concluded that the

inhibitory effect of cerebellar stimulation on hypothalamic neurons is due to a decrease or cessation of excitatory impulses to the hypothalamus. (German summary)—*R. S. Albin*.

11109. Armstrong, S. & Singer, G. (La Trobe U, Bundoora, Vic, Australia) **Effects of intrahypothalamic administration of norepinephrine on the feeding response of the rat under conditions of light and darkness.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 811-815.—Intrahypothalamic injections of norepinephrine were given to 34 male Wistar rats in high and low states of hunger, under conditions of light and darkness. A significant interaction between state of hunger, condition of photoperiod, and drug administration was found. Norepinephrine significantly facilitated feeding in the dark; this effect was more marked in the low hunger state than in the high hunger state. Conversely, norepinephrine significantly depressed feeding in the light, the depression being most marked in the high hunger state. Thus, condition of light is an important determinant of the effects of norepinephrine on feeding. Norepinephrine depressed food-associated drinking under all conditions. (30 ref)—*Journal abstract*.

11110. Atrons, Dale M. & Sinden, John D. (U Sydney, NSW, Australia) **Anatomically-dependent facilitation and inhibition of hypothalamic self-stimulation by food deprivation.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 225-231.—Investigated the effects of food deprivation on hypothalamic self-stimulation in 11 chronically implanted male guinea pigs in a free-operant shuttle-box situation which provided a rate-independent index of reward and an index of aversion. Food deprivation produced anatomically specific reward-modulation effects that were clearly dissociable from general activation or debilitation. All of the posterior electrodes showed increased reward, and all of the anterior electrodes showed decreased reward. In contrast, food deprivation generally exerted very little effect on the aversive component of hypothalamic electrical stimulation. (20 ref)—*Journal abstract*.

11111. Azulay, Alan & Schwartz, Arthur S. (U Florida, Coll of Medicine) **The role of the dorsal funiculus of the primate in tactile discrimination.** *Experimental Neurology*, 1975(Feb), Vol 46(2), 315-332.—Tested the role of the dorsal funiculus for tactile discriminations requiring active exploration of the stimulus object in 8 stump-tailed monkeys. Pairs of patterned disks were constructed with geometric designs of such size and shape as to require active palpation for successful discrimination. For comparison, other stimuli with tactile qualities which could be recognized by a more passive response topography were also used. Section of the dorsal funiculus resulted in severe, long-lasting deficits in discrimination of the patterned disks, while discrimination of the tactile qualities not requiring active exploration was retained. No significant motor impairment was observed. Lesions in the spinothalamic or spinocervical systems had no effect on either type of cutaneous discrimination. Results support the view that the afferents from the monkey hand which travel in the dorsal funiculus are critically and possibly exclusively involved in the perception of tactile stimuli requiring a spatiotem-



poral transformation by the introduction of movement. (30 ref)—*Journal abstract.*

11112. Bassett, J. R. & Cairncross, K. D. (Macquarie U, North Ryde, NSW, Australia) **Time course for plasma 11-hydroxycorticosteroid elevation in rats during stress.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 139-142.—Studied the time course of plasma 11-hydroxysteroid elevation in 2 stress situations; regular unsignaled footshock which produces an intermediate steroid elevation and irregular signaled footshock with the possibility of escape, which produces an extreme steroid elevation. Ss were male CSF rats. The initial time course for steroid elevation followed a similar pattern for both treatment groups with the exception that in the irregular signaled group the plasma steroid elevation was more pronounced and there was an indication of biphasic response.—*Journal abstract.*

11113. Benevento, L. A. & Fallon, James H. (U Illinois, Medical Ctr, Chicago) **The projection of occipital cortex to orbital cortex in the rhesus monkey (*Macaca mulatta*).** *Experimental Neurology*, 1975(Feb), Vol 46(2), 402-408.—Near total lesions of occipital cortex were made in 3 rhesus monkeys and the subsequent anterograde degeneration was analyzed using the Fink-Heimer technique. In addition to degenerated terminal endings seen in parietal, temporal, and frontal cortices, sparse to moderately dense pericellular and terminal degeneration was seen in posterior portions of ventral orbital cortex and the inferior prefrontal convexity (lateral orbital cortex). Results indicate that activity from the visual cortex may directly influence cells of the frontal orbital cortex. (17 ref)—*Journal abstract.*

11114. Bernard, Bruce K.; Berchek, James R. & Yutzey, David A. (U Connecticut) **Alterations in brain monoaminergic functioning associated with septal lesion induced hyperreactivity.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 121-126.—Rated 30 male albino Wistar rats on 3 consecutive days for reactivity to handling. Ss were then assigned to behaviorally equivalent groups and received either bilateral septal lesions or a sham operation. Following 2 days of recovery, all Ss received an additional behavioral testing session. Immediately following this last test, norepinephrine (NE) and dopamine (DA) levels, instantaneous rate constants (k), turnover times (TT), and utilization rates (K) as well as the levels of serotonin (5-HT) and 5-hydroxyindoleacetic acid (5-HIAA) in the hypothalamus, limbic system, cortex and pons-medulla were determined fluorometrically. Ss with septal lesions were significantly more reactive to handling, while the behavior of sham-operated controls remained essentially unchanged. Significant reductions in hypothalamic NE and DA and limbic DA were observed in the septal lesion Ss. Catecholamine, 5-HT, and 5-HIAA levels in other brain parts were unaffected. Results support the hypothesis of a catecholaminergic involvement in affective behavior but do not demonstrate any alteration in the functional dynamics of the brain monoamines associated with the hyperreactivity induced by septal lesions. (29 ref)—*Journal abstract.*

11115. Bhargava, Hemendra N.; Chan, S. L. & Way, E. Leong. (U California, Medical School, San Francisco) **Influence of hemicholinium (HC-3) on morphine analge-**

**sia, tolerance, physical dependence and on brain acetylcholine.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 253-261.—Administered HC-3 intracerebrally in male Swiss-Webster mice at a dose which reduced brain acetylcholine (ACh) without any change in choline (Ch) levels. HC-3 antagonized morphine antinociception slightly as measured by inhibition of the tail-flick response, in both naive Ss and in Ss rendered tolerant to and dependent on morphine by pellet implantation. However, the development of tolerance to morphine and of dependence on morphine were not affected by HC-3. Although naloxone-precipitated withdrawal jumping was enhanced irrespective of whether the HC-3 was administered before or after the dependence on morphine had developed, body weight loss during abrupt withdrawal was unaffected by HC-3. Results indicate that although some of the acute and withdrawal effects of morphine may be associated either directly or indirectly with acetylcholine, these actions do not appear to be the primary process responsible for initiating the development of tolerance and dependence. (27 ref)—*Journal abstract.*

11116. Brus, R.; Herman, Z. S. & Kostman, F. (Silesian School of Medicine, Inst of Biology & Physiology, Zabrze, Poland) **Behavioral effects of norepinephrine and dibutyl 3', 5' AMP in centrally sympathectomized rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 719-724.—In experiments with a total of 94 male Wistar rats, Ss were injected intraventricularly with 2 doses of 250 µg of 6-hydroxydopamine (6-OHDA) at a 48-hr interval. 7 days after the 2nd injection, 50 µg of norepinephrine (NE) or 100 µg of dibutyl cyclic 3', 5' adenosine monophosphate (DCAMP) were injected intraventricularly. There were no differences in gross behavior, but an increase in irritability was observed in Ss treated with 6-OHDA compared with controls. NE increased locomotor activity and irritability. Chemical sympathectomy intensified locomotor excitation and irritability caused by NE. DCAMP caused an increase of locomotor activity, irritability, and convulsions 30 min after injection. These behavioral phenomena were intensified in Ss treated with 6-OHDA. It is suggested that 6-OHDA sensitized the central nervous system to action of NE and DCAMP. (33 ref)—*Journal abstract.*

11117. Chalmers, Donald V. & Levine, Seymour. (Stanford U, Medical School) **The development of heart rate responses to weak and strong shock in the preweaning rat.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 519-527.—Studied heart rate (HR) responses to 2 intensities (.2 and 2.0 ma) of electric shock in 63 rat pups at age 5, 7, 9, 11, 13, 15, 17, 19, and 21 days. Both weak and strong shock elicited at least some HR acceleration at all ages. Beginning on Day 13, a deceleratory component was added to the response to weak shock. HR acceleration was significantly greater in response to strong shock on Days 5 and 7 and then again from Days 15-21. Strong shock also elicited a relatively long-latency bradycardia beginning with Day 11. Results are discussed in terms of the emergence of 3 response tendencies: (a) the orienting reflex, (b) the defensive reflex, and (c) a change in the state of the organism. Their possible implications for the study of preweaning

shock on subsequent behavior are also discussed. (22 ref)  
—*Journal abstract.*

11118. Cooper, Anthony. (Miami U) **Effects of accessory olfactory bulb lesions on the sexual behavior of male mice.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 419-420.—2 groups ( $N = 25$ ) of sexually inexperienced male C57 BL/6J mice received lesions to their olfactory bulbs. One group received bilateral lesions in the area of the accessory olfactory bulbs, and the other received lesions of similar size but positioned more anteriorly. Subsequent to the operation, Ss of both groups were found to exhibit lower levels of sexual behavior than did a control group. Although no effect specific to the lesioning of the accessory bulbs was found, the study shows that olfactory bulb lesions of very limited extent can disrupt the sexual behavior of the male mouse without causing the S to become anosmic.  
—*Journal abstract.*

11119. Deutsch, J. A. & Dennis, Stephen G. (U California, San Diego) **Adaptation of aversive brain stimulation: Effects of pulse frequency.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 245-250.—4 male Sprague-Dawley rats with electrodes implanted in the medial lemniscus were trained to terminate intermittent electrical pulse trains by pressing a lever. These Ss also maintained responding when the leverpress produced a continuous pulse train, but only at the higher pulse frequencies tested. This is taken to be evidence of frequency-dependent adaptation of central aversive stimulation. (18 ref)—*Journal abstract.*

11120. Domino, Edward F.; Wilson, Ann E. & Olds, Marianne E. (U Michigan) **Relation of rat brain acetylcholine levels to duration of self-stimulation and escape behavior.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 103-107.—Describes experiments with 220 male albino Holtzman rats in which total brain acetylcholine (ACh) was assayed in groups of Ss after periods of operant responding maintained by electrical stimulation of the lateral posterior hypothalamus or of escape behavior induced by electrical stimulation of the midbrain tegmentum. Brain stimulation decreased total brain ACh, regardless of whether the stimulation was positive or negative. Ss that received positive stimulation while being paralyzed showed similar decreases in total brain ACh, but the change in ACh was smaller. No changes occurred in Ss that were paralyzed that received no electrical stimulation. It is concluded that brain usage produced by electrical stimulation of discrete functional pathways causes a reduction of total ACh, but this is unrelated to the reduction of total ACh, but this is unrelated to the specific motivational properties of the electrical stimuli. (29 ref)—*Journal abstract.*

11121. Garbarg, Monique; Barbin, Gilles; Feger, Jean & Schwartz, Jean-Charles. (Inst National de la Santé & de la Recherche Médicale, Paris, France) **Histaminergic pathway in rat brain evidenced by lesions of the medial forebrain bundle.** *Science*, 1974(Nov), Vol 186(4166), 833-835.—Cites research which suggests a role for brain histamines analogous to other biogenic amines, such as catecholamines and serotonin, and that histamine is a central neurotransmitter. The present experimental evidence shows that diencephalic lesions involving the medial forebrain bundle induce a decrease in histamine

and l-histidine decarboxylase activity in a manner suggesting that it is due to degeneration of histaminergic fibers in the telencephalon which comprise the bulk of the ascending noradrenergic and serotonergic fibers. (38 ref)

11122. Glick, Stanley D. (Mt Sinai School of Medicine, City U New York) **Recovery of function and changes in sensitivity to amphetamine following caudate lesions in rats.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 239-244.—Trained 12 female Sprague-Dawley albino rats to barpress for water reinforcement. 8 Ss were administered various doses of intraperitoneal dextroamphetamine both before and 6-8 wks after bilateral lesions of the caudate nucleus. Preoperatively, low doses (.25-.5 mg/kg) increased responding and high doses (2.0-4.0 mg/kg) depressed responding. Postoperatively, the dextroamphetamine dose-response curve was shifted to the left in Ss with small caudate lesions and shifted to the right in Ss with larger caudate lesions. Although both lesions produced initial impairments of barpressing rates, only the larger lesion resulted in a persistent impairment. The lesion-induced hyper- and hyposensitivity to dextroamphetamine were, therefore, associated with greater and lesser degrees of functional recovery, respectively.  
—*Journal abstract.*

11123. Goldstein, Melvin L. (Indiana U, Kokomo) **The effect of amygdectomy on long-term retention of an undertrained classically conditioned fear response.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 548-550.—16 male hooded rats trained in the classical conditioning fear response were subjected to amygdectomy 24 hrs after conditioning and were tested for retention 4 days and 4-7 wks postoperatively. Results indicate that amygdectomy disrupted the intermediate and long-term retention of the classically conditioned fear response. There was no recovery of performance after the amygdectomy. Data confirm previous reports of retention deficits after amygdectomy in undertrained Ss, but do not corroborate previous reports of recovery of function, with additional training, after amygdectomy.—*Journal abstract.*

11124. Hodos, William & Bonbright, James C. (U Maryland) **Intensity difference thresholds in pigeons after lesions of the tectofugal and thalamofugal visual pathways.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1013-1031.—Obtained visual intensity difference thresholds from 11 White Carneaux pigeons before and after thalamic lesions. Ss with lesions in nucleus rotundus (the thalamic component of the tectofugal pathway) showed moderate postoperative threshold elevations. After extensive retraining the thresholds returned to the preoperative value. Ss with lesions in the nucleus opticus principalis (OPT), the thalamic component of the thalamofugal pathway, had smaller postoperative threshold elevations than the nucleus rotundus cases, but the deficit did not diminish after extensive retraining. Ss with combined lesions of both pathways (OPT + rotundus) had severe postoperative threshold elevations, which declined with retraining to the level of the Ss with OPT lesions, but not to the preoperative level. (36 ref)  
—*Journal abstract.*



11125. Hole, Kjell & Lorens, Stanley A. (U Bergen, Norway) **Response to electric shock in rats: Effects of selective midbrain raphe lesions.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 95-102.—Reports that the forebrain serotonin (5-hydroxytryptamine; 5-HT) concentrations of 16 Möll-Wistar rats with lesions in the median (M), dorsal (D), or both (DM) midbrain raphe nuclei were, respectively, 22, 48, and 70% lower than in 10 control animals. The lesion and control groups, however, did not evidence differences in pain sensitivity as measured by the flinch-jump technique. Those Ss with M and DM lesions required more trials than controls to acquire a one-way avoidance response. D lesion rats did not differ from controls in one-way avoidance learning, except in terms of prolonged escape latencies during the 1st 3 trials. The previously reported increased sensitivity to painful stimuli subsequent to medial forebrain bundle lesions or para-chlorophenylalanine administration, therefore, does not appear to be due exclusively to disruption of ascending 5-HT fibers originating in the dorsal and median raphe nuclei. (32 ref)—*Journal abstract*.

11126. Johansson, Gunnar G.; Kalimo, Raija; Niskanen, Harri & Ruusunen, Selja. (U Helsinki, Finland) **Effects of stimulation parameters on behavior elicited by stimulation of the hypothalamic defense area.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1100-1108.—Elicited agonistic behavior by stimulating the ventromedial hypothalamus of 22 domestic cats. 12 different behavioral components were rated separately. Behavioral alerting, mydriasis, retraction of ears, piloerection, hissing, and protrusion of claws were the most characteristic components. The parameters of the stimulus were shown to be important determinants of the nature of the behavior. Results suggest that either discrete central neural circuits for the different components of agonistic behavior are diffusively organized within the ventromedial hypothalamus, or the components result from a general activation of neurons subserving discrete fixed-action patterns, the resultant behavior being determined by different factors, such as the intensity of the activation. (28 ref)—*Journal abstract*.

11127. Kaelber, W. W. et al. (U Iowa) **Centrum medianum-parafascicularis lesions and reactivity to noxious and non-noxious stimuli.** *Experimental Neurology*, 1975(Feb), Vol 46(2), 282-290.—Trained 15 adult cats to escape electrical stimuli delivered to the pulp of the upper left canine tooth and to press a lever to obtain food. Subsequently, electrolytic lesions were produced in the medial thalamus. Ss were again tested 2-3 wks later. In addition they were trained in an avoidance conditioning paradigm, using grid shock delivered to the paws as the unconditioned stimulus. There was no correlation between the effect of the lesion on noxious vs nonnoxious stimuli; all operated Ss learned to avoid the grid shock when a warning signal appeared. In addition, it appears that destruction of the rostral portion of the nuclei centrum medianum and parafascicularis is most critical for abolishing the escape response to tooth pulp stimulation.—*Journal abstract*.

11128. Knispel, Joel D. & Siegel, Jerome. (U California, Mental Retardation Ctr, Los Angeles) **Habi-**

**tuation of aversive reticular stimulation effects on evoked potentials.** *Brain Research*, 1973, Vol 56, 340-344.—In 3 chronic cats late components of the cortical evoked potential (EP) to a light flash or shock of the optic tract were modified by preceding reticular stimulation, which in previous sessions had been found to elicit behavior indicating aversion. The changes in the EP are proposed as a sensitive central indicator of aversion. In a 2nd session which followed a re-adaptation period to pretest levels of EP amplitudes, reticular stimulation had less effect on EP amplitude. (25 ref)—B. Preilowski.

11129. Lucas, E. A. & Sterman, M. B. (U Arkansas, Medical Ctr, Little Rock) **Effect of a forebrain lesion on the polycyclic sleep-wake cycle and sleep-wake patterns in the cat.** *Experimental Neurology*, 1975(Feb), Vol 46(2), 368-388.—Tested the hypothesis that regulation of a polyphasic sleep-wake cycle in the cat is directed in large part by structures in the basal forebrain region. 11 cats were trained to produce an operant EEG response for food to assess behavioral periodicity. Electrographic data were analyzed for sleep-wake patterns, mean periodicity of the REM and operant performance (basic rest-activity) cycle and polyphasic sleep-wake cycle. Bilateral lesions placed in the basal forebrain markedly suppressed expression of sleep for more than 3 wks. These lesions significantly shortened the mean periodicity of the polyphasic sleep-wake cycle, but not that of the basic rest-activity cycle. Data support the hypothesis that basal forebrain structures are involved in the genesis and control of slow-wave sleep and the polyphasic sleep-wake cycle. (38 ref)—*Journal abstract*.

11130. Mareš, Pavel. (Czechoslovak Academy of Sciences, Prague) **Bioelectrical activity of an epileptogenic focus in rat neocortex.** *Brain Research*, 1973, Vol 56, 203-213.—Conducted an experiment on 45 unanesthetized male rats, in which the bioelectrical activity of a neocortical epileptogenic focus produced by the application of penicillin to the frontal, temporal, or occipital region of the cortex was recorded. The discharges from the primary foci had the same basic shape, irrespective of the site of the focus. The only difference was found in afterdischarges, the low incidence of which in the temporal region is probably due to poorer thalamocortical connections in this zone. Marked differences were found between the various regions in the shape of the projected discharge of the mirror focus, and hence in the manner of activation of the contralateral cortex. (29 ref)—*Journal summary*.

11131. Massotti, M.; Scotti de Carolis, A. & Longo, V. G. (Istituto Superiore di Sanità, Lab di Chimica Terapeutica, Rome, Italy) **Effects of three dihydroxylated derivatives of tryptamine on the behavior and on brain amine content in mice.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 769-775.—Investigated the effects on behavior and on cerebral bioamine content in 3 dihydroxylated tryptamine derivatives (5,6-DHT, 5,7-DHT and 6,7-DHT) administered intracerebrally to a total of 650 mice. Both 5,6-DHT and 5,7-DHT caused a 50-70% lowering of 5-hydroxytryptamine (5-HT) content in whole brain which lasted for the entire experimental period (20 days). 5,6-DHT and 5,7-DHT differed in their effects on norepinephrine (NE)

and dopamine (DA). While the former induced a DA diminution to an extent comparable to that observed for 5-HT and a rise in NE, the latter induced a lowering of NE and affected DA only slightly. 5,6-DHT decreased spontaneous activity of treated Ss at 21 and 43  $\mu$ g; the effect was dose-related. 5,7-DHT diminished spontaneous activity only at 43  $\mu$ g. Following either 5,6-DHT or 5,7-DHT, 5-hydroxytryptophan induced an exaggerated tremorigenic response; this potentiation may be related to an impaired uptake of 5-HT by the terminals. 6,7-DHT, while more toxic than the other 2 drugs, showed a much weaker effect both on brain amines content and on behavior. (18 ref)—*Journal abstract*.

11132. McEwen, G. N. (NASA, Ames Research Ctr, Moffett Field, CA) **A universal bird head-holder for stereotaxic surgery.** *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 657-658.—Describes a head-holder which can accommodate several different sizes of birds with different beak configurations. The apparatus is basically simple and easily machined. (French summary)

11133. Nir, I.; Weller, C. P. & Sulman, F. G. (Hebrew U, School of Pharmacy, Jerusalem, Israel) **Behavioural effect of intraventricular application of methoxy-indolealkylamines in the rat.** *Psychopharmacologia*, 1974, Vol 39(4), 323-329.—Behavioral profiles of 23 biogenic tryptamine derivatives and related compounds were determined by injecting the substances into the lateral ventricles of unanesthetized male Sabra strain rats using the Feldberg technique. The synthetic compound 5,6,7-trimethoxy-N-dimethyl-tryptamine (TNDT) acted quite differently from all the other biogenic tryptamines studied, having a marked behavioral effect with lack of interest in the surroundings and induction of palpebral ptosis but no inhibition of spontaneous activity. It raised the level of emotionality in Ss with conditioned fear responses and, moreover, the effects of TNDT persisted for more than 10 days as opposed to an active period of only 2-3 hrs obtained with the other tryptamines. The possibility that TNDT may be produced by an inborn error of enzyme formation in human psychotics is considered.—*Journal abstract*.

11134. Ott, T.; Schmitt, M.; Krug, M. & Matthies, H. (Medizinische Akademie Magdeburg, Inst für Pharmakologie und Toxicologie, Leipziger, E Germany) **Intrahippocampal injection of chemicals: Analysis of spread.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 715-718.—Investigated the spreading of solutions of chemicals in the brains of 21 male Wistar rats after topical cerebral injection (TCI). Detection of radioactivity in different brain regions after intrahippocampal injection of  $^3$ H-otic acid revealed a distribution pattern that cannot be explained by radial diffusion of the substance from the site of injection. The EEG flattening induced by application of potassium chloride (spreading depression) was used as an additional index of the distribution of a chemical after injection into the hippocampus. The biochemical and electrophysiological experiments showed 2 ways of spread to be of importance to the distribution pattern under the experimental conditions chosen: (a) spreading by transport up the outside of the implanted microcannula and (b) flow back of the substance into the ventricular system with

subsequent diffusion into adjacent brain structures. This type of distribution was almost independent of the physicochemical properties of the substance injected. Therefore, when using TCI, it should be taken into consideration that the substance might spread into other brain areas. (17 ref)—*Journal abstract*.

11135. Pasik, Tauba & Pasik, Pedro. (Mt Sinai School of Medicine, City U New York) **Extrageniculate vision in the monkey: IV. Critical structures for light vs. no-light discrimination.** *Brain Research*, 1973, Vol 56, 165-182.—14 monkeys (*Macaca mulatta*) were able to relearn a light/no light discrimination after complete bilateral excision of striate cortex and partial ablation of areas 18 and 19. Additional bilateral lesions of the temporal neocortex, or posterior parahippocampal and retrosplenial allocortex, or pulvinars, or superior colliculi did not interfere significantly with the relearned habit. When the additional damage involved the superior colliculi and medial pretectum, there was a major discrimination deficit, but eventually these Ss could reach the criterion level. Only when the lateral pretecal region was included in the later lesion was there a failure to master the test in 6,000 trials of postoperative testing. The effective damage caused severe bilateral degeneration of the nucleus of the accessory optic tract. The accessory optic system is seen to be a main source of visual input for the capacity to perform luminous flux discrimination tests in the absence of striate cortex. (40 ref)—*Journal summary*.

11136. Pert, Agu & Yaksh, Tony. (Biomedical Lab, Edgewood Arsenal, MD) **Localization of the antinociceptive action of morphine in primate brain.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 133-138.—Microinjections of morphine sulfate (20-40  $\mu$ g) were made into various subcortical regions of the brains of 7 rhesus monkeys. The effects of these injections were evaluated on the nociceptive threshold as defined by the shock titration technique. Results indicate that the region of maximal antinociceptive sensitivity to morphine in the primate is the periventricular-periaqueductal gray matter. It is tentatively suggested that morphine lowers that affective tone or the aversive component of pain by its action on the midbrain central gray and periventricular areas—both important projection and integration areas of the extralemniscal somatosensory system. (36 ref)—*Journal abstract*.

11137. Price, Marion T. & Fibiger, Hans C. (U British Columbia, Div of Neurological Sciences, Vancouver, Canada) **Apomorphine and amphetamine stereotypy after 6-hydroxydopamine lesions of the substantia nigra.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 249-252.—Bilateral lesions of the substantia nigra with 6-hydroxydopamine abolished amphetamine-induced stereotypy in 21 male Wistar rats, compared to 11 controls, but potentiated the stereotypic effects of apomorphine. The lesions reduced neostriatal dopamine to less than 2% of the control value. These observations are at variance with a recent report by B. Costall et al (1972) in which it was found that bilateral electrolytic lesions of the substantia nigra abolished apomorphine-induced stereotypy but did not affect amphetamine stereotypy. The present data point to the questionable value of attempting to interpret the behavioral conse-



quences of lesions to central catecholamine neurons in the absence of either biochemical or histochemical verification. Data support the view that amphetamine acts indirectly by increasing the release of catecholamines, while apomorphine directly stimulates central dopamine receptors. (15 ref)—*Journal abstract*.

11138. Rose, James D. & Sutin, Jerome. (Dartmouth Coll) **Effects of lesions in the lateral medulla on mating and responses to genital stimulation in female cats.** *Brain Research*, 1973, Vol 56, 350-354.—Lesions of the lateral reticular nucleus and lateral tegmental field in 6 cats attenuated or abolished the estrous cry and after-reaction to mating and vaginal probing. Lateral tail deflection, lordosis, and treading were not impaired, and spontaneous vocalization and general affective responsiveness to nociceptive stimuli were not affected.—*B. Preilowski*.

11139. Roy, J. C.; Delerm, B. & Granger, L. (U Lille, Lab de Psychophysiologie, Villeneuve d'Ascq, France) **[Bulbar inhibition of skin potential responses in the cat.]** (Fren) *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 621-632.—Skin potential responses (SPR) elicited by stimulation of the mesencephalic reticular formation are inhibited by simultaneous stimulation of the bulbar reticular formation. The mechanisms of this inhibition, its anatomical origin, and its pathways were studied in 40 anesthetized cats. Results show that the inhibitory points are located within the posterior gigantocellular nucleus, the paramedian reticular nucleus, and the ventral reticular nucleus. Partial lesions of the spinal cord, ipsilateral to the stimulated bulbar area, suppress the inhibition of SPR recorded from the ipsilateral hind paw. The effects on blood pressure of stimulating the bulbar inhibitory areas confirm the functional heterogeneity of the bulbar inhibitory structures. The inhibition of SPR through bulbar stimulation is accompanied, in very lightly anesthetized Ss, by strong cortical arousal; hence it is concluded that SPR inhibition is not a result of diffuse depression of the mesencephalic activating system. (39 ref)—*English summary*.

11140. Schultze, Maribeth J. & Stein, Donald G. (Clark U) **Recovery of function in the albino rat following either simultaneous or seriatim lesions of the caudate nucleus.** *Experimental Neurology*, 1975(Feb), Vol 46(2), 291-301.—Studied acquisition of spatial alternation performance and passive avoidance behavior following seriatim lesions of the caudate nucleus in 35 male albino Charles River CD rats. Lesions of the caudate nucleus were created by electrocoagulation, either bilaterally at 1 operation or in 2 sequential unilateral stages with a 25-day interlesion interval. 10 Ss having 1-stage caudate lesions were impaired on spatial alternation when compared with 14 2-stage and 11 sham-operated Ss. Ss with 2-stage lesions were better on passive avoidance than Ss with 1-stage lesions and sham-operated controls. These latter differences could not be accounted for by shock threshold or water consumption differences. There were no differences in the extent of the lesions between Ss that were subjected to 1- and 2-stage operations. Findings indicate that significant functional differences are produced by 1-stage vs 2-stage

lesions of the rat caudate nucleus. (25 ref)—*Journal abstract*.

11141. Sinnamon, Harry M. & Schwartzbaum, J. S. (U Rochester, Medical Ctr) **Dorsal hippocampal unit and EEG responses to rewarding and aversive brain stimulation in rats.** *Brain Research*, 1973, Vol 56, 183-202.—Both rewarding and aversive brain stimulation can produce strong theta responses in the dorsal hippocampus of the rat and nonspecific increases or decreases in the activity of most units. A selectivity of the hippocampal response is indicated by changes in fast EEG activity and in the activity of a relatively small number of units. (42 ref)—*Journal abstract*.

11142. Spiro, Robert T. & Kolbert, Gerald S. (Austen Riggs Ctr, Stockbridge, MA) **A new technique for visual deprivation.** *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 654-656.—Describes a new procedure for functional visual deprivation which consists of splitting both the upper and lower lid margins from the medial to lateral canthus, forming 2 lamellae—an anterior skin muscle layer and a posterior tarsoconjunctival layer. The technique is permanent, uncomplicated to implement, and requires no postoperative care; it is also superior to lid suture alone when both functional and complete light deprivation are required. (French summary)

11143. Squire, Larry R. (VA Hosp, La Jolla, CA) **A stable impairment in remote memory following electroconvulsive therapy.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 51-58.—20 38-72 yr old psychiatric inpatients receiving a course of electroconvulsive therapy (ECT) for relief of depressive illness were given a test of remote memory for public events covering the years 1940-1969. An impairment in remote memory, covering nearly the entire time period sampled by the test, developed during the 1st 5 treatments. This impairment was present during the 1st hr after the 5th treatment and persisted unchanged for at least 24 hrs thereafter. ECT did not affect performance on the verbal portion of the WISC. Apparently, the amnesia produced by ECT can involve a large portion or perhaps all of remote memory, in addition to recent memory. The relevance of these results to the neural substrates underlying storage and recall is discussed. (French & German summaries) (37 ref)—*Journal abstract*.

11144. Trulson, Michael; Nicolay, John & Randall, Walter. (Princeton U) **Abnormalities in grooming behavior and tryptophan hydroxylase activity in the superior colliculi in cats with pontile and frontal neocortical lesions.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 87-94.—In an experiment with 26 adult male cats, Ss with pontile or frontal neocortical lesions displayed a dissociation of the appetitive and consummatory components of grooming behavior when their body surface was tactually stimulated, an abnormal behavior that waxes and wanes with the seasons of the year. Tryptophan hydroxylase activity was significantly decreased in the superior colliculi of Ss with pontile lesions and of Ss with frontal neocortical lesions. Results suggest that the change in tryptophan hydroxylase activity is mediated neuronally and is a transneuronal effect on the serotonergic input to the superior colliculi. Pharmacological manipulations of the serotonergic

system in normal Ss failed to induce the abnormal behavior, indicating that other factors are involved in the genesis of the abnormal behavior. (47 ref)—*Journal abstract*.

11145. Türker, M. N. & Türker, R. K. (Ankara U, Dental Faculty, Turkey) **A study on the peripheral mediators of dental pain.** *Experientia*, 1974, Vol 30(8), 932-933.—Studied the role of the release of bradykinin and prostaglandin-like material from the tooth pulp in dental pain. Bipolar electrodes were implanted in 16 adult dogs. The stimulation of dentine by these electrodes produced a pain reaction as well as a release of bradykinin and prostaglandin-like chemicals from the tooth pulp. The effect of aprotinin (Trasylol) and indomethacin on such release is discussed. The former, but not the latter, significantly increases the pain threshold induced by dentine stimulation. It is considered unlikely that prostaglandins act directly by stimulating sensory nerve endings, but they might sensitize the nerve endings to bradykinin. (German summary)—R. S. Albin.

### Drug Effects

11146. Abernathy, Charles O.; Lukacs, Lorinc & Zimmerman, Hyman J. (VA Hosp, Washington, DC) **Toxicity of tricyclic antidepressants to isolated rat hepatocytes.** *Biochemical Pharmacology*, 1975(Feb), Vol 24(3), 347-350.—Tests for cytotoxicity showed the relative potency of tricyclic antidepressants to be chlorimipramine > amitriptyline > nortriptyline > desipramine > protriptyline > imipramine. Chlorimipramine was the most cytotoxic and 10 times more potent than imipramine. The relevance of these effects in vitro to hepatic injury in clinical circumstances remains to be determined. (25 ref)

11147. Adams, R. G. (Vale Drive Clinic, Barnet, England) **Pre-sleep ingestion of two hypnotic drugs and subsequent performance.** *Psychopharmacologia*, 1974, Vol 40(2), 185-190.—Administered 2 dose levels of 2 depressant drugs, nitrazepam and butobarbitone, and a placebo under presleep, blind conditions to 12 healthy, individually tested Ss. Ss attempted 5 15-min tasks in a balanced, latin-square design. The high dose of each drug increased the time on task decline in a short-term memory (STM) task. STM did not show a definite time of day effect. Proofreading was superior in the morning, but concept identification was faster in the afternoon. Results imply that an appropriate short test, such as STM, can detect the effect of an hypnotic drug administered to induce sleep.—*Journal abstract*.

11148. Ahlenius, Sven & Engel, Jörgen. (U Göteborg, Sweden) **Behavioral stimulation induced by ethanol withdrawal.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 847-850.—Describes a model for the study of an ethanol withdrawal syndrome on operant behavior. 4 male Sprague-Dawley rats maintained on 16% w/v solutions of ethanol for several months were trained to perform on a differential reinforcement of low rates schedule. On withdrawal of ethanol the interresponse times were significantly shortened concomitant with an increase in the total number of responses, compared to the 11 control Ss ( $p < .01$ ).—*Journal abstract*.

11149. Ambrozil, L. (Vienna Municipal Ctr for the Handicapped, Austria) **[Contribution to the objectivization of data in psychopharmacology.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 376-377.—Discusses psychopharmacological research and the clinical psychologist's important contribution, through independent and objective measurements and data, to obtaining objective research results. The various methods and procedures used (tests, questionnaires, etc.) are briefly surveyed and evaluated. (English summary)

11150. Ayd, Frank J. (Taylor Manor Hosp, Ellicott City, MD) **Side effects of depot fluphenazines.** *Comprehensive Psychiatry*, 1974(Jul-Aug), Vol 15(4), 277-284.—Reviews reported side effects from the use of fluphenazine enanthate and fluphenazine decanoate in 300,000 users over a 9-yr period. These drugs are considered as safe as any potent neuroleptic.

11151. Azbekiy, S. G. & Lapin, I. P. (Bekhtereva Psychoneurological Inst, Leningrad, USSR) **[The effect of serotonergic and adrenergic preparations upon alcohol-induced excitation in mice.]** (Russ) *Farmakologiya i Toksikologiya*, 1974(Jul-Aug), Vol 37(4), 393-396.—Tested the effects of a series of serotonergic and adrenergic preparations, introduced intraperitoneally, on alcoholic excitation induced in mice by the administration of ethanol (1.0, 1.5, and 2.0 mg/g). The amount of locomotion and of rearing onto the hind legs were measured for 3 min, 15 min after the introduction of ethanol, as indicators of alcoholic intoxication. From the different effects of the substances it is concluded that serotonergic structures are primarily involved in the excitatory effect of ethanol on locomotion. (English summary)—A. G. Pook.

11152. Barker, Jeffrey L. (NIH, National Inst of Child Health & Human Development, Bethesda, MD) **Activity of CNS depressants related to hydrophobicity.** *Nature*, 1974(Nov), Vol 252(5478), 52-54.—Analyzed data derived from vertebrate and invertebrate preparations. It was determined that much of the depression of central nervous system excitability noted following administration of ethanol, urethane, chloralose, chloroform, pentobarbital, or diphenylhydantoin is due to a selective depression of postsynaptic mechanisms and is correlated with hydrophobicity. (47 ref)

11153. Barnett, Allen; Goldstein, Jeffrey; Fiedler, Ellen & Taber, Robert. (Schering Corp, Bloomfield, NJ) **Etonitazine-induced rigidity and its antagonism by centrally acting muscle relaxants.** *European Journal of Pharmacology*, 1975(Jan), Vol 30(1), 23-28.—Conducted studies with male Sprague-Dawley rats to characterize etonitazine-induced rigidity of the trunk and limb musculature more fully, to compare the degree of rigidity with that produced by morphine, codeine, and methadone, and to assess the sensitivity of this rigidity to centrally acting muscle relaxants. Of the 4 narcotics tested, subcutaneous etonitazine was far more potent than methadone or morphine for producing rigidity; codeine did not produce comparable peak rigidity. Etonitazine-induced rigidity occurred at a supraspinal level since the effect was prevented by spinal transection. Etonitazine-induced rigidity was prevented by the narcotic antagonists cyclazocine, pentazocine, and na-



loxxone but not by the serotonin depletor, p-chlorophenylalanine. Etonitazine-induced rigidity was antagonized by centrally acting muscle relaxants, including diazepam, methocarbamol, carisoprodol and zoxazolamine. —*Journal abstract.*

11154. Beaton, J. M.; Pegram, G. V.; Smythies, J. R. & Bradley, R. J. (U Alabama, Medical Ctr) **The effects of nicotinamide on mouse sleep.** *Experientia*, 1974, Vol 30(8), 926-927.—Half of 30 adult, male, random-bred Swiss mice were injected daily with saline and the other half with 250 mg/kg nicotinamide. On Day 19, Ss were implanted with 4 cortical electrodes, and injections continued daily. Beginning with Day 22, EEGs were recorded and REM sleep was shown to have increased significantly for Ss treated with nicotinamide. A 2nd experiment confirmed these findings. Results are discussed in terms of their implications for the usage of niacin (nicotinic acid) in treating schizophrenia. It is suggested that high doses of nicotinamide may have behavioral effects unconnected with its role as a vitamin. (French summary)—*R. S. Albin.*

11155. Beecham, I. J. & Handley, Sheila L. (U Aston, Pharmacological Lab, Birmingham, England) **Potentiation of catalepsy induced by narcotic agents during Haffner's test for analgesia.** *Psychopharmacologia*, 1974, Vol 40(2), 157-164.—Morphine and tail-clip catalepsy were antagonized by nalorphine and atropine, although haloperidol catalepsy was abolished in the presence of the clip. It is suggested that morphine must have at least 2 sites of action in producing catalepsy to account for these results.

11156. Bonnet, Kenneth A. & Peterson, Karen E. (New York U, Medical School) **A modification of the jump-finch technique for measuring pain sensitivity in rats.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 47-55.—Considers that the jump-finch procedure provides a sensitive alternative to the hot-plate and tail-flick procedures. Analysis of the components of motor responses to increasing intensity of foot shock presentation was performed to identify 5 reliably elicited categories of unlearned responses to inescapable foot shock. Morphine sulfate differentially altered response category thresholds in rats. Response category thresholds also differed between Wistar and Fisher strain rats in analgesic effects of morphine sulfate. (17 ref)—*Journal abstract.*

11157. Brookshire, Kenneth H. (Franklin & Marshall Coll) **Function of the "onset of illness" in the preference changes of alloxan-diabetic rats.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1069-1072.—144 male Sprague-Dawley rats were given access to saccharin or NaCl solutions as a conditioned stimulus (CS) at 1 of several times before and after injection with alloxan as an unconditioned stimulus (UCS) and were compared with controls (given UCS but no CS exposure) on their preference for the CS 7 days after the diabetes was well established. Results indicate that Ss exposed to the UCS at 1 or 2 hrs prior to the CS or at 1, 2, or 6 hrs following the CS all formed a conditioned aversion, whereas those with 6, 24, or 48 hrs between UCS and CS showed no greater aversion to the CS than controls. It is suggested that while the onset of alloxan diabetes can serve as the UCS for a conditioned

taste aversion, the behavior of alloxan-diabetic rats towards saccharin does not depend upon this process. —*Journal abstract.*

11158. Brookshire, Kenneth H. (Franklin & Marshall Coll) **Changes in the rat's preference for saccharin and sodium chloride solutions following injection of alloxan monohydrate.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1061-1068.—Conducted 5 experiments with a total of 136 male Sprague-Dawley rats in which alloxan-diabetic rats were compared with saline-injected controls on 2-choice preference tests involving saccharin and water or NaCl and water. Previous results indicating a decrease in preference for saccharin were confirmed and extended. However, a similar pattern of preference change for NaCl was not found. Results indicate that saccharin and NaCl consumption were not affected in the same way by experimental diabetes and that the loss of palatability of saccharin during a chronic diabetic state was not consistent with learning models of taste-aversion formation. —*Journal abstract.*

11159. Browne, Ronald G. & Ho, Beng T. (Texas Research Inst of Mental Sciences, Houston) **Discriminative stimulus properties of mescaline: Mescaline or metabolite?** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 109-114.—Studied possible similarities in the interoceptive stimuli produced by mescaline and its metabolites. 20 male Sprague-Dawley rats were trained in a 2-lever operant chamber to discriminate between the drugged state (mescaline 25 mg/kg) and the nondrugged state (saline). Following acquisition of discriminative response control, Ss were pretreated with either saline, aldehyde dehydrogenase inhibitors, or amine oxidase inhibitors and tested for stimulus generalization produced by intraperitoneal injections of 3,4,5-trimethoxyphenylethanol (TMPE), 3,4,5-trimethoxyphenylacetaldehyde (TMPA), N-acetylmescaline, mescaline, or saline. Both aldehyde dehydrogenase and amine oxidase inhibitors enhanced the effects of mescaline, while TMPE, TMPA, and N-acetylmescaline failed to exhibit generalization to the mescaline state, regardless of pretreatment. Findings do not indicate the role of a metabolite in the interoceptive cue produced by mescaline. (39 ref)—*Journal abstract.*

11160. Calhoun, William H. & Jones, Elisabeth A. (U Tennessee, Knoxville) **Methamphetamine's effect on tenneased acquisitions with serial discrimination reversals.** *Psychopharmacologia*, 1974, Vol 39(4), 303-308.—In 2 experiments a total of 8 male Sprague-Dawley rats were trained through a series of discrimination reversals until they developed a stable, repeated acquisition baseline. Intraperitoneal methamphetamine (.5 mg/kg) accelerated acquisition measured from this baseline. The drug effect was demonstrated with successive cumulative records and with a graphic method using a distribution of error scores to develop a baseline. Generally, with low doses (.25-.50), methamphetamine reduced errors without affecting rewarded responding. This effect is dose dependent, although at 1.0 mg/kg the drug may disrupt operant behavior. —*Journal abstract.*

11161. Carter, Gregg L. (Columbia U) **Effects of cigarette smoking on learning.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1344-1346.—Although there

was a difference between 10 smoking and 10 nonsmoking Ss on the number correct on a letter-digit substitution task for the 2nd of 2 10-trial blocks given in the 1st of 2 sessions (7 days apart), there was no difference in savings (number of trials) for serial learning.

11162. Chesher, G. B. & Jackson, D. M. (U Sydney, NSW, Australia) **The effect of withdrawal from cannabis on pentylenetetrazol convulsive threshold in mice.** *Psychopharmacologia*, 1974, Vol 40(2), 129-135.—Groups of male QS strain mice were dosed with ethanol (2.5 and 5% w/v in drinking water) or cannabis extract (equivalent to 10, 20, 40 and 80 mg/kg  $\Delta^9$ -tetrahydrocannabinol) orally for 11, 13, and 28 days. The threshold to convulsions produced by the constant intravenous infusion of pentylenetetrazol was determined at various intervals after drug administration had ceased. The convulsive thresholds of Ss tested 6 hrs after withdrawal from both doses of ethanol were significantly lower than controls. There was no significant difference from controls in the convulsive threshold of Ss which had received cannabis extract at any of the doses employed when tested 6 hrs, 16 hrs, 1, 3, or 6 days after medication had been withdrawn. Findings support the contention that there is no abstinence syndrome evident following the withdrawal of cannabinoids after prolonged administration to mice and serve again to draw a distinction between cannabis and ethanol.—*Journal abstract*.

11163. Clemens, James A.; Smalstig, E. Barry & Sawyer, Barry D. (Eli Lilly & Co., Research Lab, Indianapolis, IN) **Antipsychotic drugs stimulate prolactin release.** *Psychopharmacologia*, 1974, Vol 40(2), 123-127.—Conducted a study with a total of 182 male and 34 female Sprague-Dawley rats. Intraperitoneal doses of antipsychotic drugs markedly stimulated prolactin secretion in male and female Ss. The amount of prolactin released was greater in females than in males. Most nonantipsychotic phenothiazines failed to alter prolactin. Results imply that the dopamine receptor that inhibits prolactin release may be similar to the dopamine receptor involved in the action of antipsychotic drugs. (18 ref)—*Journal abstract*.

11164. Cohen, Gerald; MacNamee, Dana & Dembiec, Dorothy. (Mt Sinai School of Medicine, City U New York) **Elevation in blood acetaldehyde by pargyline during ethanol administration.** *Biochemical Pharmacology*, 1975(Jan), Vol 24(2), 313-316.—Experimental results show that pargyline, a monoamine oxidase inhibitor, markedly elevated blood acetaldehyde levels in ethanol-intoxicated mice and rats. It is suggested that this elevation could be a source of concern or an experimental tool for investigators studying behavioral or pharmacologic aspects of the interaction of catecholamines with ethanol and acetaldehyde.

11165. Corcoran, Michael E.; Bolotow, Igor; Amit, Zalman & McCaughan, James A. (U British Columbia, Kinsmen Lab of Neurological Research, Vancouver, Canada) **Conditioned taste aversions produced by active and inactive cannabinoids.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 725-728.—In an experiment with 228 male Wistar rats, single intraperitoneal injections of subtoxic doses of  $\Delta^9$ -tetrahydrocannabinol (THC),  $\Delta^9$ -THC, cannabidiol (CBD), or cannabigerol (CBG) induced a conditioned aversion to a

saccharin solution, while only a behaviorally toxic dose of cannabichromene (CBC) was capable of motivating an aversion. In view of evidence suggesting that the taste aversions were not due to local irritation effects, it is concluded that CBD and CBG are pharmacologically active in rats and could be responsible for some of the behavioral effects of cannabis in animal studies. (24 ref)—*Journal abstract*.

11166. Crow, Lowell T. & Edelbrock, Craig. (Western Washington State Coll) **Stimulus properties of sympathomimetic and sympatholytic drugs.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 575-577.—Trained 37 male Holtzman albino rats in a shuttlebox avoidance task under 1 of 3 drug conditions: epinephrine suspension (Sus-Phrine), dihydroergotamine mesylate (DHE-45), or placebo. 24 hrs later the animals were tested for retention in the same or a different drug state. No evidence was found for a drug sequence effect although the DHE-45 group exhibited significantly more avoidances. An operant conditioning procedure yielded results supporting discriminative stimulus properties of DHE-45. Results are discussed as they relate to the discriminative control of behavior through stimuli of an autonomic character.—*Journal abstract*.

11167. Davis, Michael & Sheard, Michael H. (Yale U, Medical School) **Biphasic dose-response effects of N-N-dimethyltryptamine on the rat startle reflex.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 827-829.—Measured the startle reflex in 4 groups of 10 male Sprague-Dawley albino rats each after intraperitoneal injection of saline or .12, .25, .50 or 4.0 mg/kg N-N-dimethyltryptamine (DMT). Low doses (.25 and .50) of DMT augmented startle, but the high dose (4.0) depressed startle. This biphasic dose-response relationship is consistent with the hypothesis that startle is enhanced when midbrain raphe neurons are inhibited but depressed when cells postsynaptic to raphe neurons are also inhibited.—*Journal abstract*.

11168. Davis, W. M. et al. (U Mississippi, School of Pharmacy) **Motility of mice after amphetamine: Effects of strain, aggregation and illumination.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 803-809.—Tests of locomotor activity in male C57B1/6Cum, DBA/2Cum, C3H/AnCum, CBA/Cum, BALB/cCum, and Swiss-Webster mice indicated that the BALB/c strain ranked lowest and the C57B1/6 strain ranked highest in locomotor excitation after intraperitoneal injection of dextroamphetamine. A further study comparing only the BALB/c and C57B1/10 strains again showed a significant interaction of drug and strain effects. Additional significant determinants of motility were lighting and social condition during test (1 or 4 Ss). Lighting (dark, dim, and full light) also interacted significantly with drug, strain, and grouping effects. Whereas the C56B1/10 Ss showed higher levels of motility, the BALB/c showed the greater absolute increases in motility following amphetamine. The BALB/c strain also showed greater lethality under aggregated conditions (group of 10 Ss) in the dose range used for activity studies. (24 ref)—*Journal abstract*.

11169. Davis, W. Marvin & Smith, Stanley G. (U Mississippi, School of Pharmacy) **Central cholinergic influence on self-administration of morphine and**



**amphetamine.** *Life Sciences*, 1975(Jan), Vol 16(2), 237-246.—In 3 experiments, atropine and methylatropine were tested in a total of 94 male Wistar rats for an ability to alter the reinforcing action of intravenous morphine sulfate and dextroamphetamine sulfate (60  $\mu$ g/kg/injection). Atropine blocked the self-administration of morphine, but methylatropine did not. Similarly, atropine but not methylatropine prevented the establishment of a conditioned reinforcer based on passive intravenous infusions of morphine. Self-administration of dextroamphetamine was enhanced by atropine but not by methylatropine. Results indicate that a central cholinergic system exerts an influence on the brain mechanisms which are affected by morphine or dextroamphetamine to produce positive reinforcement. (24 ref)—*Journal abstract*.

11170. Dörner, Günter et al. (Humboldt U, Inst of Experimental Endocrinology, Berlin, E Germany) **A neuroendocrine predisposition for homosexuality in men.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 1-8.—In male rats, androgen deficiency during a critical hypothalamic organizational period has been shown to give rise to a predominantly female-differentiated brain, homosexual behavior, and demonstration of a positive estrogen feedback effect. In the present study, a positive estrogen feedback effect was also induced in intact homosexual men, in contrast to intact heterosexual and bisexual men. In 21 homosexual men an intravenous injection of 20 mg presomen (Premarin) produced a significant decrease of serum luteinizing hormone (LH) levels followed by an increase above initial LH values. In 20 heterosexual and in 5 bisexual men, intravenous estrogen administration, while producing a significant decrease of the serum LH level, was not followed by an increase above the initial LH values. Using a radioimmunoassay, plasma testosterone levels and 24-hr urinary excretions of unconjugated testosterone of adult homosexual men were in the normal range as observed in heterosexual men. This finding suggests that homosexual men possess a predominantly female-differentiated brain which may be activated to homosexual behavior by normal or approximately normal androgen levels in adulthood. (25 ref)—*Journal abstract*.

11171. Dykstra, L. A.; McMillan, D. E. & Harris, L. S. (U North Carolina, Chapel Hill) **Effects of  $\Delta^9$ -THC and a water soluble ester of  $\Delta^9$ -THC on schedule-controlled behavior.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 29-32.— $\Delta^9$ -Tetrahydrocannabinol ( $\Delta^9$ -THC) and one of its water soluble esters (SP-111) decreased the rates of responding by 12 male White Carneaux pigeons working under a variable interval 3-min schedule of food presentation, or a multiple fixed-ratio 30, fixed-interval 5-min schedule of food presentation.  $\Delta^9$ -THC was 3-6 times more potent than SP-111 and had a faster onset of effects on behavior.—*Journal abstract*.

11172. Elias, Merrill F. & Eleftheriou, Basil E. (Syracuse U) **A behavior-genetic investigation of induction and education times for halothane anesthesia.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 7-10.—Measured induction and recovery (education) times for recombinant inbred strains (RI strains) of mice, their reciprocal F<sub>1</sub> hybrids, and their

progenitor strains. The resulting pattern of means for these groups indicated that 2 or more loci influence induction and education times. The strain distribution patterns were different for induction and education and for different dose levels of anesthetic. It is suggested that strain differences in time to induce anesthetic effects and time to recover from anesthetic effects, as well as inadvertent use of varying anesthetic dose levels from study to study, may contribute to inconsistent results for studies of anesthetic effects on complex behavior.—*Journal abstract*.

11173. Ellis, Fred W. & Pick, James R. (U North Carolina, Medical School, Chapel Hill) **Experimental studies of alcohol dependence in animal models.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.

11174. Ellison, Gaylord; Handel, Judi; Rogers, Richard & Weiss, Judy. (U California, Los Angeles) **Tricyclic antidepressants: Effects on extinction and fear learning.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 7-11.—48 female albino rats trained to run an alley for a food reward were extinguished following injections of different antidepressants. When retested several days later, Ss extinguished following pretreatment with protriptyline showed faster running speeds than did the other groups. In a 2nd experiment with 84 female hooded rats, Ss given electrical shocks following pretreatment with protriptyline avoided the compartment in which they had been shocked less than did Ss shocked following pretreatment with other antidepressants. This implies an interference with some aspect of the learning or consolidation process which is correlated with the degree of norepinephrine (NE) reuptake blockage. It is hypothesized that NE terminals are deactivated following frustrative nonreward or punishment by the conversion and reuptake of the released NE to an altered extinction molecule. (34 ref)—*Journal abstract*.

11175. Fechter, Laurence D. (Johns Hopkins U) **The effects of L-dopa, clonidine, and apomorphine on the acoustic startle reaction in rats.** *Psychopharmacologia*, 1974, Vol 39(4), 331-344.—Conducted a series of within-S experiments with male Holtzman albino rats which demonstrated that an amine-depleting dose of reserpine enhanced the level of the startle reaction and that this effect was reversed by the catecholamine precursor, levodopa. Chemical assays suggested a correlation between the accumulation of noradrenaline and reversal of reserpine effects. Administration of the noradrenaline receptor-stimulating agent, clonidine (.125 or .250 mg/kg), produced marked reductions in startle amplitude reducing the response far below normal values in reserpinized Ss. By contrast, the dopamine receptor-stimulating agent, apomorphine (1.0 mg/kg) did not alter the response. None of the pharmacological agents used altered the inhibition of the startle reaction which resulted from the presentation of neutral stimuli (pulses) shortly before reflex elicitation. Taken together with an earlier report, the present data suggest that noradrenaline and serotonin have partially antagonistic

control over the startle reaction. (16 ref)—*Journal abstract*.

11176. Flexner, Josefa B. & Flexner, Louis B. (U Pennsylvania, Medical School) **Puromycin's suppression of memory in mice as affected by caffeine.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 13-17.—Investigated the previous finding that expression of maze-learning in mice is blocked for long periods of time by puromycin injected intracerebrally 1 or more days after the training experience. In the present study with male and female Swiss-Webster mice, treatment with caffeine after training was found to reduce greatly the amnesic effects of puromycin. With a high dose of caffeine (200 mg/kg) this reduction was evident 6 days after treatment with puromycin. With a lower dose of caffeine (25 mg/kg) the effect became evident only after a more extended period of time. In view of control experiments, it is suggested that caffeine modifies factors necessary for the expression of memory and that this alteration makes puromycin relatively ineffective in blocking memory. (31 ref)—*Journal abstract*.

11177. Fontaine, O.; Libon, Ph. & Richelle, M. (U Liège, Belgium) **Action of a new psychotropic drug (sulpiride) on avoidance behavior in rats.** *Psychopharmacologia*, 1974, Vol 39(4), 309-314.—Sulpiride, a psychotropic drug with neuroleptic activity, was administered to 5 Wistar albino rats in a Sidman avoidance schedule. Doses ranging from 1 to 80 mg/kg resulted in the S receiving fewer shocks. This effect was not correlated with an increase of responding and seemed unrelated to the suppressing action abruptly observed at high doses (150-200 mg/kg). Results differ from those classically obtained with other neuroleptics.—*Journal abstract*.

11178. Franken, Robert E. & Strain, Allan. (U Calgary, Alberta, Canada) **Effect of increased arousal on response to stimulus change in a complex maze.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1076-1078.—Tested 24 male and 24 female hooded rats under methamphetamine or saline in a 6-choice-point multiple-T maze. On Trial 1, the Ss were exposed to a homogeneous black or white maze. Between daily Trials 1 and 2 the maze was (a) left unchanged, (b) the culs were changed from Black (B) to White (W) or W to B, or (c) the path was changed from B to W or W to B. Methamphetamine-treated Ss made fewer approach responses to change when the change occurred in the culs and spent less time running from one end of the maze to the other. It is concluded that methamphetamine reduces the invitational properties normally associated with change or novelty.—*Journal abstract*.

11179. Gay, Patricia E.; Leaf, Russell C. & Arble, Francine B. (Rutgers State U) **Inhibitory effects of pre- and posttest drugs on mouse-killing by rats.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 33-45.—In a series of 6 experiments with a total of 150 male Holtzman rats, mouse-killing was gradually inhibited by repeated posttest injections of dextroamphetamine (1.5 mg/kg), levoamphetamine (1.5 mg/kg), or pilocarpine (7.5 mg/kg), but not by control substances. Of these drugs, only dextroamphetamine inhibited killing when given prior to a mouse-killing test. Further experiments suggest that anorexia per se did not contribute to drug-induced inhibitory effects but that changes in internal

state were important to the development of inhibition. Pretest injections appear to inhibit predatory killing by a direct pharmacological action on some target site or sites, while posttest injections produce a learned aversion to predatory killing. (44 ref)—*Journal abstract*.

11180. Gérardy, J. & Dresse, A. (U Liège, Lab de Pharmacologie, Belgium) **Action of neuroleptics on the content of dopamine and of DOPAC in the rat caudate nucleus.** [Fren] *Experientia*, 1974, Vol 30(5), 523-524.—Studied the action of 5 neuroleptics and of a sedative drug on the content of dopamine and of DOPAC (3,4-Dihydroxyphenylacetic acid) in the rat caudate nucleus. The neuroleptics haloperidol, pimozide, chlorpromazine, and levomepromazine increased the amount of DOPAC significantly, while the dopamine itself remained unchanged. Reserpine significantly decreased dopamine but also weakly decreased the DOPAC level. Promethazine had no effect on the level of either. A seasonal variation of the dopamine content also was observed. The duration of the neuroleptic action on DOPAC parallels self-stimulation behavior. A presynaptic action of these drugs may be implied in the DOPAC increase.—*English summary*.

11181. Gold, Paul E. & Van Buskirk, Roderick B. (U California, School of Biological Sciences, Irvine) **Facilitation of time-dependent memory processes with posttrial epinephrine injections.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 145-153.—2 experiments used a total of 175 male Sprague-Dawley rats to examine the effect of posttraining epinephrine injections on memory-storage processes. Ss were trained with a weak footshock on a 1-trial inhibitory avoidance task. Ss received subcutaneous epinephrine injections immediately, 10 min, 30 min, or 2 hrs after training. On a retention test 24 hrs after training, Ss which received epinephrine (.01, .05, or .1 mg/kg) immediately after training had retention performance which was significantly better than that of saline controls. A lower (.001 mg/kg) or a higher (.5 mg/kg) dose did not affect retention performance. Epinephrine injections (.1 mg/kg) given 10 min after training also significantly facilitated retention, but injections given 30 min or 2 hrs after training did not. Findings suggest that the hormonal consequences of a training experience may normally modulate memory-storage processes in untreated animals. (25 ref)—*Journal abstract*.

11182. Goodlet, Ian & Sugrue, Michael F. (Organon Scientific Development Group, Newhouse, Scotland) **Effect of acutely administered analgesic drugs on rat brain serotonin turnover.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 241-248.—Results of a series of experiments reveal that pentazocine, methadone, and pethidine do not share the ability possessed by acutely administered morphine to increase rat brain 5-hydroxytryptamine (serotonin) turnover. (31 ref)

11183. Gutwein, Baruch M.; Quartermain, David & McEwen, Bruce S. (City Coll, City U New York) **McEwen, Bruce S. (City Coll, City U New York) Dissociation of cycloheximide's effects on activity from its effects on memory.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 753-756.—Conducted 4 experiments with male C57BL/6J mice in which 2 subcutaneous doses of cycloheximide (CYC) were used to dissociate the effect of this drug on locomotor activity



from its effect on memory. Results indicate that significant short-term (30' - 40') and long-term (24-hr) increases in locomotor activity occurred at both CYC doses, whereas significant short- and long-term decreases in step-out latencies in a passive-avoidance task occurred primarily at the higher CYC dose. Pargyline, a monoamine oxidase inhibitor, significantly increased locomotor activity but did not decrease step-out latencies in the passive-avoidance task. It is concluded that the decreases in step-out latencies shown by CYC-treated Ss in the passive avoidance task are the result of an amnesic effect of CYC rather than its effect on locomotor activity. —*Journal abstract.*

11184. **Harding, T.** (Royal Edinburgh Hosp, Scotland) **The effect of lysergic acid di-ethylamide on serum creatine kinase levels.** *Psychopharmacologia*, 1974, Vol 40(2), 177-184.—Estimated serum creatine kinase levels in 7 patients following LSD ingestion during the 24 hrs preceding admittance to a psychiatric hospital. All patients showed a transient rise in serum level, greatest in those who became psychotic.

11185. **Heikkilä, Richard E.; Cohen, Gerald & Manian, Albert A.** (Mt Sinai School of Medicine, City U New York) **Reactivity of various phenothiazine derivatives with oxygen and oxygen radicals.** *Biochemical Pharmacology*, 1975(Feb), Vol 24(3), 363-368.—Results of chemical tests show that orthodihydroxylated phenothiazine derivatives react with oxygen to form the very reactive and potentially toxic chemical species, hydrogen peroxide and superoxide and hydroxyl radicals, and react also with the hydroxyl radical. It is suggested that these properties may be responsible for some of the beneficial and/or adverse effects of administered phenothiazines. (26 ref)

11186. **Heiss, W.-D. & Hoyer, J.** (Inst für allgemeine und vergleichende Physiologie, Vienna, Austria) **Dopamine receptor blockade by neuroleptic drugs in *Aplysia* neurones.** *Experientia*, 1974, Vol 30(11), 1318-1320.—Investigated dopamine receptor blockage by neuroleptic (antipsychotic) drugs in the marine mollusc *Aplysia californica*. Intact abdominal ganglion were isolated, selected neurons were penetrated with microelectrodes, and haloperidol and fluphenazine were directly added. Addition of both drugs resulted in a qualitative decrease or blockage of the dopamine response. Results indicate that the effects of dopamine are mediated by 2 distinct receptors. The reversible, probably competitive, blocking effect on both receptors suggests that the receptors are structurally similar. (German summary)—*R. Tomasko.*

11187. **Hine, B.; Friedman, E.; Torrelío, M. & Gershon, S.** (New York U, Medical School, Neuropsychopharmacology Research Unit) **Morphine-dependent rats: Blockade of precipitated abstinence by tetrahydrocannabinol.** *Science*, 1975(Feb), Vol 187(4175), 443-445.—Groups of 7 male Sprague-Dawley rats were implanted subcutaneously with a pellet containing 75 mg of morphine base or placebo, and naloxone hydrochloride (4 mg/kg of body weight) was administered 72 hrs later. Treatment with  $\Delta^9$ -tetrahydrocannabinol (THC, 2, 5, or 10 mg/kg) 1 hr before naloxone administration significantly reduced the intensity of abstinence; the 2 higher doses blocked the appearance of wet shakes and escapes, diarrhea, and increased defecation. THC did not induce

abstinence itself, and prior treatment with cannabidiol was ineffective in reducing naloxone-precipitated abstinence in Ss with morphine pellets. Data suggest that THC may be of value in facilitating narcotic detoxification.—*Journal abstract.*

11188. **Hirschhorn, I. D. & Rosecrans, J. A.** (Medical Coll Virginia, Richmond) **Studies on the time course and the effect of cholinergic and adrenergic receptor blockers on the stimulus effect of nicotine.** *Psychopharmacologia*, 1974, Vol 40(2), 109-121.—Conducted a study with male Sprague-Dawley rats to determine the time course of the nicotine stimulus and its relationship to brain levels of the drug and to determine whether the nicotine stimulus is dependent upon the integrity of specific neurotransmitter systems. A lever choice discrimination was used. After subcutaneous injection of nicotine, depression of 1 lever resulted in food reinforcement. When saline was administered, the opposite lever was reinforced. A high degree of discriminated responding was observed when either 400 or 200  $\mu$ g/kg of nicotine was used as a discriminative stimulus. The degree of discrimination decreased as the length of the time period between the injection of nicotine and the test of discrimination was increased. This decline in discrimination was similar to the decline in brain levels of nicotine, suggesting that nicotine discrimination is directly related to the concentration of nicotine in the brain. Atropine, mecamylamine, dibenamine, propranolol, and  $\alpha$ -methyl-para-tyrosine were all tested for effects upon nicotine discrimination. Of these, only mecamylamine antagonized the nicotine stimulus. Results indicate that the stimulus effect of nicotine is mediated specifically through nicotinic-cholinergic receptors and not muscarinic-cholinergic or adrenergic receptors. (19 ref)—*Journal abstract.*

11189. **Ho, A. K. et al.** (Wayne State U, Coll of Pharmacy & Allied Health Professions) **Experimental studies on alcoholism: I. Increased in alcohol preference by 5,6-dihydroxytryptamine and brain acetylcholine.** *Psychopharmacologia*, 1974, Vol 40(2), 101-107.—Studied the effects of an intracisternal injection of 75  $\mu$ g of 5,6-dihydroxytryptamine (DHT) on alcohol preference in male Sprague-Dawley rats. Results indicate that alcohol consumption was increased significantly from about the 5th to 11th days after treatment. This DHT-induced alcohol preference was antagonized by 4-(1-naphthylvinyl) pyridine, an inhibitor of choline acetyltransferase. The level of brain acetylcholine was also increased significantly ( $p < .001$ ) 8 days after DHT treatment. It is suggested that the DHT-induced alcohol preference may be attributed to an increase in central cholinergic activities. The possibility of a modulation of 5-hydroxytryptamine on cholinergic activity is discussed. (16 ref)—*Journal abstract.*

11190. **Irvin, Jean E. & Mellors, Alan.** (U Guelph, Ontario, Canada)  **$\Delta^9$ -tetrahydrocannabinol: Uptake by rat liver lysosomes.** *Biochemical Pharmacology*, 1975(Jan), Vol 24(2), 305-307.—Presents experimental observations in rats which may explain some of the clinical evidence that chronic marihuana use leads to hepatotoxicity and cirrhosis. Damage to lysosomes by cannabinoids may also be the basis of the reduced cellular immunity seen in chronic users of marihuana

and hashish, since cellular immunity is mediated in part through lysosomal involvement in the immune response.

11191. Japan-United States Co-operation on Drug Abuse Research, 1969-1972. Research on cannabis (marihuana). *Bulletin on Narcotics*, 1973(Jul-Sep), Vol 25(3), 37-48.—Lists participating researchers in both countries and provides information on chemical, biochemical, pharmacological, and clinical studies of  $\Delta^9$ -tetrahydrocannabinol. Needed research in each of these fields is specified.

11192. Järbe, Torbjörn U. & Henriksson, Bengt G. (Uppsala, Sweden) Discriminative response control produced with hashish, tetrahydrocannabinols ( $\Delta^9$ -THC and  $\Delta^8$ -THC), and other drugs. *Psychopharmacologia*, 1974, Vol 40(1), 1-16.—Conducted a series of experiments with a total of 100 male Sprague-Dawley albino rats to examine the discriminative properties of hashish and its derivatives and other, noncannabinoid drugs. To determine the specificity of the drug-induced response control, a variety of psychotropic drugs were tested for their possible generalization to the training drugs. It is concluded that tetrahydrocannabinols ( $\Delta^9$ - and  $\Delta^8$ -THC) were interchangeable with respect to cue function and that hashish, inhaled as smoke, produced cue effects similar to synthetic THC. Neither cannabidiol nor cannabinol evidenced transfer to hashish or its derivatives. Lack of generalization to THC was also apparent for central nervous system (CNS) depressants, anticholinergics, tacrine, sernylan, psilocybine, morphine, CNS stimulants, yohimbine, and phenitron. Except for atropine (150.0 mg/kg), the transfer testings for the noncannabinoid drugs yielded results that were anticipated from previous literature. Chlordiazepoxide showed transfer to diazepam. Results from transfer testings in rats required to differentiate one drug state from another drug-induced state, give additional support to the previous conclusions. (3 p ref)—*Journal abstract*.

11193. Johansson, J. O.; Järbe, T. U. & Henriksson, B. G. (Uppsala, Sweden) Physostigmine attenuation of  $\Delta^9$ -tetrahydrocannabinol induced hyperthermia in rats. *Experientia*, 1974, Vol 30(7), 779-780.—Hyperthermia is shown to be caused by both morphine and  $\Delta^9$ -tetrahydrocannabinol and to be counteracted in both cases by physostigmine. (German summary)

11194. Julien, R. M. & Kavan, Eva M. (U California, Coll of Medicine, Irvine) Electrophysiological effects of etoxadrol (CL-1848C): A new intravenous anaesthetic agent. *Neuropharmacology*, 1975(Jan), Vol 14(1), 53-59.—Etoxadrol and ketamine, although structurally dissimilar, both induce similar states of anesthesia. In a total of 21 cats with chronically implanted electrodes, etoxadrol-induced anesthesia was characterized by a progressive increase in central nervous system excitability with high voltage hypersynchrony and spikes occurring at intravenous doses of 5-10 mg/kg and convulsions at doses of 15-25 mg/kg. Complete recovery occurred within 24 hrs. With anesthetic doses of etoxadrol, only minimal alterations in evoked cortical and subcortical potentials were observed. Comparison was made between the electrophysiological alterations induced by etoxadrol and those induced by other anesthetics. Some anesthetics depressed evoked cortical and subcortical potentials (ether, halothane, and barbiturates) while others exerted

no change (althesin, isoflurane, ketamine and etoxadrol) or augmented (enflurane) the same potentials. The limitations to the evaluation of evoked potentials in the determination of a drug's anesthetic properties is discussed. (18 ref)—*Journal abstract*.

11195. Karkishchenko, N. N. (Rostov State U, Medical Inst, USSR) [The role of monoamines in the systemic activity of the brain.] (Russ) *Farmakologiya i Toksikologiya*, 1974(Jul-Aug), Vol 37(4), 403-407.—Carried out 107 experiments on 32 rabbits and 11 cats, with electrodes implanted in various brain structures. The action of endogenous catecholamines, acetylcholine, and serotonin, produced by the introduction of the relevant substances, was then studied. The substances changed the excitability of many of the brain structures in a complex differential fashion. (English summary)—A. G. Pook.

11196. Klemm, W. R. (Texas A&M U) Dissociation of EEG and behavioural effects of ethanol provide evidence for a noncholinergic basis of intoxication. *Nature*, 1974(Sep), Vol 251(5472), 234-236.—Studied the action of physostigmine in blocking ethanol-induced EEG deactivation in 8 rats. The EEG and a battery of behavioral tests were used to obtain specific measures of ethanol action. It was found that physostigmine blocked EEG deactivation but did not prevent behavioral effects of ethanol. The most significant aspect of the ethanol dissociation is the suggestion that intoxication does not primarily involve impairment of cholinergic systems. The behavioral tests included 4 standard "catalepsy" tests and confirmed behavioral intoxication when ethanol-physostigmine was injected intraperitoneally. Findings agree with a recent report that acetylcholine action is suppressed by ethanol. (28 ref)—A. de la Haba.

11197. Lal, Harbans; Colpaert, Francis C. & Laduron, Pierre. (U Rhode Island) Narcotic withdrawal like mouse jumping produced by amphetamine and L-DOPA. *European Journal of Pharmacology*, 1975(Jan), Vol 30(1), 113-116.—Conducted studies with 76 experimental and 24 control male Swiss albino mice in which upward jumping in Ss that resembled the narcotic-withdrawal syndrome was produced by a combination of intraperitoneal amphetamine (4 mg/kg) and levodopa (400 mg/kg) administration. Neither drug alone caused that jumping. Pretreatment with haloperidol (.16 mg/kg) or pimozide (.08 mg/kg) but not with phentolamine (10 mg/kg)—all given subcutaneously—effectively blocked amphetamine-levodopa jumping. After levodopa there was an increase in the brain levels of levodopa, dopamine, and norepinephrine. Amphetamine, ineffective in itself, enhanced levodopa-induced elevation of brain levodopa and dopamine without affecting brain norepinephrine levels.—*Journal abstract*.

11198. Lapin, I. P.; Oksenkru, G. F.; Osipova, S. V. & Uskova, N. V. (Bektereva Psychoneurological Inst, Leningrad, USSR) [Potentiation with tricyclic antidepressants of the inhibitory action of apomorphine on the righting reflex in frogs.] (Russ) *Farmakologiya i Toksikologiya*, 1974(Jul-Aug), Vol 37(4), 407-410.—Carried out experiments during the winter on frogs (*Rana temporaria*) caught in the wild and kept in groups of 6-8 Ss. A range of tricyclic antidepressants were administered 30 min before a dose of apomorphine. After



intervals of 1, 2, 3, and 4 hrs the uprighting reflex of the Ss was tested 10 times in succession. Inability to turn upright in 30 sec was regarded as a negative response. Apomorphine was found to weaken the uprighting reflex. Tricyclic antidepressants (chlorimipramine, imipramine, amitriptyline, demethylimipramine, and nortriptyline) potentiated this effect. Tertiary antidepressants had a more marked effect than secondary derivatives. Neuroleptics (haloperidol and thioproperazine) had no effect on the potentiating of the apomorphine response by imipramine. (English summary) (15 ref)—*A. G. Pook*.

11199. **Levine, Seymour.** (Stanford U, Medical School) **Differential response to early experience as a function of sex difference.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11200. **Little, H. J. & Rees, J. M.** (U Manchester, England) **Tolerance development to the antinociceptive actions of morphine, amphetamine, physostigmine and 2-aminointhane in the mouse.** *Experientia*, 1974, Vol 30(8), 930-932.—Tested for the existence of a correlational relationship between the characteristics of narcotic analgesic activity and the antinociceptive actions of morphine, amphetamine, physostigmine, and 2-aminointhane in the mouse. Groups of female mice were administered these drugs for 5 days, 3 times a day. Tolerance developed to the actions of all 4 drugs. Mutual cross-tolerance was found in any comparison between morphine, amphetamine, and 2-aminointhane. However, no cross-tolerance resulted between physostigmine and morphine. Implications of these findings for both past and future research are discussed. (German summary) —*R. S. Albin*.

11201. **Liu, Shean-Jang; Ramsey, Robert K. & Fallon, Harold J.** (Wood VA Ctr, WI) **Effects of ethanol on hepatic microsomal drug-metabolizing enzymes in the rat.** *Biochemical Pharmacology*, 1975(Feb), Vol 24(3), 369-378.—Experimental results in male and female rats demonstrate that the effects of chronic ethanol ingestion, with an adequate diet, on microsomal drug-metabolizing enzymes depended on sex, exposure to other agents, and on the duration and proximity of ethanol intake. The effects more closely approximate changes after starvation than those produced by barbiturate administration. (44 ref)

11202. **Maj, J.; Mogilnicka, E. & Przewlocka, B.** (Polish Academy of Sciences, Inst of Pharmacology, Cracow) **Antagonistic effect of cyproheptadine on neuroleptic-induced catalepsy.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 25-27.—Studied the influence of cyproheptadine on the neuroleptic-catalepsy in albino Wistar rats. Cyproheptadine antagonized dose-dependently the catalepsy induced by spiroperidol, pimozide, fluphenazine, and reserpine. The anticataleptic effect of 2 antiparkinsonian drugs, levodopa or amantadine, was potentiated by cyproheptadine. (19 ref)—*Journal abstract*.

11203. **Maly, Joachim & Quatember, Rudolf.** (U Vienna, Neurological Clinic, Austria) **[Psychological methods and their contribution to neuropsychopharmacology.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 312-316.—Discusses the

role and importance of clinical psychologists in the field of neuropsychopharmacological research and experimentation. The numerous psychological methods and statistical procedures are surveyed. (English summary) (20 ref)

11204. **Marcy, R. & Quermone, M. A.** (U Caen, France) **Anhydrotic effect of benzodiazepines in mice.** *Experientia*, 1974, Vol 30(7), 783-784.—Studied the inhibitory effect of benzodiazepines on palmar sweating in groups of 10 Swiss mice. Palmar skin conductivity was inhibited, secondary to inhibition of sweating. Doses resulting in 50% inhibition of conductivity are reported for 8 drugs. (French summary)

11205. **McKim, W. A.** (Memorial U Newfoundland, St John's, Canada) **The effects of scopolamine and physostigmine on fixed-interval behaviour in the rat.** *Psychopharmacologia*, 1974, Vol 39(3), 237-244.—Conducted 2 experiments with a total of 5 Long-Evans and 8 Wistar albino male rats to determine whether scopolamine and physostigmine, which have opposite effects on cholinergic transmission, also produce opposite effects on fixed-interval (FI) performance. Scopolamine and a wide range of doses of physostigmine were administered intraperitoneally singly and concurrently to Ss responding on a FI 2-min schedule. Scopolamine produced a disruption in FI curvature which could be antagonized by physostigmine, but physostigmine by itself produced no consistent change. (15 ref)—*Journal abstract*.

11206. **Miczek, Klaus A.** (Carnegie-Mellon U) **Intraspecies aggression in rats: Effects of d-amphetamine and chlordiazepoxide.** *Psychopharmacologia*, 1974, Vol 39(4), 275-301.—Dextroamphetamine sulfate and chlordiazepoxide hydrochloride, administered to either the dominant or subordinate rat, altered several components of fighting behavior in a dose-dependent biphasic manner. Stereotypic sequences of attack, threat, defense, and submission were generated between pairs of previously isolated Sprague-Dawley rats by extinction of a food-reinforced response. Low doses of amphetamine (.05, .1 mg/kg) and chlordiazepoxide (2.5, 5.0 mg/kg) given intramuscularly to the dominant S 30 min prior to 15-min tests increased attack bites and leaps and the display of aggressive postures and threats, whereas higher doses of both drugs (.5, 1.0 mg/kg amphetamine; 20 mg/kg chlordiazepoxide) suppressed attacks and threats. Amphetamine and chlordiazepoxide, administered to the subordinate S, caused a more prolonged display of submissive-supine and defensive-upright postures. Drugged subordinate Ss also provoked more attacks and threats by the nondrugged opponents. The multiresponse analysis of fighting revealed that various elements of aggressive and defensive-submissive behavior patterns are differentially sensitive to drug action. Results indicate that amphetamine and chlordiazepoxide can facilitate or inhibit attack or defense, depending on the dose level and which of the opponents was injected, but do not reverse dominance-subordination relationships. (3 p ref)—*Journal abstract*.

11207. **Monti, Jaime M. & Velluti, Ricardo.** (Hosp de Clinicas, Facultad de Medicina, Montevideo, Uruguay) **Action of psychotropic drugs upon pO<sub>2</sub> in the lateral amygdala and pontine reticular formation during the sleep-wakefulness cycle.** *Pharmacology, Biochemistry &*

*Behavior*, 1974(Nov-Dec), Vol 2(6), 763-767.—Studied the actions of intraperitoneal nitrazepam, haloperidol, and pentobarbital upon oxygen pressure ( $pO_2$ ) of nuclei amygdalae lateralis and reticularis pontis caudalis during the sleep-wakefulness cycle in 5 cats with chronically implanted oxygen cathodes. Nitrazepam at the .25 mg/kg dose selectively diminished the  $pO_2$  oscillations in the lateral amygdala. Further, phasic changes depicted during REM sleep in the pontine reticular formation were abolished. After larger doses (.5-1.0 mg/kg) there was a simultaneous and progressive decrease of the current oscillations in both structures. Haloperidol produced a reduction of  $pO_2$  current waves only after the highest administered dose (2.0 mg/kg), without specificity for any of the structures recorded. Sedative and anesthetic doses of pentobarbital also decreased  $pO_2$ -wave amplitude in a dose-response related manner. (22 ref)—*Journal abstract*.

11208. Moskowitz, Herbert & McGlothlin, William. (U California, Los Angeles) **Effects of marihuana on auditory signal detection.** *Psychopharmacologia*, 1974, Vol 40(2), 137-145.—Tested 23 paid, male college students for auditory signal detection under a no-treatment condition, and smoke-marihuana conditions containing 0, 50, 100, and 200  $\mu$ g/kg  $\Delta^9$ -tetrahydrocannabinol. Signal detection was measured under conditions of concentrated attention, in which the S reported the presence or absence of a tone in a 3-sec noise burst; and divided attention, where the S also repeated a series of 6 digits which were presented simultaneously with the noise burst. No differences were found between the no-treatment and placebo conditions. Significant dose-dependent impairment of signal detection resulted for the marihuana conditions under both concentrated and divided attention. Application of signal detection theory indicates that impaired performance was due to a decline in sensitivity ( $d'$ ), independent of changes in S criteria ( $\beta$ ). There was also some indication of change in criteria—a greater tendency for erroneous reporting of a signal when it was not present.—*Journal abstract*.

11209. National Clearinghouse for Drug Abuse Information. (Rockville, MD) **Narcotic antagonists.** *National Clearinghouse for Drug Abuse Information, Report Series*, 1973(Oct), Series 26(1), 15 p.—Describes the history, chemistry, pharmacology, and clinical effects of narcotic antagonists. These drugs often produce analgesia without the more undesirable actions of morphine, and are showing promise in the management of heroin addiction. Articles are reviewed which show the dangers and benefits of narcotic antagonists. (41 ref)—G. E. Zimmerman.

11210. Nurmand, L. B. (Tartu State U, Estonian SSR) **[Changes in the activity of some substances potentiating anesthesia against the background of developing tolerance of sodium barbital.]** (Russ) *Farmakologiya i Toksikologiya*, 1974(Jul-Aug), Vol 37(4), 401-403.—Studied the effects of spasmolytin (100 mg/kg introduced intraperitoneally), chlorpromazine, and estocin (5 mg/kg and 25 mg/kg respectively, both introduced subcutaneously) on anesthesia induced by sodium barbital (100 mg/kg, intraperitoneally) in 25 male mice, using the lateral position test. The substances were introduced either 20 min before the sodium barbital or

immediately after the S started to awaken, in the 1st or 2nd day of the study, according to whether the S was tolerant or intolerant. A single introduction of sodium barbital raised the resistance of the central nervous system not only to the barbiturate, but also to the central action of chlorpromazine and estocin. Resistance to the central action of spasmolytin was unchanged. The peripheral potentiating effect of all the substances in tolerant mice is not significantly changed. (English summary)—A. G. Pook.

11211. Olton, David S.; Johnson, Craig T. & Howard, Evelyn. (Johns Hopkins U) **Impairment of conditioned active avoidance in adult rats given corticosterone in infancy.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 55-61.—Notes that intensive corticosterone treatment given to rats during the 1st postnatal week irreversibly decreases DNA accumulation in the cerebrum and cerebellum. After such hypercorticism in infancy, rats (*Rattus norvegicus*) in the present experiment were tested as adults in 2 conditioned active avoidance tasks. In comparison with litter-mate controls, the treated Ss were impaired in the acquisition of 2-way active avoidance but not in the acquisition of 1-way active avoidance. These data are consistent with other observations suggesting a hyperresponsiveness or hyperemotionality following corticosterone treatment in infancy.—*Journal abstract*.

11212. Perris, Carlo (Ed). (Umea U, Sweden) **A multicenter multidimensional study of some new longacting neuroleptic drugs.** *Acta Psychiatrica Scandinavica*, 1974, Suppl 249, 134 p.—Discusses the results of a 5-yr study of long-acting neuroleptic drugs conducted at several Swedish psychiatric hospitals. Specific investigations cited deal with the environmental factors influencing drug trials; the development of schizophrenic symptom rating scales; trials of pimozide, trifluoperazine, fluspirilene, and fluphenazine enanthate; ambulatory activity and EEG amplitudes during treatment trials; and an evaluation of the antipsychotic and sedative effects of neuroleptics and amphetamine. Findings indicate the usefulness of long-acting neuroleptics in the maintenance treatment of chronic schizophrenic inpatients. Methodological problems related to clinical trials of long-acting drugs are also highlighted.—R. Tomasko.

11213. Phoenix, Charles H. (Oregon Regional Primate Research Ctr, Beaverton) **Prenatal testosterone in the nonhuman primate and its consequences for behavior.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11214. Pober, Z. & Calhoun, W. K. (US Army Natick Lab, MA) **Effect of oxethazaine HCl on control of food and water intake in the rat.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 69-74.—Used oral administration of the local anesthetic oxethazaine HCl to modify eating and drinking patterns in male Sprague-Dawley rats in 5 experiments. The addition of the oxethazaine HCl to the diet (.5 gm/100 gm diet) markedly reduced food intake. Similarly, administration of the drug by gastric intubation (gavage) also reduced food intake. This reduction was of short duration. The inhibition of water intake associated with administration of the drug was shown to be a secondary effect of



reduced food intake, rather than a direct action of the drug. Data indicate that local anesthesia of the gastrointestinal tract results in an inhibition of food intake. (20 ref)—*Journal abstract*.

11215. **Prabhu, V. K. & Nayar, K. K.** (U Kerala, Kariavattom, India) **Crustecdysone is without estrogenic or antiestrogenic activity in the rat.** *Experientia*, 1974, Vol 30(7), 821.

11216. **Rabadán, F. P. & Martínez Roldán, C.** (Lab Made S. A., Sección de Farmacología, Madrid, Spain) **Action of L-Dopa on the gonads of male rats.** *Experientia*, 1974, Vol 30(7), 826.—Investigated the effects on rats' testicles, seminal vesicles, and prostate resulting from an administration of levodopa. Male Wistar rats—39 test Ss and 19 controls—were studied. Weight of testicles, seminal vesicles, and prostate were diminished after 1 mo. (French summary)

11217. **Ranje, Christer & Ungerstedt, Urban.** (Karolinska Inst, Stockholm, Sweden) **Chronic amphetamine treatment: Vast individual differences in performing a learned response.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 307-311.—Trained 21 male Sprague-Dawley rats to swim an under-water Y maze. The position of the arm open to the water surface was indicated by difference in illumination between the 2 arms. After learning was completed, swim time and number of errors were recorded during treatment with dextroamphetamine (5-6 mg/kg). Repeated exposure to dextroamphetamine caused pronounced difference in the performance between individual Ss: some Ss behaved like the controls, while others showed progressively worse performance with each dose of dextroamphetamine even when the doses were spaced 12 days apart, indicating the priming effect of a single treatment. Results are discussed in relation to conflicting results in the literature concerning the effect of chronic amphetamine treatment. (17 ref)—*Journal abstract*.

11218. **Rhodus, Deborah M.; Elsmore, Timothy F. & Manning, Frederick J.** (Walter Reed Army Inst of Research, Washington, DC) **Morphine and heroin effects on multiple fixed-interval schedule performance in rats.** *Psychopharmacologia*, 1974, Vol 40(2), 147-155.—In Exp I 3 male Long-Evans hooded rats were trained to stability on a multiple fixed-interval (FI) 60-sec FI 60-sec schedule in which one component ended with food pellet reinforcements and the other with saccharin solution reinforcements. Morphine sulfate in intraperitoneal doses 3, 9, and 27 mg/kg and doses of heroin hydrochloride 1, 3 and 9 mg/kg produced roughly comparable dose-related decreases in both rate of responding and index of curvature in both the food and saccharin components. Exp II with 6 male Wistar albino rats investigated the effects of repeated administration of equivalent doses of morphine sulfate (7.5 mg/kg) and heroin hydrochloride (3.0 mg/kg) on responding in the above multiple FI 60-sec, FI 60-sec schedule. Increases in rates of responding were noted following 1 or 2 injections. Drug effects on FI scalloping diminished after a few injections. The present studies demonstrate a morphine-heroin equivalency ratio consistent with that used to produce analgesia. (23 ref)—*Journal abstract*.

11219. **Robert, A.; Nezamis, J. E.; Lancaster, C. & Badalamenti, J. N.** (Upjohn Co, Experimental Biology,

Kalamazoo, MI) **Production of duodenal ulcers in the rat by administration of digitoxin.** *Experientia*, 1974, Vol 30(7), 781-783.—Studied 100 male and 100 female rats. Male Ss showed a significantly greater resistance to digitoxin intoxication. (French summary)

11220. **Roerig, David L.; Hasegawa, Andrew T. & Wang, Richard I.** (Wood VA Ctr, Pharmacology Research Lab, WI) **Effect of phenobarbital pretreatment on the metabolism and biliary excretion of methadone.** *Biochemical Pharmacology*, 1975(Feb), Vol 24(3), 355-362.—Experimental data in rats suggest that enhancement of methadone metabolism by phenobarbital (PB) pretreatment was responsible for increased biliary excretion of methadone. Metabolism studies in vitro, using hepatic microsomes from PB-treated Ss, suggest that PB pretreatment enhances the metabolism of methadone in vivo. (25 ref)

11221. **Rolls, E. T.; Kelly, P. H. & Shaw, S. G.** (U Oxford, England) **Noradrenaline, dopamine, and brain-stimulation reward.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 735-740.—In 2 experiments with a total of 16 male Wistar albino and Lister hooded rats, attenuation of self-stimulation produced by blockade of noradrenaline receptors (phentolamine) or inhibition of noradrenaline synthesis (disulfiram) was associated with sedation (defined by decreased locomotor activity and decreased rearing). Attenuation of self-stimulation produced by blockade of dopamine receptors was associated with only minor sedation. Thus when both arousal and self-stimulation were measured, it was found that noradrenaline was less specifically involved in self-stimulation than dopamine. The noradrenergic theory of reward cannot be accepted until it is shown that noradrenaline has an effect on reward aspects of self-stimulation independently of its general effects on behavior measured here by locomotor activity and rearing. (48 ref)—*Journal abstract*.

11222. **Samson, Herman H. & Falk, John L.** (Rutgers State U, New Brunswick) **Ethanol and discriminative motor control: Effects on normal and dependent animals.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 791-801.—Examined the effects of ethanol in 4 male Holtzman albino rats using a task in which food pellets were made available if a manipulandum was held within a specified forceband for a fixed period of time. Following performance stabilization, the effects of acute doses of ethanol (1, 2, 3, and 4 g/kg) were determined. Ss were placed on a schedule-induced polydipsia regimen to produce chronic ethanol overdrinking, and the effects of additional acute doses of ethanol upon the task were determined. After various periods of ethanol overdrinking, the effects of short-term (5-10 hrs) ethanol withdrawal upon the motor task were evaluated. Following 10 mo of chronic ethanol overdrinking, the effects of complete ethanol withdrawal upon the motor task were examined. Prior to chronic ethanol exposure, only doses that produced blood ethanol levels above 120 mg/100 ml blood (3.5-4 g/kg) affected motor performance. Following chronic ethanol overdrinking, blood levels of over 230 mg/100 ml blood were needed to produce performance decrements, indicating the development of marked tolerance. Complete ethanol withdrawal disrupted performance for up

to 72 hrs, which is similar to the time course noted in the human alcoholic abstinence syndrome. (15 ref)—*Journal abstract.*

11223. **Samson, Herman H. & Falk, John L.** (Rutgers State U. New Brunswick) **Schedule-induced ethanol polydipsia: Enhancement by saccharin.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 835-838.—Examined the effect on the ethanol intake of male Holtzman albino rats of adding sodium saccharin to a 5% ethanol solution. 13 Ss were maintained at 80% of their free-feeding weight, in their home-cages with either 5% ethanol, or 5% ethanol-25% sodium saccharin as the only fluid available for 3 mo. 4 Ss were maintained in cages with automatic food dispensers that provided a 24-hr feeding regimen known to produce ethanol overdrinking. These Ss had 5% ethanol as their only available fluid for 1 mo, followed by the 5% ethanol-25% sodium saccharin mixture for 2 mo. No significant differences in ethanol intake were found between the 2 home-cage conditions. However, the addition of saccharin in the schedule-induced condition produced a marked increase in ethanol intake. The home-cage Ss showed no sign of an abstinence syndrome upon substitution of water for ethanol. In the schedule-induced group, severe tonic-clonic seizures occurred as a result of ethanol withdrawal.—*Journal abstract.*

11224. Sanghvi, I. S.; Singer, G.; Friedman, E. & Gershon, S. (New York U, Medical Ctr) **Anorexigenic effects of d-amphetamine and L-DOPA in the rat.** *Pharmacology, Biochemistry & Behavior*, 1975 (Jan-Feb), Vol 3(1), 81-86.—Compared the effect of amphetamine and levodopa in 200 22-hr food- and water-deprived male white Sprague-Dawley rats. Amphetamine produced marked anorexia, and levodopa significantly reduced food intake at 200 mg/kg. Following pretreatment with RO 4-4602, a decarboxylase inhibitor, 100 mg/kg of levodopa, a dose that did not significantly affect eating, produced marked anorexia. The anorectic effect of both amphetamine and levodopa was antagonized by propranolol. Phentolamine potentiated the anorectic effect of amphetamine and levodopa. Haloperidol (.1 mg/kg) failed to prevent the anorexia due to amphetamine but accentuated that due to levodopa. Methysergide, a serotonin antagonist, also failed to prevent the anorexigenic effect of amphetamine. Finally, the administration of levodopa with or without peripheral decarboxylase inhibition resulted in more than twice the increase in hypothalamic dopamine levels without significant changes in 5-hydroxytryptamine or norepinephrine levels. Data indicate a functional role for both norepinephrine and dopamine neurons in feeding behavior in the rat. (30 ref)—*Journal abstract.*

11225. Sbordone, Robert J. & Carder, Brooks. (U California, Los Angeles) **Mescaline and shock induced aggression in rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 777-782.—In 2 experiments a total of 66 male Sprague-Dawley rats were treated with mescaline and tested in a shock-induced aggression situation. Low doses (10 mg) prolonged the bouts in Exp I but not in Exp II. The topography of the fighting behavior for the Ss given this dose was like that of controls. Doses of 50 mg/kg increased the duration of the bouts and caused fighting to continue during a 5-min

period following shock termination. In addition, the topography of the behavior changed. The Ss treated with 50 mg/kg of mescaline were initially inactive and unresponsive to shock. After a few shocks, however, these Ss engaged in prolonged biting attacks while in a prone position. It is proposed that the higher dose of mescaline induced an experimental catatonia in which normal inhibitory mechanisms that control and limit aggressive behavior were ineffective. (17 ref)—*Journal abstract.*

**abstract.**  
11226. Schaefer, Gerald J.; Barrett, Robert J.; Sanders-Bush, Elaine & Vorhees, Charles V. (VA Hosp, Nashville, TN) **p-Chloroamphetamine: Evidence against a serotonin mediated learning deficit in PKU.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 783-789.—In 4 experiments, offspring of Sprague-Dawley rats were injected subcutaneously with 5.0 mg/kg of p-chloroamphetamine (PCA) or saline from 1-28 days of age. Groups treated with PCA showed hypoactivity in the open field at 29, 50, and 75 days of age when compared to Ss treated with saline and facilitated avoidance in Y-maze acquisition at 57-61 days of age. At 36 and 68 days of age, at the time of behavioral testing, brain serotonin (5HT) was reduced slightly or not at all. However, in separate groups, brain 5HT was reduced 23% and 35% in 14 and 26 day-old Ss after only a single treatment with PCA, suggesting that 5HT was reduced during the treatment period. At 66-68 days of age, 5HT turnover was also unaltered. Results suggest that the behavioral effects were due to neonatal 5HT depletion during a critical period of development rather than a concurrent 5HT depletion at the time of behavioral testing. Moreover, these data are at variance with the concept that neonatal 5HT depletion impairs learning ability and is the underlying CNS defect in phenylketonuria. (40 ref)—*Journal abstract.*

11227. **Schechter, Martin D.** (Eastern Virginia Medical School, Norfolk) **Effect of nicotine on response to frustrative non-reward in the rat.** *European Journal of Pharmacology*, 1974(Dec), Vol 29(2), 312-315.—Results of subjecting rats to frustrative nonreward in the Amsel double runway after administration of nicotine and saline reveal that nicotine decreased the magnitude of the frustrative effect when compared to saline. This finding is interpreted in light of other studies reporting a decline in aggression after nicotine administration.

11228. **Schmidek, W. R. et al.** (U São Paulo, Inst of Biomedical Sciences, Brazil) **Influence of loxapine on the sleep-wakefulness cycle of the rat.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 747-751.—The sleep-wakefulness cycle was studied in 18 Wistar albino rats under the influence of intraperitoneal loxapine, a neuroleptic derived from oxazepine succinate. One single dose of the drug (4-1.6 mg/kg) had a marked effect in depressing the paradoxical sleep (PS), maximal within 30 min and lasting about 24 hrs. Frequency and mean duration of PS episodes were differentially affected. Synchronized sleep was only slightly affected by loxapine, whereas no significant changes of wakefulness amount were detected. Chronic administration of the drug induced similar changes which disappeared in about 5 days. (23 ref)—*Journal abstract.*



11229. Schnell, R. C.; Prosser, T. D. & Miya, T. S. (Purdue U, School of Pharmacy & Pharmacal Sciences) **Cadmium-induced potentiation of hexobarbital sleep time in rats.** *Experientia*, 1974, Vol 30(5), 528-529. —Attempted to determine the minimum effective dose of cadmium required to potentiate drug response and the peak time for this phenomenon. Cadmium was administered as the acetate salt to male Sprague-Dawley rats, while control rats received a volume-equivalent injection of saline. 8 control group rats and 33 rats who were administered varying doses of cadmium acetate were monitored. In Exp I, the minimum dosage required to prolong hexobarbital sleep time was 2.0 mg/kg. In Exp II, the sleep times of all cadmium-dosed rats were significantly prolonged when compared to controls. Implications for the issue of cadmium as an industrial pollutant are discussed. It is concluded that, in any attempt to link contaminants with biological response and environmental exposure, the dose-response relationship between contaminant and specific biological changes must be established. (German summary)—*R. S. Albin*.

11230. Schoenfeld, Ronald I.; Neumeyer, John L.; Dafeidecker, William & Roffler-Tarlov, Suzanne. (Squibb Inst for Medical Research, Behavioral Pharmacology Lab, Princeton, NJ) **Comparison of structural and stereoisomers of apomorphine on stereotyped sniffing behavior of the rat.** *European Journal of Pharmacology*, 1975(Jan), Vol 30(1), 63-68. —Results of studies in male Sprague-Dawley albino rats show that N-n-propylnorapomorphine (NPA) was 35 times more potent than apomorphine (APO) in producing stereotyped behavior. The effect of NPA was blocked by perphenazine but unaltered by  $\alpha$ -methyltyrosine pretreatment and was accompanied by a decrease in central dopamine turnover. It is concluded that the activity of APO and NPA appears to be primarily in the (-)-isomer and is diminished but not lost by removal of either hydroxyl group from the catechol ring system. (22 ref)—*Journal abstract*.

11231. Schulz, Rudiger; Cartwright, Christine & Goldstein, Avram. (Stanford U) **Reversibility of morphine tolerance and dependence in guinea pig brain and myenteric plexus.** *Nature*, 1974(Sep), Vol 251(5473), 329-331. —Studied the pharmacological alterations occurring during morphine tolerance and dependence in the guinea pig myenteric plexus and the central nervous system, and determined that they are completely reversible. Within 7 days following abrupt withdrawal, sensitivities to morphine, naloxone, adrenaline, dopamine, and 5-HT (serotonin) returned to normal. The time span of recovery after morphine withdrawal is very similar in the myenteric plexus and the central nervous system. The parallelism appears to support the likelihood of a common underlying mechanism in both nervous tissues. The subsensitivities and supersensitivities accompanying morphine tolerance also appeared to reverse themselves. Findings support the view that opiate tolerance and dependence can disappear rapidly and completely. (18 ref)—*A. de la Haba*.

11232. Scott, D. F.; Schwartz, M. S.; Farrant, G. W. & Speirs, C. F. (London Hosp, Section of Neurological Sciences, England) **The importance of methodology in**

**drug studies using EEG.** *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 670-672. —During a double-blind investigation of a new adamantane compound (LRCL-1148) for its possible central nervous system depressant effects, the 8 normal volunteer Ss all showed more marked drowsiness and sleep in the 2nd EEG recording as compared with the 1st. The use of a strictly balanced design with placebo control showed that these EEG changes were not the result of drug administration but an order effect. (French summary)

11233. Sebens, Jantiena B. & Korf, Jakob. **Cyclic AMP in cerebrospinal fluid: Accumulation following probenecid and biogenic amines.** *Experimental Neurology*, 1975(Feb), Vol 46(2), 333-344. —Determined levels of cyclic adenosine 3' 5' -monophosphate (AMP) in rabbit cisternal cerebrospinal fluid (CSF) under a number of conditions. Ss were albino chinchillas and mixed breed rabbits. Cyclic AMP in CSF was increased by probenecid (intraperitoneally); this increase was not influenced by tricyclic antidepressant drugs, haloperidol, isoprenaline, or levodopa. Cyclic AMP, administered intravenously, did not penetrate into CSF. Intracisternally introduced noradrenaline, isoprenaline, dopamine, histamine, and intravenously injected isoprenaline all increased the CSF levels. Results indicate that cyclic AMP in the CSF is of central origin and is eliminated by a probenecid sensitive transport mechanism. (29 ref)—*Journal abstract*.

11234. Semmes, Josephine; Porter, Louis & Randolph, Mary C. (NIMH, Bethesda, MD) **Further studies of anterior postcentral lesions in monkeys.** *Cortex*, 1974(Mar), Vol 10(1), 55-68. —Monkeys with unilateral ablation of the hand area in the postcentral gyrus opposite the hand tested are reported to be severely impaired in somesthetic discrimination tasks. Earlier investigations had revealed either moderate or no impairment following complete bilateral removal of the postcentral gyri. An attempt was made to reconcile these divergent findings by exploring factors which might ameliorate the deficit: preoperative training on all tasks, a 6-mo recovery period, and complete or bilateral postcentral removals. None of these factors proved to be effective in lessening the severity of the impairment. It is suggested that, in the earlier studies, the representation of the finger tips near the bottom of the posterior bank of the central sulcus may have been spared.—*R. Gunter*.

11235. Shearer, Donald E.; Fleming, Donovan E.; Bigler, Erin D. & Wilson, Charles E. (VA Hosp, Neuropsychology Research Lab, Salt Lake City, UT) **Suppression of photically evoked after-discharge bursting following administration of anticonvulsants in waking rats.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 839-842. —Examined tridione, depakine, and dilantin with respect to their effect on the occurrence of photically evoked after-discharge (AD) bursting in 10 male, implanted Holtzman albino rats. It was observed that each of these anticonvulsants reliably suppressed AD bursting, although tridione and depakine were significantly more effective than was dilantin. Results are attributed to the locus of action of the anticonvulsants and suggest the usefulness of AD as an

index of the effectiveness of thalamically active drugs. (20 ref)—*Journal abstract*.

11236. Squire, Larry R. & Barondes, Samuel H. (U California, San Diego) **Memory impairment during prolonged training in mice given inhibitors of cerebral protein synthesis.** *Brain Research*, 1973, Vol 56, 215-225. —Unlike cycloheximide (CXM), isoCXM, which depresses activity like CXM but does not inhibit cerebral protein synthesis, had no effect on task acquisition by mice in a Deutsch Carousel. Studies of the effects of different doses of CXM on activity, cerebral protein synthesis, the acquisition effect, and memory 24 hrs after brief training tended to associate the acquisition effect with inhibition of cerebral protein synthesis rather than with side effects of CXM. Results suggest that impairment in learning observed a few minutes after the beginning of prolonged training is due to inhibition of protein synthesis. Expression of normal memory may depend on cerebral protein synthesis within minutes after the beginning of training.—*Journal summary*.

11237. Stern, J. A.; Bremer, D. A. & McClure, J. (Behavior Research Lab, St Louis, MO) **Analysis of eye movements and blinks during reading: Effects of Valium.** *Psychopharmacologia*, 1974, Vol 40(2), 171-175. —Monitored visual search activity during reading in 18 paid volunteer male undergraduates before and after a week long, double-blind regimen of Valium or placebo. Although Valium had little or no subjectively recognizable effect on the Ss, computer analyses of electrooculograms did indicate significant changes in the Valium group. Administration of Valium resulted in an increase in frequency of long fixation pauses, a general increase in duration of fixations following a line shift, and a decrease in velocity of saccadic eye movements during line shifts. The specific changes identified were consistent with an overall decrease in material read in the 2nd session in the Valium group.—*Journal abstract*.

11238. Syme, Lesley A. & Syme, G. J. (U Western Australia, Nedlands) **Group instability and the social response to methamphetamine.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 851-854. —Investigated the effects of intraperitoneal methamphetamine on body contact and social distances in 14 stable (familiar) and 14 unstable (unfamiliar) male New Zealand Black and White hooded rats. Although there was no difference in body contact in the stable and unstable saline groups, methamphetamine reduced body contact significantly more in the unstable group than it did for its stable counterpart. Methamphetamine had no effect on social distance in the unstable group but decreased social distance in the stable group. Group stability may therefore be not only desirable but necessary, if the effects of drugs on social responses are to be meaningfully interpreted. (23 ref)—*Journal abstract*.

11239. Tang, Maisy & Falk, John L. (Rutgers State U) **Dilutional hyponatremia due to diazoxide-produced polydipsia.** *Pharmacology, Biochemistry & Behavior*, 1975(Jan-Feb), Vol 3(1), 115-119. —In an experiment with 28 male Holtzman rats, subcutaneous injection of diazoxide every 3 hrs for a total of 5 doses in 15 hrs produced a state of elevated drinking and antidiuresis resulting in a massive, positive, self-imposed water load.

Dilutional hyponatremia was present, but not serum hyposmolality, owing to the increasing serum glucose and blood urea nitrogen. The mechanism by which diazoxide produces a polydipsia even in the presence of an accumulating water load may illuminate the genesis of other pathophysiological dilutional states. (34 ref)—*Journal abstract*.

11240. Thompson, Donald M. (Georgetown U, Medical School) **Repeated acquisition of response sequences: Effects of d-amphetamine and chlorpromazine.** *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 741-746. —3 male White Carneaux pigeons obtained food by making 4 responses on 3 keys in a specified sequence. All 3 keys were the same color throughout the response sequence. Under the learning condition, the 4-response sequence was changed from session to session. After learning (within-session error reduction) had stabilized, this baseline of repeated acquisition was used to assess the effects of varying doses of dextroamphetamine and chlorpromazine. For comparison, the drug tests were also conducted under a performance condition, in which the 4-response sequence was the same from session to session. Increases in total errors and pausing were obtained at the largest dose of each drug under both the learning and performance conditions. Under the learning condition, the error rate decreased across trials within each session, but the degree of negative acceleration was less in the drug sessions than in the control sessions. In contrast, under the performance condition, the error rate was relatively constant across trials, but was higher in the drug sessions than in the control sessions. (29 ref)—*Journal abstract*.

11241. Tseng, Liang-Fu; Loh, Horace H. & Wei, Eddie T. (U California, San Francisco) **Effects of clonidine on morphine withdrawal signs in the rat.** *European Journal of Pharmacology*, 1975(Jan), Vol 30(1), 93-99. —Studied the influence of clonidine on the naloxone-induced withdrawal signs, escape attempts, and precipitated shakes in morphine-dependent male Sprague-Dawley rats. Clonidine injected intraperitoneally or intravenicularly (iv) inhibited precipitated shakes and potentiated escape attempts induced by naloxone. Under pentobarbital anesthesia, precipitated shakes and ice-water-induced wet shakes were inhibited by clonidine and norepinephrine. Clonidine injected iv reduced body temperatures in morphine-implanted and in placebo-pellet-implanted Ss. Naloxone reduced body temperatures only in morphine-dependent Ss but not in placebo-pellet-implanted Ss. It is suggested that clonidine modulates morphine withdrawal signs by potentiating the behavior associated with heat dissipation (escape attempts) and by inhibiting the behavior associated with heat gain mechanisms (precipitated shakes). These effects may occur via stimulation of central noradrenergic mechanisms. (31 ref)—*Journal abstract*.

11242. Vista Hill Foundation. (San Diego, CA) **Sleep and sleeping pills.** *Drug Abuse & Alcoholism Newsletter*, 1974(Nov), Vol 3(7), 1-3. —Discusses the nature of sleep, of insomnia, and of drugs used to ameliorate insomnia. The 5 cycles of sleep are identified with particular reference to REM and non-REM states. Persistent sleep loss is described in terms of the biological rhythm of waking and sleeping and in terms of the 3 most common



kinds of insomnia: difficulty in falling asleep, broken sleep, and early morning awakening. The prevalence of these problems among older people is cited. The role of various drugs (e.g., cannabis, LSD and other hallucinogens) in sleep is delineated, and the misuse of sleeping medications is documented. Sleeping pills are discussed as a suicide agent, as a producer of insomnia when tolerance occurs, and as drugs of abuse. Recommendations are made for the use of alternative drugs in treating the insomnia problem. Specifically, it is suggested that muscle relaxants and tranquilizers be used either by themselves or in combination with sleep-inducing medication to assuage the tolerance effect usually found after prolonged ingestion of the latter.—R. S. Albin.

11243. **Vuillaume, Monique & Berkaloff, André** LSD treatment of *Pieris brassicae* and consequences on the progeny. *Nature*, 1974(Sep), Vol 251(5473), 314-315.—Studied 3 generations of *Pieris brassicae* to determine the effects of LSD treatment. It was found that progeny of LSD-treated parents possessed higher resistance to the substance, and physiological effects were detectable even several generations after treatment.

11244. **Yehuda, Shlomo**. (Bar-Ilan U, Ramat-Gan, Israel) *d*-Amphetamine and the sensory role of a rat's tail in thermoregulation or What the rat's tail tells the rat's brain. *Behavioral Biology*, 1975(Feb), Vol 13(2), 233-238.—The tail of a rat is one of the major effector organs in thermoregulation, aiding it to overcome excessive environmental heat. In addition, it also serves as a temperature-sensing organ. 2 sets of experiments with a total of 250 male Sprague-Dawley albino rats demonstrated the importance of the tail's sensory role in tailless Ss kept at various ambient temperatures, and in Ss whose tail and body were exposed to different ambient temperatures. When the tail sensed a cold ambient temperature (15-0°C), the body temperature increased, even if the S itself was kept at room temperature (20°C). Dextroamphetamine treatment enhanced the hyperthermia induced by the tail's exposure to cold temperature and caused an impairment of the tail's thermal sensory role.—*Journal abstract*.

11245. **Yew, D. T.; Ho, A. K. & Meyer, D. B.** (Wayne State U, Medical School) Effect of 6-hydroxydopamine on retinal development in the chick. *Experientia*, 1974, Vol 30(11), 1320-1322.—Studied the role of the catecholamine transmitter system on retinal development in the chicken. 120 fertile chicken eggs were divided into 3 groups: one treated with 6-hydroxydopamine (6-OHDA), the second with the vehicle solution, and the third untreated. Eggs with 19-day-old chick embryos were removed from the incubator, opened, the eyes removed, stained, and examined. The defective development of the inner segments, and the failure of the outer segments to develop at all, were noted. Photoreceptor malformation appeared to be related to the 6-OHDA dosage and the time of administration. Results indicate that 6-OHDA can induce developmental defects in the photoreceptors of the chick retina. (German summary)—R. Tomasko.

11246. **Zakharova, N. N.** (Central Serbsky Forensic Psychiatry Research Inst, Moscow, USSR) [The effect of seduxen on the perceptive and other functions of the central nervous system under emotional stress in man.]

(Russ) *Farmakologiya i Toksikologiya*, 1974(Jul-Aug), Vol 37(4), 396-398.—Studied the effects of seduxen (10 mg, introduced intramuscularly) on the perception of external signals (bursts of white noise) and on a variety of brain and autonomic functions under conditions of emotional stress in human Ss. Emotional stress was created by presenting single words concerned with conflict situations. Under normal conditions this dosage of seduxen had no effect on the perception of acoustic signals or on brain and autonomic functions. Under emotional stress, when all these functions change, seduxen significantly smoothed out the changes. (English summary)—A. G. Pook.

11247. **Zakusov, V. V.** (USSR Academy of Medical Sciences, Inst of Pharmacology, Moscow) [The influence of prolonged application of tranquilizers and antidepressants on the summational capacity of the central nervous system.] (Russ) *Farmakologiya i Toksikologiya*, 1974(Jul Aug), Vol 37(4), 389-390.—Studied the effects of diazepam, imipramine, and phthoracizine on the summation of impulses of the central nervous system in 18 intact rabbits. Electrical stimulation was applied to I of the hind limbs, and the number of stimuli necessary to provoke a motor response was determined. The preparations were introduced intravenously daily for 30 days. All 3 had a stimulating effect in small doses and a depressing effect in large doses, after both a single administration and prolonged administration. Diazepam and phthoracizine showed a more persistent effect than imipramine on the summation of impulses over a prolonged period. (English summary)—A. G. Pook.

11248. **Zenick, Harold**. (New Mexico Highlands U) Behavioral and biochemical consequences in methylmercury chloride toxicity. *Pharmacology, Biochemistry & Behavior*, 1974(Nov-Dec), Vol 2(6), 709-713.—Assessed the developmental periods during which exposure to methylmercury chloride (MMC) would result in permanent learning deficits in Holtzman albino rats. In addition, the mercury (Hg) content of the brain at these different stages was measured. 280 offspring of 35 mothers were tested. Offspring (30 days of age) of mothers exposed during gestation and offspring exposed directly to MMC for 9 days after weaning exhibited the greatest learning deficits on a water escape T maze. These deficits persisted through a retest session 21 days later. Biochemical analysis of brain Hg content indicated that Hg need not be present for these learning deficits to occur.—*Journal abstract*.

## ANIMAL PSYCHOLOGY

11249. **Altmann, Geza & Lanf, Siegnot**. (U des Saarlandes, Zoologisches Inst, Saarbrücken, W Germany) [Territory choice of white mice under Faraday conditions and in electrical fields.] (Germ) *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 337-344.—Studied territory choice of CFI W68 SPF adult female mice in 3 connected cages, each of which was in a different electrical field. When the choice was among Faraday conditions (A), a step impulse field (10 Hz, 3500 V/m) (B), and a d.c. field (3500 V/m) (C), A was clearly preferred for a nest site and usually B for a playground.

If the choice was among normal conditions, A, and B, normal conditions were preferred for the nest site and again B for the playground. If the step impulse field was reduced to 180 V/m, nest site and playground were found as frequently in the step impulse field as in the cage with normal conditions. Findings show that mice are able to differentiate between various electrical fields; however, olfactory orientation had greater effects than the electrical parameters.—*English summary.*

11250. Barnett, S. A. & Walker, K. Z. (Australian National U, Canberra, ACT) **Early stimulation, parental behavior, and the temperature of infant mice.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 563-577.—Conducted experiments with wild house mice and 3 inbred strains of mice (A2G/Tb, A/Tb, and C57BL/Tb) to examine the effects of early conditions of rearing on parental attention and on the heat exchanges of the infant mice. Results indicate that surface temperatures of wild and laboratory infant mice decreased after parental licking or loss of contact with the litter and increased on contact with the mother. Temperatures also increased rapidly if the mouse was held on the E's hand. (49 ref)—*Journal abstract.*

11251. Busnel, R.-G.; Busnel, M.-C. & Lehmann, A.-G. (CNRZ, Lab de Physiologie Acoustique, Jouy-en-Josas, France) **Synergic effects of noise and stress on general behavior.** *Life Sciences*, 1975(Jan), Vol 16(1), 131-137.—Studied the effects on the behavior of C57 and Swiss Rb albino male mice of noise associated with Ss' swimming performances with weight attached to their tails. Results show that there was a reduction of the latency time prior to submersion even at intensities as low as 60 db, independent of the frequency, in the range of mouse auditory discrimination. Furthermore, there was an increase in central nervous system excitability, which appeared in the reduction of the immobile time before swimming and in the increased number of seizures during the 1st 10 min of swimming. These last effects were linked with the frequency as well as with the intensity of the noise.—*Journal abstract.*

11252. Ewer, R. F. & Wemmer, C. (U Ghana, Legon) **The behaviour in captivity of the African civet, *Civettictus civetta* (Schreber).** *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 359-394.—Describes expressive movements, including an appeasement action and other behavior. Besides defensive and distress vocalizations, there is a socially positive contact call and another believed to be a female sex call. Comfort movements, grooming, micturition, defecation, scent markings, and the methods of killing prey are described. Eating of prey is normally from the head down. Strong smelling foods frequently evoke scent-rubbing, the chin, neck, and shoulder being repeatedly rubbed along the food. The posture adopted by the female during mating is similar to that of the domestic cat. The development of the young is described, including defensive responses, play, and ontogeny of prey capture. The female's methods of providing the young with solid food are described, including the fact that their rudimentary nature is correlated with a prolonged lactation period. The possible significance of civet behavior in relation to the evolution of more complex patterns of the *Felidae* is

discussed. (German summary) (28 ref)—*Journal summary.*

11253. Hidaka, Toshitaka. (Tokyo U of Agriculture & Technology, Lab of Biology, Japan) **Logic of mating behavior of lepidoptera.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 70-76.—Stresses that the comparative research method should be used to find a general logic by comparing the whole life of species with each other. That this approach enables workers to discern themes of evolution is illustrated by the study of mating behavior in the butterfly and in the moth. The mating behavior of the butterfly begins with an initial phase guided by a visual cue which requires zigzag flying patterns. The next phase—a confirmatory one—involves short-range olfaction. The final phase—contact chemical phase—results in species recognition via antennal contact with the female body. Omission of 1 or 2 of these phases can still yield success. The mating behavior of moths is also detailed, resulting in a determination of the logic inherent in both sets of behavior. Comparative studies thus elucidate the theme hidden by variations in nature.—R. S. Albin.

11254. Hirsch, Jerry. (U Illinois) **Nonadaptive tropisms and the evolution of behavior.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 84-88.—Focuses on a property of both animals and plants from which an assessment of the evolutionary role of the electromagnetic features of the environment can be made. Tropisms (oriented, forced, nonadaptive movements) are exhibited by species under certain conditions of light, gravity, and electric and magnetic fields. Research is reported that supports the notion of tropisms as both adaptive and nonadaptive behaviors. Abnormal situations readily make manifest such tendencies and permit researchers to articulate the intrinsic architecture and dispositions of species. Tropisms are viewed as the expression of an interaction between the electromagnetic forces of the environment and the very organization of organisms, which comprises polarized assemblies of polarized molecules.—R. S. Albin.

11255. Kaiser, Heinrich. (U Köln, Zoologisches Inst, W Germany) **[Behavioural patterns and temporal behaviour in the dragonfly *Aeschna cyanea* (Odonata).]** *(Germ) Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 398-429.—Reports on 10 yrs of observations of dragonflies in several locations. During feeding flights they hardly react to conspecifics which cross their path. Males that are ready to copulate fly in a patrol characterized by constant height, frequent hovering, fighting with other males, and attempts to mate with females. The frequency of hovering declines during the patrol and the other characteristics of patrol flights also become less noticeable. In mating the male grasps the female from above and behind while flying and gets into a copulatory position. Copulation lasts about 2 hrs. Resting and basking postures are described. Eye cleaning is done with the forelegs during rest. Cleaning of wings and abdomen occurs in mid-flight, mainly as displacement activity. There is no evidence of territoriality, but the concept of temporal behavior is introduced. This consists of intraspecific aggression which is not bound to a limited area, but is time-dependent and causes a



temporal sharing of a certain area. (71 ref)—*English summary.*

11256. Keeton, William T. (Cornell U) **The mystery of pigeon homing.** *Scientific American*, 1974(Dec), Vol 231(6), 96-107.—Describes several studies suggesting that homing pigeons use both the position of the sun and magnetic information to determine the home direction. Inexperienced pigeons need both types of information, but experienced pigeons are probably able to weigh conflicting information. Vision is necessary for navigation only during the final approach to the home loft. A commonly-found bias in initial bearings following release is related to the characteristics of the release site and not to some peculiarity of the birds. Other suggested sources of information are discussed; several of these have not been supported by the data, and others need further testing.—*P. Tolin.*

11257. Losey, George S. (U Hawaii, Inst of Marine Biology) ***Aspidontus taeniatus*: Effects of increased abundance on cleaning symbiosis with notes on pelagic dispersion and *A. filamentosis* (Pisces, Blenniidae).** *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 430-435.—Conducted field studies at Eniwetok Atoll from 1969 to 1972. A recent increase in the number of *Aspidontus taeniatus*, an aggressive mimic of the cleaner fish, has not had any obvious effects on the cleaning symbiosis involving the model species *Labroides dimidiatus* and its hosts. The host species appear to discern the mimic despite its close resemblance to the model. Pelagic floating behavior by young *A. taeniatus* may provide maximal distribution of the mimics throughout the available habitats. This floating stage has apparently been described as *A. filamentosus*. (German summary) (15 ref)—*Journal summary.*

11258. Lown, Bradley A. (State University Coll New York, Buffalo) **Effects of age on open-field behavior of the guinea pig.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1170.—A study of 21 male pigmented guinea pigs indicates that neonatal Ss aged 2 wks showed less activity than did the young adults aged 3 mo or mature adults aged 6 mo. This effect conflicts with other recent research indicating no developmental changes in activity in the guinea pig.

11259. Pribram, Karl H. (Stanford U) **The comparative psychology of communication: The issue of grammar and meaning.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 135-143.—Applies the methodology of comparative psychology to the study of grammar and meaning in the brains of primates. Meaning is defined to include both reference and use and can be of 2 kinds: the significant and the symbolic. Grammar is considered as a form of logic, especially as it refers to the ordering of sequential dependencies among communicative occurrences. Phrase structures that derive from this ordering are observable in animals other than humans (e.g., birds). Context-sensitive and context-free constructions lead to significant and symbolic communication among animals. Signs seem to function as a frame of reference for the communication through the identification of invariant properties. Symbolic behavior seems to refer to recurrent variances. Thus grammar (the structure of redundancies) and meaning (the resultant content) are related. It is concluded that

through a study of communication by linguistic speech, the study of the comparative psychology of the cognitive processes can proceed. (27 ref)—*R. S. Albin.*

11260. Sackett, Gene P. (U Washington, Regional Primate Research Ctr) **Sex differences in rhesus monkeys following varied rearing experiences.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11261. Syme, Lesley A. (U Western Australia, Nedlands) **Influence of age and sex on the behavior of rats deprived of the rearing response.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 35-39.—One component of "general activity"—rearing on the hind legs—was restricted in 28 male and 26 female New Zealand Black and White rats both before (25 days) and after (50 days) the development of this response. In contrast to previous restriction studies, Ss were kept in groups and allowed free locomotor activity in the cage environment. After 8 wks, open-field testing showed that selective restriction decreased the frequency of rearing behavior, particularly unsupported rearing which requires physical coordination and balance. Effects were greater for females (which usually rear more than males) and for Ss restricted at weaning (25 days).—*Journal abstract.*

11262. Wickler, W. (Max Planck Inst for Behavioral Physiology, Seewiesen, W Germany) **Ethological analysis of convergent adaptation.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 65-69.—Notes that the main goal of ethology is to study the selective consequences of a given behavior. One way to discover the adaptive significance of a trait is to compare similar ones that have evolved independently in different groups of animals, thus studying convergently evolved comparative behavior characteristics. Pair bonding in cichlid fishes, shrimps, and birds is described with reference to the intensity of attraction, the degree of exclusiveness, and the degree of synchronization between the partners. It is concluded that "pair bonding" and the resulting "monogamy" are functional terms that indicate similar adaptive traits but not necessarily similar causal mechanisms. That the same reasoning is applicable to the concept "aggression" is demonstrable by reference to the varying criteria used to define it: the form, result, or content of behavior. The same result may, in different animals, be the outcome of quite different internal mechanisms. Aggression and bonding are but examples of behaviors that may have different meanings and antecedents for different species.—*R. S. Albin.*

### Learning & Motivation

11263. Anisman, Hymie & Wahlsten, Douglas. (Carleton U, Ottawa, Ontario, Canada) **Response initiation and directionality as factors influencing avoidance performance.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1119-1128.—Conducted 3 experiments with a total of 234 male Holtzman rats. Results indicate that permitting Ss to run in either of 2 directions to avoid shock (any-way training) resulted in performance superior to that of 1-way or 2-way avoidance. In the any-way condition, Ss often selected a bidirectional mode of responding. Exposure to signaled inescapable shock enhanced avoidance in all avoidance

modes. Any-way training enhanced subsequent 2-way avoidance to a greater extent than did 1-way training. Results are interpreted in terms of the need to learn directional responses in avoidance training, role of response initiation in modifying avoidance behavior, and the effectiveness of running responses in determining avoidance performance. (18 ref)—*Journal abstract*.

11264. Blanchard, R. J.; Kelley, M. J. & Blanchard, D. C. (U Hawaii) **Defensive reactions and exploratory behavior in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1129-1133.—Describes 2 experiments with 20 male Wistar-derived and 16 male albino rats. Results indicate that forced preexposure to a novel situation reduced subsequent latencies to leave the home cage and enter the novel situation (free-exploration task). This finding and the finding of motivated flight from a novel to a less novel situation indicate that novel situations produce a pattern of defensive reactions very similar to those elicited by fear stimuli. It is suggested that reactions to novelty may be based largely—or entirely—on a fear mechanism.—*Journal abstract*.

11265. Brooks, Charles I. (Wilson Coll) **Primary frustration differences following brief partial-reinforcement acquisition under varying magnitudes of reward.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 67-72.—Reports 2 experiments with a total of 93 male albino rats. In Exp I, Ss which had received 6 partially reinforced runway acquisition trials, with a reward magnitude of 60-sec access to wet mash on rewarded trials, showed less persistent responding over highly massed extinction trials than Ss which had received the same acquisition schedule but reward magnitudes of either 1 or 10 45-mg pellets. In Exp II, Ss which had received 6 partially reinforced placements into 1 compartment of a 2-compartment box, with 60-sec access to mash on rewarded placements, jumped a hurdle faster to escape nonreward than Ss which had received the same reward schedule but 10 45-mg pellets on rewarded trials. Data support a primary frustration analysis for reward-magnitude manipulations within brief partial-reinforcement schedules.—*Journal abstract*.

11266. Brown, Charles H. & Rilling, Mark E. (Michigan State U) **Stimulus delay and the reduction of errors in the transfer of stimulus control.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 21-27.—24 white Carneaux pigeons initially trained on a simultaneous discrimination of line orientation ((Stimulus 1, or S1) were subsequently transferred to a wavelength discrimination (S2). 3 transfer procedures were employed. The abrupt-transfer Ss were "abruptly" switched from S1 to the S2 dimension. The stimulus-compounding Ss were trained on a compound stimulus consisting of S1 and S2 displayed in superimposition prior to the presentation of S2 alone. The stimulus-delay Ss were trained on a compound stimulus in which the presentation of the S1 component was delayed for successively longer intervals as a result of a correct response to the preceding trial. Stimulus-delay Ss transferred by responding to S2 prior to the presentation of S1 and the resulting formation of the compound. Ss transferred by the stimulus-compounding and the abrupt-transfer procedures displayed 5 and 10 times as many errors to the S2 dimension,

respectively, as Ss receiving the stimulus-delay procedure. (19 ref)—*Journal abstract*.

11267. Brown, Robert T. (U North Carolina, Wilmington) **Following and visual imprinting in ducklings across a wide age range.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 27-33.—20 Peking ducklings ranging in age from 20 to 125 hrs were exposed to a moving silent object in an open circular apparatus until a criterion of 300 sec of following was met. All Ss met the criterion, and age did not correlate with the time required. In subsequent choice tests most Ss approached the imprinting object over a novel object, and age did not correlate with choice behavior. Results indicate that imprinting can occur over a fairly wide age range and that the traditional critical period for imprinting may, in part, be an artifact of laboratory methods. (21 ref)—*Journal abstract*.

11268. Capaldi, E. J. & Haggblom, Steven J. (Purdue U) **Response events as well as goal events as sources of animal memory.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 1-10.—Notes that current approaches emphasize the control exercised over behavior by various internal stimuli arising from goal events such as reward and nonreward. In contrast, certain earlier views emphasized the behavioral control exercised by internal stimuli arising from responding. The purpose of the present 3 experiments was to determine whether stimuli arising both from goal events and from response events control instrumental behavior, and if so, how much behavioral control is exercised by each. In the 3 experiments, a total of 156 male albino rats received partial reinforcement in a runway either at a 24-hr intertrial interval (ITI) or at both a 24-hr ITI and a shorter ITI (2 min, 15 min, 30 min, or 1 hr), with extinction always occurring at the shorter ITI. Results suggest that both goal-produced and response-produced internal stimuli control behavior simultaneously. In addition, it was found that at ITIs as long as 30 min, response-produced cues regulated responding about as strongly as goal-produced cues. (16 ref)—*Journal abstract*.

11269. Cone, Al L. (Lynchburg Coll) **Feeding time entrainment of activity and self-produced illumination change in a squirrel monkey.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 389-391.—Daily feeding time was changed or left the same for 4 20-day replications for 1 female squirrel monkey while quantifying tilt cage activity and number of illumination changes/hr. Periodic regression analysis indicates that a statistically significant circadian cycle (23.5-24.6 hrs) was present for each replication. Significant Phase  $\times$  Replication interactions verified that feeding time served as an effective entraining stimulus for the 2 dependent variables.—*Journal abstract*.

11270. Cooper, Peter H. & Trowill, Jay A. (U Denver) **Wood gnawing preference in rats.** *Physiology & Behavior*, 1974(Dec), Vol 13(6), 845-847.—Results of testing male Simonson rats for preferences among birch, mahogany, oak, and pine for gnawing indicated that mahogany was the most preferred. Its use is therefore suggested in future studies using wood gnawing as a behavioral measure.



11271. Costanzo, D. J.; Henke, P. G. & Bosley, D. R. (Muskingum Coll) **Reversal of visual discrimination problem and differential frustration effects in dominant and submissive rats.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 49-52.—Reports 2 experiments comparing performance in dominant and submissive male Wistar rats as determined by a food-competition procedure. The 48 Ss in Exp I were either trained to criterion or overtrained before being reversed on a visual discrimination task. Although the 2 groups did not differ significantly in learning the initial task, the dominant Ss were significantly slower on reversal than the submissives. Exp II, which utilized 26 Ss and a tandem runway, showed that when the reinforcer which maintained the running response was not available in the 1st goalbox, submissive Ss responded with a greater increase in running speed in the 2nd runway than dominant Ss. Findings are discussed as reflecting motivational differences between dominant and submissive rats.—*Journal abstract*.

11272. Davis, Stephen F. & Ludvigson, H. Wayne. (Austin Peay State U) **Differential conditioning as a function of exposure time to discriminative and nondiscriminative cues preceding response.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 385-388.—90 female albino Charles River rats received differential conditioning to large and small reward in a straight runway. 3 groups were confined to startbox for 0, 2, or 8 sec prior to the opportunity to traverse the runway, with no preresponse discriminative cues to signal reward magnitude until admission to the runway; 2 additional groups received the discriminative cues for 2 or 8 sec while confined in the startbox. All Ss learned the discrimination, though the sharp depression in performance to the negative stimulus (S-) found in certain other studies failed to appear. Discriminative cue presentation in the startbox did not influence performance. It is suggested that preresponse cues only influence a frustrative depression to S-, and that for unknown reasons such a depression failed to appear in this study. Startbox confinement depressed performance to both rewards, with longer durations producing greater depressions.—*Journal abstract*.

11273. Del Russo, Jon E. (Monmouth Coll) **Observational learning of discriminative avoidance in hooded rats.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 76-80.—Conducted an experiment with 50 Long-Evans hooded rats to determine the aspects of an observational situation facilitating subsequent acquisition of an observed task. 2 experimental groups were exposed to a model's performance of a 2-way discriminative shuttlebox avoidance task with a tone as the discriminative stimulus. One experimental group observed the performance of a naive demonstrator; the other experimental group observed a skilled demonstrator. A stimulus control group was exposed to the tone with no model present; a response control group observed demonstrator running with no tone present. A naive control group received no observational experience. All groups were subsequently tested on acquisition of the task. An analysis of variance on avoidance scores and Newman-Keuls tests for differences between means revealed that the 2 experimental groups performed significantly more

avoidances than the control groups. Exposure to the total tone-running sequence was found to be necessary for observational learning. Results are interpreted in terms of a sensory-sensory conditioning model.—*Journal abstract*.

11274. Doleys, Daniel M. & Davidson, Robert S. (VA Hosp, Miami, FL) **Repeated suppression and recovery of responding using response-produced electric shock.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1259-1268.—Stabilized the responding of 3 female White Carneaux pigeons on a fixed ratio (FR) 60 schedule of reinforcement. Response-produced electric shock, contingent upon the 60th response in each ratio, was introduced and systematically increased until responding was totally suppressed. The electric shock was removed, then reintroduced following the recovery of responding, and removed again after total suppression. The relationship between increased intensity of the electric shock and rate of responding was observed to be nonlinear. At several junctures responding increased when the intensity of the electric shock increased. The responding of each S under selected intensities of electric shock differed during the 2 periods when contingent electric shock was programmed. (16 ref)—*Journal abstract*.

11275. Dücker, G.; Nuttebaum, N. & Schulze, I. (U Münster, Zoologisches Inst, W Germany) [The influence of aggression on learning and forgetting in the fighting fish *Betta splendens* (Pisces, Anabantoidei).] (Germ) *Experientia*, 1974, Vol 30(7), 747-749.—Conducted 2 experiments, using 20 *Betta splendens* in each, to determine whether aggression-specific stimulation had any influence on learning and retention of a simple color discrimination task. Stimulated Ss showed poorer results than control Ss in learning and retention.—*English summary*.

11276. Etienne, Ariane S. (U Cambridge, England) **Age variability shown by domestic chicks in selected spatial tasks.** *Behaviour*, 1974, Vol 50(1-2), 52-76.—Assigned chicks to age groups (3, 6, and 13-14 days) and trained them to locate a worm which disappeared into a tunnel or behind a screen. Ss from each age group were then tested on 1 of 3 tasks varying in complexity; the worm disappeared (a) into a tunnel and reappeared on the other side, (b) behind a screen located at one end of a tube, or (c) behind 1 of 2 screens located at opposite ends of the test area. Capture latencies and percentage of rewarded trials were among the dependent variables recorded. In the 1st condition visual discovery of the worm occurred most rapidly in the oldest Ss, while in the 3rd condition the youngest chicks learned best to make the correct choice. Results are discussed in terms of place learning, response learning, and the cognitive viewpoint. (French summary) (30 ref)—S. R. Goldstein.

11277. Ettlinger, G. & Ridley, R. M. (Inst of Psychiatry, London, England) **Visual discrimination in the monkey: Distinguishing the incorrect response.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 111-113.—Trained 12 immature rhesus monkeys to learn 2 visual discrimination tasks and the reversals of these tasks under 2 conditions: (a) with the response panel (or lid of food-box) locked after incorrect response and (b) with the panel (or lid) unlocked after incorrect response. Criterion was achieved more rapidly during original

learning with the panel locked, but no significant difference was observed during reversal learning. It is suggested that improved performance resulted when the panel remained locked because either the outcome was more salient or because the incorrect response was more frustrating. (French & German summaries)—*Journal abstract*.

11278. Gamzu, Elkan & Williams, David R. (Hoffman-La Roche, Nutley, NJ) **The source of keypecking in autoshaping.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 37-42.—Trained 12 male Silver King pigeons to step on a treadle to operate a grain hopper, under the control of an auditory stimulus. Subsequently, autoshaping consisted of pairing illumination of a response key with some of the subsequent tone presentations, reinforcement occurring only after a treadle response. One control group did not have a treadle or a treadle-response requirement. A 2nd control group received random presentations of an illuminated key. Neither paired nor random key presentations had any effect on treadlepressing. However, the paired key groups showed acquisition of pecking to the key, while the random group did not. Data suggest that pecking in the autoshaping procedure is not profitably analyzed as part of an operant sequence; autoshaping may involve a structuring of response repertoires that is independent of the effects of contingent reinforcement and shaping. Autoshaping seems to be governed by empirical temporal laws akin to those of classical conditioning. (30 ref)—*Journal abstract*.

11279. Gormezano, I. & Coleman, S. R. (U Iowa) **Effects of partial reinforcement on conditioning, conditional probabilities, asymptotic performance, and extinction of the rabbit's nictitating membrane response.** *Pavlovian Journal of Biological Science*, 1975(Jan-Mar), Vol 10(1), 13-22.—Investigated the classical conditioning and extinction of the rabbit nictitating membrane response under 100% and 2 50% reinforcement conditions (50% equated total trials, and 50% equated reinforced trials) at average intertrial intervals of 30 and 60 sec. It was found that (a) partial reinforcement reduced the rate of conditioning, but all groups eventually attained performance levels near 100%; (b) 1st-order and 2nd-order conditional probabilities following reinforced and nonreinforced trials were virtually identical; and (c) no partial reinforcement extinction effect was observed. (23 ref)—*Journal abstract*.

11280. Hammond, Lynn J. & Harman, Joan. (Temple U) **Shock escape vs food-rewarded running in a successive discrimination.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 593-596.—Trained 2 groups of 20 male Sprague-Dawley rats for 100 trials on a successive discrimination in a runway where on half the trials nonreinforcement (S-) was preceded by an alleyway cue of darkness or ambient lighting. One group of hungry rats received food as a reward on reinforcement (S+) trials; while the other group of unhungry rats were shocked in the same runway and reinforced on S+ trials by shock termination in the goalbox, but nonreinforced by 30 sec delay of shock termination on S- trials. Ss given the appetitive training learned the discrimination within 20-30 trials, while those given aversive training

showed no evidence of forming a discrimination.—*Journal abstract*.

11281. Herman, Louis M. (U Hawaii) **Interference and auditory short-term memory in the bottlenosed dolphin.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 43-48.—Studied interference in auditory short-term memory in 1 female bottlenosed dolphin, using a delayed matching-to-sample task in 2 experiments. At each trial, 1 of 2 sample sounds, chosen randomly, was projected underwater for 4 sec and then, after a variable delay interval, both sounds were presented. A response to the sound matching the initial sample was reinforced. Correct matching was significantly reduced following short intervals between trials in combination with long delays after the sample (proactive interference), or when a near continuous irrelevant sound was inserted into the delay interval (retroactive interference). There was rapid habituation to interference if the irrelevant sound was short in duration relative to the delay interval. For both proactive and retroactive interference, the errors were predominantly responses to the sample sound appropriate to the prior trial rather than to the current trial, indicating that memory for the relative recency of events (temporal memory) was degraded by interference. When interference was deleted or minimized, temporal memory remained nearly perfect over 30-sec delay intervals. The longest tested. The importance of distinguishing between temporal memory and nontemporal, or event, memory in different forms of the delayed matching task is emphasized.—*Journal abstract*.

11282. Hurwitz, Harry M. (U Guelph, Ontario, Canada) **A note on the conditioned stimulus control of postshock responding.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 554-556.—Trained 6 female hooded rats to leverpress to avoid shock. Typically, Ss emitted a burst of lever responses whenever shock occurred. Following 35 avoidance training sessions, Ss were occasionally presented with a tone (conditioned stimulus; CS) for 1 min before an unavoidable, inescapable shock (unconditioned stimulus; UCS) was administered. Avoidance deteriorated dramatically during CS (conditioned suppression), but a burst of responses occurred on termination of CS-UCS. When CS was presented without UCS—the classical extinction procedure—avoidance rapidly recovered during CS, but the response burst made to the termination of CS diminished only gradually and as a function of the number of CS presentations.—*Journal abstract*.

11283. Jackson, Patrick S. (U Cambridge, England) **A method for measuring generalization of imprinting effects in young chicks.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1032-1037.—Describes 2 experiments, with a total of 180 Ross chicks as Ss, in which an attempt was made to construct a continuum of imprinting stimuli, together with a new method, the "stationary wheel," of estimating approach tendencies in young chicks. Ss were imprinted with 1 member of the continuum and either divided into subgroups, each of which was tested on 1 value of the continuum (Exp I), or tested on all values of the continuum (Exp II). Approach scores showed a significant decrement away from the training value at whichever end of the continuum chicks were trained.



Results show that the stationary wheel method yielded replicable approach data without the disadvantages inherent in the "arena-type" method of measurement. Analyses of a number of other measures, including peep calls, twitter calls, and approach orientation, are also discussed. (18 ref)—*Journal abstract*.

11284. Kadden, Ronald M.; Schoenfeld, William N. & Snapper, Arthur G. (Franklin Delano Roosevelt VA Hosp, Montrose, NY) **Aversive schedules with independent probabilities of reinforcement for responding and not responding by rhesus monkeys: II. Without signal.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1189-1197.—Manipulated independently the probabilities of aversive stimulus presentation given the occurrence or the nonoccurrence of a leverpress response. 10 naive male rhesus monkeys (*Macaca mulatta*) were divided into 5 groups, each group receiving a different sequence of the 2 probabilities and thereby a different sequence of electric shock presentation schedules ranging between avoidance and punishment. The schedules provided systematic control both of the amount of response facilitation that occurred when response-produced shocks were first introduced following avoidance training and of the postfacilitation response rate decline. When the probability of shock presentation following a response was less than that for not responding, scalloped response patterns occurred; when the relative shock probabilities were reversed, biphasic response patterns were observed. (17 ref)—*Journal abstract*.

11285. King, Donald L. (Howard U) **An image theory of instrumental conditioning.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1115-1122.—Discusses theories of classical conditioning and images, which hold that an image of the goal for an instrumentally conditioned response occurs by way of classically conditioned associations between the stimuli of the learning situation and the stimuli produced by the instrumentally conditioned response and between these response-produced stimuli and the goal. The animal is viewed as behaving in order to change the vividness of the image of the reinforcer, associated with a change in the "reinforcing effect" of the image of the reinforcer. The animal does this by producing successively closer approximations to the stimuli produced by the instrumentally conditioned response via a feedback process, this response thereby eventuating. Image approaches to some instrumental conditioning results and some theories of instrumental conditioning are also discussed. (17 ref)—*Journal abstract*.

11286. King, Maurice G.; Pfister, H. Peter & DiGiusto, Eros L. (U Newcastle, NSW, Australia) **Differential preference for and activation by the odoriferous compartment of a shuttlebox in fear-conditioned and naive rats.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 175-181.—96 adult, male Wistar rats were either fear conditioned in a Plexiglas tube or were subjected to a control procedure. Each S was subsequently placed in a 2-compartment shuttlebox and tested for activity and time spent in the compartment of the shuttlebox which contained odoriferous fecal materials generated by other fear-conditioned Ss. Results show that fear-conditioned Ss were significantly less active than controls and spent

significantly less time than controls in the odoriferous compartment of the shuttlebox. In addition, controls spent significantly more time in the odoriferous compartment than in the nonodoriferous compartment. Findings suggest that odors generated by stressed rats do not have alarm pheromone properties.—*Journal abstract*

11287. Klare, Warren F. (Syracuse U) **Activity level changes preceding runway trials: An index of conditioned fear.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 26-28.—Conducted 2 experiments with a total of 24 male and 16 female Long-Evans hooded rats in which Ss were dropped into a shock runway from an enclosed chamber where activity was monitored. Those that received shock in the runway showed a reliable decline in activity, significantly correlated with a reliable rise in running speed. When extinction trials were widely spaced (Exp II), the activity-level measure accurately monitored both extinction and spontaneous recovery of fear. Results suggest the activity measure as a useful tool for investigation of fear in complex behavior.—*Journal abstract*.

11288. Knutson, John F. & Schrader, Susan P. (U Iowa) **A concurrent assessment of schedule-induced aggression and schedule-induced polydipsia in the rat.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 16-20.—3 male hooded rats subjected to fixed interval (FI) 60-sec and FI 120-sec schedules of reinforcement were permitted concurrent access to a licking tube and a restrained target rat. While both polydipsia and attack occurred, polydipsia was the predominant schedule-induced behavior. When attack occurred, and the licking tube was also available, attack usually followed licking in the interreinforcement interval. Eliminating access to the target did not influence polydipsia, and removal of the licking tube did not affect the frequency of aggressive episodes.—*Journal abstract*.

11289. Kop, Pieter F. (Katholieke Hogeschool, Tilburg, Netherlands) **Aversive schedules with independent probabilities of reinforcement for responding and not responding by rhesus monkeys: I. With signal.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1180-1188.—Applied 2 independent probabilities of electric shock presentation to 12 naive male rhesus monkeys (*Macaca mulatta*) as the independent variables defining schedules of aversive control: (a) the probability that a fixed signal period would end with a shock if a specified response were made and (b) the probability that the fixed signal period would end with shock if a specified response were not made. Systematic changes in the probability values generated several familiar schedules of aversive control, as well as several intermittent procedures. Response rate tended to rise during the signal period when the probability values were set so that not responding was more likely to produce a shock than responding; response rate tended to fall during the signal period when the probabilities were set so that responding was more likely to produce shock than not responding. Response patterning in time was also evident during the interval between signals when no consequences were programmed. These characteristics of response patterning reflected the changes in the 2 independent probability variables in ways that simple measures of response

rate and shock rate alone did not. (15 ref)—*Journal abstract.*

11290. Kop, Pieter F.; Kadden, Ronald M. & Schoenfeld, William N. (Katholieke Hogeschool, Tilburg, Netherlands) **Aversive schedules with independent probabilities of reinforcement for responding and not responding by rhesus monkeys: III. Recovery of avoidance baseline.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1198-1208.—Investigated the effect of prior response history on subsequent avoidance responding. In Exps I and II, using 12 and 10 male rhesus monkeys that had served in previous experiments by the authors (see PA, Vol 53:Issue 6), up to 5 sequences of aversive stimulus presentation schedules provided a range from no responding to complete avoidance response recovery, whether with or without signaled shock. Exp III, with 12 naive rhesus monkeys, demonstrated that the same range of avoidance response recovery could be obtained by the use of only selected schedules rather than a prolonged sequence. These findings provide further support for the power of 2 independent probability variables, governing reinforcement delivery for responding or nonresponding, for generating schedules of reinforcement. (16 ref)—*Journal abstract.*

11291. Leaton, R. N. (Dartmouth Coll) **Long-term retention of the habituation of lick suppression in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1157-1164.—Conducted 5 experiments with a total of 97 naive male albino Holtzman rats. Retention of habituation of suppression of licking to the presentation of 2-sec pure tones was measured 7, 21, and 42 days after an initial series of habituation-training sessions (10 trials/day for 4 days). No recovery was found after 7 or 21 days, and there was only slight recovery after 42 days. No group approached its initial level of responsiveness. Habituation produced by a single, 2-sec stimulus was retained for at least 30 days. Recovery did occur with changes in the frequency of the auditory stimulus or the modality of stimulus. Habituation was insensitive to changes in the test environment other than the test stimulus itself. Habituation transferred from the behavioral context associated with nondrinking to that associated with drinking. (24 ref)—*Journal abstract.*

11292. Lee, C. T.; Wong, Paul T.-P. & Chen, Jawsy. (Brooklyn Coll, City U New York) **Durable partial reinforcement effect and social dominance in two inbred mouse strains.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 400-402.—Investigated the partial reinforcement effect (PRE) in a total of 10 C57BL/10J (C57) and DBA/2J (DBA) inbred male mice in a straight runway. The PRE was obtained in both strains and was sustained through extended extinction and continuously reinforced (CRF) reacquisition. 2 wks after the completion of the 2nd runway extinction test, partial reinforcement (PRF) and CRF Ss of each strain were pitched against each other in a tube dominance test. PRF Ss won a significantly greater number of the contests.—*Journal abstract.*

11293. Linton, Leslie & Roberts, Albert E. (Catawba Coll) **Changes in unsignalled avoidance behavior when a pre-shock CS is response-produced.** *Psychological*

*Reports*, 1974(Dec), Vol 35(3), 1251-1258.—Trained 6 female hooded rats under a procedure in which signaled shock conditioned stimulus—unconditioned stimulus (CS—UCS) was superimposed on unsignalled avoidance behavior. The UCS was delivered for  $\frac{1}{4}$  sec for 3 Ss (Condition 1) and given for 1 sec to 3 Ss (Condition 2.) While the CS—UCS procedure was maintained, at different times during the session a response briefly produced the preshock CS. Blocks of sessions in which the response-produced CS occurred in addition to CS—UCS were alternated with blocks of CS—UCS sessions without the response-produced CS. Under the CS—UCS procedure, avoidance in CS was enhanced for Ss in Condition 1 and was enhanced to a lesser degree during the response-produced CS. However, the CS controlled suppressed avoidance when followed by UCS and when response-produced.—*Journal abstract.*

11294. Lucas, Gary A. (U Missouri, Kansas City) **The control of keypecks during automaintenance by prekey-peck omission training.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 33-36.—Measures of 3 white Carneaux pigeons' prekeypecking (pecking in front of the response key) during automaintenance sessions with keypeck omission contingencies indicate that prekey-pecks occurred frequently and were often followed by grain delivery. When the omission procedure was extended to prevent food delivery following any trial on which prekeypecks occurred within 2 in of the response key, keypecking was not maintained. Results suggest that the automaintenance keypeck is part of a sequence of approach behaviors, including prekeypecks. The persistence of keypecking during automaintenance schedules appears to result from the adventitious reinforcement of prekeypecks close to the response key, and the effectiveness of the omission procedure seems to depend upon the extent of the approach behaviors which result in omission. (15 ref)—*Journal abstract.*

11295. Lyons, Joseph E.; Kliepe, William D. & Siegel, Candy. (U Arizona) **The effect of increasing the response rate in S<sub>1</sub> and S<sub>2</sub> on stimulus generalization and the peak shift.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 421-423.—A study of 6 naive adult Silver King pigeons shows that differentially increasing the response rate in both the first and second stimulus by changing from a multiple variable interval (VI) 5-, VI 5-min reinforcement to a multiple VI 1-, VI 3-min schedule produced a peak shift in 5 Ss. Results suggest that a change in reinforcement density independent of a response rate reduction in the 2nd stimulus is a sufficient condition to produce the peak shift.—*Journal abstract.*

11296. Mackintosh, N. J. (U Sussex, Lab of Experimental Psychology, Brighton, England) **The psychology of animal learning.** London, England: Academic Press, 1974. xiv, 730 p. £8.—Presents a comprehensive and detailed treatment of the procedures, results, and interpretation of psychological studies of learning in animals, covering the original and latest experiments and theories. Included are sections on classical conditioning, instrumental learning, avoidance and punishment, contrast effects, extinction, generalization, and discrimination learning. (89 ref)



11297. **Martin, James T. & Schutz, Friedrich.** (U Minnesota, St Paul) **Arousal and temporal factors in imprinting in mallards.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 69-78.—Examined a number of factors affecting the learning processes in laboratory imprinting, using 80 mallard ducklings as Ss. 2 factors alone explained the degree to which Ss learned the characteristics of a given model: the length of exposure to the model and the endogenous arousal state of the duckling. A 3rd factor, the effect of muscular exertion, was not significant. The characteristics of some models were more rapidly learned than others, and the significance of this fact for biochemical studies of learning is discussed. In this study ease of learning coincided with innate preference, suggesting the presence of a neural filtering mechanism in the duckling which alters the assimilation of information into the central nervous system and hence controls both innate preference and learnability. (22 ref)—*Journal abstract*.
11298. **McHose, James H. & Blackwell, David R.** (Southern Illinois U) **Performance in differential instrumental conditioning as a function of the pattern of partial S+ reward.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 63-66.—In 2 experiments, a total of 46 male albino rats received differential instrumental conditioning trials in a nonchoice brightness-discrimination apparatus. In each experiment, groups differed with respect to the pattern of rewarded and nonrewarded positive stimulus (S+) trials. Response in S- was never reinforced. Results of both experiments indicate that the pattern of S+ reward events influenced S- response levels in a fashion consistent with expectations derived from stimulus-specificity theory.—*Journal abstract*.
11299. **Mejta, Cheryl et al.** (Bradley U) **Methods of deconditioning avoidance: II. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 119-120.
11300. **Millard, W. J. & Woods, Paul J.** (U Massachusetts, Amherst) **Frustrative nonrelief in instrumental escape conditioning.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 28-32.—Examined the generality of the frustration effect in an aversive stimulus conditioning procedure by training and testing 40 male BHE rats in a double cold-waterway escape conditioning apparatus. Experimental and control procedures analogous to appetitive conditioning experiments indicated that frustrative nonrelief (i.e., reinforcement omission) in the 1st goal tank yielded significant increments in swimming speed in the 2nd waterway, and that these increments in performance were dependent upon initial training with continuous relief (i.e., reinforcement) in the 1st goal tank. Extensions of the generality of the frustration effect are discussed. (26 ref)—*Journal abstract*.
11301. **Misanin, James R.; Hardy, Sheryl; Goodyear, Janet & Nagy, Z. Michael.** (Susquehanna U) **Effects of shock intensity on speed and response competition in the escape training of neonatal and infant rats.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 397-399.—Examined the effect of varying shock intensity on response competition (turning) and speed in the escape training of a total of 42 Wistar albino rats, 3-11 days old. Ss were given 25 escape training trials in a straight alley with .1, .2, or .4-ma 60-Hz ac shock as the motivating stimulus. Results indicate that the younger the rat or the more intense the shock, the less likely escape training was to be completely effective. On .1 ma, only the 7-11 day old Ss showed an intrasession speed increase, and on .4 ma, only the 11 day olds showed such an increase. The 7-11 day old Ss were also the only Ss to increase speed as shock intensity increased. Response competition decreased over training trials for all age groups on both .1 and .2 ma, but only the 5- and 7-day-old Ss showed such a decrease on .4 ma. For all age groups, however, response competition varied inversely with shock intensity.—*Journal abstract*.
11302. **Nageishi, Yasuhiro & Imada, Hiroshi.** (Kwansei Gakuin U, Nishinomiya, Japan) **Suppression of licking behavior in rats as a function of predictability of shock and probability of conditioned-stimulus-shock pairings.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1165-1173.—In Exp I, the effects of various degrees of predictability of electric shock upon rats' licking behavior were studied using 45 male albino rats. The basal rate of licking became progressively lower as unpredictability of shock increased. It was also found that Ss could utilize "time" as a predictor of safety and danger. In Exp II, using 48 Ss, the relationship between conditioned emotional response (CER) and the probability of conditional stimulus (CS) being paired with shock was studied under the matched basal rate of licking by making all shocks predictable. The CER was an increasing function of the probability of CS-shock pairings. Results are discussed with reference to M. Seligman's (1969) safety-signal hypothesis and R. Rescorla's (1968) probabilistic theory. (19 ref)—*Journal abstract*.
11303. **Olson, Richard D.; May, James G. & Williams, George D.** (U New Orleans) **A reinterpretation of extinction in appetitive conditioning.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 409-410.—Compared the effects of response-independent reinforcement and the withdrawal of response-contingent reinforcement on food rewarded barpressing rates in 24 male Sprague-Dawley rats. Neither the resultant decreases in response rate nor subsequent reacquisition performance were differentially affected. It is suggested that the traditional response-contingent reinforcement withdrawal was actually a mild form of punishment and that only the response-independent procedure validly represented extinction.—*Journal abstract*.
11304. **Olton, David S. & Samuelson, Robert.** (Johns Hopkins U) **Decision making in the rat: Response-choice and response-time measures of discrimination reversal learning.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1134-1147.—Tested 6 water-deprived male albino rats in 6 consecutive light-dark simultaneous discrimination reversals in a T maze. Measurements were obtained of (a) the animal's choices, (b) the time from the start box to the choice point, (c) the time in the choice point, and (d) the time from the choice point to the water spout at the end of the arm. Results indicate that response times were a reliable indicator of discrimination reversal learning and that the discrimination process was composed of separate prechoice, choice, and postchoice components. (20 ref)—*Journal abstract*.
11305. **Pavlik, W. B. & Collier, Alexis C.** (Virginia Polytechnic Inst & State U) **An analysis of "signaled**

**double-alternation patterning" in the rat.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 73-75.—7 male hooded rats were given training with double alternation of rewards and nonrewards in which the 1st reward or nonreward of each pair occurred in a black runway and the 2nd in a white runway. Ss developed fast running on rewarded trials in both runways and slow running on nonrewarded trials in both runways—signaled double alternation patterning. A subsequent shift in the reinforcement schedule produced a period of reversed patterning—slow on rewarded trials and fast on nonrewarded trials. Results are consistent with a compound stimulus discrimination interpretation of signaled double-alternation patterning rather than with a selective memory-retrieval explanation.—*Journal abstract.*

11306. **Rosenberg, Jordan.** (California State U, Hayward) **Reinforcement probability and concurrent operants.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 582-584.—Tested the maximizing principle which suggests that when reinforcements for concurrent operants are programed by independent variable-interval schedules of reinforcement, the relative response rate obtained for each operant will approximate the relative reinforcement rate for that operant. This relationship, called matching, appears to be a necessary consequence of a maximizing principle which states that the operant emitted is the one having the momentarily greater reinforcement probability. To test the maximizing principle rats were trained to respond on either 1 of 2 levers. Whether a leverpress was reinforced was governed by a random process having a constant reinforcement probability which was not necessarily the same for the 2 levers. After a few sessions' exposure, responding occurred nearly exclusively to the lever having the greater reinforcement probability as predicted by the maximizing principle.—*Journal abstract.*

11307. **Russo, Dane.** (U South Carolina, Spartanburg) **Transfer of persistence in the domestic chick: Effects of imprinting experiences on later instrumental responses.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 381-384.—Investigated the effects of obstructed and unobstructed imprinting approach on subsequent instrumental responding. 4 groups of domestic chicks ( $N = 34$ ), in 2 separate replications, received imprinting or control treatment during the 1st wk of life and later acquired a food-motivated running response in a runway for continuous reward. Runway acquisition results reveal no significant differences between imprinting, imprinting shock, shock control, and handling control Ss. However, significantly different patterns of persistence across groups and replications were evident during runway extinction. Results are explained in terms of a counter-conditioning notion of response persistence.—*Journal abstract.*

11308. **Shafer, Scott W. & Stephens, Mark W.** (Pittsburgh Child Guidance Ctr, PA) **Emotionality, conditioned helplessness, and escape conditioning.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1051-1056.—Examined the role of emotionality in mediating conditioned helplessness by comparing the performance of 16 handled (low emotionality) and 16 nonhandled (high emotionality) litters of Purdue-Wistar rats, half of each group having had prior experience with inescapable

shock (conditioned helplessness) and half without such experience on a task requiring escape from shock. Generalization of helplessness effects was tested by subsequently testing Ss in a 2-way shuttle box with a loud escapable buzzer as the unconditioned stimulus. Differences in activity level in the absence of an aversive stimulus were measured later. Prior experience with inescapable shock did inhibit performance on the shock-escape task but emotionality did not, and emotionality differences did not interact with prior experience with inescapable shock. Emotionality affected shuttle-box performance, but conditioned helplessness did not. Activity level was reduced significantly by the conditioned helplessness experience, but was marginally related to emotionality.—*Journal abstract.*

11309. **Siegel, Shepard.** (McMaster U, Hamilton, Ontario, Canada) **Flavor preexposure and "learned safety."** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1073-1082.—Conducted 3 experiments with a total of 131 male Wistar rats. Results indicate that (a) a single preexposure to a distinctive flavor resulted in both a retardation of aversion learning (if the flavor was later paired with toxicosis) and a preference for this flavor (if the flavor was not paired with toxicosis); (b) preexposure-induced preferences were retained over a 24-day period and were not attributable to thirst reduction consequent upon ingestion; and (c) Ss evidenced a preference for a preexposed solution by subsequently ingesting relatively great amounts of this solution when it was the only fluid available (as well as by choosing it over an alternative, simultaneously available solution). Results are discussed in terms of a "learned safety" interpretation of the deleterious effects of flavor preexposure on flavor-aversion learning. (27 ref)—*Journal abstract.*

11310. **Solomon, Paul R.; Lohr, A. Craig & Moore, John W.** (U Massachusetts, Amherst) **Latent inhibition of the rabbit's nictitating membrane response: Summation tests for active inhibition as a function of number of CS preexposures.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 557-559.—64 New Zealand rabbits received classical conditioning of the nictitating membrane response to a light as a conditioned stimulus. Experimental Ss then received 18, 36, 118, or 354 nonreinforced tone presentations followed by summation tests for active inhibition in which the tone was compounded with the light. Control Ss sat restrained in the conditioning chambers for periods of time corresponding to the experimental Ss but did not experience the tone between initial conditioning to the light and the summation test phase. The degree to which addition of the tone depressed conditioned responding to the light was essentially the same for experimental and control groups, thereby negating the possibility that the tone possessed active or conditioned inhibitory properties.—*Journal abstract.*

11311. **Spencer, Boyd & McGown, W. P.** (Eastern Illinois U) **DRL performance and water availability: Enhancement or interference?** *Psychological Reports*, 1974(Dec), Vol 35(3), 1023-1028.—8 Charles River female albino rats were divided into 2 groups that were exposed to a differential reinforcement of low rates (DRL) 18-sec schedule. One group had water available



for the 1st 30 days while the 2nd did not. Ss with water available initially showed more reinforced barpresses, but by the end of the 2nd wk Ss with no water available demonstrated superior performance. After the initial 30 days the conditions of availability of water were reversed. Ss with water available consistently received fewer reinforcements for the remaining 28 days of the experiment. Also, they consumed far less water than did the group which had water available during the initial 30 days. Results are discussed in terms of schedule-induced polydipsia.—*Journal abstract.*

11312. Stevens, David A. (Clark U) **Determination of stimuli "neutral" with respect to generalization from horizontal-vertical stripes discrimination.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 564-566.—To determine stimuli with which there would be no differential generalization when used in transfer tests, 10 male Charles River CD rats learned a successive vertical-horizontal stripe discrimination and were then tested for generalization with the following stimuli: 4-cell checkerboard, lattice, and 8 sets of stripes ranging in slope from 10-80°. There was no differential generalization with the checkerboard, but there was generalization from horizontal stripes to the lattice. Interpolation from responses to stripes of 40° and 50° slopes indicated that with a slope of 42.9° there would be equal generalization from the horizontal and vertical standards.—*Journal abstract.*

11313. Svendsrod, Rolf & Ursin, Holger. (Norsk Gallup Inst, Oslo, Norway) **A factor-analytic study of the acquisition of a conditioned emotional response in rats.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1174-1179.—Analyzed data from 30 male Möll-Wistar albino rats on a fixed-ratio 15 schedule of reinforcement for food acquiring a conditioned emotional response (CER). Factor 1 represented the conditioning process; Factor 2 was believed to represent the orienting response. The 2nd factor had high loadings on the early trials and a gradually decreasing loading for later trials. The shape of the curve of factor loadings over trials indicates that there was initially sensitization (including dishabituation) and then habituation of the orienting response as the CER was acquired. Data from prehabituation and changes in stimulus conditions confirms that Factor 2 represented the orienting response. 2 independent processes appear to be involved during CER learning: the orienting response and the ordinary CER acquisition.—*Journal abstract.*

11314. Terrace, H. S.; Gibbon, J.; Farrell, L. & Baldock, M. D. (Columbia U) **Temporal factors influencing the acquisition and maintenance of an auto-shaped keypeck.** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 53-62.—Describes 2 experiments with a total of 132 male white Carneaux pigeons. Food-deprived Ss were given brief meals of grain following the presentation of a light on a response key. Pecking the key had no consequence; virtually all Ss pecked the lighted key. The number of trials prior to the 1st peck varied inversely with the value of the mean interval between light onsets. Trials to criterion was a negative power function of the value of the intertrial interval. The addition of a 2nd stimulus, never followed by food, retarded the acquisition of the keypeck, particularly at

short intertrial intervals. During steady state performance, the value of 2 measures of response strength—rate and probability of responding—increased as a function of the duration of the intertrial interval. (30 ref)—*Journal abstract.*

11315. Thorpe, W. H. (U Cambridge, England) **Is there a comparative psychology? The relevance of inherited and acquired constraints in the action patterns and perceptions of animals.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 89-112.—Affirms the existence of comparative psychology, with the following qualifications. The mere comparison of the behavior of an animal with that of a human, in a problem situation of the type primarily designed to test the responses of a human being, does not constitute an experiment in comparative psychology. It is necessary to first study in detail the sensory capacities, movement patterns, drive states, and hormonal influences under which the experimental animal normally operates. The way in which inherited constitution and early experience interact to produce restraints that act upon and direct learning capacities (i.e., the normal habitat, normal behavior, and the natural choice situation usually encountered) must be studied. 2 sorts of patterns and learning, motoric and perceptual, are used to elucidate these concepts. Imprinting is one sort of perceptual organization that affects subsequent behavior, thus demonstrating the inseparability of motor and perceptual patterns. (28 ref)—*R. S. Albin.*

11316. Vestal, Bedford M. (Oklahoma City Zoo, Animal Research Ctr, OK) **Development of the immobility response (animal hypnosis) in two species of deermice (*Peromyscus*).** *Animal Learning & Behavior*, 1975(Feb), Vol 3(1), 11-15.—Found immobility responses (animal hypnosis) to restraint in a study with 251 prairie and 196 white-footed deermice. Ss were tested cross-sectionally at ages ranging from 11 to 22 days and as adults (60 days). Responses in prairie deermice appeared at 13 days of age and, by 20 days, had increased to approximately adult levels of incidence. In white-footed mice, responses only occurred between 15 and 18 days and as adults. Response incidence was higher in juvenile prairie mice than in white-footed mice, while adults of the 2 species were not different. It is concluded that the developmental pattern of the response in prairie mice is similar to that in birds, but the white-footed mice pattern is different from others reported. (25 ref)—*Journal abstract.*

11317. Walker, Jeanne; Williams, Sharon & Martin, R. Chris. (U Missouri, Kansas City) **The effects of social interaction upon persistence of self-punitive behavior.** *Bulletin of the Psychonomic Society*, 1974(Oct), Vol 4(4-B), 423-425.—Trained 82 Holtzman-derived male rats to escape shock in a straight runway prior to institution of punishment conditions in an attempt to assess the effect of the presence of another S upon the persistence of self-punitive behavior. All rats first received the usual 35 shock escape training trials. Then, during extinction when no shock was present in the goalbox or startbox, Ss were put into 1 of 4 groups: punished, nonpunished, punished with a naive S, and punished with another punished S. Results show that punishment produced self-punitive behavior and that the presence of another S

decreased the number of trials a punished S would perform. The presence of a naive S had more effect than the presence of a trained S. Results are discussed in terms of generalization decrement, social interaction, and fear.—*Journal abstract.*

11318. White, K. Geoffrey. (Victoria U Wellington, New Zealand) **Temporal integration in the pigeon.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 437-444.—Examined temporal integration in 6 adult pigeons in the context of a procedure which required the S to integrate information from successively presented stimuli in order to make a correct choice. If 2 previous stimuli presented successively on the center key of 3 response keys were the same, a response to the left key was reinforced, whereas if they were different, a right-key response was reinforced. Thus, a correct response could only be made on the basis of abstracting a relationship between temporally separated stimuli. Results show that not only were the Ss able to integrate temporally, but also, their ability to do so decreased as the blackout interval separating the successive stimuli was increased. (30 ref)—*Journal abstract.*

11319. Williams, Ben A. (U California, San Diego) **The role of local interactions in behavioral contrast.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 543-545.—In a study with 6 mixed-breed pigeons, typical behavioral contrast effects were obtained using a multiple variable-interval (VI) extinction schedule of reinforcement. Response rate was higher, however, during VI components preceded by a VI component than during a VI component preceded by extinction. This effect, contrary to previous findings concerning sequential effects, challenges recent interpretations of behavioral contrast derived from the literature on autoshaping.—*Journal abstract.*

11320. Wood, Keith A. & Willis, Richard D. (U Florida) **Reinforcer and ratio requirement effects in concurrent fixed-interval fixed-ratio schedules.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 541-543.—In an experiment with 2 male Long-Evans hooded rats, the fixed-ratio requirement was varied in concurrent fixed-interval-fixed-ratio (FI-FR) schedules. FR responding was reinforced by food. In different phases, FI responding was reinforced by food and water. There was an inverted U relationship between the ratio requirement and ratio response rates. There was a direct relation between the ratio requirement and interval response rates when both responses were reinforced with food, but only minimal relational effects when the reinforcers were different. The role of reinforcers in concurrent schedules merits detailed study.—*Journal abstract.*

11321. Wyrwicka, Wanda. (U California, Medical School, Los Angeles) **The sensory nature of reward in instrumental behavior.** *Pavlovian Journal of Biological Science*, 1975(Jan-Mar), Vol 10(1), 23-51.—Presents a theory in which improvement in the sensory state, or "better-being," achieved either through obtaining desirable sensations or through escaping undesirable sensations, is considered the essential value which maintains instrumental behavior. This value may vary depending on such factors as the intensity of the stimulus-producing sensations, the effects of its previous occurrence, and changes in the internal and external environment.

Methods of evaluating sensory "better-being" by means of measuring instrumental, autonomic, and EEG responses are discussed. (108 ref)—*Journal abstract.*

### Social & Sexual Behavior

11322. Anzenberger, Gustl. (Max-Planck-Inst für Verhaltensphysiologie, Seewiesen, W Germany) **[The first appearance of sex-specific parts in duetting young *Trachyphonus d'arnaudii emini*.]** (Germ) *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 395-397.—Describes calls of young barbets of both sexes raised in captivity. During the first months of life they produced exclusively male calls. The young females could, therefore, not be recognized acoustically. Siblings of the same brood failed to duet with each other even after a young female had answered a strange male several times with her sex-specific song. It is suggested that this mechanism might have significance as an incest barrier.—*English summary.*

11323. Barash, David P. (U Washington) **Behavioral individuality in the Cichlid fish, *Tilapia mossambica*.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 197-202.—Evaluated and demonstrated behavioral individuality with regard to courtship and aggression among 7 males of the Cichlid fish, *Tilapia mossambica*, and their male offspring. Individuals fell into natural categories within which behavioral differences were not apparent, suggesting a behavioral polymorphism. These categories appear to represent heritable discontinuities; possible ways in which these polymorphisms are maintained are discussed.—*Journal abstract.*

11324. Brain, Paul & Poole, Angela. (University Coll Swansea, Wales) **Some studies on the use of "standard opponents" in intermale aggression testing in TT albino mice.** *Behaviour*, 1974, Vol 50(1-2), 100-110.—Agonistically naive, 40-day-old male mice were used as "standard opponents" in 3 experiments on aggression. Exp I matched castrated against intact males, Exp II evaluated the effects of previous fighting experience, and Exp III controlled for previous exposure to the fighting arena. It was found that castrated standard opponents were less effective in eliciting fighting than intact Ss, that aggressive behavior exhibited the greatest increment between the 1st and 2nd fights, and that familiarization with the fighting area did not affect measures of aggressive behavior. The advantages of the standard opponent technique for research on aggression are discussed. (French summary) (21 ref)—S. R. Goldstein.

11325. Brain, Paul. (University Coll Swansea, South Wales) **What does individual housing mean to a mouse?** *Life Sciences*, 1975(Jan), Vol 16(2), 187-200.—Reviews recent studies relating the effects of isolation and group housing to behavior, physiology, and neurochemistry in laboratory rats and mice, and relates these accounts to comparable information derived from experiments employing social stresses (e.g., subjecting the animal to defeat). The problem of whether individual housing constitutes a stress (in terms of adrenocortical and adrenal medullary functioning) in these species, as it appears to do in primates, is discussed. In spite of the large number of papers which ascribe the behavioral and endocrine changes obtained in isolation vs grouping comparisons to the effects of "the isolation-induced



stress syndrome," it is concluded that, in terms of adrenal function, there is little evidence that isolation per se constitutes a stress in rats and mice. It should be noted that the wild progenitor of the laboratory strains of house mouse often appears to evidence territoriality. The view is advanced that the isolated condition in male mice may result in changes characteristic of territorial dominance. This may represent a mechanism for inducing social or territorial stability in this species. It appears that experiments involving physical isolation in laboratory rodents are unlikely to provide good models for the effects of social deprivation in man. (144 ref)—*Journal abstract*.

11326. D'Souza, Frances & Martin, Robert D. (Zoological Society of London, Wellcome Inst of Comparative Physiology, England) **Maternal behaviour and the effects of stress in tree shrews.** *Nature*, 1974(Sep), Vol 251(5473), 309-311.—Observed the suckling behavior of 3 tree shrew species in the subfamily *Tupaia*nae. Some of the laboratory findings indicate that 2 of the species exhibit 48-hr suckling intervals while rearing their young in separate nest-boxes. The milk given by the mother is high in protein, caloric density, and fat caloric content. Each suckling visit by the mother is short, and although the amount of milk given increases with the infant's body size, the duration of the visit decreases. Tests made to determine what conditions would affect maternal behavior revealed that sudden loud noises produced marked disruption in the suckling patterns, while removing the infants from the nest-box between suckling periods produced no effect. It is concluded that the 48-hr suckling rhythm is typical of several members of the *Tupaia*nae maintained under relatively stress-free conditions. (17 ref)—*A. de la Haba*.

11327. Davis, Roger E. & Pilotte, Nancy J. (U Michigan, Mental Health Research Inst, Neurosciences Lab) **Attraction to conspecific and nonconspecific chemical stimuli in male and female *Macropodus opercularis* (Teleostei, Anabantoidei).** *Behavioral Biology*, 1975(Feb), Vol 13(2), 191-196.—9 male and 9 female socially isolated *Macropodus opercularis* showed a distinct approach response to water taken from the tank of a conspecific individual or a nonconspecific, *Trichogaster trichopterus*, but not to water from a tank without fish. It is proposed that these species produce chemical stimuli which are attractive to *M. opercularis*. Approach frequency and the total duration of approach during a 10-min period of stimulation varied with the species and the sex of the stimulus fish but not with the sex of the S. Ss responded most frequently to the conspecific male and nonconspecific female stimuli and least to the nonconspecific male stimuli.—*Journal abstract*.

11328. Dunbar, R. I. & Dunbar, Patsy. (U Bristol, England) **Behaviour related to birth in wild Gelada baboons (*Theropithecus gelada*).** *Behaviour*, 1974, Vol 50(1-2), 185-191.—Describes behavior during and after parturition in free-living baboons in the Simien Mountains National Park, Ethiopia. One female was observed giving birth while 3 others were observed within a few hours of parturition. The observed birth occurred when the female suddenly stood up in a half crouching position, uttered a staccato cough and gave birth, the neonate falling to the ground beneath her. Discussion

concerns the similarity of baboon mother-neonate interactions to those observed in other old world monkeys. (German summary)—*S. R. Goldstein*.

11329. Dyer, David P. & Southwick, Charles H. (Johns Hopkins U, School of Hygiene & Public Health) **A possible sensitive period for juvenile socialization in mice.** *Behavioral Biology*, 1974(Dec), Vol 12(4), 551-558.—Provided juvenile male CFW mice with 3 days of social experience with male partners of the same age and treatment group as themselves. They were isolated at all other times between weaning (21 days of age) and adulthood (42 days of age). When the Ss were tested at 42-47 days of age, it was found that those which had received social experience at 27-30 and 30-33 days of age showed less wounding and a greater tendency to sleep together than Ss which had received an equal amount of social experience at an earlier or later age.—*Journal abstract*.

11330. Eppe, Gisela. (U Pennsylvania, Monell Chemical Senses Ctr) **Olfactory communication in South American primates.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 261-278.—Reviews research on chemical communication in 2 species of marmoset monkeys. Messages facilitating the identification of species, of sex, of the individual, of reproductive condition, of social status, and of aggressive behavior are discussed. The results of experiments pertaining to these various messages are summarized. It is concluded that many neotropical primates use chemical signals in conflicts between members of the same social group and in intergroup encounters. The control of intraspecific aggression is considered to be the most important function of chemical signals in South American primates. (56 ref)—*R. S. Albin*.

11331. Erwin, J. & Mitchell, G. (U California, Davis) **Initial heterosexual behavior of adolescent rhesus monkeys (*Macaca mulatta*).** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 97-104.—Describes the 1st heterosexual encounters of 12 3-yr-old rhesus monkeys, 6 of each sex. The Ss were all laboratory-born and were reared in wire cages for the 1st 8 mo of life, accompanied only by their mothers. After these animals were weaned, each was placed in a cage with another animal of the same age and sex. The pairs formed in this way remained intact until the animals were 2 yrs old. When heterosexual dyads were formed, some of the Ss attacked and bit the animal with which they had been paired, while the members of other pairs established almost immediate rapport as evidenced by mutual grooming and adequate sexual behavior. The initial sexual interactions of most pairs were uncoordinated, but all eventually demonstrated qualitatively species-typical patterns of sexual behavior. Despite their immaturity, 2 of these pairs succeeded in producing offspring, both of which were healthy. (17 ref)—*Journal abstract*.

11332. Evans, Roger M. (U Manitoba, Winnipeg, Canada) **Responsiveness of young herring gulls to adult "mew" calls.** *Auk*, 1975(Jan), Vol 92(1), 140-143.—Tested preferences of young herring gulls for mew calls from 3 other gull species. Results suggest that adaptive radiation of the parent-young acoustical communication system in this group has occurred largely by adaptive

variations in the calls of the adults relative to the more stable response tendencies of the young.

11333. **Flandera, V. & Nováková, V.** (Czechoslovak Academy of Sciences, Inst of Physiology, Prague) **Effect of mother on the development of aggressive behavior in rats.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 49-54.—Conducted 2 experiments with a total of 81 male Wistar rats and 64 rat pups. It was found that 23-day-old Ss that were offspring of aggressive parents attacked mice. They killed them, however, only if the mother had already killed mice in their presence. Rats 30 days of age killed mice spontaneously without any previous exposure to killing. The occurrence of muricide activity in young Ss of this age was the same as in the adult population. If offspring of aggressive parents were reared by nonaggressive foster mothers from birth, they did not exhibit the muricide reaction at 30 days. In adulthood, however, the reaction appeared to the same extent as in the offspring of aggressive parents reared by aggressive mothers. If the descendants of nonaggressive parents were reared by aggressive foster mothers from birth, 64.7% of them killed mice at age 30 days. This aggression was retained in equal intensity during adulthood and could not be attributed to specific learning in that the mothers had never encountered a mouse in the presence of their foster young. (18 ref)—*Journal abstract*.

11334. **Gosow, Hartmut & Schürholz, Götz.** (U Freiburg, Faculty of Forestry, W Germany) **Social aspects of wallowing behaviour in red deer herds.** *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 329-336.—Observed that, outside the rutting season, wallowing behavior correlated with rank order position and/or age group (judged by antler size). Rank order patterns usually become apparent, especially under ecologically limited conditions. Wallowing behavior seemed to improve social integration of younger herd members and to synchronize herd activities. (German summary) (15 ref)—*Journal summary*.

11335. **Gottlieb, Gilbert.** (Dorothea Dix Hosp, Raleigh, NC) **On the acoustic basis of species identification in wood ducklings (*Aix sponsa*).** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1038-1048.—Tested the hypothesis that frequency modulation is an important feature of the acoustic basis of species identification by synthesizing a call that was as attractive to maternally naive wood ducklings as the natural wood duck maternal call itself. 3 experiments were performed with over 250 wood ducklings hatched in the laboratory from eggs collected in the wild. The critical acoustic feature of the wood duck maternal call is a descending frequency modulation. It is suggested that the attractiveness of the wood duck maternal call to maternally naive ducklings derives, at least partially, from prior exposure of the ducklings to their own embryonic vocalizations, each of which is composed of a very pronounced descending frequency modulation. (15 ref)—*Journal abstract*.

11336. **Goyens, Jacqueline & Noirot, Eliane.** (U Brussels, Lab of Experimental Psychology, Belgium) **Effects of cohabitation with females on aggressive behavior between male mice.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 79-84.—Observed individual male mice of several groups ( $N = 108$ ) during daily

encounters with a male intruder. The groups differed with regard to social and sexual experience of the resident S and of the intruder. Aggressive behavior was most intense in residents actually living with a female and least intense in sexually naive residents living alone. Residents that had only cohabited with a female for a short time obtained intermediate scores. Experienced intruders were attacked less than naive ones. (22 ref)—*Journal abstract*.

11337. **Harmatz, Paul; Boelkins, R. Charles & Kessler, Seymour.** (Stanford U, Medical School) **Postisolation aggression and olfactory cues.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 219-224.—15 socially isolated DBA/2J male mice chronically subjected to soiled bedding from 15 group-housed males showed less aggressivity than 2 groups of 15 isolates subjected either to soiled bedding from other isolated males or to fresh bedding. Findings suggest that postisolation aggression in mice may result from the gradual disinhibition from a primer pheromone, present in groups of male mice, which acts to suppress aggressive attack. (21 ref)—*Journal abstract*.

11338. **Hendricks, D. Paul.** **Copulatory behavior of a pair of yellow-billed cuckoos.** *Auk*, 1975(Jan), Vol 92(1), 151.—Describes an instance of copulatory behavior in yellow-billed cuckoos which involved the male placing a twig in the female's mouth during coition, removing it and flying away, and then repeating the entire sequence. Suggestions for the function of the twig (e.g., as a tool to maintain balance) are presented.

11339. **Jarvis, M. J. & Ettlinger, G.** (Inst of Psychiatry, London, England) **Transfer of spatial alternation between responding in the light and in the dark.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 115-116.—Substantial savings in 2nd modality performance were found in rhesus monkeys trained on spatial alternation in the light and in the dark, supporting evidence from lesion studies that the cortical area concerned with spatial alternation, the frontal cortex, is organized so that information regarding modality of sensory inflow is not critical for mediating behavior as it is for behavior mediated by infero-temporal and parieto-prestriate regions.

11340. **Krischik, Vera A. & Weber, Peter G.** (Lake Ontario Environmental Lab, Oswego, NY) **Induced parental care in male convict cichlid fish.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 1-11.—Recorded 3 parameters of parental care for pairs of cichlid fish caring for their own young to determine the normal parental role of the male. Nonreproductive adult males were induced to exhibit parental behavior (e.g., herding, fin-digging, and defense of young) by daily presentation of free-swimming conspecific young. This process of sensitization to young appears to be species-specific in that males did not exhibit parental care toward alien (*Hemichromis bimaculatus*) young. Parental behavior in reproductive and nonreproductive males, as well as the implications and function of sensitization in these fish, is discussed. (31 ref)—*Journal abstract*.

11341. **Lee, M. H. & Williams, D. I.** (U Hull, England) **Long term changes in nest condition and pup grouping following handling of rat litters.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 91-95.—Results of



observation of litters born to 15 black-hooded rats over the entire preweaning period reveal long-term changes to result from handling pups. Handled litters had fewer good nests and were less likely to be found in a single group than control litters. These differences are not attributable to the disturbance per se, as litters where the mother was removed did not differ significantly from undisturbed controls. The differences occurred predominantly in the daytime when maternal activity was at its lowest. (16 ref)—*Journal abstract*.

11342. Lenington, Sarah & Mace, Terry. (U Chicago) **Male fidelity and nesting site tenacity in the Killdeer.** *Auk*, 1975(Jan), Vol 92(1), 149-151.—Presents banding, mate fidelity, site tenacity, and comparative data from 30 pairs of Killdeer which indicate that male Killdeer have a greater tendency to return to previous breeding sites than do females, and that for some species of plovers there may be a higher probability that males will be nesting within the censusing areas than will females.

11343. McNicholl, Martin K. (U Alberta, Edmonton, Canada) **Larid site tenacity and group adherence in relation to habitat.** *Auk*, 1975(Jan), Vol 92(1), 98-104.—A review of the literature indicates that nest site tenacity is strongly developed in larids in highly stable habitats. In highly unstable habitats, site tenacity is necessarily greatly reduced, and group adherence assists rapid pioneering of newly suitable habitat. In fluctuating marshes and prairie lakes, group adherence and reduced site tenacity allow rapid colonization of newly suitable habitat, while the maintenance of at least a weak form of site tenacity allows rapid recolonization of previously used sites. (54 ref)—*Journal abstract*.

11344. Michael, Richard P.; Wilson, Margo I. & Zumpe, D. (Emory U, Medical School) **The bisexual behavior of female rhesus monkeys.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11345. Moyer, Kenneth E. (Carnegie-Mellon U) **Sex differences in aggression.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11346. Mulder, J. B. (Michigan State U) **Bedding preferences of a pregnant laboratory-reared male.** *Behavior Research Methods & Instrumentation*, 1975(Jan), Vol 7(1), 21-22.—20 pregnant ARS Ha (ICR) Swiss mice were allowed to select from 10 commercially available bedding products for parturition and rearing young. Combinations of bedding materials were most often selected, and products of wood origin were overwhelmingly preferred. Rates for the selection of bedding materials from the 20 tests were Aspen Bed 100%, Cedar Shavings 75%, Pinewood Shavings 45%, Ab-Sorb-Dri 5%, and Stop "O" 5%.—*Journal abstract*.

11347. Navarro, Jose & del Solar, Eduardo. (U Austral de Chile, Inst of Ecology, Valdivia) **Pattern of spatial distribution in *Drosophila melanogaster*.** *Behavior Genetics*, 1975(Jan), Vol 5(1), 9-16.—Studied the effect of temperature and sex on spatial distribution of *Drosophila melanogaster* adults in a specially designed apparatus. It was observed that individuals tend to aggregate in sections of the sphere independently of sex and tempera-

ture. Nevertheless, a decrease in temperature increased aggregation. The mobility of both males and females indicates a negative geotactic tendency. Results may indicate a mechanism of social interaction that makes different individuals group together and may also have implications for the biological meaning of gregarious behavior. (16 ref)—*Journal abstract*.

11348. Poduschka, Walter. [On the mating behavior of the large Madagascar hedgehog (*Setifer setosus*, Froriep 1806) and the phylogenetic age of some of its elements.] (Germ) *Zeitschrift für Tierpsychologie*, 1974(Apr), Vol 34(4), 345-358.—Observed and filmed mating behavior of several hedgehogs for 2 yrs. The precopulatory behavior of *Setifer* is less ritualized than that of rice ternecs, but shows some similarities to that of the long-eared hedgehog. Stimulatory scratching with the hind legs and short contact bites apparently both serve to induce the female to present her genitalia better and to fasten the perineal contact. Form and function of the penis in action and its rodlike glans are described. Mating ordinarily lasts more than 2 hrs. Ultrasonic signals, eye secretions, form and function of the penis, and stimulatory scratching seem to be phylogenetically old elements of the mating behavior. (47 ref)—*English summary*.

11349. Rearden, John J. (Eastern Illinois U) **Dominance and aggression in the Mongolian gerbil (*Meriones unguiculatus*).** *Psychological Reports*, 1974(Dec), Vol 35(3), 1346.—Studied 2 generations of Mongolian gerbils to examine their natural aggression and dominance. Dominant males, removed from the colony for 1 wk, were attacked when returned; less dominant males would attack intruders when alpha was removed.

11350. Rosenbaum, Leonard A. (State U New York, Downstate Medical Ctr, Primate Behavior Lab, Brooklyn) **Sex differences in mother-infant attachment in monkeys.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11351. Scott, J. P.; Stewart, John M. & de Gheet, Victor J. (Bowling Green State U) **Critical periods in the organization of systems.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 489-513.—Analyzed the critical period for primary socialization (social attachment) in a dog. Evidence that attachment had taken place consisted of discriminative behavior in relation to familiar and unfamiliar objects and rested on a minimum of 3 processes: (a) organization of the separation distress response, (b) visual and auditory sensory capacities, and (c) long-term associative memory capacities. Once these capacities were developed, the overall attachment process proceeded very rapidly. It is suggested that the critical periods for the organizational subprocesses precede or slightly overlap that for the overall process, and that the theory of critical periods is a general one that should apply to any developmental organizational process which proceeds at grossly different rates at different times. (36 ref)—*Journal abstract*.

11352. Sloan, Lloyd R. & Latané, Bibb. (U Notre Dame) **Social deprivation and stimulus satiation in the albino rat.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1148-1156.—Conduct-

ed 2 experiments, with a total of 288 male Sprague-Dawley albino rats, to explore the mechanisms whereby social deprivation leads to increased sociability in rats. Exp I housed Ss alone or in pairs with additional nonsocial stimulation, with additional response opportunities, or with no added social surrogates for 3 wks prior to testing for sociability. Social deprivation led to a strong increase in sociability, and this was not ameliorated by stimulus or response enrichment. Exp II exposed alone or pair-housed Ss to handling, human contact, or no stimulation and found that human exposure did serve a social surrogate function. This result suggests that sociability in rats represents to some degree a search for complex and unpredictable stimulation. (25 ref)—*Journal abstract*.

11353. Syme, G. J.; Syme, L. A. & Kevey, W. (U Western Australia, Nedlands) **The peck order and performance in three competitive situations by a small flock of pullets.** *Behavioral Biology*, 1975(Feb), Vol 13(2), 257-262.—Investigated relationships between peck order and behavior in 3 different food competition situations with a flock of 8 White Leghorn  $\times$  Australorp pullets. Low correlations were observed between peck order and performance in all competitive tasks and between scores on the 3 competitive measures. Implications of these findings are discussed in terms of the use of the concept "social dominance" to describe social behavior in domestic fowl.—*Journal abstract*.

11354. Watton, David G. & Keenleyside, Miles H. (Ontario Ministry of Natural Resources, Wildlife Branch, Toronto, Canada) **Social behaviour of the Arctic ground squirrel: *Spermophilus undulatus*.** *Behaviour*, 1974, Vol 50(1/2), 77-99.—Studied the social behavior of Arctic ground squirrels living in small groups in an outdoor enclosure, using descriptive and analytic techniques (release and recapture experiments). Agonistic encounters were characterized by a variety of mutual pushing postures exhibiting sequential dependencies. In release experiments males acquired territories before females, and heavy animals acquired territories before lighter animals. Size was not a factor when prior residency was established. The adaptive significance of these findings, particularly as they relate to rearing of young, is discussed. (German summary) (31 ref)—S. R. Goldstein.

### Sensory Processes

11355. Cowey, Alan & Weiskrantz, Lawrence. (U Oxford, England) **Demonstration of cross-modal matching in rhesus monkeys, *Macaca mulatta*.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 117-120.—By using edible and inedible shapes presented first in darkness then in the inedible shapes presented first in darkness then in the light to rhesus monkeys, it was possible to demonstrate cross-modal matching from touch to vision. The result shows that cross-modal matching is not unique to apes and human beings. (French & German summaries)

11356. Govindarajan, S. & Rajulu, G. S. (PSG Coll of Technology Campus, U Extension Ctr, Coimbatore, India) **Presence of resilin in a scorpion *Palamnaeus swammerdami* and its role in the food-capturing and sound-producing mechanisms.** *Experientia*, 1974, Vol 30(8), 908.—Studied the elastic cuticular hinge in a scorpion that permits opening and closing of the chela

necessary for grasping food. It is concluded that this cuticle contains a protein resembling resilin whose inherent property is regaining its original condition after being pulled out or extended. Thus, the occurrence of a protein resembling resilin may aid in the operation of the scorpion's sound-producing and food-capturing mechanisms. (German summary)

11357. Grant, G. G. (Canadian Forestry Service, Insect Pathology Research Inst, Sault Ste Marie, Ontario) **Male sex pheromone from the wing glands of the Indian meal moth, *Plodia interpunctella* (Hbn.). (Lepidoptera: Phycitidae).** *Experientia*, 1974, Vol 30(8), 917-918.

11358. Kovach, Joseph K. (Menninger Foundation, Topeka, KS) **Early color preferences in the coturnix quail.** *Journal of Comparative & Physiological Psychology*, 1974(Dec), Vol 87(6), 1049-1060.—Color preferences within 6 paired combinations of the 4 primary colors were tested in 3,039 quail chicks by a binomial mass-screening procedure. The procedure resulted in highly reliable preference estimates for the middle range (green and yellow) over the extreme portions (blue and red) of the color spectrum and for the shortest over the longest wavelength (blue over red). Identified preferences were shown to be independent of objective or subjective intensity differences of colors and were also significantly different from each other in terms of their within-trait phenotypic variations.—*Journal abstract*.

11359. Morse, Philip A. & Snowden, Charles T. (U Wisconsin, Madison) **An investigation of categorical speech discrimination by rhesus monkeys.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 9-16.—Examined the discrimination of synthetic human speech sounds by 8 monkeys, using the cardiac component of the orienting response. A within-category change which consisted of stimuli differing acoustically in the onset of F2 and F3 transitions, but which are identified by humans as belonging to the same phonetic category, were responded to differently from a no-change control condition. Stimuli which differed by the same amount in the onset of F2 and F3 transitions, but which human Os identify as belonging to separate phonetic categories, were differentiated to an even greater degree than the within-category stimuli. Results provide ambiguous data for an articulatory model of human speech perception and are interpreted instead in terms of a feature-detector model of auditory perception. (37 ref)—*Journal abstract*.

11360. Sabbot, Irene & Costa, A. (U California, Brain Research Inst, Los Angeles) **Cold stress induced changes in the uptake distribution of radiolabelled magnesium in the brain and pituitary of the rat.** *Experientia*, 1974, Vol 30(8), 905-906.—Studied the effects of cold stress conditions on the uptake of radiolabelled magnesium by certain brain areas and by the pituitary gland in 64 white male rats (1/2 control and 1/2 experimental). Such stress produced an increase in magnesium uptake levels in the cortex. Results are explained with reference to changes in the permeability of the blood-brain and blood-pituitary barriers for magnesium that are induced by cold-stress. (French summary)

11361. Schuijff, A. & Siemeling, M. E. (Lab of Comparative Physiology, Utrecht, Netherlands) **The**



**ability of cod (*Gadus morhua*) to orient towards a sound source.** *Experientia*, 1974, Vol 30(7), 773-775.—Investigated the ability of the cod to determine the direction of a sound. A netted device with 4 possible corridors from which a 75 Hz sound could be generated was suspended into a fjord. The S was conditioned to swim in the corridors and rewarded at a feeding station in line with the active sound source. Results indicate that the S was able to determine a sound's direction. An operation was performed to sever the nerve roots innervating the pars inferior of the left labyrinth. Results indicate that the cooperation of both labyrinths is involved in directional hearing. (German summary)—*R. Tomasko*.

11362. **Wasserman, Gerald S.** (U Wisconsin, Madison) ***Limulus* psychophysics: Dark adaptation in the ventral eye.** *Journal of Experimental Psychology: Human Perception & Performance*, 1975(Feb), Vol 104(1), 68-76.—Notes that sudden illumination applied to *Limulus* produces an unconditioned downward tail movement which is under stimulus control and can be used to measure psychophysical thresholds. The method of constant stimuli was used to measure the behavioral dark-adaptation function mediated by the ventral eye of *Limulus*. The resulting function has 2 phases, each of which is rectified when log threshold is made a function of log time in the dark. Under the conditions of the present experiment, the transition between the 2 phases occurred at 6 min. Results are based on data derived from 8 animals. This psychophysical dark-adaptation function has the same form as an electrophysiologic dark-adaptation function obtained by A. Fein and R. D. DeVoe in 1973 (using the ventral eye receptor potential as the response). In more complex visual systems such 2-phase, dark-adaptation functions would usually be interpreted in terms of screening pigment movements or changes in the neural contributions of different receptor classes, but neither interpretation is appropriate for the ventral eye of *Limulus*.—*Journal abstract*.

11363. **Wegener, Jonathan G.** (Indiana U) **Interaural intensity and phase angle discrimination by rhesus monkeys.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 638-655.—Trained 9 pre- and postadolescent macaques to perform 3 auditory discriminations, which required that they press the right-hand key when the auditory stimulus was present in the right ear, and the left-hand key when the stimulus was presented to the left ear. Monaural thresholds for 18 ears averaged 14.7 db sound-pressure level. Interaural intensity difference thresholds for the same Ss had a mean of 2.7 db. Interaural phase angle difference thresholds were determined for 7 of the Ss. The mean threshold was 9.7°, equivalent to a temporal difference of 53  $\mu$ sec. (30 ref)—*Journal abstract*.

## DEVELOPMENTAL PSYCHOLOGY

11364. **Bench, John; Langford, Cheryl & Wilson, Ian.** (Royal Berkshire Hosp, Reading, England) **Some effects of prestimulus activity and length of prestimulus observation on judgments of infants' auditory behavior.** *Audiology*, 1975(Mar-Apr), Vol 14(2), 164-172.—The auditory responses of 9 6-wk-old and 10 6-mo-old

infants were assessed subjectively by a group of 4 experienced female Os. Infants' responses were evaluated as a function of prestimulus activity level and of duration of prestimulus observation. Response assessment for both ages was significantly affected by the 1st but not by the 2nd. The percentage of responses for both ages tended to decrease with increasing prestimulus activity state. Findings are compared with the similar study of C. Langford et al (1975) on neonates. (French summary)—*Journal abstract*.

11365. **Biller, Henry B.** (U Rhode Island) **Paternal and sex-role factors in cognitive and academic functioning.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 83-123.—Discusses studies which made qualitative and quantitative analyses of sex-role development and father-child relationships in the child's cognitive and academic behavior. Mothers were found more tolerant than fathers toward intellectually handicapped children, especially sons. Higher father availability and less parental deprivation were found related to high academic performance, particularly if the father enjoyed intellectual activities. Daughters also benefited from father availability and his intellectual pursuits in terms of greater autonomy, independence, creativity, and achievement. Strong mother figures tended to produce higher verbal skills but lower levels of independence and assertiveness in sons. Children's reactions to male vs female teachers are discussed. (146 ref)—*J. M. Roberts*.

11366. **Birns, Beverly.** (State U New York, Stony Brook) **Piaget and Wallon: Two giants of unequal visibility.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 24-28.—Compares J. Piaget's contributions to developmental psychology with those of H. Wallon. Piaget's theory, which emphasizes the classification of cognitive development and learning through action, with an experimental approach, received rapid recognition because of the influence of Freud's theories and public interest in child development. By contrast, Wallon's clinical approach and his emphasis on interaction between cognitive and emotional development has been recognized only recently, because of its congruence with modern social learning theories which emphasize how much behavior can be learned on the basis of imitation. Wallon's theory is concordant with the premise that who and what are imitated are related to the child's feelings about the class of people that he imitates. Piaget's researches tend to be experimental; Wallon's are more clinical and they do not focus on one particular dimension.—*A. H. Alawi*.

11367. **Cassel, Russell N. (Ed.).** (Project Innovation, Chula Vista, CA) **Critical contributions of Piaget to developmental psychology.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.—Considers the nucleus of Piaget's entire history of investigation to be the concept of genetic epistemology and discusses his definition of the process of adaptation in relation to the present understanding of learning theory. 5 areas involved in Piaget's concept of learning—maturation, experience

with environment, teachings, equilibration, and cultural norms—are outlined.

11368. Cortial, Christiane & Lézine, Irène. (Port Royal Hosp, Paris, France) **Comparative study of nutritive sucking in the newborn (premature and full-term).** *Early Child Development & Care*, 1974, Vol 3(3), 211-228. —Describes an analysis of sucking patterns in premature infants. The rhythm is disorganized compared to that of normals and is related to the difficulties in space orientation found in older prematurely born children. The psychoprophylactic importance of individually appropriate feeding procedures is discussed.

11369. Day, R. H. (Monash U, Clayton, Vic, Australia) **Perceptual processes in early infancy.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 15-34. —Reviews research on infant perception during the preceding 4 yrs. Most of the work has involved 3 techniques: (a) operant conditioning with social reinforcement, (b) visual fixation preference, and (c) habituation of visual fixation. A variety of experiments are discussed dealing with discrimination of pattern in infancy, discrimination of orientation, object distance as a determinant of visual fixation, and shape constancy in infancy. The chief conclusion is that the very young infant is prepared for a wide range of perceptual achievements at an early age. (31 ref)—J. C. Figurelli.

11370. DeVito, Pasquale J. (Boston Coll) **An analysis of selected behavioral characteristics of disadvantaged students.** *Journal of Educational Research*, 1975(Jan), Vol 68(5), 178-181. —Investigated sex and grade differences of 193 male and 210 female educationally disadvantaged children, ranging in grade level from kindergarten to Grade 3, on behavioral traits delineated by orthogonal factor analysis. 6 factors were extracted and factor scores used as dependent variables in univariate analyses of variance. Primary results indicate that (a) creativity indices among Ss decreased steadily from kindergarten to Grade 3; and (b) contrary to research conducted with general population Ss, girls in the disadvantaged sample exhibited more aggressive behavior than boys and were no more dependent on the teacher than the boys. Possible explanations and implications are discussed. —Journal abstract.

11371. Draper, Mary W. (Oklahoma State Dept of Health, Oklahoma City) **Play: The pathway to learning.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50. —Explores the role of play actions and play objects in the development of the child, especially during the sensorimotor period from birth to approximately 18-24 mo, and in the child's acquisition of skills and concepts (e.g., object permanency, perceptual motion, classification, seriation, and spatial and temporal relationships).

11372. Eimas, Peter D. (Brown U, W. S. Hunter Lab of Psychology) **Auditory and linguistic processing of cues for place of articulation by infants.** *Perception & Psychophysics*, 1974(Dec), Vol 16(3), 513-521. —In 2 experiments a total of 144 2- and 3-mo-old infants discriminated the acoustic cues for the phonetic feature of place of articulation in a categorical manner.

Evidence for the discriminability of 2 synthetic speech patterns was present only when the stimuli signaled a change in the phonetic feature of place. No evidence of discriminability was found when 2 stimuli, separated by the same acoustic difference, signaled acoustic variations of the same phonetic feature. Discrimination of the same acoustic cues in a nonspeech context was found, in contrast, to be noncategorical or continuous. Results are discussed in terms of infants' ability to process acoustic events in either an auditory or a linguistic mode. (37 ref) —Journal abstract.

11373. Galenson, Eleanor & Roiphe, Herman. (Albert Einstein Coll of Medicine, Yeshiva U) **The emergence of genital awareness during the second year of life.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11374. Gove, Walter R. & Herb, Terry R. (Vanderbilt U) **Stress and mental illness among the young: A comparison of the sexes.** *Social Forces*, 1974(Dec), Vol 53(2), 256-265. —The sociological and psychological literature almost uniformly suggests that young males experience more stress than young females, in part because of social expectations and in part because of different rates of biological development and other physiological factors. It also suggests that with advancing age the sex difference in experienced stress tends to disappear, and by late adolescence the situation of females appears to be at least as stressful if not more so than that of males. On the premise that the differences in experienced stress would be reflected in rates of treated mental illness, the national rates of males and females in psychiatric treatment between ages 5 and 19 are compared. Data consistently show preadolescent males to have higher rates of mental illness, while by late adolescence females appear to have as high if not higher rates of mental illness than males. (2 p ref)—Journal abstract.

11375. Hellbrun, Alfred B. (Emory U) **Parent identification and filial sex-role behavior: The importance of biological context.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 125-194. —Examines the complexity of human social responses in an attempt to fill in details omitted by using over-simplified theories and simplistic research tools that have thus far precluded a complete understanding of the antecedents of these responses. The term "congruity" is used to describe the fit between psychological masculinity or femininity and biological maleness or femaleness. Self-assessments on 15 personality variables are compared with the S's ratings of the parents on the same variables. Congruity of the parent identified with bears upon the resultant behavior of the son but not the daughter. 3 possible explanations are offered to explain this result. (56 ref)—J. M. Roberts.

11376. Korner, Anneliese F. (Stanford U, Medical School) **Methodological considerations in studying sex differences in the behavioral functioning of newborns.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11377. Labovitz, Sanford. (U Calgary, Alberta, Canada) **Control over death: The Canadian case.** *Omega: Journal of Death & Dying*, 1974(Fal), Vol 5(3), 217-221.



--Replicated D. J. Phillips's (1969) "death control study" of famous Americans, using famous and nonfamous Canadians. Results support the hypothesis that death rates decrease prior to birth dates and increase after them, with 1 exception—death rates for famous Canadians did not decrease prior to birth dates.

11378. Lubin, Gerald I.; Magary, James F. & Poulsen, Marie K. (Eds.). *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.*

11379. Mencher, George T.; Kushner, Marcia & McCulloch, Barbara. (Hosp for Children, Halifax, Nova Scotia, Canada) **White noise as a pretest sensitizer for neonatal hearing screening.** *Audiology*, 1975(Mar-Apr), Vol 14(2), 152-163.—Tested 450 newborn infants under 18 test conditions which also permitted examination of infant state and criterion stimuli (warble tone vs narrow band noise) as variables. There were 3 pretest conditions: no pretest sensitizer, 90-db pretest sensitizer, and 100-db pretest sensitizer. Each pretest condition was followed by either a 90- or a 100-db criterion stimulus. Analysis concerned an increase in the number and in the strength of the responses. Generally, there was no benefit associated with the use of white noise as a pretest sensitizer. (French summary)—*Journal abstract.*

11380. Moltz, Howard. (U Chicago) **Some implications of the critical period hypothesis.** *Annals of the New York Academy of Sciences*, 1973(Dec), Vol 223, 144-146.—Proposes that the term "critical period" is conceived too broadly and too generally, designating a host of disparate developmental phenomena. It is indiscriminately applied to all behavior patterns whose growth and organization are markedly affected by events typically occurring within a fairly narrow and specific period of development. Inherent in this use of the concept of critical periods in ontogeny is its confusion with the existence of optimal periods for specific learning. Contingent response systems will not develop in the absence of certain investigated stimulus conditions, and critical periods in development exist for these (e.g., imprinting). A noncontingent response system will develop in the absence of environmental events, which, if present, exert a great effect on these responses. Thus, optimal periods exist for their development. It is concluded that the term "critical period" as used by psychologists and ethologists requires conceptual refinement.—R. S. Albin.

11381. Sklar, Mark J. **Is Piaget a developmental or learning theorist?** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds.), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.*—Discusses Piaget's characterization of intelligence as an adaptive process, arguing that it is clearly evident that his theory of intelligence is, above all, developmental in nature. An analysis of Piaget's developmental theory is presented, and its contribution to learning in today's schools is outlined.

11382. Steiner, J. E. (Hebrew U, Hadassah School of Dental Medicine, Jerusalem, Israel) **Discussion paper: Innate, discriminative human facial expressions to taste and smell stimulation.** *Annals of the New York Academy of Sciences*, 1974(Sep), Vol 237, 229-233.—Summarizes experiments designed to elucidate the gustofacial response—the well-differentiated motor reaction of the facial muscles to adequate stimulation of the peripheral gustatory receptors. Studies described include several utilizing neonate infants (both normal and malformed) less than 16 hrs of age and several testing normal Israeli adults. All displayed the gustofacial response when presented with sweet, sour, and bitter stimuli. The presentation of sweet stimuli is usually followed by a marked relaxation of the facial muscle, retraction of the mouth (smile), and licking and sucking. Bitter stimuli were followed by depression of the mouth angles. In sour stimulation, lips were pursed. These reactions are seen as reflex-like and innate. Reactions to odorant stimuli are also described. It is concluded that food-related odors are discriminated by human infants in the very first hours of life.—R. S. Albin.

11383. Stodolsky, Susan S. (U Chicago) **How children find something to do in preschools.** *Genetic Psychology Monographs*, 1974(Nov), Vol 90(2), 245-303.—Conducted a 2-yr observational study of a total of 81 lower- and middle-class 3-6 yr olds to examine the behavior of young children in school settings which program all or part of the day as "free play" time. Results indicate that with age, children became more effective in moving from one activity to another; they spent less time in transition and longer periods in activity. Behaviors exhibited while in transition became less dependent on the immediate surrounding and seemed to indicate more autonomy. Lower-class boys had shorter activity lengths and more transitions than the other groups. A qualitative description of children's transition behavior is presented and possible implications of the findings for developmental and educational research are discussed. (35 ref)—*Journal abstract.*

11384. Ushiyama, Toshiko. [Facilitation and inhibition factors of choice of "Jan-Ken" behavior in kindergarten children.] (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 105-109.—Describes the psychological and social significances of "Janken" behavior, which is widely used by Japanese children as a method of deciding a winner.

11385. Wallon, Henri. **The psychological development of the child.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 29-39.—Traces the psychological development of the child as a continuous transition from concrete to abstract mental organization, from reflex emotionality to intellectualization of emotions, and from pleasure to reality orientation as a function of maturation and learning. Special emphasis is given to the role of play, in which the child repeats the impressions of events he has just experienced; of imitation, language, and cognitive clarity. Emotions are regarded as the underlying basis for the gregarious drives that constitute a rudimentary form of communication and community. Discontinuity in the thought of the child is attributed to inadequate accommodation to an object. The various stages of development are described,

emphasizing that these stages demonstrate unity and interrelatedness. At each stage the child constitutes an indivisible whole "self" capable of further enrichment.—A. H. Alawi.

11386. Watanabe, Hirozumi. (Ehime U, Matsuyama, Japan) [Development of form perception in preschool children: Analysis of manual movements by means of VTR.] (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 115-119.—Analyzed the videotaped hand movements of Japanese preschool children in relation to the development of form perception. 4 developmental stages were confirmed: inactive, active search, visual search, and simultaneous solution.—S. Choe.

11387. Wels, P. M. & Van den Munckhof, H. C. (Katholieke U, Nijmegen, Netherlands) [The Nijmegen growth study: A mixed longitudinal, multidisciplinary investigation of children 4-14 yrs old.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Nov), Vol 29(8), 649-667.—Presents the design of the Growth Study of 486 children (232 male and 254 female). Medical, dental, and psychological variables were investigated. The psychological aspects considered were (a) the development of cognitive functions, school progress, and several personal characteristics; (b) the relationships between the psychological and somatic characteristics; (c) the influence of cultural and pedagogical characteristics; (d) the ability to generalize, as identified by test effect; (e) the development of new concepts by the Ss. The measuring instruments used are described. The cross-sectional and longitudinal testing patterns are discussed. (24 ref)—A. J. Ter Keurst.

11388. Wolff, Peter H. (Children's Hosp Medical Ctr, Boston, MA) What Piaget did not intend. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.—Criticizes interpretations of Piaget's writings which take his observations rather than his theory as a basis for reforming elementary school education. Core concepts from the psychological aspects of Piaget's genetic epistemology are restated, and it is argued that the clinical method which he used to discover universals of intellectual development is just as relevant for classroom teaching.

11389. Zern, David S. (Clark U) An interpretation of the effects of stimulation on development: Its role as a resolvable disequilibrating. *Genetic Psychology Monographs*, 1974(Nov), Vol 90(2), 325-347.—Reviews literature which demonstrates that stimulation helps to foster development, although there have been no uniformly accepted interpretations of the relevant data. An explanation is offered which argues that stimulation is experienced by the organism as an unpleasant and frustrating intrusion and not as something enjoyable. The organism is motivated to achieve appropriate skills in order to eliminate the stimulation, thus resolving the disequilibrium that has been created. Evidence supporting this thesis is presented both from laboratory experiments of animals and systematic examination of human offspring in their homes and in institutional

settings in a variety of societies. (47 ref)—*Journal abstract*.

### Cognitive & Physical Development

11390. Bauer, Richard H. (U California, Los Angeles) Developmental and intellectual changes in serial recall of repeated and nonrepeated digit sequences. *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 121.

11391. Baylor, George W. & Lemoyne, Glisele. (U Montréal, Québec, Canada) Experiments in seriation with children: Towards an information processing explanation of the horizontal décalage. *Canadian Journal of Behavioural Science*, 1975(Jan), Vol 7(1), 4-29.—Tested 37 5-10 yr olds on 3 seriation tasks: length, weight, and a specially constructed "hidden length" seriation designed to eliminate the typically observed horizontal décalage between the length and weight tasks. Results confirm the main hypotheses: the hidden length seriation was more difficult than the normal length seriation and of approximately equal difficulty to the weight seriation. An information-processing analysis was then carried out with 1 8-yr-old S at the operational level of cognitive development. This led to the construction of a performance model, a computer program cast as a set of production rules, that simulated in detail the S's behavior on the 3 tasks. The general and task specific elements of the program show how the length seriations are facilitated by perceptual factors and the organization of memory, though within the framework of a common insertion strategy that the S employed on all 3 tasks. (French summary) (22 ref)—*Journal abstract*.

11392. Brislaw, Ferdinand L. (Piedmont Unified School District, Special Education Services, CA) Space representation and language development. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11393. Carlson, Jerry S. & Goldman, Roy D. (U California, Riverside) The relationship between multiplicative classification and inductive reasoning. *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 265-272.—Investigated the relationship between multiplicative classification and inductive reasoning with 103 9-yr-old children. Regression analysis showed a significant association. The variance accounted for in B. Inhelder and Piaget's Standard Matrix Test by performance on the Coloured Progressive Matrices test was 34%. It was expected that the operational component of the latter test would be restricted to conceptual items. The data did not support this expectation. It is concluded that for the present sample, there was an overlap between these 2 domains of mental operations.—*Journal abstract*.

11394. Chateau, John. [The two orientations in the child's world.] (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 5-20.—Boys and girls 4-6 yrs old were shown cardboard geometric colored forms. In a previous experiment the children had learned that each colored form represented a character or scenery in the story of Little Red Riding Hood. They were asked, for each of 15 objects, "What is it?" If they said "It's a wolf," the response was recorded



as symbolic; if merely "a black circle," the response was perceptive. Results showed a duality of attitude, symbolic as opposed to perceptive. Another study showed that color is more significant than form at younger ages. Adolescents asked to place numbered counters on a triangular arrangement of square spaces showed another duality; perceptive as opposed to abstract. It is concluded that there is a split in the child psyche between the real and the imaginary. This fundamental ambiguity persists in adult thought and often manifests itself in the schizoid character.—S. S. Marzolf.

11395. Dempsey, Arthur. (East Texas State U) **Videotape: Piagetian tests of time perception.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11396. Denney, Nancy W. & Duffy, Diane M. (U Kansas) **Possible environmental causes of stages in moral reasoning.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 277-283.—Conducted a study of both mothers and their children ( $n = 176$ , 17 10-, and 17 14-yr-olds) to determine whether parents imply different moral principles to children of different ages and whether there is a relationship between the type of moral reasoning that the parents imply and the level of moral reasoning used by the child. Children's responses to moral dilemmas and the mothers' responses to hypothetical situations were classified according to L. Kohlberg's (1969) 3 main categories—preconventional, conventional, and postconventional. Results indicate that as the age of the children increased, both the level of moral reasoning used by the children and the level of moral reasoning implied by the mothers' treatment of the children increased. Even with age partialled out, there was a significant positive relationship between the mothers' and children's implied levels of moral reasoning.—*Journal abstract.*

11397. Docherty, Edward M. (U Wisconsin, Madison) **Identifying concrete and formal operational children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11398. Downing, John & Oliver, Peter. (U Victoria, British Columbia, Canada) **The child's conception of "a word."** *Reading Research Quarterly*, 1973-1974, Vol 9(4), 568-582.—Examined preschool, kindergarten, and 1st-grade children's conceptual understanding of what constitutes a spoken English word. Ss were presented with examples of 8 classes of auditory stimuli to which they responded "yes" if they thought each was a single word and "no" if they did not. Certain age trends were noted with respect to the number of correct responses to each class of stimuli and to the number of children demonstrating concept attainment within each stimulus class. All of the Ss, regardless of age, confused isolated phonemes and syllables with spoken words. All were also able to recognize that nonverbal sounds which were not identifiable were not words. Until the age of 6.5 yrs, however, Ss tended to confuse identifiable nonverbal

sounds, phrases, and sentences with words. These confusions disappeared with older children. Ss between 5.6 and 6.5 yrs old tended to exclude long words from their conception of the spoken word, but Ss younger and older than this age group did not. (French & Spanish summaries)—*Journal abstract.*

11399. Edwards, Derek. (Loughborough U, England) **Sensory-motor intelligence and semantic relations in early child grammar.** *Cognition*, 1973, Vol 2(4), 395-434.—Explores the interface between universal semantic relations and universal sensory-motor cognitions, which meet in the content and process of language acquisition at the beginning of syntax in 2-word utterances. Based on case grammar and on the findings of studies of early child language, a system of semantic clause-types is elaborated for the description of the relational meanings that are apparently expressed universally in the speech of young children. These semantic relations are compared to the concepts invoked in Piaget's descriptions of sensory-motor intelligence, in particular to the concepts of permanent objects and their spatial relations, to the dual concepts of persons as physical objects and as active beings, and to the role of persons as causers of changes in the locativity of objects. A close correspondence is found, and it is claimed that the nature of sensory-motor intelligence severely constrains the range of relational meanings expressed, including even the child's notions of possessive relations between persons and objects, of attributes of objects, and his use of apparently experiential verbs. (French summary) (35 ref)—*Journal abstract.*

11400. Fagan-Dublin, L. (California State U, Fullerton) **Lateral dominance and development of cerebral specialization.** *Cortex*, 1974(Mar), Vol 10(1), 69-74.—Administered to left-handed and right-handed 5-6 yr old children the verbal and nonverbal (Performance) subtests of the WISC, to reveal possible differences in abilities between the 2 groups. Since previous studies by others showed such differences in specific adult groups, this investigation sought to discover whether or not differences associated with handedness (a) are detectable earlier in development and (b) exist in nonspecialized individuals. Results indicate that there are no significant differences between left-handed and right-handed 5-yr-old children with respect to their verbal and performance abilities.—R. Gunter.

11401. Guerrieri, Mary A. & Frank, Harry. (U Michigan, Flint) **Height and diameter cues in conservation of volume.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1110.—Results of administering to 7-8 yr old conservers and nonconservers volume problems in which either height or volume was held constant confirm the hypothesis that failure to conserve volume is not mediated by attention to diameter cues, as has been suggested.

11402. Hathaway, Walter E. & Hathaway-Theunissen, Anneke. (Portland Public Schools, OR) **The unique contributions of Piagetian measurement to diagnosis, prognosis, and research of children's mental development.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern*

California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11403. Hornemann, Jacqueline. [Influence of content upon the solution of logical problems.] (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 45-64.—Attempted to determine whether deficiency in verbal facility manifests itself in a variety of tasks or chiefly in those operations depending on verbal structures. 2 groups of boys and girls aged 11-16 were compared; the 449 experimental Ss were characterized by lesser verbal performance than that of the 617 control Ss. A variety of tests were given, including a Scale of Logical Development based on Piagetian concepts, and educational achievement and interest tests. Between-group and intragroup analyses and a factor analysis are reported in detail. Results support Piaget's hypothesis that all normal Ss will achieve the formal stage of intellectual development but the way in which this stage is reached will not necessarily be the same in all cases. Interests, specific aptitudes, and differences in concrete experiences will alter the process. (16 ref)—S. S. Marzolf.

11404. Kershner, John R. (Ontario Inst for Studies in Education, U Toronto, Canada) **Visual-spatial organization and reading: Support for a cognitive-developmental interpretation.** *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 30-36.—Studied 20 7-yr-old Grade 2 children to (a) test whether the conceptual, spatial ability of 7-yr-olds is related more highly to reading than their visual, perceptual ability; and (b) determine whether concrete operational children with low visual-perceptual skills, can, nevertheless, read adequately. Results indicate that Ss' cognitive spatial ability was better than their visual-perceptual ability in differentiating good from poorer readers. The visual-perceptual skills measured by the Frostig Developmental Test of Visual Perception were insufficient for advanced reading at the Grade 2 level and an unnecessary requirement for high reading ability. Results suggest that perceptual-motor training will be most effective when used preventively rather than remedially and when the programs are implemented during the early years of development at the time the child is in Piaget's preoperational stage. The study supports an alternate theoretical framework for understanding the relationship of visual-perceptual deficits and reading. (20 ref)—*Journal abstract*.

11405. Khatena, Joe & Fisher, Susan. (Marshall U) **A four-year study of children's responses to onomatopoeic stimuli.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1062.—Test-retest data acquired by administering Forms 1A and 1B of Onomatopoeia and Images to 8-yr-old children at 4 consecutive yearly intervals show that the loss in verbal originality occurring at ages 9 and 10 yrs followed by a gain at 11 yrs was significant and supportive of similar observations reported in an earlier study.

11406. Kimball, Richard L. (California State U. Hayward) **Some aspects of the role of affective development in cognitive development: Relating formal operations learning to emotional maturity.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15,*

1974: University of Southern California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11407. Kohlberg, Lawrence & Ullian, Dorothy Z. (Harvard U, Lab of Human Development) **Stages in the development of psychosexual concepts and attitudes.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11408. Lahey, Margaret. (Montclair State Coll) **Use of prosody and syntactic markers in children's comprehension of spoken sentences.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 656-668.—Compared 27 4-yr-old and 27 5-yr-old nursery school children's comprehension of coordinate, center-embedded relative clause, and right-branching relative clause sentences under 4 conditions of presentation: (a) prosody (P) and syntactic markers (M) intact, (b) P intact and M eliminated, (c) M intact and P eliminated, and (d) M and P eliminated. The number of semantic-syntactic relationships in a sentence that were correctly acted out were analyzed by age, sentence type, and conditions of presentation. More relationships were acted out appropriately by 5-yr-old Ss. Differences between sentence type were significant, with coordinate sentence type the easiest and right-branching sentence type the most difficult. Conditions of presentation did not significantly affect responses, although there was a significant Condition  $\times$  Sentence Type interaction. Scores were significantly lower for center-embedded sentences when M was intact and P eliminated. It is concluded that word order was the major linguistic cue used by the Ss to process these sentences. (25 ref)—*Journal abstract*.

11409. Larue, Gerald A. **The acquisition of concepts of conservation of matter in black adolescents.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15,* 1974: University of Southern California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11410. Leroy-Boussillon, A. & Martinex, F. (Inst of Neurophysiology & General Psychophysiology, Marseille, France) **[An auditory-phonetic prerequisite for learning written language: Syllabic analysis.]** (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 111-130.—Recognizing individual letters and knowing their sounds does not ensure ability to use them in writing dictated syllables; ability in syllabic analysis may be lacking. Except for those having auditory and speech deficits, the 224 Ss were taken from schools at 4 socioeconomic levels. IQs were available for all. Beginning at age 5 a test consisting of 42 2-letter syllables (a consonant followed by a vowel) was given every 3 mo for 3 yrs. The syllables were pronounced and the children were asked to write them. For the group as a whole the means produced an S-shaped curve over time. When the Ss were divided into 8 IQ subgroups the curves were roughly parallel except for the 2 lowest levels, where the curves did not reach the 2nd inflection. Those with IQs over 130 attained perfect scores at the beginning of the 2nd yr, but most 6-yr-olds lacked maturity in this ability. (English summary) (28 ref)—S. S. Marzolf.

11411. McCarthy, Jeanette M.; Wright, Robert J. & Noppe, Lloyd D. (Temple U) **Concept attainment and**



**Piagetian conservation tasks: Educational implications.**

In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11412. Millar, W. Stuart. (U Strathclyde, Glasgow, Scotland) **The role of visual-holding cues and the simultanizing strategy in infant operant learning.** *British Journal of Psychology*, 1974(Nov), Vol 65(4), 505-518. —Monitored the operant acquisition of a manipulative response and concurrent visual fixation behavior in a total of 96 6- and 9-mo-old infants under conditions where a cue marked the discontiguous feedback source, and where no such cue was available. Nonavailability of the visual cue disrupted manipulative response acquisition of 6-mo-old but not 9-mo-old infants. Cue-assisted younger infants responded at a level comparable to the 9-mo-olds and at a level reliably higher than the younger no-cue group. 9 mo-old infants performed equally well under no-cue and cue-assisted conditions. This finding, which demonstrates the importance of visual-holding during the interresponse interval, is interpreted in terms of the increasing capability of infants during the 2nd half of the 1st yr to spontaneously relate centrally retrieved information to concurrent activity and to regulate behavior on the basis of this information. Noncontingent stimulation elicited greater visual fixation of the feedback source at both ages in the presence of the cue and related to the occurrence of acquisition. 9-mo-old infants revealed more coincidental visual and manipulative behavior than did younger infants, but only with the cue available. The visual data are discussed in terms of the prerequisite discrimination of contingent from noncontingent stimulation for response acquisition, and the generalized use of the simultanizing strategy.—*Journal abstract*.

11413. Nelson, Keith E. & Bonvillian, John D. (New School for Social Research, New York, NY) **Concepts and words in the 18-month-old: Acquiring concept names under controlled conditions.** *Cognition*, 1973, Vol 2(4), 435-450.—Examined, longitudinally, the use of available evidence in acquiring words by 5 male and 5 female white, middle-class 16.2-17.5 mo olds. In comparison with previous work on early word meaning, 2 essential departures in design were employed—word use by the Ss was exhaustively detailed in an experimental setting, and this setting permitted systematic control and limitation in patterns of referent object encounter and of adult naming for the objects (toys). Although relatively few examples from which to learn word and concept meanings were presented to Ss during the 6-mo study, they succeeded in learning to use many of the words appropriately. Variations in the course of learning for different Ss are discussed, with special attention to the ways in which nonverbal action or mother-child interaction could have influenced the S's progress. (French summary)—*Journal abstract*.

11414. Ochiai, Masayuki. (Kyoto U, Japan) **[Development of conservation and acquisition of language.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 100-104.—Examined conservation

and language development but found no relationship between them.

11415. Paynter, Earlene T. & Petty, Nancy A. (Texas Tech U) **Articulatory sound: Acquisition of two-year-old children.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1079-1085.—90 children (15 2-yr-old females, 15 2-yr-old males, 30 2½-yr-old females, and 30 2½-yr-old males) were administered the Sounds-in-Words subtest of the Goldman-Fristoe Test of Articulation. Percentages were computed for each of the 35 consonant sound items at each age level to determine which sounds the 2- and 2½-yr-old children were able to produce correctly. Results show that articulatory performance was significantly influenced by age and sex but not by socioeconomic level.—*Journal abstract*.

11416. Peterson, Rita W. (California State U, Hayward) **Evidence of logical operations in children's nonverbal behavior.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11417. Rafferty, Frank T. (Inst for Juvenile Research, Chicago, IL) **Cognition, language, and social behavior.** *Child Psychiatry & Human Development*, 1974(Sum), Vol 4(4), 227-237.—Briefly reviews studies demonstrating the interdependence of cognition, language development, and social group differences. It is suggested that the global concept of cultural deprivation is inadequate. (19 ref)

11418. Robinson, Violet B. (San Francisco State U) **An investigation of the performance of kindergarten children on quantitative class inclusion tasks.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11419. Ross, Robert J. (U Wisconsin, Eau Claire) **The development of formal thinking for high and average achieving adolescents.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11420. Rubin, Kenneth H. (U Waterloo, Ontario, Canada) **The relationship between spatial and communicative egocentrism in children and young and old adults.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 295-301.—Tested 4 age groups (young and late childhood, mean ages = 7 and 11 yrs; young adult, mean age = 21 yrs; and elderly, mean age = 76 yrs) of 112 Ss on 2 measures of spatial and communicative egocentrism. Contrary to Piaget's assumption (1950) that the variables within his system develop in a unidirectional and irreversible fashion, a curvilinear pattern of development was found. Moreover, the relationship between the 2 egocentrism measures was significant for only late childhood and young adult Ss. Nonsignificant relationships existed for the young and elderly groups.

Findings are discussed in terms of neurological disintegration in the elderly. (16 ref)—*Journal abstract.*

11421. Scardamalia, Mariene. (York U, Toronto, Ontario, Canada) **Two formal operational tasks: A quantitative neo-Piagetian and task analysis model for investigating sources of task difficulty.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11422. **Sinha, Durganand & Shukla, Pushpa.** (Allahabad U, India) **Deprivation and development of skill for pictorial depth perception.** *Journal of Cross-Cultural Psychology*, 1974(Dec), Vol 5(4), 434-450.—Studied the impact of familial deprivation on the acquisition of skill for pictorial depth perception on 2 groups of 125 3-6.5 yr olds each from Indian nurseries and orphanages. Ss were required to judge distance by interpreting each of the 6 common pictorial cues depicted individually in a set of pictures. Analysis of mean scores reveals a clear developmental trend in both the groups. Intelligence was significantly correlated with the scores. With intelligence controlled, significant retarding effects of deprivation on the scores at the higher age levels but none at 3-4 yrs were found. Comparison of scores on each of the 6 cues revealed the same tendency. Lack of heterogeneity and absence of stimulation in orphanages had a general retarding influence on the development of the skill for pictorial depth perception. (24 ref)—*Journal abstract.*

11423. **Sohns, Marvin L.** (California State Dept of Education, Sacramento) **A comparison between certain Piagetian logical thinking tasks and the subtraction ability of first, second, and third grade children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11424. **Stewin, L. L. & Martin, Jan.** (U Alberta, Edmonton, Canada) **A comparison of the developmental stages proposed by L. S. Vygotsky and J. Piaget.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11425. Stewin, L. L. & Martin, Jan. (U Alberta, Edmonton, Canada) **The developmental stages of L. S. Vygotsky and J. Piaget: A comparison.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 348-362.

—Conducted a study of 104 4-16 yr olds to explore the relationship between the stages of cognitive development proposed by L. S. Vygotsky (1962) and Piaget. All Ss were in the average range of intelligence, were in the usual school grade for their age, and had no history of neurological or emotional problems. Ss were administered the Vygotsky Concept Formation Test as well as the Piagetian tasks related to the conservations of continuous and discontinuous quantity, weight, area, volume, and density. Responses were scored qualitatively in terms of the described developmental model of each theorist. Developmental levels were converted to a

numerical scale within each system and were compared through correlational analysis. Results led to the conclusion that the 2 theoretical models are closely related since both Piaget's and Vygotsky's models of cognitive development appeared to be representative of children's thought processes at all levels of sophistication. (32 ref)  
—*Journal abstract.*

11426. Sticht, Thomas G. et al. (Human Resources Research Organization, Alexandria, VA) **Auding and reading: A developmental model.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 203.

11427. Taylor, Lorne J. & Skanes, Graham R. (Memorial U Newfoundland, St John's, Canada) **Psycholinguistic abilities of children in isolated communities of Labrador.** *Canadian Journal of Behavioural Science*, 1975 (Jan), Vol 7(1), 30-39.—A total of 101 kindergarten and Grade-1 children from 4 isolated coastal communities in Labrador were given the Peabody Picture Vocabulary Test, Wechsler Preschool and Primary Scale of Intelligence, and Illinois Test of Psycholinguistic Abilities. The differential psycholinguistic profiles of the Ss are reported. These results offer support for the claim that ecological demands to some extent determine cognitive structures. Results also indicate that the Ss had abilities in a number of areas that were within 1 standard deviation of the mean for the normative sample. These suggest areas that could be capitalized upon in order to make the educational system more meaningful to these children. (French summary)  
—*Journal abstract.*

11428. Turkewitz, Gerald & Creighton, Susan. (Albert Einstein Coll of Medicine, Yeshiva U) **Changes in lateral differentiation of head posture in the human neonate.** *Developmental Psychobiology*, 1975(Jan), Vol 8(1), 85-89.

—Examined developmental changes in the relationship between lateral differences in responsiveness and the assumption of asymmetrical head postures. The head turning of 70 infants ranging in age from 0 to 72 hrs was observed following a procedure (maintenance of the head in a midline position) known to reduce or eliminate lateral differences in the infant's response to stimulation. Even following this procedure Ss older than 12 hrs made significantly more right than left head turns, whereas younger Ss exhibited no such difference. When lateral differences in sensitivity were not interfered with in 0-12 hr old infants ( $n = 20$ ) they, like the older infants, made significantly more right than left turns. Results are discussed in terms of possible developmental consequences of a reciprocity between asymmetric head position and lateral differences in sensitivity.—*Journal abstract.*

11429. **Van Enoo, Sharon.** (California State Coll Dominguez Hills) **Egocentric, subjective, and objective thinking in children based on Piaget's theory of mental development in the areas of realism, animism, and artificialism.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11430. Verba, Nina. [Graphic space: Role of the presence of the model in the construction of complex sentences]. *Journal of Child Psychology and Psychiatry*, 1975, 348 p. \$7.50.



**geometric figures.]** (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 81-92.—Forms to be reproduced may differ in the ease with which they may be broken down into parts. 2 drawings capable of being so broken down, at 2 levels of difficulty, were copied and then reproduced from memory by 103 Ss in age groups 4, 4-6, and 5 yrs. Failure and 3 levels of success were defined. The order of progression by age from lower to higher levels of performance was the same for copying as for drawing from memory, but in each age group levels of success were higher for drawings copied than for drawings from memory. Whether similar results would be obtained with drawings which could not be readily broken down into parts needs investigation, since the results would bear upon the development of the child's conception of space.—S. S. Marzolf.

11431. Vezin, Jean-Francois. (U René Descartes, Lab de Psychologie Génétique, Paris, France) **[Comparative study of more and less concrete diagrams and verbal statements: Their correlation and role in learning as a function of age.]** (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 21-44.—Materials for programed instruction, consisting of verbal texts with and without examples, and diagrams (concrete, abstract, and in perspective) were presented to 18 treatment groups, each consisting of 10 boys and 10 girls aged 8-14 distributed in 3 school grades, to determine the degree to which the diagrams could be related to the texts. Success was related to the concreteness of the verbal material and of the diagrams. Differences in the efficacy of the different kinds of diagrams were most notable where Ss were called upon to produce a hierarchy of important words in the text. In this case the concrete diagrams were best. Examples were effective in relating statements to drawings but impeded production of resumes. As age increased, verbal and graphic symbolism were used more effectively. (15 ref)—S. S. Marzolf.

11432. Wallon, Henri. **The origins of thought in the child.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 53-66.—Contrasts the intellectual inertia of the child and his susceptibility to external and internal distractions with the configuration-forming capacity of adult thought. The aspects of intellectual development considered include the elementary structure of the child's thought; the contradictory sources of information derived from his direct personal experience and from social experience (through language and tradition); the significance of gestures; imitation; intellectual and verbal techniques as the origins of mental representation; the progressive differentiation and identification process as a function of the acquisition of the concept of the "same" and its diverse meanings; and finally, the problem of the child's inability to dissociate subjective from objective reality.—A. H. Alawi.

11433. Windmiller, Myra. (U California, Berkeley) **The relationship between a child's conception of space and his comprehension and production of spatial locatives.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions*: February 15, 1974: University of Southern

California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11434. Zelazo, Philip R.; Hopkins, J. Roy; Jacobson, Sandra & Kagan, Jerome. (Harvard U) **Psychological reactivity to discrepant events: Support for the curvilinear hypothesis.** *Cognition*, 1973, Vol 2(4), 385-393.—Observed 80 male and 60 female 7½-mo-old infants under 5 a priori judged levels of discrepancy to assess whether sustained attention was linearly or curvilinearly related to degree of discrepancy from an experimental standard. Following habituation, Ss were exposed to either the repetition of the standard, a minimal, 1st- or 2nd-level moderate discrepancy, or a novel stimulus having no relation to the standard. The related stimuli, varying in elongation, were sphere, pear, club, and cylinder-shaped objects; the novel stimulus was a different colored, toothlike object. 80 Ss observed the sphere as the standard and the cylinder as the 2nd-level moderate discrepancy; 60 Ss were exposed to the reverse order with the cylinder as the standard. Habituation and recovery of responding were observed in an operant paradigm. Leverpressing, fixation, and vocalization increased most to the 2nd-level moderate stimuli and decreased most to the familiar and novel objects; fretting was highest to the redundant stimuli and lowest to the moderate objects. There were no stimulus main effects or interactions. Results support the hypothesis of a curvilinear relation between stimulus discrepancy and sustained attention, excitement, and preference. (French summary) (21 ref)—*Journal abstract*.

#### Emotional & Personality Development

11435. Boddez, Martha. **An analysis of the self-concept and the impact of success and failure upon the perception of performance and upon the self-concept of junior high school students: I.** *St Louis University Research Journal*, 1973(Sep), Vol 4(3), 367-413.—Analyzes various theories of the development of the self in order to determine a common factor at the basis of self-concept formation. Special attention is given to the importance of self-knowledge in education and the influence of the family, the peer group, and society in general for self-concept development. 97 male and 99 female 15-16 yr old high school students performed tests in area estimation of geometric figures. Half of each group performed in a "success" mode in which 3 sample guesses of figure area are declared correct by the E, or incorrect for the "failure" group; S then judged 20 figures. To study the impact of previous failure or success on subsequent perception of performance, a Pearson product-moment correlation was performed between self-concept and academic rating. Results are to be presented in a subsequent paper. (97 ref)—J. Carlson.

11436. Call, Justin D. (U California, Coll of Medicine, Irvine) **Helping infants cope with change.** *Early Child Development & Care*, 1974, Vol 3(3), 229-248.—Suggests how teachers, students, and child-care workers can help infants cope with change resulting from adoption and foster care at various ages.

11437. Coates, Susan. (State U New York, Downstate Medical Ctr, Brooklyn) **Sex differences in field dependence-independence between the ages of 3 and 6: Perceptual & Motor Skills**, 1974(Dec), Vol 39(3),

1307-1310.—Individually administered the Preschool Embedded Figures Test to 298 3-6 yr old middle-class nursery school children. Results show that females were more field-independent than males, and significantly so at the age of 5 yrs ( $p < .05$ ). It is suggested that the development of sex differences in field independence may be more complex than has previously been assumed, because the results were in a direction opposite to those found in males at older ages.—*B. McLean.*

11438. Coates, Susan. (State U New York, Downstate Medical Ctr, Brooklyn) **Sex differences in field independence among preschool children.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11439. Goldberg, Robert W. (Case Western Reserve U) **Synthesis and reformulation of some views of Piaget and Fairbairn on object relations.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11440. Gordon, Ira J. (U Florida, Inst for Development of Human Resources) **Studies in socio-emotional development in infancy.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 120-121.

11441. Lewis, Michael & Weinraub, Marsha. (Educational Testing Service, Inst for Research in Human Development, Princeton, NJ) **Sex of parent  $\times$  sex of child: Socioemotional development.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11442. Mischel, Walter & Baker, Nancy. (Stanford U) **Cognitive appraisals and transformations in delay behavior.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 254-261.—Investigated the effects of different cognitive representations of the rewards (outcomes) in a delay of gratification paradigm on children's ability to wait for these rewards. Ss were 60 3-5 yr olds in nursery school. It was found that consummatory (arousing) ideation directed at the relevant (contingent) rewards hindered effective delay. In contrast, cognitive transformations of the rewards which focused on their nonconsummatory qualities and associations significantly facilitated delay behavior more than did comparable ideation about similar rewards irrelevant to the delay contingency. Consummatory ideation focused on rewards irrelevant to the contingency also greatly helped to maintain delay. Theoretical implications for the role of fantasy and cognitive appraisal in self-control are examined.—*Journal abstract.*

11443. Money, John. (Johns Hopkins U, Medical School) **Prenatal hormones and postnatal socialization in gender identity differentiation.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 221-295.—Rejects the concepts of sex drive, instinct, need, and motivation on the grounds that they cannot be handled empirically or operationally (any more than phlogiston or possession by demons could be) and substitutes threshold for the release or inhibition of behavior. Chromosomes, fetal gonads and hormones, neural pathways, and genital

appearance are listed as cumulative components of adult gender. Photographs of varying genital differentiation in genetic vs gonadal males and females at different ages are presented. Results of corrective therapy and/or surgery are shown. Transvestite dissexual identity, transsexual reassignment, and transpositions of gender identity and role are compared.—*J. M. Roberts.*

11444. Rosenberg, Benjamin G. & Sutton-Smith, Brian. (Bowling Green State U) **Family structure and sex-role variations.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 195-220.—Contends that men and women are more alike than they are different. Sibling position in relation to California Q-sort responses, number of offspring in the family, and their parents' sibling positions are compared. Family structure affects sex-role stereotypes, family relations, and within-family rivalries to produce different results. Family size is studied in relation to eventual choice of spouse and number of children. The effects of family structure on sex-role development are powerful, numerous, and diverse. (23 ref)—*J. M. Roberts.*

11445. Rudhe, L. & Ekecrantz, L. (U Stockholm, Psychological Lab, Sweden) **Transitional phenomena: The typical phenomenon and its development.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(4), 381-400.—Investigated the basic characteristics of "transitional phenomena," the emotional dependency on special objects displayed by children, especially at bedtime and during times of anxiety. Attention was given to the possibility of transitional phenomena being a defense mechanism against separation anxiety. 77 mothers of 6-yr-old children were interviewed about their children's behaviors. Most typically, the children used sounds, movements, and pieces of cloth, beginning during the 1st yr of life and continuing for several years. Strong emotional dependency was apparent in the fact that the transitional phenomena became more important than the mother, especially at bedtime. Great possibilities for close physical contact with the mother promoted the development of transitional phenomena, precluding the applicability of a simple model of substitution. (28 ref)—*Journal abstract.*

11446. Stetic, Edward C. & Lorr, Maurice. (Catholic U of America) **Age and sex differences in personality during adolescence.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1123-1126.—Attempted to determine what changes occur in adolescent personality in the age period between 12 and 19 yrs. Efforts were made to identify the personality dimensions that distinguish males from females at various age periods and any age trends in personality change. The Interpersonal Style Inventory was administered to 331 males and 358 females from high schools. Males and females were significantly differentiated on this inventory at each of 4 age levels (12-14, 15, 16, and 17-19 yrs) through use of discriminant function analyses. Females scored more Sociable, Nurturant, Conscientious, Help-seeking, and Anxious at all age levels. The males scored more Detached, Withholding, Self-sufficient, and Stable. Results are in close agreement with those reported by A. Sealy and R. Cattell (1966), J. Garai (1970), and G. Gurin et al (1960).—*Journal abstract.*



11447. Wallon, Henri. **The emotions.** *International Journal of Mental Health*, 1972-1973(Win), Vol 1(4), 40-52.—Discusses the disruptive and adaptive function of emotions with special reference to J. R. Kantor's views. The primitive and automatic nature of emotions is in contrast to the conscious control of perceptual responses. The psychobiological development of emotions, arising from the interplay of environmental and maturational functions, is described. The emotions are regarded as the origin of consciousness, and they bring about a fusion of feeling between the individual and the group. Through the group the child acquires the differentiated action sequences and intellectual tools which he must have to operate with the distinctions and classifications necessary for knowledge of things and of himself.—A. H. Alawi.

### Social Behavior & Family Relations

11448. Adamski, Wladyslaw. (Polska Akademia Nauk, Poland) **[Socio-occupational attitudes of working youth.]** (Polh) *Studia Socjologiczne*, 1974, No 2(53), 139-154.—Reports on the relationship between economic and political attitudes at different age levels. The cross-sectional sample was made up of 2,059 Ss 15-30 yrs old and 1,097 Ss 30-65 yrs old. In general, the under-30 group was more materialistic, self-centered, and better educated than the over-30 group. Political interest decreased as age level increased.—H. Kaczowski.

11449. Dembrowski, Theodore M. & Pennebaker, James W. (Eckerd Coll) **Reactions to severity and nature of threat among children of dissimilar socioeconomic levels.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 338-342.—Explored the conditions under which lower- and middle-class preschool children react differently in the "forbidden toy" paradigm. In a  $2 \times 2 \times 2$  design, 40 middle- and 43 lower-class children (mean age = 58 mo) were threatened with loss of a gift of money (mild or severe) or loss of approval (mild or severe) if they played with an attractive toy. Rankings of the forbidden toy before and after a 5-min temptation period indicate opposite reactions in middle- and lower-class Ss. For middle-class Ss, threatening loss of approval produced an effect consistent with a prediction derived from dissonance theory (i.e., devaluation of the toy under mild rather than severe threat). Threatening loss of small or large quantities of money generated intermediate and similar amounts of derogation. For lower-class Ss, threatening mild or severe loss of approval produced moderate and similar amounts of devaluation. However, threatening loss of money produced an effect opposite to that predicted by dissonance theory (i.e., more devaluation under threat of large than small money loss). This reversal resists both dissonance and reinforcement-familiarity interpretations. (17 ref)—*Journal abstract.*

11450. Furukawa, Ayako. (Osaka U, Japan) **[Developmental psychological study about parental leadership for their child.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 69-79.—379 children from kindergarten through high school and 26 mothers responded to a questionnaire to indicate their perceptions of 2 functions of parental leadership as the source of affection and of discipline in 2 dimensions: as an ideal

and as the practical rule of life. Developmental changes in perception of parental leadership were significant ( $p < .01$ ). Curvilinear relationships were found between developmental stages and perception of parental leadership as the practical rule of life, but not as an ideal. Results indicate that the Ss as they approached adolescence tended to be independent of parental control while the need for the parent as the source of affection continued to be strong throughout the developmental stages. (English summary) (22 ref)—S. Choe.

11451. Gabel, Harris. (George Peabody Coll) **Effects of parent group discussion on adolescents' perceptions of maternal behavior.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 32-35.—Presents an evaluation of a parent group discussion program led by trained paraprofessional leaders and focusing on maternal behavior as perceived and described by the adolescent children of the participants. Both before the start of this group and after 5 weekly meetings, these children completed the 108-item Child Report of Parental Behavior Inventory. Results show that following the program, the 6 participating mothers were described by their children as allowing greater autonomy and showing more positive involvement with their children than control mothers. This is interpreted as support for the view that maternal participation in group discussion programs leads to changes in adolescents' perceptions of aspects of their mothers' behavior.—R. S. Albin.

11452. Gelso, Charles J. (U Maryland) **The transmission of attitudes toward child rearing: An exploratory study.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 285-293.—Conducted a study of 63 female and 30 male students (28 were parents and 65 were not) to investigate the relationship between Ss' attitudes toward childrearing and Ss' perceptions of the manner in which their parents treated them during their childhood. These attitudes were assessed using 3 dimensions suggested by A. Roe—acceptance, concentration, and avoidance (1957). Results indicate that (a) for males, the relationship with the mother was influential in developing child rearing attitudes while the relationship with the father was of negligible importance; (b) for females, mothers' and fathers' additively combined attitudes appeared to be more influential than either taken separately; and (c) for nonparents, avoidance by their parents was positively related to Ss' possession of rejecting childrearing attitudes. Implications of these differences are discussed.—M. E. Pounsel.

11453. Gunsberg, Linda. (Montefiore Hosp & Medical Ctr, New York, NY) **Conflict training and the development of moral judgment in children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11454. Lieberman, Florence. (Hunter Coll, School of Social Work, City U New York) **Sex and the adolescent girl: Liberation or exploitation?** *Clinical Social Work Journal*, 1973, Vol 1(Special Issue), 224-243 Issue.—Illustrates the complex world of the adolescent girl through case examples. Many factors in her environment which influence her sexual development and behavior

are discussed. The richness of the clinical material provides an understanding of the difficulties many young women encounter in adolescence. Treatment suggestions are offered throughout.—S. R. Stein.

11455. Marsella, Anthony J.; Dubanoski, Richard A. & Mohs, Karen. (U Hawaii) **The effects of father presence and absence upon maternal attitudes.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 257-263.—Administered the Parental Attitude Research Instrument to 34 wives of nuclear submarine personnel under counterbalanced conditions of father presence and absence. Results show that significant differences were found on 7 subscales as a function of the father's status. 4 of the subscales reflected themes of maternal domination, and the remaining 3 reflected themes of marital dissatisfaction and discord. In all of the 7 instances, scores were higher under conditions of father presence. It is suggested that father presence and absence effects may be mediated by the alterations which occur in maternal attitudes under these conditions. (21 ref)—*Journal abstract*.

11456. Martin, William C.; Bengston, Vern L. & Acock, Alan C. (California State U, Chico) **Alienation and age: A context-specific approach.** *Social Forces*, 1974(Dec), Vol 53(2), 266-274.—Used a context-specific conceptualization of alienation to describe age-group differences. Traditionally, alienation has been treated in terms of specific modes (e.g., powerlessness, meaninglessness, normlessness, social isolation, and self-estrangement). This research adds to each of these modes social structural contexts (e.g., polity, economy, education, religion, and family) to produce a matrix of context-specific alienation. Age-group differentials on specific components of alienation were then examined in a 3-generation sample of 182 males. The postulate that alienation is related to position in the social structure leads to the hypothesis that there is a curvilinear relation between alienation and age, the youth most alienated, the middle-aged least, and the elderly in between. The hypothesis was generally supported. (30 ref)—*Journal abstract*.

11457. Moss, Howard A. (NIMH, Child Research Branch, Bethesda, MD) **Early sex differences and mother-infant interaction.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11458. Nel, B. F. (U Pretoria, South Africa) **The role of sensitivity in pedagogical observation and discourse (dialogue, Gespräch).** *Interpersonal Development*, 1973-1974, Vol 4(3), 190-196.—Considers, first, that every person is ontologically endowed with sensitivity. It is proposed that discourse and observation play an important part in the development of a child. The adult-child relation is a subject-subject relation, not a traditionally scientific subject-object relation. The pedagogical teacher has the task of becoming involved in the child's world relations. By mutual sensitivity, communication and encounter are established, and discourse proceeds, encompassing togetherness, a further precondition for actualization of the child's potentialities.—*Journal abstract*.

11459. Royak, A. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of Preschool Education, Moscow) **[Psychological aspects of peer conflict situations among preschool children.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 71-83.—Conducted a 3-yr longitudinal study of conflicts in play situations among children in 2 kindergartens. Situational sampling, sociometry, individual assessment, questionnaires, and interviews with children and their parents were the techniques employed. 2 factors in conflict situations were identified: those arising from the child's inability to perform the acts necessary for successful play ("operational" factors), and those due to the child's insufficient motivation to participate in play as compared with the motivation of the group as a whole. The characteristics of these 2 conflict situation types are discussed. (English summary)—L. Zusne.

11460. Sharabany, Ruth. (Educational Testing Service, Psychological Studies, Princeton, NJ) **Socialization in the Israeli kibbutz: Bibliography.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 185.

11461. Smith, Nancy F. & Grenier, Mary K. (McGill U, Montreal, Quebec, Canada) **English- and French-Canadian children's views of parents.** *Canadian Journal of Behavioural Science*, 1975(Jan), Vol 7(1), 40-53.—A total of 160 lower- and middle-class, English- and French-Canadian children from 1st and 3rd grades in the Montreal area were interviewed about their perceptions of parental roles. When parental differences in nurturance, power, and discipline were compared, lower-class Ss perceived a greater division of parental roles than middle-class Ss. When 2 subtypes of nurturance (supportive and companionship) were contrasted, and 3 subtypes of discipline (physical, affective, and deprivational) were examined, it was found that there were important differences related to the children's ethnicity and sex, as well as social class. The importance of further exploration of subdivided discipline and nurturance scales is emphasized. (French summary) (20 ref)—*Journal abstract*.

11462. Steinfeld, George J. (Federal Correctional Inst, Narcotic Unit, Danbury, CN) **Piaget's concept of decentering in relation to family process and therapy.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11463. Stern, Daniel N. & Bender, Estelle P. (New York State Psychiatric Inst, Dept of Developmental Processes, New York) **An ethological study of children approaching a strange adult: Sex differences.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11464. Tait, Perla. (Temple U) **Method for quantitative analysis of dramatic play.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 1012-1014.—Describes a method for the quantitative analysis of dramatic play based on narrative case records in which the following items are isolated: dramatic units, involvement of O requested by S, and the longest dramatic unit. The longest dramatic



units are further analyzed for amount of time, subunits introduced, intensity, and themes expressed.

11465. **Thoman, Evelyn B.** (U Connecticut) **Some consequences of early infant-mother-infant interaction.** *Early Child Development & Care*, 1974, Vol 3(3), 249-261.—Summarizes human and animal studies of the feedback system of infant-mother-infant interactions. Not only does the mother provide the infant's environment, but the infant also exerts an influence on the mother, thereby creating a system of continuous feedback in terms of behavior. Evidence for failure of feedback within the system was found in studies of infants who cry excessively despite much stimulation by their mothers, and of infants who fail to thrive although they have no apparent physiological deficits.—*W. V. Adams.*

11466. **Tzeng, Oliver C. & Dimit, Mary G.** (U Illinois) **Attitudinal differences of college students and their parents.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1247-1249.—25 male and 22 female college students living in 5 different housing units listed areas of perceived attitudinal differences with their parents on an open-ended questionnaire. 89 items were elicited, ranging in number for each individual response from 0 to 31. Eleven categories were organized to cover these items. Differences in characteristics of responses for males and females were observed.—*Journal abstract.*

11467. **Willemssen, Eleanor; Flaherty, Denise; Heaton, Christine & Ritchey, Gary.** (Santa Clara U) **Attachment behavior of one-year-olds as a function of mother vs father, sex of child, session, and toys.** *Genetic Psychology Monographs*, 1974(Nov), Vol 90(2), 305-324.—12 male and 12 female 1 yr olds were observed separately with their mothers and with their fathers in 2 structured play situations developed by M. Ainsworth and S. Bell (see PA, Vol 44:8130). Results indicate (a) an absence of sex differences or of differential reaction to the presence of mother or father, (b) an increase in attachment after separation, (c) reduced visual exploration in the presence of the stranger, and (d) a pattern of correlation suggesting that a common basis exists for attachment but not for exploratory behaviors. Findings seem inconsistent with the ethological theory of attachment of M. Ainsworth and J. Bowlby (1969).—*Journal abstract.*

### Adult Development & Aging

11468. **Botwinick, Jack & Storandt, Martha.** (Washington U) **Vocabulary ability in later life.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 303-308.—Compared a group of young adults (17-20 yrs) to a group of older adults (62-83 yrs) to examine the relationships between qualitative and quantitative vocabulary test scores as they involve the age of S. Results of the study cast doubt as to the validity of the generalization that vocabulary function is maintained throughout adult life. The best possible response (i.e., superior synonym) declined with age. This decline was compensated for by very satisfactory, although less good, performance. This made the overall level of correct response appear similar for the 2 age groups, which may account for the usual report of stability of function in the course of adult aging. The compensation also accounted

for very high correlations between qualitative and quantitative scores.—*Journal abstract.*

11469. **Salvendy, Gavriel.** (Purdue U, School of Industrial Engineering) **Discrimination in performance assessments against the aged.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1087-1099.—Conducted 5 experiments with a total of 399 7-93 yr old Ss performing 6 diversified tasks to study the phenomena of increase and decrease in performance and physiological and behavioral changes with aging. Results with the greatest impact on occupational productivity are (a) Human body's physiological efficiency was the highest at a freely chosen pace for the age bracket 20-45 yrs, while paced performance yielded the highest physiological efficiency for the age bracket 45-65 yrs. (b) Different predictive validity models exist for different age categories, as the younger industrial operators (15-35 yrs) had higher test scores than the older age group (36-58 yrs) for an equivalent level of production performance. It is concluded that both manipulative skills and personality attributes are affected by aging. (25 ref)—*Journal abstract.*

11470. **Strnad, M.** (Oddělení metodiky Správy sociálních služeb NVP, Prague, Czechoslovakia) **[Differentiated approaches to new arrivals at homes for the elderly.]** (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 195-198.—Discusses 5 kinds of adjustment problems encountered by newcomers to homes for retired elderly people. The problems concern (a) lowering of living standard, (b) loss of own household and the related independence and freedom of action, (c) loss of mobility due to somatic illness, (d) recent loss of wife or husband, and (e) feelings of being deserted by their families. Better utilization of social workers for support and therapy, and extramural activities for the elderly people are recommended. (Russian & English summaries)—*V. Fischmann.*

11471. **Taub, Harvey A.** (VA Hosp, Syracuse, NY) **Coding for short-term memory as a function of age.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 309-314.—21 young (mean age = 23.1 yrs), 21 middle-aged (mean age = 51.4 yrs), and 21 old (mean age = 69.7 yrs) female Ss viewed letter sequences of 12 letters each and were required to recall the letters in exactly the same order as they saw them. In half of the sequences the letters could not be coded into meaningful units, while in the other half the letters could be chunked into 3 complete 4-letter words. Findings indicate that the age groups did not differ from each other in the low-code condition, but that with the high-code sequences the old Ss performed significantly more poorly than either the young or middle-aged Ss. These findings suggest an age-related deficit in the coding of sequentially ordered material.—*Journal abstract.*

11472. **Tramer, Richard R. & Schludermann, Eduard H.** (U Manitoba, Deer Lodge Hosp, Winnipeg, Canada) **Cognitive differentiation in a geriatric population.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1071-1075.—Tested the differentiation hypothesis in 94 52-88 yr old male inpatients who were administered the Colored Progressive Matrices (a test of intellectual ability), the Children's Embedded Figures Test, and a socializing scale. A correlation of .58 ( $p < .01$ ) between field dependence and intellectual ability was similar to

that previously obtained with younger age groups. A positive correlation of .22 ( $p < .05$ ) between field dependence and socializing was contrary to theoretical expectation. (15 ref)—*Journal abstract*.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

11473. Billings, Dwight. (U North Carolina, Chapel Hill) **Culture and poverty in Appalachia: A theoretical discussion and empirical analysis.** *Social Forces*, 1974(Dec), Vol 53(2), 315-323.—Questioned the cultural explanation for the persistence of poverty in Appalachia (i.e., that the region's traditional culture ill equips it for participation in the modern world). Data from a "middle-class orientation" scale administered to several thousand respondents in North Carolina (age was controlled in the analysis) suggest that attitudinal factors cannot be used to account for economic development as it occurred in the Appalachian region. (41 ref)

### Culture & Ethnology & Race Relations & Religion

11474. Berry, John W. & Annis, Robert C. (Queen's U, Kingston, Ontario, Canada) **Acculturative stress: The role of ecology, culture and differentiation.** *Journal of Cross-Cultural Psychology*, 1974(Dec), Vol 5(4), 382-406.—Conducted a study of 3 Amerindian peoples (Cree, Tsimshian, and Carrier) to examine the hypothesis that the psychological response to social change would vary as a function of both the acculturative pressures brought to bear on a community, and the traditional cultural and behavioral features that characterize the community. Results of interviews and tests with 405 Ss indicate that the greater the cultural discontinuities across cultures, then the greater the acculturative stress; within Amerindian communities, levels of psychological differentiation were negatively related to acculturative stress. It is concluded that specific cultural and individual differences must be taken into account when attempting to understand relationships between culture contact and acculturative stress; its course is not universal. (31 ref)—*Journal abstract*.

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units are further analyzed for amount of time, subunits introduced, intensity, and themes expressed.

11465. **Thoman, Evelyn B.** (U Connecticut) **Some consequences of early infant-mother-infant interaction.** *Early Child Development & Care*, 1974, Vol 3(3), 249-261.—Summarizes human and animal studies of the feedback system of infant-mother-infant interactions. Not only does the mother provide the infant's environment, but the infant also exerts an influence on the mother, thereby creating a system of continuous feedback in terms of behavior. Evidence for failure of feedback within the system was found in studies of infants who cry excessively despite much stimulation by their mothers, and of infants who fail to thrive although they have no apparent physiological deficits.—*W. V. Adams.*

11466. **Tzeng, Oliver C. & Dimit, Mary G.** (U Illinois) **Attitudinal differences of college students and their parents.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1247-1249.—25 male and 22 female college students living in 5 different housing units listed areas of perceived attitudinal differences with their parents on an open-ended questionnaire. 89 items were elicited, ranging in number for each individual response from 0 to 31. Eleven categories were organized to cover these items. Differences in characteristics of responses for males and females were observed.—*Journal abstract.*

11467. **Willemssen, Eleanor; Flaherty, Denise; Heaton, Christine & Ritchey, Gary.** (Santa Clara U) **Attachment behavior of one-year-olds as a function of mother vs father, sex of child, session, and toys.** *Genetic Psychology Monographs*, 1974(Nov), Vol 90(2), 305-324.—12 male and 12 female 1 yr olds were observed separately with their mothers and with their fathers in 2 structured play situations developed by M. Ainsworth and S. Bell (see PA, Vol 44:8130). Results indicate (a) an absence of sex differences of or differential reaction to the presence of mother or father, (b) an increase in attachment after separation, (c) reduced visual exploration in the presence of the stranger, and (d) a pattern of correlation suggesting that a common basis exists for attachment but not for exploratory behaviors. Findings seem inconsistent with the ethological theory of attachment of M. Ainsworth and J. Bowlby (1969).—*Journal abstract.*

### Adult Development & Aging

11468. **Botwinick, Jack & Storandt, Martha.** (Washington U) **Vocabulary ability in later life.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 303-308.—Compared a group of young adults (17-20 yrs) to a group of older adults (62-83 yrs) to examine the relationships between qualitative and quantitative vocabulary test scores as they involve the age of S. Results of the study cast doubt as to the validity of the generalization that vocabulary function is maintained throughout adult life. The best possible response (i.e., superior synonym) declined with age. This decline was compensated for by very satisfactory, although less good, performance. This made the overall level of correct response appear similar for the 2 age groups, which may account for the usual report of stability of function in the course of adult aging. The compensation also accounted

for very high correlations between qualitative and quantitative scores.—*Journal abstract.*

11469. **Salvendy, Gavriel.** (Purdue U, School of Industrial Engineering) **Discrimination in performance assessments against the aged.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1087-1099.—Conducted 5 experiments with a total of 399 7-93 yr old Ss performing 6 diversified tasks to study the phenomena of increase and decrease in performance and physiological and behavioral changes with aging. Results with the greatest impact on occupational productivity are (a) Human body's physiological efficiency was the highest at a freely chosen pace for the age bracket 20-45 yrs, while paced performance yielded the highest physiological efficiency for the age bracket 45-65 yrs. (b) Different predictive validity models exist for different age categories, as the younger industrial operators (15-35 yrs) had higher test scores than the older age group (36-58 yrs) for an equivalent level of production performance. It is concluded that both manipulative skills and personality attributes are affected by aging. (25 ref)—*Journal abstract.*

11470. **Strnad, M.** (Oddělení metodiky Správy sociálních služeb NVP, Prague, Czechoslovakia) **[Differentiated approaches to new arrivals at homes for the elderly.]** (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 195-198.—Discusses 5 kinds of adjustment problems encountered by newcomers to homes for retired elderly people. The problems concern (a) lowering of living standard, (b) loss of own household and the related independence and freedom of action, (c) loss of mobility due to somatic illness, (d) recent loss of wife or husband, and (e) feelings of being deserted by their families. Better utilization of social workers for support and therapy, and extramural activities for the elderly people are recommended. (Russian & English summaries)—*V. Fischmann.*

11471. **Taub, Harvey A.** (VA Hosp, Syracuse, NY) **Coding for short-term memory as a function of age.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 309-314.—21 young (mean age = 23.1 yrs), 21 middle-aged (mean age = 51.4 yrs), and 21 old (mean age = 69.7 yrs) female Ss viewed letter sequences of 12 letters each and were required to recall the letters in exactly the same order as they saw them. In half of the sequences the letters could not be coded into meaningful units, while in the other half the letters could be chunked into 3 complete 4-letter words. Findings indicate that the age groups did not differ from each other in the low-code condition, but that with the high-code sequences the old Ss performed significantly more poorly than either the young or middle-aged Ss. These findings suggest an age-related deficit in the coding of sequentially ordered material.—*Journal abstract.*

11472. **Tramer, Richard R. & Schludermann, Eduard H.** (U Manitoba, Deer Lodge Hosp, Winnipeg, Canada) **Cognitive differentiation in a geriatric population.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1071-1075.—Tested the differentiation hypothesis in 94 52-88 yr old male inpatients who were administered the Colored Progressive Matrices (a test of intellectual ability), the Children's Embedded Figures Test, and a socializing scale. A correlation of .58 ( $p < .01$ ) between field dependence and intellectual ability was similar to

that previously obtained with younger age groups. A positive correlation of .22 ( $p < .05$ ) between field dependence and socializing was contrary to theoretical expectation. (15 ref)—*Journal abstract*.

## CULTURAL INFLUENCES AND SOCIAL ISSUES

11473. Billings, Dwight. (U North Carolina, Chapel Hill) **Culture and poverty in Appalachia: A theoretical discussion and empirical analysis.** *Social Forces*, 1974(Dec), Vol 53(2), 315-323.—Questioned the cultural explanation for the persistence of poverty in Appalachia (i.e., that the region's traditional culture ill equips it for participation in the modern world). Data from a "middle-class orientation" scale administered to several thousand respondents in North Carolina (age was controlled in the analysis) suggest that attitudinal factors cannot be used to account for economic development as it occurred in the Appalachian region. (41 ref)

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compared to an emic—or culturally appropriate—sorting task for the US college students than for nonliterate Mano farmers. Both US and Mano Ss most readily sorted by perceptually salient and unidimensional stimulus features and had difficulty shifting sorting dimensions, when tested with an unfamiliar task. US men differed from Mano men in sorting more rapidly on both tasks, and in being more often able to describe verbally the basis for unfamiliar task sorts they had performed. (29 ref)—*Journal abstract*.

11480. Kandiyoti, Deniz. (Middle East Technical U, Ankara, Turkey) **Some social-psychological dimensions of social change in a Turkish village.** *British Journal of Sociology*, 1974(Mar), Vol 25(1), 47-62.—Studied the social-psychological aspects of social change. The total adult male population of a village was interviewed (79 persons). Social-economic and attitudinal variables were intercorrelated and tested for significance. A high degree of coherence was not found among the variables.

11481. Mackie, Marlene. (U Calgary, Alberta, Canada) **Ethnic stereotypes, prejudicial attitudes, and education.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 279-292.—Examined the sociological assumption that stereotyping and prejudice are equivalent phenomena by studying the variation of both dimensions of ethnic attitudes by education. 590 Ss completed an open-ended questionnaire and a semantic differential scale. The well-established negative relationship between prejudice and education was affirmed. However, the finding that stereotyping varied directly with education suggests that the cognitive and affective dimensions of ethnic attitudes ought to be conceptually separated and independently measured. (17 ref)—*Journal abstract*.

11482. Marsella, Anthony J. & Quijano, Walter Y. (U Hawaii) **A comparison of vividness of mental imagery across different sensory modalities in Filipinos and Caucasian-Americans.** *Journal of Cross-Cultural Psychology*, 1974(Dec), Vol 5(4), 451-464.—Investigated vividness of imagery across different sensory modalities in 30 Filipino and 30 Anglo-American college students. It was hypothesized that (a) Filipinos would manifest greater vividness of imagery than Anglo-Americans in all sensory modalities, (b) groups would differ with respect to the rank order of scores for vividness of imagery for different sensory modalities, and (c) groups would differ in the interrelationships of vividness of imagery scores among various sensory modalities examined. The 1st 2 hypotheses were partially supported. Results are interpreted in terms of variations in socialization practices between the 2 groups and the implications these practices may have for conditioning personality configurations and linguistic functions that mediate imagery abilities and use. (32 ref)—*Journal abstract*.

11483. Ness, Robert C. & Rohner, Ronald P. (U Connecticut) **The logic of regional testing, and a modified application of that procedure to four hypotheses in the rejection-acceptance project.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 121-122.

11484. Nixon, Charles R. (U California, Los Angeles) **The adaptation of cultural ties to economic development.** *American Behavioral Scientist*, 1974(Sep-Oct), Vol 18(1), 36-58.—Examines how ties to cultural identity are

related to the emergence of new economic class divisions in the complex situation of multicultural societies undergoing economic development. (35 ref)

11485. Ongay, Mario. (Postgraduate Ctr for Mental Health, New York, NY) **The domestic worker in Mexican families: A disturbing factor.** *International Mental Health Research Newsletter*, 1973(Win), Vol 15(4), 13-14.—Points out psychological and sociological implications of the role of the domestic worker in middle- and upper-class Mexican families. It is noted that this role does not help the status of women in a male chauvinistic society. It perpetuates exploitation of women. It does not promote active relationships among family members. The presence of a domestic creates passivity, lack of cooperation, and a poor sense of participation in family tasks. It produces confusion in the child's mind about his relationships and the internalization of an ambiguous, devaluated-omnipotent, close-distant female image. Further, it does not help the formation of a responsible self.—C. A. Heikkinen.

11486. Ramirez, Manuel; Castaneda, Alfredo & Herold, P. Leslie. (U California, Santa Cruz) **The relationship of acculturation to cognitive style among Mexican Americans.** *Journal of Cross-Cultural Psychology*, 1974(Dec), Vol 5(4), 424-433.—Administered tests of cognitive style to 541 Mexican-American children in Grades 1, 4, and 6 and their mothers in 3 communities—traditional, dualistic, and atraditional. Questionnaires on socialization practices and Mexican-American family values were also administered to the mothers. Ss from the traditional community—in which members were most identified with the sociocultural system of Mexican culture—scored in a field-dependent direction. Ss from the atraditional community, whose members are most influenced by mainstream American middle-class values, were most field-independent in cognitive style. Children and mothers of the community influenced by both cultures—the dualistic community—obtained scores between those of the other 2 groups. Mothers from the traditional community were most frequently in agreement with items reflecting indicators of the field-dependent "socialization" cluster, and also with items reflecting the sociocultural system of Mexican-American culture.—*Journal abstract*.

11487. Schnucker, R. V. **The English Puritans and pregnancy, delivery and breast feeding.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Spring), Vol 1(4), 637-658.—Presents a survey of Puritan childbirth and breast-feeding practices in 17th century England, illuminating some of the motivation and fears of parents when having a new baby. Puritans possessed many misconceptions of the physical processes of conception, birth, and nursing, many applying a religious interpretation. Labor pains were a punishment for Eve's sin. The rule that a mother should breastfeed her own child is discussed from the Puritan view as both the law of nature and of God.—J. Carlson.

11488. Smith, Catherine H. (Columbia U, Harlem Hosp Ctr) **Institutional racism: A major urban educational problem.** *Religious Education*, 1974(Nov-Dec), Vol 69(6), 713-727.—Cites selected demographic data and conclusions of commission reports and other documents that indicate continuing racial inequities in the US in

education, juvenile delinquency, and health. Despite some progress in social justice, institutions that were designed to meet consumer needs continue to resist, and by their structures and functions discriminate against, powerless and oppressed minorities. The Christian church is challenged to attack institutional racism and the myth that past progress toward minority justice is satisfactory.—*R. D. Kahoe.*

11489. **Spector, Samuel I.** *The end of days.* *Omega: Journal of Death & Dying*, 1974(Fal), Vol 5(3), 267-276.—Notes that Judaic tradition, from the 10th century BC to the present era, has always attempted to soften the blow of death. In its various aspects, it has engaged both the dying and the remaining living in principles and ceremonies that would make death more acceptable. Of equal importance is the preparation for the end of days through historical, theological, philosophical, and psychological approaches. Most of these avenues are of interest and adaptability to other traditions as well.—*Journal abstract.*

11490. **Vernon, Glenn M. & Waddell, Charles E.** (U Utah) *Dying as social behavior: Mormon behavior through half a century.* *Omega: Journal of Death & Dying*, 1974(Fal), Vol 5(3), 199-206.—Distinguishes between biological, clinical, psychological, and social death. In an analysis of death behavior of Mormons for 50 yrs it was found that their death rate was consistently lower than that of the US and the state of Utah. However, it evidenced essentially the same change patterns as these 2 other populations. Although some biases may be operating in the available statistics, Mormons were shown to be responsive to both their church and their society. Mormonism incorporates somewhat distinctive meanings of death and also a strong health code, both of which it is assumed are related to the identified patterns.—*Journal abstract.*

11491. **Wasson, R. Gordon.** *The role of "flowers" in Nahuatl culture: A suggested interpretation.* *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 351-360.—Suggests that references to "flowers" by Nahuatl poets are allusions to hallucinogenic mushrooms. Nahuatl symbols and literary references are interpreted in this light.

11492. **Weick, Karl E. & Gilfillan, David P.** (Cornell U) *The sway and decay of tradition: Individual and group processes in the perpetuation of culture.* *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 189-190.

### Social Issues & Social Processes

11493. **Acosta, Frank X.** (U California, Los Angeles) *Etiology and treatment of homosexuality: A review.* *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 9-29.—A review of the major causal theories of and treatment approaches to male and female homosexuality indicates that neither biological, psychoanalytic, or learning and social-learning theories provide convincing evidence for the etiology of homosexuality. All of these accounts, however, provide mixed empirical support for their predictions, with social-learning research presenting the most consistent evidence. Both social-learning and retrospective studies suggest that homosexuality may best be linked to the early qualitative learning and

development of gender identity and gender role. Both psychoanalytic therapy and behavior therapy have minimal successes and many failures; most therapeutic successes seem to be with bisexuals rather than with exclusive homosexuals. The combined use of psychotherapy and specific behavioral techniques offers some promise for heterosexual adaptation with certain kinds of patients. However, better prospects for intervention in homosexuality lie in its prevention through the early identification and treatment of the potential homosexual child. (3½ p ref)—*Journal abstract.*

11494. **Almquist, Elizabeth M.** (North Texas State U) *Attitudes of college men toward working wives.* *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 115-121.—Surveyed 109 male and 120 female undergraduates for attitudes toward working wives. 67.5% of the females and 55% of the males responded to a mailed questionnaire. Results show that (a) over 60% of both men and women generally favored wives' working; (b) both groups regarded wives' working as less desirable if there are preschool children or if luxuries are the aim; (c) women more than men tended to view wives' work roles as supportive of husbands; (d) men both high in favorability (HF) and low in favorability (LF) to working wives had working mothers; (e) LF men preferred high status people-related occupations and had highly educated mothers; HF men preferred entrepreneurial business and managerial occupations and had semi- or unskilled mothers. Overall, more similarity than difference existed between male and female attitudes.—*C. A. Heikkinen.*

11495. **Angst, J.** (Psychiatrischen Universitätsklinik Zürich, Switzerland) *[Analgesics consumption of 19 year old healthy women.]* (Germ) *Schweizer Archiv für Neurologie, Neurochirurgie und Psychiatrie*, 1973, Vol 112(1), 7-19.—Investigated the consumption of analgesics and the influence of Ss' social background and personality characteristics by comparing the data provided by 2 recent studies: one with 1,381 19-yr-old healthy women and the other with 6,313 19-yr-old men. Chi-square tests and phi coefficients were used to determine differences in social background and the Freiburg Personality Inventory, variance analyses, and *t* tests were used to test personality characteristics. Results show that 70% of the Ss used analgesics occasionally. There were correlations between the consumption of analgesics, sleeping pills, and cigarettes but none between analgesics and that of cannabis or alcohol (heavy smokers used more analgesics than light smokers, and stress smokers more than nonstress smokers). The personality dimensions of Ss using analgesics differed from those of nonusers; users had higher values for emotional lability and dysphoria, more neurovegetative and psychosomatic disturbances, dominance tendencies, openness, and aggressivity. The profiles of analgesics and cannabis users differed only insignificantly (cannabis users had more aggressivity). The consumption habits of parents influenced the use of analgesics and, to a lesser degree, also that of sleeping pills and alcohol. Other social factors influencing consumption included availability, group influences, and propaganda. Results support the hypothesis that an unspecific emotional lability causes a general disposition to the consumption, abuse



and even addiction to analgesics, sleep-inducing medicines, nicotine, alcohol, and cannabis.—T. Fisher.

11496. **Asch, Stuart S.** (Mt Sinai Medical School, City U New York) **Some superego considerations in crime and punishment.** *Journal of Psychiatry & Law*, 1974(Sum), Vol 2(2), 159-181.—Examines from a psychoanalytic viewpoint various criminal acts, varieties of criminals, and ways by which the "normal" individual can evade his superego restrictions and commit antisocial acts. The habitual criminal can be considered to have specific defects in both ego and superego. In addition, the aims and effectiveness of current systems of punishment are examined in relation to the psychopathology which they are supposed to correct. Some modifications of existing punishments are suggested which seem more compatible with a psychoanalytic understanding of the individual. (27 ref)—*Journal abstract*.

11497. **Atkins, Richard D.** (Private practice, Philadelphia, PA) **Diversion in drug related cases: A view from the defense.** *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 311-314.—Reviews the considerations made by an attorney of an accused drug-abusing client regarding the treatment diversion alternative to criminal prosecution.

11498. **Bahn, Charles.** (John Jay Coll of Criminal Justice, City U New York) **The reassurance factor in police patrol.** *Criminology: An Interdisciplinary Journal*, 1974(Nov), Vol 12(3), 338-345.—Notes that, in addition to its more obvious functions, police patrol has the function of citizen reassurance—providing feelings of safety that a citizen experiences when he knows that a police officer or patrol car is nearby. Since this function is highly related to both visibility and awareness, it is suggested that in locations of both cognitive centrality and high density, fixed posts be established that would both serve the reassurance function and provide another communication link between the police and the public. Recent studies are cited which have contributed to understanding of what S. Milgram (1970) calls "the cognitive map of the city." This concept can be used in the pursuits of safety.—*Journal abstract*.

11499. **Bard, Morton & Zacker, Joseph.** (Graduate School & University Ctr, City U New York) **Assaultiveness and alcohol use in family disputes: Police perceptions.** *Criminology: An Interdisciplinary Journal*, 1974(Nov), Vol 12(3), 281-292.—Notes that systematic naturalistic observation often contradicts experimental laboratory findings and idiosyncratic personal perceptions. In the present study, family disputes managed by police officers trained in interpersonal conflict management yielded uniform observational data on 962 families visited 1,388 times during a 22-mo period. The view shared by police and by social scientists that family disputes are likely to involve assaultiveness and that such behavior is typically caused by alcohol use was not supported by these data. Instead, the findings suggest that (a) assaults do not usually precede arrival of police, (b) disputes are not usually influenced by alcohol use, and (c) assaults are less common when alcohol has been used.—*Journal abstract*.

11500. **Bayer, Istvan.** (National Inst for Pharmacy, Budapest, Hungary) **The abuse of psychotropic drugs.**

*Bulletin on Narcotics*, 1973(Jul-Sep), Vol 25(3), 11-25.—Discusses nontherapeutic uses of therapeutic agents (e.g., amphetamines for "energy" and for mood modification) and overuse or constant use for therapeutic effect. The fact that some agents have a low toxicity contributes to the problem.

11501. **Bayer, Ron.** (Greenwich House Counseling Ctr, New York, NY) **Repression, reform and drug abuse: An analysis of the response to the Rockefeller drug law proposals of 1973.** *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 299-309.—Examines reactions to the Rockefeller "get tough" drug law proposals. Public opinion surveys are cited, and the specific responses of criminal justice system professionals, treatment workers, blacks, and political liberals are described.

11502. **Bell, Alan P.** (Indiana U, Inst for Sex Research) **Homosexualities: Their range and character.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 1-26.—Comparisons across groups (under psychiatric treatment vs not under treatment) and within groups (all under treatment whether homosexual or heterosexual) indicate large differences across groups and few differences within groups in both samples. Sample sources were recruited using paid public advertising, mailing lists, and personal contacts in "public places." Persons selected were compared on levels of sexual interest, stimuli, repertoire, problems, and partnerships; acceptance of one's own and others' homosexuality; the degree of "known-aboutness"; and psychological and social adjustments. Despite persisting notions that homosexuality involves primarily a sexual preoccupation, the data indicate that heterosexuals actually have higher levels of sexual interest. Possible etiologies of human sexuality are summarized. (21 ref)—*J. M. Roberts*.

11503. **Boyd, Kenneth M.** (U Edinburgh, Scotland) **Homosexuality and the church.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11504. **Brook, Robert; Kaplun, Jack & Whitehead, Paul C.** (Addiction Research Foundation, Lake Erie Region, London, Ontario, Canada) **Personality characteristics of adolescent amphetamine users as measured by the MMPI.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 61-66.—Compared 60 amphetamine users who were being evaluated for residential or outpatient treatment at the Addiction Research Foundation, London, Ontario, Canada, in 1970-1971 with 24 nonuser Ss, high school student volunteers from the same geographical area, who were tested in 1971. Separate *t* tests were computed for each MMPI subscale to determine user-nonuser differences. Male and female Ss were combined, and the MF subscale was omitted. Most users, and all nonusers, scored within normal limits on the validity triad (L,F,K). Marked differences between users and nonusers appeared both in personal interviews and in the MMPI profiles. Users experience more psychological stress than nonusers, are unstable and insecure. Their psychological problems appear to antedate drug usage. The implications of these findings for treatment are discussed. (15 ref)—*A. P. Balevre*.

11505. Chafetz, Janet S.; Sampson, Patricia; Beck, Paula & West, Joyce. (U Houston) **A study of homosexual women.** *Social Work*, 1974(Nov), Vol 19(6), 714-723. —Reviews the literature and current approaches to treatment of lesbians, and presents preliminary findings of a study based on a nonclinical sample of 51 Ss. The life-styles of the Ss, their problems, views of themselves, relationships with others, and their perceptions of society's reactions to them are explored. Findings indicate that lesbians all too often find the helping professions, as well as a number of American institutions, to be judgmental and nonsupportive of them. This is attributed, at least in part, to the dearth of practical and theoretical literature concerning the female homosexual. (24 ref)—P. O'Brien.

11506. Chodoff, Paul. (George Washington U, Medical School) **Involuntary hospitalization of political dissenters in the Soviet Union.** *Psychiatric Opinion*, 1974(Feb), Vol 11(1), 5-19. —Describes in detail the involuntary hospitalization of a number of Soviet political dissidents, as presented in documents provided to Western psychiatrists in 1971 by Vladimir Bukovsky. The Soviet diagnosis of psychiatric disorder is reviewed in each case, and all but one are judged fallacious. The reactions of Western psychiatrists to the Bukovsky documents and other similar cases, appeals to Soviet authorities, and their failure to influence Soviet practices, are described. The possibility of politically-motivated behavior by US psychiatrists is considered, but the safeguards against it in this country are pointed out.—R. S. Albin.

11507. Clemens, John. **The volatility of voting behaviour.** *Journal of the Market Research Society*, 1974(Oct), Vol 16(4), 291-301. —Describes a theory of voting behavior, relates it to the February 1974 British elections, and attempts to learn how well sample survey data match the theory advanced. Voting behavior is viewed as derivable from the interaction between what is available (the political parties) and voters' perceptions of what is available. Both change, but not necessarily on a one-to-one basis. A synopsis of the workings of voting behavior for an individual is presented, and the question of what decides the saliency of an issue is discussed. The outcome of an election is seen as affected by the saliency of short-term issues. The 1974 election and surveys done prior to it to determine results are summarized, and implications for the next election and for opinion polling in general are offered.—R. S. Albin.

11508. Cooper, Alan J. (St Mary's Hosp. Medical School, London, England) **The aetiology of homosexuality.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases.* New York, NY: American Elsevier, 1974. 217 p.

11509. D'Augelli, Judith F. & Cross, Herbert J. (Pennsylvania State U, Addiction Prevention Lab) **Relationship of sex guilt and moral reasoning to premarital sex in college women and in couples.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 40-47. —Used the Mosher Forced-Choice Guilt Inventory, the Sex Experience Inventory, and Kohlberg's Moral Dilemmas Questionnaire in Exp I to assess 119 unmarried college women with regard to sex behavior, sex guilt, and moral reasoning. Categories of sexual expression

were developed which were useful in predicting behavior. Guilt was a better predictor of sex than morality. Maintaining virginity and losing it were multidetermined. Exp II assessed 76 unmarried college couples on the same variables. Sex guilt and sex experience were associated with moral reasoning for men and for couples. Results suggest that the male partner is more influential than the female in setting standards for the couple. —Journal abstract.

11510. Dawson, John. (U Edinburgh, Scotland) **Urbanization and mental health in a west African community.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today.* New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

11511. Dearden, John. **Sex-linked differences of political behavior: An investigation of their possibly innate origins.** *Social Science Information*, 1974(Apr), Vol 13(2), 19-45. —Explores the possibility that sex-related differences in political behavior are in part derived from gender-specific innate behavioral predispositions rather than from differential learning experiences and social role expectations. Part 1 reviews data suggesting an innate basis of certain sex-linked behavioral differences; Part 2 attempts to test politically relevant hypotheses derived from findings of Part 1. Results are interpreted as providing only mild support for the hypotheses, though they are logically consistent and noncontradictory to the view expressed in Part 1. (67 ref) —R. Hall.

11512. Earles, James A.; Mullins, Cecil J. & Viola, Bart M. (Lackland Air Force Base, Personnel Research Div, TX) **Variables related to amphetamine use.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 135.

11513. Engelmann, Frederick C. & Schwartz, Mildred A. (U Alberta, Edmonton, Canada) **Austria's consistent voters.** *American Behavioral Scientist*, 1974(Sep-Oct), Vol 18(1), 97-110. —Compares 1968 and 1973 survey data, based on a random sample of Austrian voters, to see if changes in electoral outcomes were associated with changes in the social-structural and interpersonal sources of consistent party support. (18 ref)

11514. Fairburn, Nicholas H. **Homosexuality and the law.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases.* New York, NY: American Elsevier, 1974. 217 p.

11515. Feldman-Summers, Shirley & Kiesler, Sara B. (U Kansas) **Those who are number two try harder: The effect of sex on attributions of causality.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 846-855. —Conducted 2 experiments to ascertain the causal attributions made by a total of 274 male and female undergraduates for identical performance (including success and failure) of males and females. In both experiments, Ss made attributions along 4 dimensions: ability, motivation, task difficulty, and luck. Whether evaluating undergraduates on an intellectual task (Exp I) or successful physicians (Exp II), Ss attributed greater motivation to females than to males. In addition, males perceived the female physician as being less able and having an easier task than the male physician. However, female Ss perceived the female physician as having a harder task than the male



physician. Implications for attribution theory and the perception of professional women in our society are discussed. (17 ref)—*Journal abstract*.

11516. **Fields, Suzanne. Patients' rights: I. Due process of law.** *Innovations*, 1974(Win), Vol 1(2), 12-15. —Discusses legal rights of mental patients, summarizes critical cases, and explores their significance for mental health delivery systems. 3 legal questions are presented: (a) Do the involuntarily committed mentally handicapped have a constitutional right to treatment by the state and what is adequate treatment? (b) Should a patient's work in a hospital be considered therapy (part of the treatment), or should he be reimbursed for involuntary servitude? (c) Does a local board of education have an obligation to provide education for children with alleged mental, behavioral, physical, or emotional handicaps? 5 legal case studies are presented in discussion of these issues.—*J. Carlson*.

11517. **Fields, Suzanne. Patients' rights: II. Lawyers test the limits.** *Innovations*, 1974(Win), Vol 1(2), 16-17. —Describes progress in cooperation between mental health professionals and lawyers to ensure the legal rights of mental patients. The Mental Health Law Project, organized in January 1972, is sponsored by the Center for Law and Social Policy, the American Orthopsychiatric Association, and the American Civil Liberties Union Foundation, and is staffed by lawyers experienced in the field. Besides providing legal assistance and counseling, the project provides a mental health legislation guide, organizes workshops on legal rights of the mentally handicapped, and has analyzed and prepared comments on the new proposed federal rules of evidence as they pertain to the patient-psychotherapist privilege. "Mental Retardation and the Law," a quarterly summary of all litigation relating to the rights of the mentally retarded, and a handbook, "Basic Rights of the Mentally Handicapped," are services provided.—*J. Carlson*.

11518. **Fisher, Gary.** (Cedars-Sinai Medical Ctr, Los Angeles, CA) **Harmful effects of marihuana use: Experiences and opinions of current and past marihuana users.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 75-84. —Surveyed 530 past and current marihuana users with a 13-page questionnaire designed to elicit their experiences and opinions on the harmful effects of marihuana use. The sample was constituted by using the social network method and random sampling of voter registration lists, predominantly in southern California. Respondents were classified according to 5 use patterns: trial users, past users, occasional, regular, and daily current users. Ss were asked their experiences and opinions with respect to 8 areas related to the dangers of marihuana use: experienced harmful effects; potential dangers to self; type of harm caused to others; potential dangers to society; reasons given by current users for possibly discontinuing use; reasons given by past users for having discontinued use; legal dangers; and types of people to whom users would not recommend the use of marihuana. Generally, respondents did not disparage the use of marihuana in the 8 areas covered by the questionnaire.—*A. P. Balevre*.

11519. **Fisher, Gary; Steckler, Allan; Strantz, Irma & Nabholz, Emily.** (Cedars-Sinai Medical Ctr, Los Angeles,

CA) **The legalization of marihuana: Views of several American populations of users and non-users.** *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 333-349. —Re-examines the findings of a 1969-1970 opinion survey of 2,728 adults on their views regarding the liberalization of marihuana laws. It was found that as marihuana use increases, there are more liberal attitudes toward disposition of users and legal control, and an increase in the belief that marihuana will be legalized.

11520. **Freund, Kurt W.** (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **Male homosexuality: An analysis of the pattern.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11521. **Gagnon, John H.** (State U New York, Stony Brook) **Scripts and the coordination of sexual conduct.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 27-59. —Sexual scripts are defined as "culturally provided plans and goals of persons" that shape and coordinate both verbal and nonverbal conduct involved in sexual behavior. One script of a young, inexperienced couple moving from a purely social context to a novice attempt at sexual intercourse is described in detail. From the viewpoint of socialization, its complexity cannot be easily predicted from the Freudian paradigms of developing psychosexuality. The conducts brought into use in this behavior were learned in contexts not related to sexuality. Skills and scripts are detached from the original contexts and add to the flexibility of sexual behavior.—*J. M. Roberts*.

11522. **Glass, Roger; Johnson, Bridget & Vessey, Martin.** (Mt Sinai Hosp, New York, NY) **Accuracy of recall of histories of oral contraceptive use.** *British Journal of Preventive & Social Medicine*, 1974(Nov), Vol 28(4), 273-275. —Compared the oral contraceptive histories obtained from 75 women attending family planning clinics with the information contained in the clinic records to investigate the assumption that women are able to recall their oral contraceptive histories with reasonable accuracy. It is concluded that simple measures of oral contraceptive use, such as whether the preparations have ever or never been used, whether they are in current use, and the total duration of use, are likely to be remembered with adequate accuracy.—*Journal abstract*.

11523. **Grey, Antony.** (Albany Trust, London, England) **Homosexuality: Some social and legal aspects.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11524. **Gunderson, E. K.; Nail, Richard L. & Kolb, Douglas.** (US Naval Health Research Ctr, San Diego, CA) **Health status of drug abusers as measured by the Cornell Medical Index.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 58-67. —Investigated the mental health status of heavy users of marihuana, amphetamines, hallucinogens, and heroin in a population of young Navy men. The Cornell Medical Index Questionnaire provided a summary of presenting complaints and the patient's medical history. The 195 items have been widely used to survey the prevalence of somatic and emotional symptoms in a variety of populations. Ss were 903 drug users on active duty with the Navy, 1,422

psychiatric inpatients and outpatients tested at major Naval hospitals and clinics, and 725 men who had been examined for special Naval programs and were generally superior in health status. Results show a prominence of psychiatric symptoms among the drug use population. Furthermore, heavy multiple drug use was associated with disease or dysfunction in a number of specific organ systems, i.e., eyes, liver, respiration, digestion, circulation, and muscles and joints. (29 ref)—R. S. Albin.

11525. Hall, Malcolm C. (Commonwealth Police Force, Narcotics Section, Canberra, ACT, Australia) **Problems in legislating against abuse of hallucinogenic fungi in Australia.** *Bulletin on Narcotics*, 1973(Jul-Sep), Vol 25(3), 27-36.—Discusses legislative proposals that possession of specific chemicals, of preparations or extracts containing them, or of the fungi presumed to contain them, should be made a criminal offense. The drawbacks of defining such substances too narrowly are pointed out.

11526. Halleck, Seymour L. (U North Carolina, Medical School, Chapel Hill) **Society: The roots of dependency.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses the major reasons why people, especially youth, use drugs which caused dependency and considers some of the environmental situations conducive to drug abuse: permissiveness, freedom, social and technological change, restlessness, altered sense of values, and personal isolation.

11527. Joesting, Joan & Joesting, Robert. (Salisbury State Coll) **Attitudes about sex roles, sex, and marital status of anti-Nixon demonstrators, comparison of three studies.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1049-1050.—Comparison of findings across 3 small studies of 10%, 6%, and 22% of an estimated attendance at anti-Nixon demonstrations showed a sex difference of greater liberalism of the women's attitudes toward their own roles.

11528. Kenyon, F. Edwin. (Warneford Hosp, Oxford, England) **Female homosexuality: A review.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11529. King, Marc R. & Manaster, Guy J. (U Texas, Austin) **Time perspective correlates of collegiate marijuana use.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 99.—Data from 26 undergraduate marihuana users and 48 nonusers who completed the Time Reference Inventory show that users were significantly more past-oriented than nonusers. No significant differences in present or future orientations or age and sex variables were found.

11530. Klyman, Fred I. & Kruckenberg, Joanna. (Wichita State U) **A methodology for assessing citizen perceptions of police.** *Journal of Criminal Justice*, 1974(Fal), Vol 2(3), 219-233.—Developed and administered a scale to 1,000 residents of a Kansas community to determine perceptions that residents hold toward their police. Race and dogmatism were examined as variables influencing perceptions. Nonwhite residents evaluated police less favorably than did whites. No significant difference was found on level of dogmatism in evaluating

the police. The importance of assessing citizen perceptions of the police to obtain data which will optimize the setting of goals for police-community relations programming is discussed. (23 ref)—*Journal abstract*.

11531. Knopf, Andrea & Wakefield, John. (U Hosp of South Manchester, England) **Effect of medical education on smoking behaviour.** *British Journal of Preventive & Social Medicine*, 1974(Nov), Vol 28(4), 246-251.—Compared the smoking behavior, knowledge, and opinions of 658 medical students with those of 288 law students based on questionnaire data. Results indicate that medical students had more knowledge than law students about the hazards of smoking, were more convinced by the relevant evidence, and assessed the risk to health more highly. However, there was no significant difference in their smoking behavior. Among medical students, 61% were nonsmokers, 10% ex-smokers, and 29% smokers, of whom three-fifths smoked regularly. During their training they were more likely to start smoking than to give it up, and more likely to increase their consumption than decrease it. Expansion of smoking occurred especially in the early years of the course, whereas the main increase in knowledge was in the clinical period. Students' knowledge and their opinion of the evidence were related to their stage of education, whereas their assessment of the risk was linked with their smoking behavior. It is suggested that expansion of smoking at medical school may be forestalled by providing information about the hazards as early as possible, although some smokers will continue the habit irrespective of knowledge.—*Journal abstract*.

11532. Kosviner, Adele; Hawks, David & Webb, M. G. (Inst of Psychiatry, Addiction Research Unit, London, England) **Cannabis use amongst British university students: Prevalence rates and differences between students who have tried cannabis and those who have never tried it.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 35-60.—Studied incidence of 1969-1971 marihuana usage by students at 3 selected colleges in southern England and differences between users and nonusers. Questionnaires were sent to the whole student body at the 2 all-male colleges, and at the coeducational college random sampling ensured adequate female response. Response rate to the 7,897 questionnaires was 75%. The study's main areas of interest, the design of the questionnaire, and the statistical methods used in analyzing the data, are described in detail. 67% of the Ss reported that they had never used marihuana. Men used marihuana only slightly more than women. More users than nonusers were brought up outside the United Kingdom, especially in the US. The more independent a student's living arrangements, the more likely he was to have used the drug. (24 ref)—A. P. Balvire.

11533. Lelental, Stefan. (U Łódź, Poland) **[Sentencing in cases of unintentional crimes.]** (Polh) *Przegląd Penitencjarny i Kryminologiczny*, 1972, Vol 10(2), 3-19.—Studied 125 cases of unintentional crime, using questionnaires and documents. 44% of the crimes were committed under the influence of alcohol, and 62% involved manslaughter. 44% of the offenders were vehicle drivers, 26% had served previous prison sentences, and 78% were under 35 yrs old. The modal sentence was 2 yrs. Only 16% of the offenders considered that their



sentences were fair and deserved. (French summary) (24 ref)—A. Z. Arthur.

11534. Lerner, Steven E. & Linder, Ronald L. (San Francisco Polydrug Project, CA) **Drugs in the elementary school.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 317-322.—Administered a questionnaire about the use of 12 types of drugs to 69 4th graders, 63 5th graders, and 62 6th graders in a suburban elementary school. A general trend of greater use of tobacco, marihuana, beer and wine, hard liquor, amphetamines, barbiturates, codeine, and methaqualone was evident and increased with grade level. Significant differences between 4th graders and the 5th and 6th graders were found in the use of inhalants (23.1% vs 11.1% and 8%, respectively). Marihuana was cited by 11.5% of all Ss as the most available drug for purchase. 58.3% believed that students use drugs "to be part of the gang." Findings substantiate the extensive use of certain psychoactive drugs (beer and wine and inhalants) by 4th graders and suggest the need for drug education programs at the kindergarten or 1st-grade level.—L. Gorsey.

11535. Levenberg, Stephen B.; Heckel, Robert V. & Wagner, Mervyn K. (U South Carolina) **Smoking habits of smoking researchers: Missionaries or hypocrites?** *Psychological Reports*, 1974(Dec), Vol 35(3), 1085-1086.—A survey of the smoking behavior of researchers who produce literature related to smoking indicates that their current rate of cigarette consumption did not differ from the national rate or that of a comparison group of researchers. Differences were found in the current rate of cigar and pipe smoking and in the speed with which smoking researchers are ceasing the habit.

11536. Lewis, Robert A. & Burr, Wesley R. (Pennsylvania State U) **Premarital coitus and commitment among college students.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 73-79.—A questionnaire survey of 2,453 undergraduates from 4 geographical areas in the US suggests that there is a behavioral pattern of "permissiveness with commitment." This pattern of "coitus with commitment" was evident not only for females, but for males as well. With minor exceptions, the pattern was detected for both sexes in all 4 geographical regions. Speculation is made about ways in which this pattern may be one outcome of the alleged intersex convergence in sexual attitudes and behavior among American college youth. (23 ref)—*Journal abstract*.

11537. Loraine, J. A. (Ed.). (MRC External Scientific Staff, U Edinburgh, Scotland) **Understanding homosexuality: Its biological and psychological bases.** New York, NY: American Elsevier, 1974. 217 p.—Presents a collection of 9 articles on male and female homosexuality. Major topics include psychological, biological, and endocrinological factors in the etiology of homosexuality; religious and legal aspects; and the current role of homophile organizations.

11538. Loraine, John A.; Chew, Iain & Dyer, Tim. (MRC External Scientific Staff, U Edinburgh, Scotland) **The population explosion and the status of the homosexual in society.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11539. Lucas, Wayne L.; Grupp, Stanley E. & Schmitt, Raymond L. (Iowa State U) **Longitudinal research and marijuana smoking: A successful approach.** *Criminology: An Interdisciplinary Journal*, 1974(Nov), Vol 12(3), 315-327.—Noting the recognized need for longitudinal research concerning drug use, the specific methods used in a successful longitudinal study of marihuana experience are reported. Of those qualifying for inclusion in the study (128 college students who did not smoke marihuana) only 1 S refused to be interviewed at the initial contact, and 94% cooperated at the recontact 2 yrs later. The probable factors responsible for this success are described, including details regarding preparation prior to the study, approaching the S, establishing rapport at initial contact, and maintaining rapport throughout the study. It is noted that 17% of Ss reported some marihuana experience at the end of the 2-yr interval. (17 ref)—*Journal abstract*.

11540. Luscutoff, Sidney A. & Elms, Alan C. (U California, Davis) **Advice in the abortion decision.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 140-146.—Examined several aspects of the abortion decision beyond demographic data, particularly the number and kinds of contacts-for-advice made by women confronted with the decision. Ss were 224 therapeutic abortion patients aged 13-41 yrs, 71 obstetrics patients aged 15-35 yrs, and 201 nonhospitalized control Ss aged 16 to over 27 yrs. Ss were asked to report the number of contacts-for-advice they had made when forming decisions to have a therapeutic abortion, to carry a pregnancy to term, or to engage in a significant behavior that did not involve a pregnancy. All Ss were asked to report the difficulty they had in making their respective decisions and the satisfaction they felt with their decisions. As predicted, the abortion group differed strongly from both other groups on most questions. Abortion patient contacts-for-advice also differed from those reported by N. H. Lee's (1969) Ss, but in a direction opposite the predicted one: Lee's reported contacts-for-advice were more numerous than those in the present study. Differences are discussed in light of current social feelings toward abortion and conditions which may have influenced the amount of information upon which Ss had to base their decisions.—*Journal abstract*.

11541. Melinek, Stanley J. (Fire Research Station, Borehamwood, England) **A method of evaluating human life for economic purposes.** *Accident Analysis & Prevention*, 1974(Oct), Vol 6(2), 103-114.—Describes a method of estimating a monetary value of life which can be used for the evaluation of safety precautions, based on the idea that people are willing to spend money to reduce the risk of accidents or, alternatively, to increase the risk for some benefit. The method attempts to estimate the value of life which is consistent with such behavior. Examples of the application of this method are given which indicate that the value of a life is of the order of £50,000. Results are compared with values given by discounted earnings. The importance of perceived risk is also considered, and factors influencing perceived risk are discussed. (French & German summaries) (32 ref)—*Journal summary*.

11542. Milstein, Stephen L.; Pihl, Robert O. & Smart, Reginald G. (Inst Nationale de la Recherche Scientifique-Santé, Montreal, Canada) **The problem of drug abuse: Has Canada found some answers?** *Canadian Psychologist*, 1974(Oct), Vol 15(4), 357-367.—Critically discusses the findings and recommendations of a Canadian government-sponsored study which examined the extent of the nonmedical drug use problem, principal views on treatment, and suggestions for the control of cannabis. 2 major issues are considered: (a) the use of criminal law to control the availability of nonmedical drugs and the user's attempts to obtain them, and (b) the advisability of opiate maintenance programs. (French abstract)—*Journal abstract*.

11543. Monahan, John & Cummings, Lesley. (U California, Program in Social Ecology, Irvine) **Prediction of dangerousness as a function of its perceived consequences.** *Journal of Criminal Justice*, 1974(Fal), Vol 2(3), 239-242.—Investigated 1 of the factors hypothesized to account for overprediction—differential consequences to the individual whose violence is being predicted. Undergraduate Ss were presented with descriptions of personality characteristics which had previously been judged by psychiatrists to indicate dangerousness. In Condition 1 Ss were told that a prediction of dangerousness would lead to another's mental hospitalization, and in Condition 2 they were told that such prediction would lead to a prison sentence. Results support the hypothesis that predictions of dangerousness are at least in part a function of the consequences of the prediction: Ss were more likely to predict another to be dangerous if the prediction would lead to his mental hospitalization than if it would lead to his imprisonment.—*Journal abstract*.

11544. Mullins, Cecil J.; Vitola, Bart M. & Michelson, Alan E. (Lackland Air Force Base, Personnel Research Div, TX) **Variables related to preserve cannabis use in a sample of Air Force enlistees.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 134.

11545. Newman, Graeme R.; Articulo, Donald J. & Trilling, Carol. (State U New York, School of Criminal Justice, Albany) **Authoritarianism, religiosity and reactions to deviance.** *Journal of Criminal Justice*, 1974(Fal), Vol 2(3), 249-259.—Administered a modified version of the California F Scale and a deviance-control scale to 116 police science students and to 91 university students. No overall relationship was found between respondents' preference to control deviance and their authoritarianism, nor did the F Scale discriminate between the 2 groups. However, the police sample favored the control groups. Evidence of response bias of deviance significantly more. Evidence of response bias to the F Scale was also found. It is concluded that the source of the criminal sanction usually typified as moral indignation was more a cognitively based evaluation than an emotionally based reaction. (22 ref)—*Journal abstract*.

11546. Ottenberg, Perry. (U Pennsylvania) **Bureaucratic attitudes as a psychosocial defence.** *Psychiatric Opinion*, 1974(Feb), Vol 11(1), 26-35.—Discusses widespread tendencies in many developed countries to ignore the issue of political dissent and its treatment in the USSR. The problem also exists in a modified form in the US and elsewhere. Bureaucratic factors leading to the

involuntary confinement of dissidents include the proliferation of red tape that precludes quick or rational release for anyone; dehumanization; inability to oppose dominant group attitudes or pressures; rationalizations that others in power know more than the psychiatrist; the devaluation of moral values; and confusion of health ethics and morality. 8 available ways to assist political dissenters in the hospital are described.—R. S. Albin.

11547. Parfrey, P. S. (University Coll Cork, Ireland) **Factors associated with undergraduate alcohol use.** *British Journal of Preventive & Social Medicine*, 1974(Nov), Vol 28(4), 252-257.—Conducted a survey of 265 male and 179 female undergraduates to examine the extent and prevalence of intoxicant use and the various factors associated with their use. 20% of males and 36% of females reported that they did not drink, whereas 52% of males and 17% of females were social drinkers or occasional drunks. Student patterns of drinking behavior were significantly associated with sociocultural factors, such as leisure money available, belief in a God, and frequency of attendance at religious services. Current cigarette use, experience of marihuana, and attitude to future marihuana use, to the opposite sex drinking, and to the misdemeanor considered most serious also had significant associations with alcohol-related behavior. It appears that peer group pressures, as illustrated by the proportion of close friends drinking and sibling drinking, had a greater influence on student drinking behavior than family-related factors such as parental drinking and parental knowledge of drinking. The effect of ambivalent attitudes towards alcohol use, demonstrated by the age at introduction and the place of introduction to alcohol, may suggest that a more relaxed attitude to alcohol should be adopted.—*Journal abstract*.

11548. Parsons, Robert J. & Hoppe, Edward W. (Brigham Young U) **The polarity of political preferences of clergymen.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 123.

11549. Quinsey, Vernon L. (Mental Health Ctr, Oak Ridge Div, Penetanguishene, Ontario, Canada) **Psychiatric staff conferences of dangerous mentally disordered offenders.** *Canadian Journal of Behavioural Science*, 1975(Jan), Vol 7(1), 60-69.—Studied 39 consecutive staff conferences held in a maximum security psychiatric institution to discuss patients who had been remanded by the courts for observation. Each conference participated by the courts for observation. Each conference participated by the courts for observation. Each conference participated by the courts for observation. The panel rated each patient on a number of variables. The degree of rated mental illness was positively correlated ( $p < .002$ ) with the amount of rated patient dangerousness. Most remanded patients were seen as fit for trial and responsible for their crimes, and the conference decisions reflected this. There were significant differences among attendants, physicians, and other professional staff in their ratings of the patients. (15 ref)—*Journal abstract*.

11550. Ramsay, Ronald W.; Heringa, P. M. & Boorsma, I. (U Amsterdam, Psychological Lab, Netherlands) **A case study: Homosexuality in the Netherlands.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974. 217 p.

11551. Rogers, Rita R. (Harbor General Hosp, Torrance, CA) **Psychiatric hospitalization of political**



**dissenters.** *Psychiatric Opinion*, 1974(Feb), Vol 11(1), 20-24. —Considers psychiatric hospitalization of political dissenters as a severe abuse of the concept of psychiatric illness. The political, moral and social implications of this problem make it difficult to handle. It is suggested that the profession should take a stand not on whether those hospitalized are psychiatrically ill or whether their dissent is legitimate, but only on the question of whether their hospitalization is due to political dissent.—R. S. Albin.

11552. **Salzman, Carl & Lieff, Jonathan.** (Harvard U, Medical School, Massachusetts Mental Health Ctr, Boston) **Interviews with hallucinogenic drug discontinuers.** *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 329-332.—Examines reasons for drug use as reported by 16 drug discontinuers. Ss were given a drug questionnaire, a battery of psychological tests, and a loosely-structured interview focusing on their involvement with hallucinogens. The interviews indicate 3 clearly defined periods of drug involvement: initiation, heavy drug use, and discontinuance. A frequent correspondence between the phase of drug use and the stage of conflict resolution of an S's personal problem is noted. Ss cited emerging life decisions and resolution of personal and interpersonal conflicts as the basis for their initial drug use. Drugs became less important to Ss as their major life issues were resolved.—R. Tomasko.

11553. **Saxe, David B. & Kuvin, Seymour F.** (City of New York Dept of Consumer Affairs, NY) **Notes on the attorney-client relationship: A psychological overview.** *Journal of Psychiatry & Law*, 1974(Sum), Vol 2(2), 209-216.—Discusses problems that an attorney may face in everyday legal practice, resulting from his own emotional problems, that may have a detrimental effect on the conduct of a successful practice. Various examples are provided as a checklist and warning guide for the perceptive attorney. It is concluded that a successful attorney-client relationship necessitates an emotional alertness on the part of the attorney to his own difficulties.—*Journal abstract.*

11554. **Schill, Thomas; Evans, Ron; Monroe, Scott & Drain, Dennis.** (Southern Illinois U, Carbondale) **Effects of approval or disapproval on reading behavior of high- and low-guilt subjects.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 104.—Hypothesized that censure would enhance viewing of an erotic magazine for low- but not for high-guilt Ss. In contrast to the prediction, mean viewing time for high-guilt Ss was significantly higher in the positive and negative comment conditions than in the neutral conditions, while the viewing time of low-guilt Ss in the positive and negative conditions did not significantly differ from the neutral condition.

11555. **Schneider, William.** (Harvard U) **Issues, voting, and cleavages: A methodology and some tests.** *American Behavioral Scientist*, 1974(Sep-Oct), Vol 18(1), 111-146.—Proposes 2 tests for measuring issue characteristics and their effect on voting behavior: (a) divisiveness, which analyzes the degree to which an issue divides public opinion and creates political cleavages; and (b) political direction, which indicates how clearly parties and candidates are identified with positions on an issue. These tests are applied to the 1968 and 1972 elections.

11556. **Schwartz, Steven.** (Northern Illinois U) **Effects of sex guilt on word association responses to double-entendre sexual words.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 100.—Hypothesized that high-sex-guilt and low-sex-guilt male undergraduates would not differ in their knowledge of the sexual meaning of double-entendre words but rather in their respective orders of associative response production. Data support the hypothesis and show that high-sex-guilt Ss produce sexual responses later in the response hierarchy than low-sex-guilt Ss.

11557. **Silverman, Jerome.** (Private practice, Rosemead, CA) **The women's liberation movement: Its impact on marriage.** *Hospital & Community Psychiatry*, 1975(Jan), Vol 26(1), 39-40.—Discusses marriages in which a basically insecure husband plays a godlike role and his wife, who initially worshipped him, matures and finds her situation depressing and degrading. With support from the women's liberation movement, many women have found the courage and conviction to challenge such situations. The challenges often bring the husbands' repressed feelings of inadequacy to the surface, which leads to increased turmoil and finally to requests for professional help, first by the wife and later by her husband. During counseling both become more open and develop as individuals. As a result their marriage improves.—*Journal abstract.*

11558. **Simon, William.** (Inst for Juvenile Research, Chicago, IL) **The social, the erotic, and the sensual: The complexities of sexual scripts.** *Nebraska Symposium on Motivation*, 1973, Vol 21, 61-82.—Asserts that differences between human sexual pairs of any type are possibly greater than their similarities. The literature on sexual techniques (specifically foreplay) is compared to a car owner's manual explaining how to get a car started on a cold morning. Scripts or scripted behavior suggestive of the dramatic also are inappropriately suggestive of the conventional dramatic narrative form in regard to sexual behavior. The organization of social activity to facilitate sexual behavior and the organization of sexual activity to facilitate nonsexual social and personal goals are compared. Sex research is called "a science of icebergs that is based exclusively upon above-surface observations." (34 ref)—J. M. Roberts.

11559. **Singer, Jack N.** (Colorado State U) **Sex and college class differences in attitudes toward autonomy in work.** *Human Relations*, 1974(May), Vol 27(5), 493-499.—Constructed a homogeneous 20-item "attitude to autonomy in work" scale to evaluate independence needs, and a 6-item scale was constructed to evaluate attitudes toward Women's Liberation. No significant male-female differences were detected among 70 undergraduates in attitudes to autonomy in work, but attitudes among seniors were more positive. Positive attitudes to autonomy were significantly correlated with positive attitudes to the women's movement.—W. W. Meissner.

11560. **Smith, Brian H. & Rodriguez, Jose L.** (Yale U) **Comparative working-class political behavior: Chile, France, and Italy.** *American Behavioral Scientist*, 1974(Sep-Oct), Vol 18(1), 59-96.—Analyzes a number of economic, political, and cultural factors associated with working-class politics. It is concluded that the Franco-Italian pattern of working-class political behavior was

not repeated in Chile before or after Allende's tenure as the 1st Marxist president in Latin America. (95 ref)

11561. Smith, Carolyn B. & Borgers, Sherry B. (U Houston) *Plato's Utopia is yet to come. Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 122-127. —Compares the status of women and men in the US in light of Plato's assertion that equality of nurture and education are in the best interests of the state. Research is cited showing that women do not have access to equal education and opportunity, that they are able to commit themselves and to be as productive as men, and that they do not receive equal reward for their efforts. An examination of the results of one large university's affirmative action plan after 3 yrs revealed continued inequalities. It is concluded that Plato's ideal state remains unrealized. (21 ref)—C. A. Heikkinen.

11562. Ungerleider, J. Thomas. (U California, Ctr for the Health Sciences, Los Angeles) *The courts and I: Ruminations, retorts and remnants. Journal of Psychodelic Drugs*, 1974(Jul-Sep), Vol 6(3), 315-320. —Reviews the personal experiences of a psychiatrist involved as an expert witness in drug-abuse cases.

11563. Vidmar, Neil. (U Western Ontario, London, Canada) *Retributive and utilitarian motives and other correlates of Canadian attitudes toward the death penalty. Canadian Psychologist*, 1974(Oct), Vol 15(4), 337-356. —Reports a survey of 144 English Canadian adults which examined the motives behind, and other social psychological correlates of, attitudes toward capital punishment. Results suggest that for a substantial percentage of people, the motive of retribution may be more important than deterrence as a reason for favoring the death penalty. Other findings indicate that the more strongly people favored the death penalty, the more likely they were to score high on measures of authoritarianism, punitiveness, dogmatism, and prejudice (items were used from tests such as the California F Scale and the Rokeach Dogmatism Scale). They were also more likely to be older and less educated. The hypothesis that people who felt threatened by crime would be more likely to favor capital punishment received equivocal support. (French abstract) (40 ref)—*Journal abstract*.

11564. Waller, Julian A.; Lamborn, Kathleen R. & Steffenhagen, Ronald A. (U Vermont) *Marihuana and driving among teenagers: Reported use patterns, effects, and experiences related to driving. Accident Analysis & Prevention*, 1974(Oct), Vol 6(2), 141-161. —Data from 1,271 college freshmen show that 49% reported using marihuana during the previous year. A majority of users simultaneously consumed alcohol at least on occasion, and many of them had enough alcohol at those times to be impaired by the alcohol alone. Among users who smoked weekly or more often, 25% of driving while "high" occurred under the combined effect of marihuana and medium to heavy alcohol use. Most users reported marihuana effects on driving judged to be hazardous (e.g., altered attention, vision, or time perception). In an estimated 15,000 driving trips while "high" on marihuana, 2 crashes occurred definitely attributable to marihuana, 2 possibly attributable to marihuana use. Also, 42 persons (13% of drivers) reported near crashes while "high." Drivers who encountered trouble while driving after marihuana said 59% of the time that the incidents

were caused by the marihuana, 27% by alcohol, and in 14% that they could not assess which drug was responsible. (French & German summaries) (17 ref)—*Journal summary*.

## SOCIAL BEHAVIOR AND INTERPERSONAL PROCESSES

11565. Becker, Henrik & Körner, Wolfgang. (U Hamburg, W Germany) *Cognitive balance and clique formation: A critique and modification of balance theory.* (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(3), 189-200. —Discusses J. A. Davis's application of balance theory to the explanation of sociological facts. In order to explore whether "social facts" (in the Durkheimian sense) can be reduced to psychological variables, Davis's theory is modified and put into the form of an axiomatic model. Difficulties in Davis's formulation are demonstrated by incorrect predictions of coalition formation in *n*-person structures. Further modifications of Davis's theory are suggested.—R. P. Abeles.

11566. Diener, Edward et al. (U Illinois) *Effects of altered responsibility, cognitive set, and modeling on physical aggression and deindividuation. Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 328-337. —Assessed the role of 3 disinhibiting variables in producing both physical aggression and an internal state of deindividuation, using 64 male college students as Ss. Altered responsibility, cognitive set, and modeling were manipulated in a factorial design, and all 3 variables significantly increased physical aggression. No interaction produced significant results. The increase due to altered responsibility and varying cognitions supports P. G. Zimbardo's theory of deindividuation which relates certain input variables to wild, impulsive behavior. Questionnaire data indicate that the increase in aggression was not accompanied by internal mediational factors such as reduced self-awareness. It appears that disinhibiting forces may produce increases in antisocial behavior without necessarily producing a deindividuated internal state. (17 ref)—*Journal abstract*.

11567. Hendrick, Clyde. (Kent State U) *Social psychology as history: A bibliography. Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 125-126.

11568. Löhr, Gerhard & Preiser, Siegfried. (U Erlangen, Psychologischen Inst, Nürnberg, W Germany) *[Regression and recreation: A contribution to the problem of stress and rest.]* (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 575-591. —Investigated the relationship between stress situations and activities during rest periods. 25 psychology students and 36 student nurses were tested on highly complex and very simple tasks. Rest activities consisted of problem solving (high complexity), social games (medium complexity), and doing nothing, or smoking (low complexity). The greatest improvement in a repetition of the original test situation was observed when the rest activity was compensatory to the complexity of the test situation; i.e., doing nothing after a highly complex test, or doing problem solving after an easy test.



The importance of these results for recreational practice is pointed out. (English & French summaries)—*W. J. Koppitz*.

11569. Nelson, Cheryl A. & Hendrick, Clyde. (Kent State U) **Bibliography of journal articles in social psychology: 1973.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 126.

11570. Schmidt, Hans D. & Schmidt-Mummendey, Amélie. (U Bielefeld, W Germany) [Weapons as aggression-eliciting stimuli: A critical inspection of experimental results.] (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(3), 201-218.—Criticizes L. Berkowitz's theory of cue-elicited aggression by analyzing experiments on cue-elicited effects of weapons on aggressive behavior. The original experiment by Berkowitz and A. LePage (1967), its replications, and the authors' experiments are discussed with respect to internal and external validity. No experimental evidence of a cue-elicited weapons-effect on aggressive behavior is found. Occasionally observed increases in aggressive behavior after presentation of aggressive cues are interpreted according to the operant conditioning paradigm. (21 ref)—*English abstract*.

#### Group Dynamics & Interpersonal Communication

11571. Adams, W. Clifton. (Central Missouri State U) **The effect of various channels of feedback on the communication of information.** *Speech Monographs*, 1973(Jun), Vol 40(2), 147-150.—Used closed-circuit TV to test whether visual and/or audio responses from a listener increased communication accuracy. 32 dyads were drawn randomly from the male and female populations of the basic speech course at a state university. Analysis of covariance was used to adjust for the influence of interaction time. Findings suggest that the audio channel carried the information necessary to improve communication, and the visual channel provided auxiliary feedback which was inefficacious without the audio. A secondary finding indicates that within feedback conditions accuracy was independent of time.—*Journal abstract*.

11572. Birchler, Gary R.; Weiss, Robert L. & Vincent, John P. (U California, Medical School, San Diego) **Multimethod analysis of social reinforcement exchange between maritally distressed and nondistressed spouse and stranger dyads.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 349-360.—Based on a social learning formulation of marital interaction, the positive and negative social reinforcement behaviors exchanged within a total of 24 distressed marital, nondistressed marital, and stranger dyads were investigated. Behavioral data gathered from home and laboratory interactions were used to study distressed and nondistressed marital interaction. In the laboratory, a repeated measurements design facilitated comparisons of marital and stranger interactions. Results from the natural environment indicate that distressed couples, relative to nondistressed, emitted fewer "pleases" and more "displeases," and engaged in more conflicts and fewer recreational activities together. Laboratory data from a behavioral coding system also indicate that distressed couples engaged in fewer positives and more negatives during casual conversation and problem-solving

than did nondistressed couples. Both distressed and nondistressed married dyads were more negative and less positive than stranger dyads. Theoretical and practical implications of the findings are discussed. (18 ref)—*Journal abstract*.

11573. Bochner, Arthur P. & Kaminski, Edmund P. (Temple U) **Modes of interpersonal behavior: A replication.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1079-1083.—Replicated a portion of M. Lorr and A. Suziedelis' study (see PA, Vol 43:15703) of modes of interpersonal behavior. Lorr's Interpersonal Behavior Inventory was administered to 287 undergraduates. Ss rated well-liked others and themselves. Factor analysis was performed on the 2 correlation matrices and the results were compared to those for Lorr's normal sample. 3 factors were sufficient to account for the variance. 2 major differences between the studies were found. The Nurturance and Sociability factors in the previous study were combined into 1 bipolar factor labeled Hostility-Affection, and the scales comprising the Dependency category seemed considerably reduced in importance.—*Journal abstract*.

11574. Breiger, Ronald L. (Harvard U) **The duality of persons and groups.** *Social Forces*, 1974(Dec), Vol 53(2), 181-190.—Attempts to translate a metaphor of classical social theory concerning the "intersection" of persons within groups and of groups within the individual into a set of techniques to aid in empirical analysis of the interpenetration of networks of interpersonal ties and networks of intergroup ties. These techniques are useful in the study of director interlocks, clique structures, organizations within community and national power structures, and other collectivities which share members. The "membership network analysis" suggested in this paper is compared to and contrasted with sociometric approaches and is applied to a study by A. Davis et al (1941) of the social participation of 18 women. (22 ref)—*Journal abstract*.

11575. Chesebro, James W.; Cragan, John F. & McCullough, Patricia. (Temple U) **The small group technique of the radical revolutionary: A synthetic study of consciousness raising.** *Speech Monographs*, 1973(Jun), Vol 40(2), 136-146.—Attempted to identify the aggregate or central symbols which characterize the different stages in consciousness-raising. 3 consciousness-raising sessions, involving 6, 5, and 4 Gay Liberationists expressing a profound sense of alienation from the establishment, were tape-recorded. Results indicate that in moving through a 4-stage process, participants generally created a new identity for themselves (Stage 1), perceived themselves as pitted against agents of the establishment (Stage 2), denied establishment values for newly created values (Stage 3), and finally agreed to support the liberation efforts of unrecognized oppressed groups, hence broadening the revolution (Stage 4). It is concluded that an examination of consciousness-raising as a small group technique appears to have important implications regarding the reliability, prior reported results, methodology, and future studies of small groups.—*Journal abstract*.

11576. Coutts, Larry M. & Schneider, Frank W. (U Windsor, Ontario, Canada) **Visual behavior in an unfocused interaction as a function of sex and distance.**

*Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 64-77.—Following E. Goffman's (1963) distinction between focused and unfocused interactions, the visual behavior of male, female, and mixed sex dyads in an unfocused interaction (waiting room situation) was investigated. Ss were 40 male and 40 female undergraduates. Amount of visual behavior decreased over time and with increasing proximity of the interactants. While the sex of the looker was not a significant source of variance, females received more glances than males. Also, more glances occurred in female dyads than in either male or mixed sex dyads. The amount of mutual gaze accounted for 1% of the interaction time and did not exceed the level expected by chance. Attention is drawn to the differences in the patterns of visual behavior which occurred in the present unfocused interaction and those which occur in focused interactions. (18 ref)—*Journal abstract*.

11577. Emurian, Henry H.; Bigelow, George E.; Brady, Joseph V. & Emurian, Cleeve S. (Johns Hopkins U, Medical School) **Small-group performance maintenance in a continuously programmed environment.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 187.

11578. Firestone, Ira J.; Lichtman, Cary M. & Colamosca, John V. (Wayne State U) **Leader effectiveness and leadership conferral as determinants of helping in a medical emergency.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 343-348.—Investigated the contribution of an individual's qualification for discussion group leadership (LGD) and the method of leadership conferral (election vs appointment) upon his group's response to a medical emergency. Ss were 156 male undergraduates. It was found that 5-person, face-to-face groups with high-LGD leaders responded more frequently and more rapidly to a confederate member's diabetic reaction than did groups with low-LGD leaders. Low-LGD leaders were frequently overthrown, while groups with high-LGD leaders experienced continuity of leadership. Conferral process had no discernible effect on helping or overthrows. It is concluded that a victim is the more fortunate if his group's leader is assertive. (17 ref)—*Journal abstract*.

11579. Frandsen, Kenneth D. & Rosenfeld, Lawrence B. (Pennsylvania State U) **Fundamental interpersonal relations orientations in dyads: An empirical analysis of Schutz's FIRO-B as an index of compatibility.** *Speech Monographs*, 1973(Jun), Vol 40(2), 113-122.—Conducted a series of studies with a total of 146 Ss (including college students and Civil Service employees) to investigate the potential usefulness of W. Schutz's (1960) theory of interpersonal relations orientations for the study of interpersonal relations. Based on analysis of the descriptive and explanatory power of scores produced by responses to Schutz's instrument, the Fundamental Interpersonal Relations Orientations Scales—Behavior (FIRO-B), the 3-dimensional classification of interpersonal needs is challenged, as well as the argument concerning 3 distinct forms of interpersonal compatibility. Results suggest that FIRO-B may be structurally biased against the interpersonal need to control or be controlled and that the compatibility measures derived from the test, although useful for examining certain broad-gauge predictions, do

not permit intensive analysis of the functional relationship between interpersonal orientations and communicative processes in dyads.—*Journal abstract*.

11580. Hrycenko, Igor & Minton, Henry L. (U Windsor, Ontario, Canada) **Internal-external control, power position, and satisfaction in task-oriented groups.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 871-878.—On the basis of a conceptualized congruency between expected locus of control and preference for locus of control in a given situation, it was hypothesized that in a task-oriented communication network, satisfaction with power position would be determined by the interaction of the personality dimension of internal-external control and the actual degree of power possessed. This hypothesis was tested via an experimental design in which 52 undergraduates, whose goal was to complete a group task with maximum efficiency, were led to believe that they possessed either high or low power in a triadic communication network. All Ss had completed Rotter's Internal-External Control Scale. Ss' responses to a postexperimental questionnaire supported the hypothesis for males but not for females. Results support the conceptualized relation between expected locus of control and preferred locus of control. (17 ref)—*Journal abstract*.

11581. Kawasaki, Michio. (Tokyo U of Education, Japan) **[Functional utilization of speech in group problem solving.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 80-90.—Compared individual and group performances by 7 groups of college students ( $N = 98$ ) in 2 experiments on matching 9 pairs of nonsense geometric figures, with or without verbalization. Verbalization and naming reduced the number of errors. Problem solving took longer by groups than by individuals in the early stages but less time in the later stages. Effectiveness of group activity depended on verbal communication in reaching agreements. (English summary)—S. Choe.

11582. Killworth, Peter D. & Bernard, H. Russell. (Cambridge U, England) **The Catij Technique: Some descriptive tests of its adequacy.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 188-189.

11583. Knowles, Eric S. & Johnsen, Per K. (U Wisconsin, Green Bay) **Intrapersonal consistency in interpersonal distance.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 124.

11584. London, Manuel & Walsh, W. Bruce. (U Illinois) **The development and application of a model of long-term group process for the study of interdisciplinary teams.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 188.

11585. Martin, Jane W. (Buffalo & Erie County Head Start Program, NY) **Attitudes toward epileptic students in a city high school system.** *Journal of School Health*, 1974(Mar), Vol 44(3), 144-146.—Investigated attitudes toward epilepsy by surveys and interviews of teachers, counselors, and nurses in the Buffalo public high schools. Results indicate a general lack of knowledge and understanding of epilepsy, especially among teachers. Although 5 out of every 100 students were known epileptics many teachers were unaware of the proper response to a child's epileptic seizure. In addition, most



counselors did not deal with the specific vocational and social needs of epileptic students. It is the responsibility of both the public school system and teacher training programs to change attitudes toward epilepsy.—*A. de la Haba.*

11586. Michener, H. Andrew & Lawler, Edward J. (U Wisconsin, Madison) **Endorsement of formal leaders: An integrative model.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 216-223.—Attempted to develop an integrative, path-analytic model for the endorsement accorded to formal leaders. The model contains 4 independent variables reflecting aspects of group structure: group success-failure, the payoff distribution, the degree of support by other members for the leader, and the vulnerability of the leader. Also included are 2 intervening variables reflecting perceptual processes (attributed competence and attributed fairness) and 1 dependent variable (endorsement). Results of an experiment with 144 male undergraduates indicate that endorsement was greater when the group's success was high, when the payoff distribution was flat rather than hierarchical, and when the leader was not vulnerable to removal from office. Other support had no significant impact on endorsement. The effect of success-failure on endorsement was mediated by attributed competence, while the effect of the payoff distributed was mediated by attributed fairness. These results suggest that moral and task evaluations are distinct bases of endorsement. (19 ref)—*Journal abstract.*

11587. Morgan, Cyril P. & Aram, John D. (U Colorado, Coll of Business & Administration) **The preponderance of arguments in the risky shift phenomenon.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 25-34.—Conducted a risky shift experiment with 48 graduate students in 12 4-person groups to study the enhanced-salience-of-values mechanism of R. Brown's (1965) widely held values theory and A. Vinokur's (1971) persuasive argumentation hypothesis. Tape recorded group discussions and written briefs were coded to measure percent risky expression of content of 4 risky and 4 cautious Choice Dilemma Questionnaire problems. Results show significant relationships between percent risky expression and degree of shift by groups and by problems. Results support the enhanced-salience-of-values mechanisms of values theory and the persuasive argumentation hypothesis. (27 ref)—*Journal abstract.*

11588. Moxnes, P. A. & Engvik, H. A. (U Oslo, Inst of Psychology, Norway) **Diagnosing the organization: The psychogram.** *Interpersonal Development*, 1973-1974, Vol 4(3), 177-189.—21 psychologist members of a sensitivity trainer organization evaluated each other according to 20 bipolar adjectives. From a resulting factor analysis came 2 distinct dimensions, interpreted as the "love" and the "will." Scores for all members were plotted within a derived coordinate system, with the aid of a computer program. The emerging "psychogram" is seen as reflecting 4 different modes of group member behavior: The Apathetic, the Sentimentalist, the Manipulator, and the Carer. The significance of each of the group member types is discussed and implications explored. (16 ref)—*Journal abstract.*

11589. Paloutzian, Raymond F. (Claremont Graduate School & University Ctr) **Some consequences of individuation and deindividuation: Aggression and altruism as functions of responsibility and group size.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 124-125.

11590. Phillipsen, Gerry F. & Saine, Thomas J. (U California, Santa Barbara) **The effect of reward criteria on verbal participation on group discussion.** *Speech Monographs*, 1973(Jun), Vol 40(2), 151-153.—Previous studies in speech communication have reported that the presence of a high-status evaluator inhibits verbal participation in group discussion. However, results of the present study with 64 undergraduates suggest that when the status variable is manipulated directly such differences are not observed. Results also suggest that differences in the frequency and quality of participation are linked to differences in reward criteria. Some support was found for the argument that evaluator status may either strengthen or weaken the effects of reward criteria on participation.—*Journal abstract.*

11591. Ryen, Allen H. & Kahn, Arnold. (Iowa State U) **Effects of intergroup orientation on group attitudes and proxemic behavior.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 302-310.—Examined the effects of 5 levels of intergroup orientation on (a) member evaluations of both ingroup and outgroup and (b) proxemic behavior both within and between groups. Ss were a total of 123 male undergraduates. 24 Ss divided into triads were assigned to each condition: alone, coacting, cooperating, competing with no feedback, and competing with win-lose feedback. Members of alone and coacting groups chose random seating patterns, and coacting group members did not differentiate evaluatively between own and other group. Ss in cooperating groups sat near both ingroup and outgroup members, and displayed a slight bias favoring own group. Competing-no-feedback group members sat near other ingroup members but far from outgroup members, rating own group much higher than other group. Winning feedback caused Ss to sit closer to the losing group, relative to no-feedback conditions, while losing groups tended to sit as far from the winning group as possible; winning feedback caused even higher own-group evaluations than in the no-feedback conditions, while losing feedback produced relatively low own-group ratings. Results suggest intergroup orientation provides (a) expectations about involvement with the outgroup and its effects on group goal attainment which influences ingroup and outgroup evaluations and (b) normative information as to how to place oneself with regard to own- and other-group members. (26 ref)—*Journal abstract.*

11592. Shoham, Shlomo G.; Ben-David, Sarah & Rahav, Giora. (Tel Aviv U, Israel) **Interaction in violence.** *Human Relations*, 1974(May), Vol 27(5), 417-430.—Examines the process of eruption of violent acts using a stimulus-response interactional model. Data are based on analysis of court records, content analysis of fictional accounts of violence, role-playing, and descriptions of violent experiences by youth leaders. A subjective grading scale was compiled to evaluate levels of intensity of response. Findings suggest that if the meaning or intent of the 1st cycle of interaction

(provocation, reaction, and their relation) is ambiguous, the interaction will tend to escalate in intensity until the meaning is clarified. If it is perceived as provoking, violence erupts; if neutral or friendly, tension diminishes; if still ambiguous, subsequent cycles will be defined as provoking with violent results.—*W. W. Meissner.*

11593. Silver, Burton B. (Florida Atlantic U) **Group success and personal commitment in game simulations.** *Simulation & Games*, 1974(Dec), Vol 5(4), 415-424.—Used modified version of SIMSOC to test the hypothesis that within a game-simulation context, the greater the group success in a goal-oriented pursuit, the greater the personal commitment to the group. 52 Ss were divided into 3 sets of 4 simulated groups each. Limits were covertly placed on the extent of mobility opportunity in 2 groups. One of these groups experienced status threat while the other group experienced mobility blockage. Results of posttest questionnaires supported the hypothesis but found no relationship between commitment to the original group and achievement of personal goals.—*D. E. Anderson.*

11594. Tajfel, Henri. (U Bristol, England) **Social identity and intergroup behaviour.** *Social Science Information*, 1974(Apr), Vol 13(2), 65-93.—Accepts the frustration-aggression hypothesis of group hostility based upon conflicts but focuses on intergroup relations and not individual behavior. In-group, out-group distinction is necessarily based on belonging. To relate self to group the individual uses categorization, identity, comparison and psychological distinctiveness. It is the awareness of the existence of categories which generates the in-group response, not necessarily past hostility nor objective conflict. Identity within a group is either secure and of lasting nature with change not likely, or insecure and subject to change. Data are cited to indicate that psychological distinctiveness may be enhanced to bolster high status, insecure, group identification. Low status identity, which cannot be changed, leads to defenses, redefinition of groups or the search for change in the situation, or new identity. In these research continuities the individual acts in relation to clearly dichotomized social groups. Self identification is subordinated by the nature of the experimental designs. In the assignment of rewards to unknown parties, Ss respond to the group dichotomies and to permanence of group affiliation, whenever they are aware of the comparisons of differing groups. (54 ref)—*R. J. Anderson.*

11595. Weight, David G. (Brigham Young U) **Interviewer's locus of control and conditioning of interviewee's self-reference statements.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1307-1316.—Conducted a study of 40 male and 40 female undergraduates to explore the relationship between an interviewer's perceived personal control and his effectiveness as a social reinforcer during control and his effectiveness as a social reinforcer during a free verbalization in an interview. The design was a  $2 \times 2 \times 2$  factorial experiment. The experimental variables were the locus of control of both interviewers and Ss, reinforced response class, and sex. Ss were reinforced for the emission of either positive or negative self-references. The following results were obtained: (a) internal interviewers were generally more effective than external interviewers in eliciting positive self-references, (b) verbal reinforcement increased the emission of positive self-

references, (c) negative self-references were relatively unaffected by either internal or external interviewers, (d) internal interviewers had maximum influence when Ss were male, and (e) internal interviewers were significantly more confident about the quality of their relationship with Ss. (17 ref)—*Journal abstract.*

11596. Westfall, Michael P.; Schatzberg, Alan F.; Blumetti, Anthony B. & Birk, C. Lee. (Harvard U, Medical School, Boston) **Effeminacy: II. Variation with social context.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 43-51.—Videotaped 19 Ss while participating in 4 encounter groups, of which 2 were homosexual and 2 heterosexual. There were large situational variations in expressivity of effeminacy during group meetings. High-frequency levels of effeminate responses were observed to parallel high levels of anxiety or anger. At other times, effeminate responses were observed which seemed to subserve sexual signaling functions or which seemed related to narcissistic retreat (self-cuddling) or castration anxiety (e.g., cupping the genitals). Interrater reliability with the authors' Effeminacy Scale for 2 nonprofessional raters viewing the same videotaped material from the group was .93.—*Journal abstract.*

#### Social Perception & Motivation & Attitudes

11597. Bailey, Roger C. & Helm, Bob. (East Tennessee State U) **Matrimonial commitment and date/ideal-date perceptions.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1245-1246.—Results of perceived intelligence ratings on Date and Ideal Date scales made by college student dating couples were significantly correlated for engaged Ss but not for occasional or steady daters. Results suggest that perceptions of the date's intelligence was similar to an ideal when marriage was contemplated, as hypothesized.

11598. Bell, Paul A. (Purdue U) **Interpersonal attraction as a joint function of primacy and recency effects.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 113-116.—Studied empirical primacy-recency inconsistencies between D. Byrne's reinforcement affect model of attraction and N. H. Anderson's information integration model of personality impression formation. 36 male and female undergraduates gave attraction responses to sequences of blocks of similar and dissimilar attitudes arranged in increasing or decreasing proportions of similarity and increasing or decreasing levels of topic importance. Results generally support the hypothesis that attraction is a joint function of the proportion of similar attitudes within each block (recency) and cumulative proportion of similar attitudes before each response (primacy). This joint occurrence of primacy and recency effects was interpreted in terms of an affect neutralization hypothesis. (17 ref)—*Journal abstract.*

11599. Buckhout, Robert. (Brooklyn Coll, Ctr for Responsive Psychology, City U New York) **Eyewitness testimony.** *Scientific American*, 1974(Dec), Vol 231(6), 23-31.—Discusses factors which limit a person's ability to give an accurate description of events he witnessed and of the people involved. Sources of unreliability are frequently inherent in the original situation, in the witness himself, and in the circumstances attending the attempt at information retrieval. Reported research



documents the unreliability of eyewitness testimony.—P. Tolin.

11600. Cladini, Robert B. et al. (Arizona State U) **Reciprocal concessions procedure for inducing compliance: The door-in-the-face technique.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 206-215.—Conducted 3 experiments to test the effectiveness of a rejection-then-moderation procedure for inducing compliance with a request for a favor. Ss were a total of 202 passersby on a university campus. All 3 experiments included a condition in which a requester first asked for an extreme favor (which was refused to him) and then for a smaller favor. In each instance, this procedure produced more compliance with the smaller favor than a procedure in which the requester asked solely for the smaller favor. Additional control conditions in each experiment support the hypothesis that the effect is mediated by a rule for reciprocation of concessions. Several advantages to the use of the rejection-then-moderation procedure for producing compliance are discussed. (15 ref)—*Journal abstract*.

11601. Cook, Mark & Smith, Jacqueline M. (University Coll Swansea, Wales) **Group ranking techniques in the study of the accuracy of interpersonal perception.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 427-435.—Conducted 3 experiments with a total of 124 students to examine theoretical and methodological problems in the study of the accuracy of interpersonal perception. It is suggested that one set of problems, known "Cronbach's components," arise from the use of arbitrary numerical scales, and the other—response set artifacts—arise from uneven distributions of responses on multiple-choice questionnaires or in rating scales. It is also suggested that a group ranking technique—in which Ss within a group rank each other on a continuous dimension—will avoid both these sets of artifacts. Preliminary data, using the 4 dimensions of extraversion, neuroticism, authoritarianism, and intelligence, indicate that Ss ranked others on extraversion with some accuracy but were poor at ranking others on intelligence and neuroticism. Their success at ranking others for authoritarianism depended on the spread of authoritarianism scores. The significance of these results is discussed. (26 ref)—*Journal abstract*.

11602. Fink, Edward L. et al. (Michigan State U) **The effects of family occupational type, sex, and appeal style on helping behavior.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 43-52.—Used a campus blood donation drive to examine the variables of family occupational type as a milieu for the socialization of altruism, appeal style stressing equity or dependency, and sex-role attitude (traditional and nontraditional) in influencing helping behavior. Ss were 63 undergraduates. No effects were found for family occupational type dichotomized as bureaucratic and entrepreneurial. Males but not females responded to an appeal based on equity more than to an appeal based on the dependency of others. Among Ss of both sexes with nontraditional sex-role orientation, response to both appeals was similar, while among those of traditional sex-role orientation, response to the appeal of equity was much greater than to the appeal of dependency. Implications of the current

restructuring of sex roles for altruism are indicated. (18 ref)—*Journal abstract*.

11603. Graham, John R. et al. (Kent State U) **The Home Environment Perception Scales.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 40-49.—Constructed and used 4 forms of the Home Environment Perception Scales with expatrients and informants to describe the expatrients' home environment and significant other people in the environment as they relate to the patient. It was found that expatrients and informants utilized very similar dimensions in describing the environment. Factor analysis results show that 5 scales were underlying the 2 forms for assessing the home and 7 scales underlying the 2 forms for assessing significant other people. In addition, when factor scores for 366 expatrients and informants were compared, similarity between perceptions of home were found, supporting the results of earlier correlational analysis.—R. S. Albin.

11604. Hamm, Norman H.; Baum, Michael R. & Nikels, Kenneth W. (U Nebraska, Omaha) **Effects of race and exposure on judgments of interpersonal favorability.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 14-24.—2 experiments replicated and extended the "mere exposure" effect across the variables of race, sex, and level of initial favorability. Both experiments employed a between-Ss design in which 40 white undergraduates rated their favorability toward 20 photographs, 10 of black and 10 of white college graduates. The initial exposure sequence was followed by 10 repetitions of each photograph for experimental Ss and an inverted alphabet printing task for control Ss. During the posttest all Ss again rated the photographs. Irrespective of race and sex of photograph or initial level of favorability, exposure functioned to enhance interpersonal attractiveness in both experiments. (18 ref)—*Journal abstract*.

11605. Hendrick, Clyde. (Kent State U) **Bibliography of research on impression formation and related topics.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 128.

11606. Houston, B. Kent & Warner, Marsha O. (U Kansas) **Reducing stress by counterattitudinal advocacy.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 350-360.—In an experiment with 44 male undergraduates, 1 group of Ss were made apprehensive by being threatened with shock and then were induced to publicly argue that they were not apprehensive about the situation. Apprehension was measured by the Affect Adjective Check List. It was hypothesized that the Ss who were induced to advocate a position contrary to their feelings about the situation would experience dissonance. To reduce dissonance, these Ss were expected to redefine the situation as less threatening and thereby experience less apprehension regarding the situation than subjects in a control threat condition. Results of physiological measures and a postexperimental questionnaire support the expectations. (24 ref)—*Journal abstract*.

11607. Innes, John M. & Young, Roger F. (U Edinburgh, Scotland) **The effect of presence of an audience, evaluation apprehension and objective self-awareness on learning.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 35-42.—Tested social

facilitation and objective self-awareness theories of audience effects on individual performance by having male and female undergraduates perform a learning task (mirror drawing) (a) either alone or before a nonevaluative audience, (b) before a mirror or not, and (c) either with or without an emphasis on the evaluation of individual performance. Results suggest that the presence of an audience with little explicit evaluative function produces slower performances than those of Ss behaving alone. This occurred even in the condition which minimized the importance of the S's own performance. Data support a hypothesis of the anticipation of outcomes rather than one which suggests that mere presence results in a general quickening of behavior. Evidence also indicates that an audience and a mirror combine to produce a pattern which supports neither the social facilitation or objective self-awareness theories.—L. Gorsev.

11608. Jacobson, Dan. (Tel-Aviv U, Israel) **Rejection of the retiree role: A study of female industrial workers in their 50's.** *Human Relations*, 1974(May), Vol 27(5), 477-492.—Studied attitudes toward retirement among 145 male (mean age 60.2 yrs) and 70 female (mean age 56.8 yrs) semiskilled factory workers in the vicinity of London. Female Ss were less favorable to retirement than males; work-based social ties were the chief correlate of the wish to continue working. Implications for retirement policies, particularly earlier retirement age for women, are discussed. (23 ref)—W. W. Meissner.

11609. Johnson, David W. (U Minnesota) **Cooperativeness and social perspective taking.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 241-244.—The ability to take the perspective of other individuals is commonly assumed to be one of the most important aspects of cooperative interaction. While a number of theorists have posited that cooperativeness and social-perspective-taking are highly related, there is no direct evidence confirming such an assumption. In the present study, 24 4th graders were given a series of tasks indicating predisposition to cooperate and ability to take the perspective of other individuals both physically and emotionally. Results indicate that there was no relationship between predisposition to cooperate and ability to take the physical perspective of other individuals, but there was a strong relationship between predisposition to cooperate and ability to take the emotional perspective of other individuals. No relationship was found between ability to take the physical and emotional perspective of other individuals. Results confirm a basic theoretical assumption in cooperation theory and empirically link the research and theory on cooperation and social development.—*Journal abstract.*

11610. Johnson, Douglas A. (U California) **Equity theory and overpayment: The behavior of children of differing socioeconomic backgrounds.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 186-187.

11611. Krebs, Dennis & Adinolfi, Allen A. (Simon Fraser U, Burnaby, British Columbia, Canada) **Physical attractiveness, social relations, and personality style.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 245-253.—Investigated the relationship between physical attractiveness, social contact with members of the same and opposite sex, and personality

factors, using 60 male and 60 female university freshmen who were rejected, accepted, or unknown to their same-sex peers. A reliable rating of physical attractiveness by independent judges showed that rejected Ss were most attractive, accepted Ss were next most attractive, and unknown Ss were least attractive. There was a positive relationship between physical attractiveness and dating for females, but not for males. A factor analysis of Ss' scores on personality inventories (e.g., the Jackson Personality Research Form) and subsequent analyses of variance of personality factors by sociometric groups showed that rejected Ss of both sexes were independent, achieving, and ambitious; accepted Ss were affiliative and affectionate; and isolated Ss were emotionally constricted, defensive, and withdrawn. (17 ref)—*Journal abstract.*

11612. Kriss, Mitchell; Indenbaum, Eugene & Tesch, Frederick. (Princeton U) **Message type and status of interactants as determinants of telephone helping behavior.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 856-859.—Used the wrong telephone number technique to investigate the emotional tone or impact of the help-seeking message as a variable mediating the help seeker and potential benefactor interaction. Help seekers of high, low, or ambiguous status delivered 1 of 3 messages (positive appeal, negative appeal, or simple request) to 432 adult Ss of either high or low status. The frequency of the requested helping response was significantly affected by the message variations, but this effect was confounded by a significant Subject Status  $\times$  Help-Seeker Status  $\times$  Message Type interaction. Data also reveal that the message effect was limited to the ambiguous-status caller and opposite-status conditions.—*Journal abstract.*

11613. Kuehn, Lowell L. (U California, Riverside) **Looking down a gun barrel: Person perception and violent crime.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1159-1164.—Studied police reports of 100 crimes (2 homicides, 22 rapes, 15 assaults, and 61 robberies) in which the victim provided a description of the suspect who was unknown to him. Data show that the perception of a criminal assailant (as indicated by the completeness of description) is dependent on several variables related to characteristics of the crime and the victim. Taken from the perspective of person perception, these data suggest that perceiving and describing an object "in the field" may be influenced by a variety of conditions such as type of offense and the spatial and temporal characteristics of the act. Moreover, certain types of victims possessed differential capabilities for making identifications which might lead to an arrest.—*Journal abstract.*

11614. L'Armand, Kathleen & Pepitone, Albert. (Widener Coll) **Helping to reward another person: A cross-cultural analysis.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 189-198.—Conducted a series of studies to confirm several motivational tendencies theoretically expected to determine how much an individual maximizes reward for another peer (other-rewarding as distinguished from other-relieving "altruism"), for himself, and for himself or another. Since these hypothesized motives (e.g., need for achievement, the norm of social responsibility, and the value of



equity) are likely to be affected by the larger cultural value system, a total of 172 male college students from widely different cultures—India and the US—were compared with respect to their disbursement of rewards to another and to self. Results indicate that American Ss rewarded another peer more than they rewarded themselves, while Indian Ss rewarded themselves more than they rewarded another peer. Such marked helping on the part of American Ss was limited to the case where nothing could be lost in doing so. When Ss could lose in proportion to how much the other gained, the altruistic tendency vanished, presumably because of the competitiveness engendered in such a zero-sum reward structure. The low level of helping by Indian Ss suggests a "quasi" competitiveness (since objectively nothing could be lost in rewarding another) engendered by a world view of limited resources. Questionnaire data confirm this conjecture by showing that the lower the income of the Ss' families, the lower the level of maximizing reward for another. Finally, non-Brahmin Ss rewarded a Brahmin peer less than did Brahmin Ss, supporting the view that quasi competitiveness is attenuated when the other is an ingroup member and/or the norm of social responsibility (operating at a comparatively low level in Indian Ss) is restricted to ingroup members. (17 ref)—*Journal abstract*.

11615. MacCorquodale, Donald W. (U South Florida, Medical School) **Sex differentials among family planning physicians in the Philippines.** *Health Services Reports*, 1973(Dec), Vol 88(10), 963-967.—Analyzed data collected from 200 Philippine family planning physicians. The 97 men were somewhat older than the 103 women, had more living children, and desired more children although there was no significant difference in marital status. The mean numbers of family planning acceptors recruited by men and by women were not significantly different. However, women physicians inserted a significantly higher proportion of intrauterine devices. More women than men cited tubal ligation as the contraceptive method they least preferred, and more men than women cited vasectomy as the least preferred method. Otherwise, no differences appeared between men and women physicians as to most and least preferred contraceptive methods, degree of concern about population growth, knowledge of contraception, or attitude toward contraception.—*R. S. Albin*.

11616. Miller, Gerald R. & McReynolds, Michael. (Michigan State U) **Male chauvinism and source competence: A research note.** *Speech Monographs*, 1973(Jun), Vol 40(2), 154-155.—Conducted a study with 69 male and 40 female undergraduates to test the hypothesis that if all other source qualifications and the message content are held constant, receivers will rate a male communicator as more competent than a female communicator. The predicted male chauvinistic effect was observed, and the effect was somewhat more pronounced for female receivers than for male receivers.—*Journal abstract*.

11617. Moriarty, Thomas. (New York U) **Crime, commitment, and the responsive bystander: Two field experiments.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 370-376.—In 2 field experiments it was demonstrated that bystanders ( $N = 72$ ) more readily intervened to stop a theft if they had committed

themselves in advance to the victim. During the summer of 1972, thefts were staged (a portable radio taken from an unattended beach blanket) at Jones Beach, New York. Ss agreeing to watch the victim's belongings were more likely to notice the theft, and among those noticing, committed Ss were more likely to stop the theft. Similarly, thefts were staged at Automat cafeterias in New York City (a suitcase taken while the owner was absent). Again, committed Ss were more likely to stop the theft. Results support the notion that while conflict often prevents bystanders from intervening, prior commitment simplifies the decision process and produces a more responsive bystander.—*Journal abstract*.

11618. Moscovici, Serge & Nève, Patricia. (Ecole Pratique des Hautes Etudes, Paris, France) **Studies on polarization of judgments: III. Majorities, minorities and social judgments.** *European Journal of Social Psychology*, 1973, Vol 3(4), 479-484.—Studied the cognitive and interactional aspects of the shift from individual (preconsensus) to group (consensus) judgment of person perception and social judgment. Ss were 24 high school students in a private Catholic school who were given the Repertory Grid Test of 15 well-known personalities—scientists, political figures, actors, and artists. Each S was asked to select the most common of 3 personalities to the exclusion of a third. In the 2nd phase, group consensus was to be reached by the same procedure. Results show that polarization occurred after group interaction, and group criteria were less idiosyncratic and moralistic than individual judgments. In most group judgments the group adopted the pattern chosen by 2 or 3 individuals in the preconsensus phase, although a few individual judgments prevailed when there was no agreement in the preconsensus phase. It is concluded that decisions followed the common norm that emerged from the preconsensus phase.—*M. K. Phifer*.

11619. Payne, David E. (U Iowa) **Alienation: An organizational-societal comparison.** *Social Forces*, 1974(Dec), Vol 53(2), 274-282.—Studied the relation between comparable composite measures of powerlessness felt toward the work organization and toward society and a modified version of R. Blauner's occupational typology (1964) using data from 546 workers in 4 companies. Results show that (a) the degree of powerlessness workers felt in their work organization and in their society was not related to their type of work, and (b) there were no significant differences in the degree of powerlessness which workers felt in their work organization and in their society. (29 ref)—*Journal abstract*.

11620. Raben, Charles S.; Wood, Michael T.; Klimoski, Richard J. & Hakel, Milton D. (Ohio State U) **Social reinforcement: A review of the literature.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 186.

11621. Rim, Y. (Technion-Israel Inst of Technology, Haifa) **Perception of self and others in four situations.** *Interpersonal Development*, 1973-1974, Vol 4(3), 164-169.—Conducted a study to determine whether self-perception and perception of significant others would differ according to varied situations. Ss were 34 male and 46 female 6th-formers in Great Britain (mean age = 17 yrs). Ss were asked to rate themselves on 8 constructs (e.g., warm-cold) in 4 situations: (a) engaged in work, (b)





ty and subsequent social categorization, not attraction. (15 ref)—*Journal abstract*.

11628. Steele, Claude M. (U Washington) **Name-calling and compliance.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 361-369.—Results of 2 experiments with a total of 221 housewives support the prediction that name-calling, by conveying a negative judgment, would enhance Ss' willingness to comply and their actual compliance with a later request for help. Negative names produced more compliance behavior than positive names. Also, whether or not the negative name was related to the help request made no difference in the percentage of Ss who agreed to comply. Exp II also demonstrated that it was the name's impugning of the S's general character and not its impugning of a specific behavior that was needed to increase later compliance. Implications for experiments using negative judgments as independent variable manipulations and for the relationship between self-esteem and consistency processes are discussed. (16 ref)—*Journal abstract*.

11629. Taylor, Stuart P. & Smith, Ian. (Kent State U) **Aggression as a function of sex of victim and male subject's attitude toward women.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1095-1098.—Investigated the relative aggressiveness of 40 undergraduate males who held either liberal or traditional beliefs concerning females as a function of provocation by male and female opponents. Both groups of male Ss reacted aggressively to provocation by male opponents and unaggressively to female opponents. The traditional male Ss were generally more aggressive to their opponents than the liberal male Ss.—*Journal abstract*.

11630. Tesser, Abraham & Conlee, Mary C. (U Georgia, Inst for Behavioral Research) **Some effects of time and thought on attitude polarization.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 262-270.—Conducted 3 experiments with a total of 211 college students to examine the effects of thought on attitude change. It was predicted that (a) thought produces a change in attitude so as to make it more extreme in the initial direction (i.e., polarization); and (b) the longer one thinks about the attitude object, the greater the tendency toward polarization. In Exps I and II the attitude objects were drawn from a heterogeneous attitude questionnaire; in Exp III they were news-type photos. Hypothesis (b) was tested over the following thought durations: 30, 60, 90, and 180 sec in Exp I; 45, 60, 90, and 180 sec in Exp II; and 28 and 60 sec in Exp III. Exps II and III also had "no-thought" conditions, thereby permitting a test of Hypothesis (a). Using whether or not an attitude became more polarized as the dependent variable, Hypothesis (b) received significant support in all 3 experiments, and Hypothesis (a) was supported only in Exp III.—*Journal abstract*.

11631. Worthington, Mary E. (Pepperdine U) **Personal space as a function of the stigma effect.** *Environment & Behavior*, 1974(Sep), Vol 6(3), 289-294.—Tested whether the distance between S and E would increase if E had a highly visible stigma. Ss were males and females (other than highly gravid women, children below adolescence, and physically distressed persons), selected at random in an airport lobby. E hailed each S and asked for directions. 29 control Ss were contacted by a

"normal" E and 34 experimental Ss were contacted by an E simulating a physical disability. Distance of approach and time spent in the encounter were recorded. Distances were significantly greater in the experimental condition (mean = 19.5 in) than in the control condition (mean = 10.4 in). There was no difference in time spent in the encounter.—S. T. Margulis.

11632. Zanna, Mark P.; Goethals, George P. & Hill, Janice F. (Princeton U) **Evaluating a sex-related ability: Social comparison with similar others and standard setters.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 86-93.—Tested L. Festinger's (1954) hypothesis that when people evaluate an ability they prefer to compare with others similar on characteristics related to performance vs the hypothesis that they prefer to compare with best-off others or standard setters. In a 2 × 2 design 30 male and 30 female undergraduates received ambiguous feedback about their performance on a test of an intellectual ability on which they believed either males or females excelled. Virtually all Ss first chose a same-sex reference group with which to compare and thus gave strong support to Festinger's similarity hypothesis. Ss in conditions where the opposite sex excelled switched more often to an opposite-sex reference group on their 2nd choice, indicating that comparing with standard setters is a secondary comparison priority. No sex differences were expected or found.—*Journal abstract*.

11633. Zillmann, Dolf; Mody, Bella & Cantor, Joanne R. (Indiana U, Inst for Communication Research, Radio-TV Ctr) **Empathetic perception of emotional displays in films as a function of hedonic and excitatory state prior to exposure.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 335-349.—A film clip depicting a young couple in a dysphoric encounter was seen following 1 of 4 film segments that were selected and pretested with 16 female undergraduates to effect a factorial variation in (a) hedonic tone (positive, negative) and (b) excitatory potential (low, high). Reactions to the subsequent film were assessed via ratings to test predictions from excitation-transfer theory and to determine sequential effects in hedonically valued experiences. In Exp I with 42 female undergraduates, the subsequent film was viewed immediately after the antecedent film. A nearly significant distraction effect of excitation occurred; affective responses to the subsequent film were less intense following high-excitation films than following low-excitation films. In Exp II with 120 female undergraduates, the procedure employed in the interval between films was changed to foster close attention to the subsequent film. An excitation-transfer effect was observed, with the dysphoric encounter being perceived as sadder after high-excitation films than after low-excitation films. In both experiments, hedonic-set effects were also observed. (16 ref)—*Journal abstract*.

## COMMUNICATION AND LANGUAGE

11634. Alloni-Fainberg, Yafa. (Haifa School District, Israel) **Official Hebrew terms for parts of the car: A study of knowledge, usage and attitudes.** *International Journal of the Sociology of Language*, 1974, No 1, 67-94.

—Studied the acquisition and usage of Hebrew terms and attitudes toward the terms. Both demographic and place-of-learning predictors are considered.

11635. Baars, Bernard J. & Motley, Michael T. (U Wisconsin, Milwaukee) **Spoonerisms: Experimental elicitation of human speech errors.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 118.

11636. Bell, Wendell. (Yale U) **A conceptual analysis of equality and equity in evolutionary perspective.** *American Behavioral Scientist*, 1974(Sep-Oct), Vol 18(1), 8-35.—Examines definitions of equality and equity, and the evolutionary interpretations of the causes and effects of long-term changes in each. (48 ref)

11637. Berger, Arthur A. (California State U, San Francisco) **Drug advertising and the "pain, pill, pleasure" model.** *Journal of Drug Issues*, 1974(Sum), Vol 4(3), 208-212.—Describes the socialization impact of TV drug advertising on American drug abuse. A restructuring and redirecting of current advertising practices is advocated.

11638. Best, Roger J. (U Oregon) **An experiment in Delphi estimation in marketing decision making.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 448-452.—Tested 4 hypotheses derived from the Delphi process (a method of anonymous estimation) to compare the accuracy of judgments made by self-rated experts and nonexperts when feedback precedes or follows estimates, and when written explanations are or are not required. Results demonstrate the importance of selectively separating experts from nonexperts on any given judgment task, and replicate the Delphi effect of convergence following feedback. (18 ref)

11639. Black, Stephen A. **Journeys into chaos: A psychoanalytic study of Whitman, his literary processes and his poems.** *Literature & Psychology*, 1974, Vol 24(2), 47-54.—Discusses some of Walt Whitman's poems in relationship to the depression and neurotic anxiety that plagued him for much of his life. These creative works are viewed as reactivating narcissism and internal conflicts, and the stages in his writing are matched with stages in his emotional development.

11640. Bode, Loreli. (U Nevada) **Communication of agent, object, and indirect object in signed and spoken languages.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1151-1158.—Used a picture-description task to study the comparative effectiveness of communication between 16 deaf, undergraduate, native users of American Sign Language, and 16 hearing undergraduates using spoken English. Within the 2 groups, paired Ss alternately described pictures to each other. Pictures illustrated 3 different characters assuming in turn the roles of agent, object, and indirect object. Following a description by S<sub>1</sub>, S<sub>2</sub> selected the picture he or she thought S<sub>1</sub> had described, from a set of 6 pictures containing the described picture. The frequency of errors did not differ significantly between signing and speaking Ss.—*Journal abstract*.

11641. Bonfield, E. H. (U Alabama) **Attitude, social influence, personal norm, and intention interactions as related to brand purchase behavior.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 379-389.—Tested D. E. Dulany's 1968 theory of propositional control (originally concerned with verbal conditioning and concept learning) and its adaptation by M. Fishbein to include relationships between attitudes and behavior within a

marketing field setting. Purpose was to (a) extend the theory's usefulness for consumer brand purchase behavior and (b) examine the relative importance of attitude, social influence, personal norm, and intention among purchasers in general and among purchaser segments. Data from a questionnaire survey of 261 consumers who had previously purchased the product class (soft drinks) indicate that the importance of social psychological influences on consumer behavior varies according to the situation. The hypothesis that influences of attitude, social influence, personal norm, and intention are situation-bound was strongly supported. Evidence also suggests that consumer brand choice is a stochastic process. The usefulness of the Dulany-Fishbein theories and their resultant methodologies is also discussed. (33 ref)—*L. Gorsey*.

11642. Braren, Warren. (Consumer's Union, Mount Vernon, NY) **Deception in advertising and the failure of self-regulation.** *Journal of Drug Issues*, 1974(Sum), Vol 4(3), 213-216.—Describes the impact of deceptive advertising for over-the-counter drugs on the unnecessary expansion of the market for health products and on the promotion of insignificant product differences. Industry self-regulation attempts are considered inadequate.

11643. Brenner, Sten-Olof & Hjelmquist, Erland. **Psycholinguistics: Foundations and research approaches. I: From de Saussure (1916) to Chomsky (1957).** *Göteborg Psychological Reports*, 1974, Vol 4(3), 21 p.—Presents a critical review of psycholinguistic research and research foundations, including research based on N. Chomsky's 1957 theory. The Whorfian hypothesis is discussed in view of recent proposals from psycholinguistic researchers. The influence that linguistic theories have had on research approaches is traced and criticized, and suggestions are made as to what should most interest psychologists studying the production and understanding of speech. An outline of the development of linguistic theory is also presented, with emphasis on the works of F. Saussure (1916), L. Hjelmslev (1943), and N. Chomsky (1957). It is concluded that linguistic theory has led psychologists to concentrate on highly artificial situations that bear little resemblance to everyday communication. When using more natural situations, psycholinguistics gets results that cannot be accounted for by a linguistic approach based on theories such as that of Chomsky. (3½ p ref)—*Journal abstract*.

11644. Brink, A. W. (McMaster U, Hamilton, Ontario, Canada) **Hermann Hesse and the Oedipal quest.** *Literature & Psychology*, 1974, Vol 24(2), 66-79.—Discusses the effect of psychoanalysis on 20th century fiction and especially on the writings of Herman Hesse. Hesse is presented as a seeker after truth, as a pacifist, and as a writer who penetrated the modern obsession with survival of individual egos in an ever expanding and disorienting society. It is noted that Hesse is often misinterpreted to be encouraging escapism, but that he actually followed as far as possible the most valuable precept of psychoanalysis that unconscious material shall become conscious. Thus, the neurotic's greatest benefit in culture is to expose unconscious contents in order to reintegrate them in the ego so that all may see how it is managed. Art is seen as the most agreeable way



to communicate this process. All of Hesse's major works are discussed.—*R. S. Albin.*

11645. Carringer, Dennis C. (Winchester Public School System, Winsted, CT) **Creative thinking abilities of Mexican youth: The relationship of bilingualism.** *Journal of Cross-Cultural Psychology*, 1974(Dec), Vol 5(4), 492-504.—Examined the relationship of bilingualism to the creative thinking abilities of Mexican youth by administering 4 subtests from the Torrance Tests of Creative Thinking to 12 Spanish-English coordinate bilingual and 12 Spanish monolingual high school Ss. It was hypothesized that the Spanish-English coordinate bilinguals would score significantly higher on the dependent measures of figural fluency, figural flexibility, figural originality, verbal fluency, verbal flexibility, and verbal originality than the Spanish monolinguals. A multivariate analysis indicates that the main effect of language group was significant in favor of the bilinguals. Neither the main effect of sex nor the interaction effect was significant. Univariate analysis indicates that the dependent measures of verbal flexibility, verbal originality, and figural originality were significant at the .05 level in favor of the bilinguals, and the dependent measure of figural fluency was significant at the .01 level in favor of the bilinguals. (22 ref)—*Journal abstract.*

11646. Choynowski, Mieczyslaw. **A proposal for a new type of information about psychological measures.** *Educational & Psychological Interactions*, 1974(Nov), No 49, 13 p.—Argues that, in spite of the existence of many sources of information, the task of getting an exhaustive list of available psychological test instruments for some definite purpose is formidable. Ideas are presented for an improved information system in the form of a periodical publication to be called the *Test Compendium*. 3 main elements of this system are (a) the type of publication and its format, (b) a test description scheme, and (c) a test classification scheme. (35 ref)—*Journal abstract.*

11647. Claxton, John D.; Fry, Joseph N. & Portis, Bernard. (U British Columbia, Vancouver, Canada) **A taxonomy of prepurchase information gathering patterns.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 35-42.—Used numerical taxonomic analysis to classify furniture and appliance buyers in terms of their prepurchase search behavior. Data were obtained from personal interviews with 546 Canadian housewives; questions concerned 5 aspects of prepurchase shopping activities—type and range of alternatives considered, information sources used, features considered, stores visited, and time spent considering the purchase. 3 measures were found to generate clusters which were both distinctive and comparable across sample split halves—number of information sources, total visits to stores, and deliberation time. 3 general clusters were identified in both the furniture and appliance buyer samples and were labeled as thorough (store intense), thorough (balanced), and nonthorough on the basis of group average measures on the discriminating variables. Results suggest that for a particular amount of deliberation, there may be trade-offs in the balance of attention given to different aspects of the purchasing process, and that in a particular search period, buyers may gather substantially different amounts of information. (16 ref)—*L. Gorsey.*

11648. Conville, Richard L. (U Massachusetts, Amherst) **Linguistic nonimmediacy and communicators' anxiety.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1107-1114.—Linguistic nonimmediacy refers to the degree of verbal indirectness with which a person refers to himself or to that about which he communicates. Current research on linguistic nonimmediacy indicates that this indirectness of verbal reference increases as the speaker experiences increased negative affect. 24 undergraduates were used in the present study to test the reliability of this finding in a nonlaboratory setting and using a within-Ss design. Results of previous research were replicated, and the argument is advanced that nonimmediacy analysis of Ss' language can be a legitimate substitute for conventional paper-and-pencil attitude tests. (19 ref)—*Journal abstract.*

11649. Cox, Eli P.; Anderson, W. Thomas & Fulcher, David G. (U Texas, Austin) **Reappraising mail survey response rates.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 413-417.—Examined (a) the main and interaction effects among personalized cover letters, follow-up postcard reminders, and mail questionnaire response rate; and (b) the question of response reliability under limitations of budget, time, and sample size. Results show that personalized letters had significant positive effects on response rate, while follow-up reminders did not, regardless of personalized/nonpersonalized cover letters, and emphasize the importance of examining cost considerations in designing a mail survey.—*L. Gorsey.*

11650. Darden, William R. & Flaschner, Alan B. (U Georgia) **Visual presentation of marketing stimuli defined in hyperspace.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 456-461.—Describes MULDI-PLOT, a method of visually analyzing and grouping, in hyperspace, data derived from multidimensional scaling and cluster analysis. The approach, in which points are depicted as lines, allows the proximity of multivariate points to be examined visually on a single plot, and in addition, subspaces, containing critical dimensions of differences among stimuli defined in hyperspace, can be isolated from the original space. (25 ref)

11651. Derks, Peter L. & Johnston, Becky. (Coll of William & Mary) **Effect of translation and transformation on recognition of sentences.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1269-1270.—Studied 16 English speakers who had lived in France and spoken French for at least 1 semester to examine the interaction between the recognition of transformed and translated sentences. No interaction appeared when the task included English-active sentences.

11652. Duncan, Starkey. (U Chicago) **On the structure of speaker-auditor interaction during speaking turns.** *Language in Society*, 1974(Oct), Vol 3(2), 161-180.—Studied the structure of speaker-auditor interaction during speaking turns, using detailed transcriptions of language, paralanguage, and body-motion behaviors displayed by both participants in dyadic, face-to-face conversations. On the basis of certain observed regularities in these behaviors, 3 signals were hypothesized: (a) a speaker within-turn signal, (b) an auditor back-channel signal, and (c) a speaker continuation signal. These signals were composed of various behaviors in language

and in body motion. It is suggested that the display of appropriate ordered sequences of these signals by both participants served to mark "units of interaction" during speaking turns. Results suggest the possibility of extending the analytic approach to language to the development of information about communication behavior in general.—*Journal abstract.*

11653. Evanechko, P. O.; Armstrong, R. D. & McFetridge, Patricia A. **Semantic space and the development of word meaning.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 305-315.

—Argues that from cumulative experiences which focus attention on the many ways in which words can have meaning, and on the many logico-semantic relations between words and their significates, each person builds a unique multidimensional meaning space. New words are processed in terms of the dimensions existing in the individual's meaning space. Development of verbal ability, therefore, should involve learning of ways of knowing concepts rather than learning words as undifferentiated entities, and these semantic associations should be organized into broader strategies of perceiving meaning to reduce the information processing load.—*Journal abstract.*

11654. Gordon, Andrew. (U California, Berkeley) **Why are we in Vietnam? Deep in the bowels of Texas.** *Literature & Psychology*, 1974, Vol 24(2), 55-65.—Presents a psychoanalytic review of Norman Mailer's books: *Why are we in Vietnam?*, *An American Dream*, and *Armies of the Night*. Mailer's obsession with disembowelment is viewed in terms of his concern with being attacked internally. The author's appeal is seen to be in his constant war with all his unmastered contradictions and fears.

11655. Higbee, Kenneth L. (Brigham Young U) **What is the "fear" in a fear-arousing appeal?** *Psychological Reports*, 1974(Dec), Vol 35(3), 1161-1162.—Obtained responses of 60 junior high and 126 undergraduates on 5 communications on the dangers of marihuana on 5 measures—fear, anxiety, nausea, worry, and concern. Correlations among measures were significant, but fear, anxiety, nausea, and worry showed high intercorrelations, while concern showed lower correlations with the other measures.

11656. Jefferson, Gail. (U Pennsylvania, Ctr for Urban Ethnography) **Error correction as an interactional resource.** *Language in Society*, 1974(Oct), Vol 3(2), 181-199.—Considers some small errors which occur in 181-199.—Considers some small errors of competence, natural talk, treating them as matters of competence, and both in the production of coherent speech and the conduct of meaningful interaction. Focusing on a rule-governed occurrence of the interjection "uh," a format is described by which one can display that one is correcting an error one almost, but did not, produce. 2 broad classes of error are considered, both of which can be announced by and extracted from the occurrence of an error correction format. These are "production" errors (i.e., a range of troubles one encounters in the attempt to produce coherent, grammatically correct speech) and "interactional" errors (i.e., mistakes one might make in the attempt to speak appropriately to some co-participant(s) and/or within some situation). It is proposed that the error correction format can be used to invoke

alternatives to some current formulation of self and other(s), situation and relationship, and thereby serve as a resource for negotiating and perhaps reformulating a current set of identities.—*Journal abstract.*

11657. Kaniuga, Nancy; Scott, Thomas & Gade, Eldon. (Lenawee County Probate Court, Adrian, MI) **Working women portrayed on evening television programs.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 134-137.—Analyzed the portrayal of work roles on evening TV programs, directing particular attention to the characterization of women. The occupational roles of 140 principal characters from 44 programs on 3 major networks were classified by means of the *Dictionary of Occupational Titles* and US Census Bureau categories. Results show that (a) women make up a smaller proportion of the work force on TV (21.4%) than in real life (37.8%); (b) far fewer working women on TV are married (10%) than in real life (60%); (c) TV overrepresents the proportion of women employed in professional, managerial, and technical categories (53% as opposed to 19.5%); (d) women workers on TV perform largely sex-stereotyped traditional roles; (e) high drama in existing work is usually reserved for TV males; (f) married woman's place on TV is at home. It is suggested that counselors aiding female clients in reality testing and career exploration beyond present boundaries must recognize the inaccuracies of TV portrayals.—C. A. Heikkinen.

11658. Kanter, Donald L. (U Southern California, School of Business Administration) **Research on the effects of over-the-counter drug advertising.** *Journal of Drug Issues*, 1974(Sum), Vol 4(3), 223-226.—Presents the findings of a systematic study of the effect of commercial advertising on drug usage. Advertising is not reported to directly lead to drug abuse, but is considered one of several factors in the social-media environment having a significant influence on an individual's behavior.

11659. Katz, Gary M. & Brophy, Alfred L. (Virginia Polytechnic Inst & State U) **Institutional sources of articles in the Journal of Counseling Psychology, 1962-1973.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 160-163.—Surveys and tabulates institutional affiliations of authors of articles published in Vol 9-20 of the *Journal of Counseling Psychology*. Trends are reported within this 12-yr period, and comparisons are made with earlier surveys.

11660. Kiesler, Charles A.; Pallak, Michael S. & Archer, Richard. (U Kansas) **Commitment of audience, and legitimacy and attitudinal stance of communicator: A test of the "woodwork" hypothesis.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1035-1048.—Based upon an analysis of anecdotal evidence in social reality, an experiment was conducted with 135 undergraduates in which the following were varied: one's prior commitment to consonant behavior, and the legitimacy and attitudinal stance (agree-disagree) of a communicator. Legitimacy of a communicator was defined as independent of his prestige, sincerity, and personal attractiveness, and limited to his qualifications to speak on a specific issue. A variety of measures were taken to define Ss' perceptions of legitimate and illegitimate communicators. Legitimacy tended not to affect uncommitted Ss. Committed Ss responded positively to the legitimate



communicator and negatively ("boomerang") to the illegitimate speaker regarding attitude change, behavior measures, and information-seeking, regardless of the attitudinal stance of the communicator.—*Journal abstract*.

11661. Kornbluth, Ilana & Aynor, Sarah. (Hebrew U, Jerusalem, Israel) **A study of the longevity of Hebrew slang.** *International Journal of the Sociology of Language*, 1974, No 1, 15-37.—Examines factors including the language of origin, category of content, structural characteristics, and selected individual background characteristics of slang users.

11662. Lackner, James R. & Levine, Kenneth B. (Brandeis U) **Speech production: Evidence for syntactically and phonologically determined units.** *Perception & Psychophysics*, 1975(Jan), Vol 17(1), 107-113.—The durational accuracy with which 8 normal university students could speak syntactically structured strings of words was compared with their accuracy in speaking word lists. These measurements underscored the great temporal precision of the human articulatory mechanism which appears to be the most precisely controlled movement system of the human body. Evidence is presented that when a syntactically structured message is being spoken, the centrally programed innervational units involved in its articulatory implementation are greater in size and complexity than when a word list is being spoken. (21 ref)—*Journal abstract*.

11663. Langendoen, D. Terence; Kalish-Landon, Nancy & Dore, John. (City U New York) **Dative questions: A study in the relation of acceptability to grammaticality of an English sentence type.** *Cognition*, 1973, Vol 2(4), 451-478.—Notes that generative grammarians have contended that English sentences of the type Who(m) did you give the book? (what are here called "dative questions") are ungrammatical. The incorporation of the necessary restrictions in the grammar of English to account for this, however, requires a weakening of linguistic theory. It would be desirable, therefore, to account for the restriction within performance theory, as has been proposed by R. Jackendoff and P. Culicover (1971). It is shown that their particular account is inadequate. It was found that in the course of trying to devise a better account, by 2 different questionnaire-type experiments using a total of 48 undergraduates and professional persons in Exp I and 79 undergraduates in Exp II, that some English speakers, all from metropolitan New York City, accept dative questions. On the basis of this finding, it is theorized that the observed variation in acceptability of dative questions is best accounted for by differences in the perceptual strategies for determining the grammatical relations in perceived clauses that different populations of English listeners use. There are thus no dialect differences, strictly speaking, for dative questions; they are all grammatical for all English speakers. (French summary) (19 ref)—*Journal abstract*.

11664. Levelt, W. J. **Formal grammars in linguistics and psycholinguistics: III. Psycholinguistic applications.** The Hague, Netherlands: Mouton, 1974. viii, 206 p.—Presents a 4-chapter discussion which demonstrates how the theory of formal languages and its applications to linguistics have penetrated psycholinguistics. Key chapter topics are: Grammars in Psychology of Lan-

guage, Grammars and Linguistic Intuitions, Grammars in Models of the Language User, and Grammars and Language Acquisition. (12 p ref)

11665. McEwen, William J. & Hanneman, Gerhard. (U Connecticut) **The depiction of drug use in television programming.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 281-294.—Suggests that complete evaluation of antidrug abuse campaigns should examine not only the messages created, but the programming content which makes up the information environment for those receiving the messages. A content analysis of commercial messages, public service announcements, and TV programs shown during prime time indicates that far more messages propose an increase in the use of specified drugs (all licit) than warn of the possible dangers of the abuse of illicit or licit drugs. The most frequently depicted drug on TV is alcohol, generally in a positive context. It is concluded that commercial appeals promoting chemical agent use and programming which largely neglects abuse potentials suggest cautions for the strategy planner and questions for media programmers.—*Journal abstract*.

11666. Monaco, Paul. **The popular cinema as reflection of the group process in France, 1919-1929.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Spring), Vol 1(4), 607-636.—Suggests that persistent themes in popular cinema may be used as a major index of mass fantasy, and demonstrates the significance of some central themes in French cinema during the 1920s to political conditions of the time. Latent collective meanings of films reveal themselves through analysis of manifest film contents. 48 native film productions achieved widespread popularity in France from 1919 to 1929. Collective obsessions (e.g., concern with children and birth, an unconscious group wish reflected in orphan films, and elements of war, violence, and danger) are analyzed in film and in French society.—*J. Carlson*.

11667. Mortensen, C. David & Arntson, Paul H. (U Wisconsin, Madison) **The effect of predispositions toward verbal behavior on interaction patterns in dyads.** *Quarterly Journal of Speech*, 1974(Dec), Vol 60(4), 421-430.—Selected 3 groups of 24 Ss each, significantly different in amount of verbal activity, from 350 Ss who took a 25-item self-report test of Predispositions toward Verbal Behavior (PVB). The hypothesis was formulated and verified that a significant linear trend among levels of intensity would occur on duration of time spent in answering interviewers' questions, the number of words used in answering the questions, the Ss' impressions of their own verbal activity, and interviewer understanding of what the Ss had said. Statistical strategies employed included a  $2 \times 3 \times 2$  split-plot factorial design with an alpha set at .025 for all measures, a  $3 \times 2$  randomized factorial design with an alpha set at .025 for each measure, Scheffe's post-hoc analysis, Omega<sup>2</sup>, and the Grieser-Greenhouse Conservative F value to measure the significance of the interaction of Trials  $\times$  Order. The PVB has consequences that are both stable over time and consistent in a given social setting, and it has implications for efforts to formulate models of communication based upon the interplay between self- and other-directed perceptions of communication.—*H. Ruja*.

11668. **Mulac, Anthony; Hanley, Theodore D. & Prigge, Diane Y.** (U California, Lab for Quantitative Research in Speech, Santa Barbara) **Effects of phonological speech foreignness upon three dimensions of attitude of selected American listeners.** *Quarterly Journal of Speech*, 1974(Dec), Vol 60(4), 411-420.—26 foreign-born and 6 American-born university graduate students recorded impromptu English monologues on audiotape. From these monologues, 16 45-sec samples were selected as most "representative" and presented to 52 middle-aged, middle-class townspeople of both sexes and to 40 university students of both sexes. Ss rated the samples on 22 items of a Speech Dialect Attitudinal Scale (SDAS). Factor analysis identified 3 dimensions of the ratings: Socio-intellectual Status, Esthetic Quality, and Dynamism. Reliability of the data from the SDAS was consistently high, and its construct validity was indicated by the consistency of factor structure across rater groups. Native-born speakers were rated higher than the foreign-born on all 3 dimensions. It is concluded that attitudinal judgments towards speakers are influenced by perceived voice quality. (26 ref)—*H. Ruja*.
11669. **Nakanishi, Masao & Bettman, James R.** (U California, Graduate School of Management, Los Angeles) **Attitude models revisited: An individual level analysis.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 16-21.—Examined models of attitude structure and of attribute importance using regressions for each individual S for data on toothpaste brands. 121 graduate and undergraduate students completed semantic differential scales, with 5 adjective pairs for attitudes toward the act of buying each brand and the evaluative aspects of a given attribute, and 5 pairs for beliefs and the importance of the attribute. Results show that beliefs-only and standard Evaluation  $\times$  Belief models are virtually indistinguishable and that importance has different meanings for different Ss. The inclusion of attributes beyond the most important did not significantly improve predictions. The low-involvement nature of the product class may have influenced the data, however. 3 methodological requirements for future research in multiple-attribute models are outlined. (20 ref)—*L. Gorsey*.
11670. **Peltz, Fillmore K.** (Fiorello H. LaGuardia Community Coll, Middle Coll, City U New York) **The effect upon comprehension of repatterning based on students' writing patterns.** *Reading Research Quarterly*, 1973-1974, Vol 9(4), 603-621.—Investigated whether using repatterning passages affected reading comprehension. 34 10th-grade Ss wrote 1,000 prose words dealing with social studies content. 8 passages were repatterned to approximate the syntactic patterns found in transformational analysis of the Ss' writing using T units and a linguistic analysis worksheet. No significant differences in multiple choice test scores resulted from repatterning, but cloze items based upon repatterned passages showed significantly more correct responses ( $p < .05$ ). It is concluded that syntactic patterns generated by learners are different from those generated by authors. Moreover, comprehension as measured by multiple choice tests may be different from comprehension as measured by the cloze procedure. (French & Spanish summaries) (26 ref)—*E. J. Mason*.
11671. **Ryans, Adrian B.** (U Western Ontario, London, Canada) **Estimating consumer preferences for a new durable brand in an established product class.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 434-443.—Describes a theoretical model for estimating demand for a durable brand at a given price in an established product class. The model assumes that a consumer making a durable purchase selects the brand that will maximize his total satisfaction while meeting his budget constraints. 4 groups of 188 Ss (1 analysis and 3 validation groups) were used to test the model, with electric blenders used as the product class. Ss were told to assume (a) that they had won money greater than the price of any of the brands, (b) that they had to purchase a brand, and (c) that they could retain any change from the transaction. Results support the predictive utility of the model in a laboratory setting. Suggestions for its use in field studies and some recommended modifications are presented. (17 ref)—*L. Gorsey*.
11672. **Schumacher, Sanford P.; Swezey, Robert W.; Pearlstein, Richard B. & Valverde, Horace H.** (Applied Science Assoc, Valencia, PA) **Guidelines for abstracting technical literature on instructional system development.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 113-114.
11673. **Seckbach, Fern.** (Ctr for Educational Research, Jerusalem, Israel) **Attitudes and opinions of Israeli teachers and students about aspects of modern Hebrew.** *International Journal of the Sociology of Language*, 1974, No 1, 105-124.—Examined attitudes toward the effective usage of modern Hebrew by journalists, authors, and intra-Israel ethnic groups.
11674. **Seidenberg, Robert.** (State U New York, Upstate Medical Ctr, Syracuse) **Images of health, illness and women in drug advertising.** *Journal of Drug Issues*, 1974(Sum), Vol 4(3), 264-267.—Reviews the use of derogatory and demeaning images of women in physician-directed drug advertising, and considers the harmful aspects of the use of prescribed psychoactive drugs for children.
11675. **Silberelsen, Rainer K.** (Technische U Berlin, Inst für Psychologie, W Germany) **[Investigations of the effect of frequency limitations on the expressive content of diction.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 637-661.—Used different band filters to limit the frequency range of taped spoken samples collected from 9 students. 33 student Ss judged 99 of the tapes on 10 dimensions—pleasant-unpleasant, fresh-dull, etc. Factor analyses of the results indicated that the frequency restrictions not only failed to diminish the expressive quality of the undistorted voice but sometimes strengthened it. The importance of these findings for electronic synthesis of diction is discussed. (English & French summaries) (43 ref)—*W. J. Kopitz*.
11676. **Smith, Charles B.** (Arizona State U, Coll of Business Administration) **Communication: An essential of reality.** *Personnel Journal*, 1974(Aug), Vol 53(8), 601-605, 625.—Describes communication as a process of exchanging meanings. 3 principles of communications are discussed: (a) What we don't clearly understand, we



can't communicate. (b) Words are both barriers and carriers of meaning. (c) We communicate as we perceive reality.

11677. Stanton, John L. & Lowenhar, Jeffrey A. (Temple U) **A congruence model of brand preference: A theoretical and empirical study.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 427-433.—Presents an individual need-based distance model to explain and predict brand preference. The model is based on the hypothetical symmetry between a consumer's needs and his perception of alternative brands' ability to satisfy those needs: the more a product is perceived as having the ability to satisfy an individual's needs (i.e., the press of the product), the more it will be preferred over similar alternatives. 53 undergraduates were used to predict preference for 6 brands of cars using this need-press model. G. Stern's Activity Index was used to measure both need and press components. Findings suggest that the distance model may be more productive than certain expectancy value models, and demonstrate the model's ability to reproduce the original orderings of the Ss. The usefulness of the model for studying multidimensional motivational levels of consumer behavior is discussed in terms of both individual motives and environmental factors.—L. Gorsey.

11678. Sternthal, Brian & Craig, C. Samuel. (Northwestern U, Graduate School of Management) **Fear appeal: Revisited and revised.** *Journal of Consumer Research*, 1974(Dec), Vol 1(3), 22-34.—Presents a review and analysis of fear appeals, examines their effects on consumer behaviors, and discusses methodological considerations in fear research. 2 basic approaches to fear research are identified—one which involves the presentation of a persuasive message that specifies a dangerous practice and its consequences (e.g., smoking), and the other which elaborates the results of failure to perform certain activities (e.g., dental hygiene). Dependent measures in fear experiments are also described (e.g., behavioral compliance), and it is noted that unlike most attitudinal studies, fear research involves the assessment of Ss' responses on variables other than attitude change or persuasion. Findings on the effect of fear on persuasion, intention, and behavior indicate that fear arousal has greater effects on attitude change than on subsequent intentions or behaviors. Fear drive and parallel response paradigms of the effects of fear arousal, and several moderators of fear (e.g., communicator credibility and audience characteristics) are examined, along with types of fear and contextual effects of fear. (2½ p ref)—L. Gorsey.

11679. Stewig, John W. (U Wisconsin, Milwaukee) **Children's picture preferences.** *Journal of Instructional Psychology*, 1974(Fal), Vol 1(4), 2-8.—Conducted a study to learn what types of illustrations children prefer in the books they look at or read. Ss were 1,078 black and white children of both sexes from lower, middle, and upper social classes. They ranged in grade level from prekindergarten to 6th grade. Ss viewed slides designed to elicit preferences on 5 elements: color, shape, proportion, detail, and space. No overall significant differences were found. Significant interactions were found (a) between grade level and color, detail and space choices; (b) between social class and detail and space

choices; and (c) between racial groups and color detail, space and shape choices. Results indicate that children do prefer different types of pictures; choices are related to factors investigated. Implications are drawn for those who create and choose book illustrations for children.—*Journal abstract.*

11680. Strong, Edward C. (Tulane U) **The use of field experimental observations in estimating advertising recall.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 369-378.—Presents a model of advertising recall within an audience that provides the basis for a schedule simulator which estimates advertising recall for a variety of schedules (e.g. weekly, monthly, or bimonthly). The outcomes of the simulations are compared with previous research.

11681. Summers, John O. (Indiana U) **Less information is better?** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 467-468.—Argues that the conclusions of the article by J. Jacoby et al (see PA, Vol 53:1138) on the effects of information load on consumer purchases do not accurately follow from their data, and that their procedures for constructing the experimental conditions and their method of evaluating the quality of Ss' decisions are questionable. The exploratory nature of the Jacoby article is emphasized.

11682. Szalay, Lorand B. & Bryson, Jean A. (American Inst for Research, Washington, DC) **Psychological meaning: Comparative analyses and theoretical implications.** *Journal of Personality & Social Psychology*, 1974(Dec), Vol 30(6), 860-870.—Compared 6 major methods of empirical semantic analysis, including semantic differential, similarity judgment, and association tasks, to explore their relationship, the range of their differences, and their implications for the conceptualization of psychological meaning. 5 of the 6 measures produced high positive intercorrelations, while the standard semantic differential correlated only with attitude measures. However, a modified semantic differential containing more relevant scales—scales adapted to the words in the investigations—did produce high positive correlations with the other meaning measures. Thus, past differences between the semantic differential and similarity judgment as well as association tasks appear as consequences of the frequent irrelevance of the semantic differential scales adapted by universalist strategies. (29 ref)—*Journal abstract.*

11683. Tybout, Alice M. & Zaltman, Gerald. (Northwestern U) **Ethics in marketing research: Their practical relevance.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 357-368.—Considers that an understanding of ethical issues in marketing research may contribute to the quality of research data. The rights of Ss in marketing studies are examined and compared to the rights of consumers (e.g., the right to be heard, the right to safety, and the right to choose). A tabular presentation of Ss' rights, possible results of violating these rights, and their effects on research methodologies and results is discussed in detail. It is concluded that when Ss' rights are violated, not only do Ss lose the opportunity to communicate clearly, but the data gathered may be inaccurate and lead to false conclusions by researchers and clients. (52 ref)—L. Gorsey.

11684. Wilkie, William L. (U Florida) **Analysis of effects of information load.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 462-466.—Questions the assumptions of the article by J. Jacoby et al (see PA, Vol 53:1138) which concluded that dysfunctional effects on brand choice result from more information. Methodological problems are examined, and Jacoby's definition of product information variables as number of brands rather than number of items/brand is questioned.

11685. Witt, Robert E. & Fulcher, David G. (U Texas, Austin) **Effect of alternative combinations of predictor variables in behavioral research.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1287-1290.—Examined alternative methods of combination of predictor variables to evaluate the impact of various combinatorial methods in behavioral research, using as the dependent variable consumers' information-seeking about purchases. The 4 predictor variables were perceived conspicuousness of the product, perceived risk in a decision to purchase, need for social approval, and compliance. Data were collected from 89 housewives via personal interviews in Ss' homes. 3 combinations of predictor variables were examined using multiple correlation analysis. The 3 models differed substantially in terms of percentage of explained variation.—*Journal abstract.*

## PERSONALITY

11686. Abbott, Robert D. (California State U, Fullerton) **Social desirability and judged frequency of occurrence: Reanalysis and comment on Bernhardtson and Fisher.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1271-1274.—Re-examined the conclusions of C. Bernhardtson and R. Fisher (see PA, Vol 46:6785) on the "direct contribution" of the social desirability scale value and judged probability of occurrence in the population to the prediction of the proportion of respondents answering "true" to personality items. Emphasis is placed on new estimates of "direct contribution" upon multiple regression model comparisons which emphasize the common "contribution" between the judged probability of occurrence and social desirability and are not influenced by the ordering of variables in the regression equation. (20 ref)—*Journal abstract.*

11687. Abend, Sander M. **Problems of identity: Theoretical and clinical applications.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 606-637.—Reviews the various meanings and usages of the term "identity," particularly among psychoanalytic writers such as E. H. Erickson, P. Greenacre, and E. Jacobson. 2 groups of meanings seem to be involved. The first includes such concepts as self, self-representation, self-image, and the sense of self. The second group refers to ego, personal identity, sense of identity, and sexual identity. Redefinitions and reformulations of these concepts are advanced.—J. Z. Elias.

11688. Becker, Stephen. (City Coll, City U New York) **Father absence and its relationship to creativity.** *Graduate Research in Education & Related Disciplines*, 1974(Spring), Vol 7(2), 32-52.—Attempted to determine whether children who experienced father absence during childhood are more creative than children whose

father was present. 60 undergraduates were randomly selected on the basis of their responses to a questionnaire regarding family structure and perception of parental influence. The Unusual Uses test, applied to tin cans, was given in group settings, and scored for fluency, flexibility, and originality. A significant  $F$  ratio ( $p > .01$ ) was obtained for all 3 factors of creativity. An additional significant finding was that whether the father had been absent or present, mother-influenced Ss were superior to father-influenced Ss on all 3 factors. (52 ref) —C. Tatham.

11689. Becker, W. Michael. (Brigham Young U) **Internal-external scale correlated with Edwards Personal Preference Schedule.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1182.—Studied 32 male and 57 female undergraduates in an extension of R. DiGiuseppe's (1971) hypothesis that there is a relationship between several Edwards Personal Preference Schedule scales and Rotter's Internal-External Control Scale. No support for the hypothesis was found.

11690. Bloomberg, Morton. (Western Connecticut State Coll) **On the relationship between internal-external control and morality.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1077-1078.—53 undergraduates varying in sophistication about moral judgment on the Defining Issues Test completed Rotter's Internal-External Control Scale. Analysis shows that internally oriented Ss used significantly more Stage-6 thinking than externals.

11691. Brenner, Charles. **On the nature and development of affects: A unified theory.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 532-556.—Advances a new psychoanalytic theory of affects. Affects are complex mental phenomena which include sensations of pleasure, displeasure (or both), and ideas. The development of affects and their differentiation from one another depend on ego and on later superego development. Further amplification of the theory within the general framework of psychoanalysis is presented.—J. Z. Elias.

11692. Bull, R. H. (North East London Polytechnic, England) **Personality and physiological recovery.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1086.—In a study of the reliability of several galvanic skin response (GSR) parameters, Ss' mean GSR recovery tended to remain constant over a number of months. Negative correlations were observed between mean GSR recovery quotients and anxiety and between recovery and neuroticism, even when Ss were not extreme scorers on the personality scales.

11693. Bush, David F. & Coward, Raymond T. (Villanova U) **Sex differences in the solution of achromatic and chromatic embedded figures.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1121-1122.—Of 20 male and 20 female undergraduates given 6 items of the Embedded Figures Test, female Ss proposed significantly more incorrect solutions and required significantly more time to reach correct solutions. There were no differences due to color format and no interactions.

11694. Callison, Connie P. (George Mason U) **Experimental induction of self-concept.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1235-1238.—Studied 28 3rd graders to investigate the effects of both positive and



negative feedback on children's self-concept. Group-1 Ss were administered Items 1-40 of the Piers-Harris Children's Self Concept Scale (CSCS) and a mathematics test. Ss were then administered Items 41-80 of the CSCS after being told that they had made high scores on the mathematics test. Group-2 Ss were administered the same tests but were told that their performance on the mathematics test was not adequate. Results show that Group-1 Ss' scores on the self-concept scale did not change while Group-2 Ss' scores decreased. It is suggested that discrepancies in the children's expected and reported performances on the mathematics test may have affected their subsequent self-concept ratings. —*Journal abstract.*

11695. Chaikin, Alan L.; Derlega, Valerian J.; Bayma, Benjamin & Shaw, Jacqueline. (Old Dominion U) **Neuroticism and disclosure reciprocity.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 13-19.—49 male undergraduates identified as either "normal" or "neurotic" by their scores on the Maudsley Personality Inventory were exposed to a confederate who disclosed either intimate or superficial information about himself, as part of an "impression formation" study. Normal males reciprocated disclosure at a level of intimacy similar to the confederates, but neurotics disclosed at a moderate level regardless of whether the confederate's initial disclosure was intimate or superficial. Results suggest that neuroticism may be related to inappropriate or nonnormative disclosure, rather than characteristically high or low levels of disclosure. (26 ref) —*Journal abstract.*

11696. Chun, Ki-Taek & Campbell, John B. (U Michigan, Inst for Social Research) **Dimensionality of the Rotter Interpersonal Trust Scale.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1059-1070.—Interspersed the Rotter Interpersonal Trust Scale in a larger questionnaire completed by 187 undergraduates. 4 dimensions—Political Cynicism, Interpersonal Exploitation, Societal Hypocrisy, and Reliable Role-performance—were identifiable across analysis techniques. (18 ref)

11697. Cohen, Ronald J. & Teevan, Richard C. (State U New York, Albany) **Fear of failure and impression management: An exploratory study.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1332.—Results of a study of 20 male undergraduates with either very high or very low scores on R. Birney et al's Hostile Press support the hypothesis that persons high on fear of failure are more likely to take advantage of an opportunity to manage a favorable impression which would enhance the individual's social value.

11698. Constantinople, Anne. (Vassar Coll) **Analytical ability and perceived similarity to parents.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1335-1345.—Previous research has indicated that analytical ability is a masculine characteristic in that males score higher than females on such measures and, within sex groups, those who are classified as more masculine on measures of sex-typing tend to have greater analytical ability. To examine the relationships found in earlier research, 40 male and 101 female undergraduates were studied, focusing on field independence as one aspect of analytical ability. Although some of the data confirm earlier findings, especially within sex groups, the most significant result is

that females were more field-independent than the males. It is pointed out that serious questions about both the measures used and the nature of the sample can be raised, making any generalization unwise, but the finding is unprecedented in published research. (18 ref)—*Journal abstract.*

11699. Dangaard, Collin. **Ten thousand hands.** *Psychic*, 1974,(Nov-Dec), Vol 6(1), 40-43.—Reports the findings of a Los Angeles engineer who has photographed and studied hands for more than 10 yrs. It is asserted that the palm "lines" of traditional palmistry mean nothing, but the size and shape of the hand correlate strongly with personality and character, and hence with choice of profession. The largest hands of all belong to people in mental institutions. Hand size is related to body height by a formula involving width of palm, length of palm, and length of fingers. Temperament is also indicated by the grain structure of the palm, i.e., the fine lines of the skin.

11700. Dietz-Helmers, A. **On correlation between the generation age of the fathers and grandfathers and the intelligence of the descendants.** *Experientia*, 1974, Vol 30(5), 567-570.—Conducted a series of correlational studies of the relationship between the age of the parents at the birth of the child and the intelligence of these children. 3 of the series involved highly gifted personalities while one included persons of below average endowment. Data were collected from biographies of outstanding persons—1,560 descendants—and from a study of isolated and below average individuals—380 descendants. In addition, a field investigation was carried out in Munich, Germany, on 87 boys: IQ tests and questionnaires were administered. Overall results support the hypothesis that generation age and IQ are related: intelligence, in this sense, was related to the age of the father and his parents at the time of the child's birth, but not to the ages of the mother and her parents. Correlations carried out to determine if these results were an artifact of social class or birth order were nonsignificant. Sources of error in this research are noted, and suggestions are made for further study. (German summary)—R. S. Albin.

11701. Edelstein, E. L. (Hadassah U Hosp & Medical School, Jerusalem, Israel) **Experience and mastery of pain.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 216-226.—Considers pain experience and its expression to be not only the results of the stimulus and its perceptive threshold, but also of many other correlates. A short summary of the psychological theories of pain is discussed. An attempt is made to relate the expressions reflecting pain experience as dependent on ethnocultural, developmental, and personal factors. Based on a review of previous studies, an attempt is made to demonstrate that various styles of mastery of pain in the local Israeli population are partly determined by their countries of origin and their belonging to groups. The various attitudes of doctors to the sufferer are discussed.—*Journal abstract.*

11702. Eysenck, Michael W. (U London, Birkbeck Coll, England) **Individual differences in speed of retrieval from semantic memory.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 307-323.—Hypothesized that extraverts retrieve information from semantic

memory faster than introverts. A total of 109 undergraduates served as Ss in 2 experiments. In Exp I, the stimulus items consisted of category names followed by a single letter (e.g., fruit-P). Ss, half of whom were introverts and half extraverts (determined by the Eysenck Personality Inventory), responded as quickly as possible with a member of the specified category starting with the letter. Extraverts responded significantly faster than introverts, and more so when the most likely response was of low frequency than when it was of high frequency. In Exp II, Ss were assigned to 1 of 4 groups representing the 4 combinations of high and low extraversion and high and low general activation (determined by the Activation-Deactivation Adjective Check List). The speed-of-recall task from the 1st experiment was used on some trials; on the remaining trials, a speed-of-recognition task was used. Extraverts had greater response speed than introverts for recall, but not for recognition. (34 ref)—*Journal abstract*.

11703. Feinman, Saul & Rogers, James D. (U Wyoming) **Sex differences in psychological rigidity. *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1337-1338.**—Investigated sex differences on a battery of 3 scales of psychological rigidity in 112 male and 138 female college students. The size of the intercorrelations among the scales suggests that psychological rigidity is a multidimensional concept. Females were significantly less rigid on 2 of 3 scales. The experience by females of a wider range of approved behavior is suggested as a possible explanation.

11704. Freund, Kurt; Langevin, Ron; Laws, Richard & Serber, Michael. (U Toronto, Ontario, Canada) **Femininity and preferred partner age in homosexual and heterosexual males. *British Journal of Psychiatry*, 1974(Nov), Vol 125, 442-446.**—Conducted a study of 260 androphilics, 32 ephebophilics, and 24 homosexual pedophilics to investigate the relationship between "femininity" and male homosexuality, taking into consideration preferred partner age. Ss were given a sexual deviation questionnaire and the California Psychological Inventory. Results indicate that homosexual males in general scored higher on femininity than did heterosexuals, and that within the homosexual groups such males who erotically preferred physically mature partners scored higher on femininity than did those who erotically preferred pubescents or children. There was the unexpected finding that heterosexual pedophilic males scored higher on femininity than normals and could not be differentiated in this respect from the homosexual groups. (15 ref)—*Journal summary*.

11705. Gale, Raymond. (Ball State U) **Who are you? The psychology of being yourself.** Englewood Cliffs, NJ: Prentice-Hall, 1974. x, 177 p.—Posits that each person must assume responsibility for realizing the full potential of his humanity. Topics include the humanistic nature and humanistic and existential models of the person, the person as a perceiver and as a striver, validation of one's identity, meeting self-actualizing needs, and love as a creative personal risk. (4½ p ref)

11706. Garza-Guerrero, A. Cesar. (C. F. Menninger Memorial Hosp, Topeka, KS) **Culture shock: its mourning and the vicissitudes of identity. *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2),**

408-429.—Describes culture shock as a polyphasic psychosocial phenomenon, a reactive process stemming from the effect of a new culture upon those who attempt to merge with it. Violent removal from an expectable environment and subsequent exposure to a relatively unpredictable, strange new environment, triggers the process. Mourning for the massive loss of loved objects—the abandoned culture—and the concomitant threats to the individual's identity constitute the common denominator in various types of culture shock. The adaptive functions of mourning are prerequisites for a successful solution of the shock problem. The stages of culture shock are described, from the initial mourning and identity threats to final transformations and reintegration of the newcomer's identity. (31 ref)—*Journal summary*.

11707. Gibson, H. B. & Curran, J. D. (Hatfield Polytechnic, England) **The effect of distraction on a psychomotor task studied with reference to personality. *Irish Journal of Psychology*, 1974(Win), Vol 2(3), 148-158.**—Studied 22 undergraduates to test the hypothesis that introverts' performance on a primary test of psychomotor efficiency would be more effectively disrupted than that of extroverts by a secondary task. A suitable cognitive task, to act as a distractor to performance on the Gibson Spiral Maze, was found by pilot study. This distractor was presented alternately on half of 8 successive maze-trials in the main investigation. Extraversion, as determined by the Eysenck Personality Inventory, was found to be significantly related to maze performance. Introverts tended to slow down on distracted trials but extraverts were often speeded up by distraction. Those effects are interpreted in terms of the S maintaining an efficient level of performance in accord with temperamental reaction tendencies. (19 ref)—*Journal abstract*.

11708. Goldberg, Barbara & Folkins, Carlyle. (U Houston) **Relationship of body-image to negative emotional attitudes. *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1053-1054.**—Correlations of mean body image and Multiple Affect Adjective Checklist scores for male and female undergraduates yielded ratings not statistically significantly different, although ratings for females varied more than those for males.

11709. Golden, Charles J. (U Hawaii, Manoa) **Sex differences in performance on the Stroop Color and Word Test. *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1067-1070.**—Notes that despite the wide use of the Stroop Color-Word Test in psychological research, there has been relatively little work on the effect on the test of demographic variables. The present study examined the effect of sex on pure scores of interference and the general effects of 219 undergraduates' sex on Stroop performance. Results indicate better performance by females on the 2 color cards but no difference on pure measures of performance.—*Journal abstract*.

11710. Gottfredson, Gary D. & Holland, John L. (Johns Hopkins U, Ctr for Social Organization of Schools) **Some normative self-report data on activities, competencies, occupational preferences, and ability ratings for high school and college students, and employed men and women. *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 192.**



11711. Greenstein, Theodore & Bennett, Richard R. (Washington State U) **Order effects in Rokeach's Value Survey.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 393-396.—212 undergraduates completed a version of Rokeach's Value Survey in which the presentation order of the values was randomized. Each respondent received a unique randomization pattern. Spearman's  $\pi$  correlations were computed between the presentation order and the order of ranking done by the respondent. The magnitude of the correlations obtained was such that the amount of bias created by presentation order was sufficiently small as to suggest that order effects are not a problem in the instrument.—*Journal abstract.*

11712. Haft-Pomrock, Yael. **Psyche and soma in chirolgy: Personality changes in analysis as reflected in the hand.** *Spring*, 1974, 179-192.—Describes the importance of the hand and the meanings ascribed to the fingers and lines of the palm throughout history and in different cultures. 2 case histories are given of changes occurring in the lines of the hands of persons undergoing analysis.

11713. Hanson, David J. (State University Coll New York, Potsdam) **Dogmatism and authoritarianism: A bibliography of master's theses.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 128.

11714. Hekmat, Hamid; Khajavi, Farokh & Mehryar, Amir H. (U Wisconsin, Stevens Point) **Some personality correlates of empathy.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 89.—Administered R. Hogan's Empathy Scale and the Psychological Screening Inventory to 278 female and 167 male undergraduates. Results support the prediction that high-empathy persons are significantly lower in signs depicting neurotic and psychotic disturbance (e.g., anxiety) as compared with low-empathy persons.

11715. Hines, Caroline V.; Koepfel, John C. & Jacobs, Keith W. (U Southern Mississippi) **Locus of control as a variable in geographic mobility.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1282.—Scores on Rotter's Internal-External Control Scale were related to a questionnaire measure of planned geographic mobility, with Ss planning out-of-state mobility scoring as significantly more "internal" than Ss planning no mobility. Locus of control is suggested as a possible variable in geographic mobility.

11716. Horn, Joseph M. & Turner, Robert G. (U Texas, Austin) **Personality correlates of differential abilities in a sample of lower than average ability.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1211-1220.—Critics of IQ tests often emphasize the importance of nonintellectual components of intelligent behavior. Previous research has identified masculinity-femininity as one factor contributing to the differentiation of people along a dimension of high verbal ability at one end and high mathematical (or other "practical") ability at the other. However, almost all of this information was derived from the study of groups whose overall ability was about 1 standard deviation above the population mean. To test the generalizability of these findings, personality correlates of differential abilities (as measured by the Guilford-Zimmerman Temperament Survey) were investigated in 240 male and 165 female Mexican-

American undergraduates enrolled in a developmental studies class. Masculinity was related to the high mathematical-low verbal ability complex for females but not for males. The importance of studying the interaction of sex and type of ability is discussed. (22 ref)—*Journal abstract.*

11717. Horton, Paul C. **The mystical experience: Substance of an illusion.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 364-380.—Presents a case history to illustrate a discussion of mystical experience. Such an experience may represent a culmination of a transitional mode of relatedness, and the experience itself may then become a transitional phenomenon. Multiple previous experiences with controlled illusion and hallucinogens may facilitate the experience. The quintessence of the mystical experience specifically, and of the transitional experience generally, is an upsurge of residual primary narcissism; such an upsurge can serve as a defense against overwhelming loneliness. Therefore the mystical experience can become a special, potentially adaptive, ego mechanism of defense. (25 ref)—*Journal summary.*

11718. Jacobs, Keith W. & Koepfel, John C. (U Southern Mississippi) **Biographical correlates of sensation-seeking: Form II and Form IV.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 192.

11719. Jensen, Arthur R. (U California, Inst of Human Learning, Berkeley) **How biased are culture-loaded tests?** *Genetic Psychology Monographs*, 1974(Nov), Vol 90(2), 185-244.—Conducted 3 studies in which the culture-loaded Peabody Picture Vocabulary Test (PPVT) and the culture-reduced Raven's Progressive Matrices (Colored and Standard forms) were compared on various internal criteria of culture bias; Ss were a total of 6,170 Anglo-American, black, and Mexican-American school children, from kindergarten through 8th grade, in 3 California school districts. On both the PPVT and the Raven, the 3 ethnic groups (which showed large mean differences) showed little difference in the rank order of item difficulties, the relative difficulty of adjacent items, the loadings of items on the first principal component, and the choice of distractors for incorrect responses. Analysis of variance (ANOVA) revealed very small Ethnic Group  $\times$  Items interaction, but an index of item bias derived from ANOVA indicates that the Raven was considerably less biased than the PPVT, especially in the Mexican-American group. The Group  $\times$  Items interaction was shown to be attributable largely to differences in mental maturity. On both tests groups of culturally homogeneous younger and older white children (separated by 2 yrs) perfectly simulated the white-black differences in Group  $\times$  Item interactions and choice of error distractors in the Raven. Certain expectations from a culture bias hypothesis were borne out only for the PPVT in the Mexican group. It is suggested that unless the empirically unsubstantiated assumption is made that culture bias affects all kinds of test items equally, the various item analyses of the present studies lend no support to the proposition that either the PPVT or the Raven is a culturally biased test for blacks. (16 ref)—*Journal abstract.*

11720. Keith, Regina R. & Vandenberg, Steven G. (U Colorado) **Relation between orality and weight.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1205-1206.—Tested the psychoanalytic theory of obesity by administering T. Grygier's (1970) Dynamic Personality Inventory to obese and normal-weight females. No significant differences between groups were found, and the tenability of the theory of obesity and suitability of the scales are questioned.

11721. Kiener, Franz. (Technical U Berlin, Inst for Psychology, W Germany) **[Research on body image: I.]** (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 335-351.—Presents an extensive survey of the methods and results of past and contemporary research on body ego, body image, and body image boundaries and their ontogenetic development through various stages of age and development. The changes induced by various factors (e.g., sex difference, physical handicaps, organic brain damage, and mental disorders) are discussed. (English summary)—T. Fisher.

11722. Kratoch, Ronald; Leventhal, Gloria & Silverstein, Barry. (William Paterson Coll) **Self-perceived transformation of Negro-to-black identity.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1071-1075.—To examine changes in self-perceptions, 25 male and 25 female low-income, black undergraduates rated personal statements in accordance with how they (a) retrospectively viewed themselves (4 and 2 yrs ago), (b) currently viewed themselves, and (c) projectively viewed themselves. Responses showed a significant transition away from a past Negro to a present and future black identity. It is suggested that social and cultural forces over time probably led to changes in racial identity more than changes in personal identity.—*Journal abstract.*

11723. Levitt, Eugene E. et al. (Indiana U, Medical School, Indianapolis) **Testing the coercive power of hypnosis: Committing objectionable acts.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 59-67.—Selected 14 hypnotically susceptible individuals and 9 simulators from groups of high and low scorers, respectively, on the Harvard Group Scale of Hypnotic Susceptibility, Form A. All Ss were asked to perform 2 objectionable acts, cutting up the American flag and mutilating a Bible. 25% of all Ss declined to carry out one or the other of the experimental tasks. While no conclusions can be drawn about the power of hypnosis to induce objectionable behavior, the findings appear to indicate clearly that objectionable behavior, as opposed to dangerous, criminal, or antisocial behaviors, can be used to test the coercive power of hypnosis. (German, French, & Spanish summaries) (16 ref) —*Journal abstract.*

11724. Liebling, Barry A.; Seiler, Marilyn & Shaver, Phillip. (National Analysts, Philadelphia, PA) **Unsolved problems for self-awareness theory: A reply to Wicklund's (see PA, Vol 53:Issue 6) reply to the authors' 1974 paper contains 5 major critical points, each of which is countered here. It is concluded (a) that Wicklund misinterprets drive theory, and (b) that his elucidation of the distinction between drive theory and self-awareness theory makes it clearer than before that**

Liebling et al's experiment does not support self-awareness theory as presently formulated. Questions remain which require further research.—*Journal abstract.*

11725. Littig, Lawrence W. (Howard U) **Personality, social class, occupational aspirations, and family size intentions of young, English men and women.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 122-123.

11726. Lucisano, Bruno. (Experimental Ctr for the Measurement of Children's Intelligence, Milan, Italy) **[The stress-value of events.]** (Ital) *Medicina Psicomatica*, 1972(Apr), Vol 17(2), 125-133. Reports on I. H. Holmes's studies of the stress-value of events, based on estimates by 394 Ss of the degree of social readjustment they would require after experiencing stressful events. Mean points for minor law violations were 11, for marriage 50, for death of spouse 100. The accumulation of 200-300 stress points in a year makes a person vulnerable to psychiatric and/or psychosomatic disorders. A comparison between a sample of Italians and Americans shows significant agreement between the 2 groups. (French & English summaries) D. I. Aron.

11727. Lund, Paul A. & Ivanoff, John M. (Muskego Intermediate School, WI) **Correspondence of self-concept measures with levels of reading achievement.** *Journal of Reading Behavior*, 1974(Jul), Vol 6(2), 149-165.—227 incoming freshmen were grouped in terms of reading ability, sex, and enrollment in a reading course. Using data from the College Entrance Examination Board, the Nelson-Denny Reading Test, and the Gough Adjective Check List, significant differences in self-concept were found among the groups, particularly between those who enrolled and those who did not enroll in the reading course. W. I. Chovan.

11728. Magnusson, David & Elchammar, Bo. (U Stockholm, Sweden) **Anxiety profiles based on both situational and response factors.** *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 27-43. Argues that a comprehensive picture of an individual's anxiety pattern can be obtained by taking into account different types of anxiety reactions and different categories of stressful situations reacted to. An anxiety inventory utilizing these 2 factors was analyzed with regard to the anxiety profiles of different subgroups of 116 15-17 yr old students. The original situation and response scales were categorized on the basis of factor analyses in order to reduce the total matrix. Ss with similar response profiles across categories of situations were classified in homogeneous groups using latent profile analysis. For each sex, 3 categories of Ss were obtained, 2 of which differed mainly in anxiety level whereas the 3rd group was characterized by a high transsituational inconsistency. For the total sample, "Psychic" responses were reported as more intense than "Somatic" responses, and "Anticipation fear" situations were reported as less anxiety provoking than "Inanimate threat" situations and "Threat of punishment" situations. (29 ref) *Journal abstract.*

11729. Mahler, Irwin. (Occidental Coll) **A comparative study of locus of control.** *Psychologia: An International Journal of Psychology in the Orient*, 1974(Sep), Vol 17(3), 135-139.—Describes the preparation of a Japanese translation of the Levenson (PC) Scale, a revision of



Rotter's I-E Scale. The Levenson scale was administered to university students of both sexes in Japan and the US. American students scored in a more internal direction than the Japanese. Japanese students felt themselves to be more controlled by chance or luck; but contrary to prediction, they did not score higher on control by powerful others. However, Japanese females scored significantly higher than Japanese males in this respect.—R. D. Nance.

11730. Mathers, James. (Radnor House, Hay on Wye, England) **The gestation period of identity change.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 472-474.—Discusses the hypothesis that critical experiences which initiate change in a person's sense of identity are not usually emotionally digested until about 18 mo have elapsed. It is suggested that the hypothesis has significant implications for those programs in education and therapy from which personality change commonly results and that the effectiveness of such programs cannot be adequately assessed in less than 18 mo from their initiation.—*Journal summary*.

11731. Mehryar, A. H.; Khajavi, F. & Helmat, H. (Pahlavi U, Shiraz, Iran) **Comparison of Eysenck's PEN and Lanyon's Psychological Screening Inventory in a group of American students.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 9-12.—Administered Eysenck's Psychoticism, Extraversion, and Neuroticism Inventory and the Psychological Screening Inventory (PSI) to 178 male and 297 female undergraduates. Included in the study was an 18-item Lie scale taken from the Eysenck Personality Inventory. A factorial analysis of the intercorrelations showed that 3 major factors could account for the bulk of correlations among the 9 differently labeled characteristics covered by the 2 inventories. These 3 factors were identified as Psychological Disturbance, Extraversion, and Defensiveness, respectively. The 1st factor was characterized by alienation, psychoticism, discomfort, and neuroticism. The 2nd factor was mainly identified by high loadings on Eysenck's Extraversion and the PSI Expression scales. The Defensiveness factor was mainly marked by the Lie scale and the PSI Defensiveness scale. The PSI Social Nonconformity scale loaded equally moderately on both the Psychological Disturbance and Defensiveness factors for both male and female groups. In the case of the male group, its highest loading was on the Extraversion factor. (16 ref)—*Journal abstract*.

11732. Merrens, Matthew R. & Garrett, James B. (State U New York, Plattsburgh) **The Protestant Ethic Scale as a predictor of repetitive work performance.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 125-127.—Administered the Protestant Ethic Scale as part of a large test battery to 333 undergraduates. 40 male and female Ss, of whom 20 had scored at least 1 standard deviation above the mean score on the Scale (high Protestant ethic group) and 20 had scored at least 1 standard deviation below that mean (low Protestant ethic group), were selected to participate in a repetitive task. Results show that the high Protestant ethic group spent significantly more time working on the task ( $p < .01$ ) and produced significantly more output ( $p < .001$ ). It is concluded that the type of work

behavior studied is a component of the Protestant ethic personality variable.—*Journal abstract*.

11733. Metcalfe, R. J. (Trinity & All Saints' Coll.) Leeds, England. **Own vs provided constructs in a repeated measure of cognitive complexity.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1305-1306.—On Kelly's Role Construct Repertory Test, both cognitive complexity and cognitive differentiation scores of 50 education students were calculated using own vs provided constructs. Both indices were significantly correlated over treatments, but they were independent of each other.

11734. Millham, Jim. (U Houston) **Two components of need for approval score and their relationship to cheating following success and failure.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 378-392.—50 male and 41 female undergraduates completed a simulated "intelligence test" on which they were given bogus feedback indicating that they had either met college norms or had failed substantially to meet norms. Immediately following was a period in which Ss could modify their scores and believe that their modification would go undetected. The relationship of need for approval to "cheating" and amount of "cheating" was analyzed. Need for approval was measured by the Marlowe-Crowne Social Desirability scale. Results support an "avoidance" interpretation of approval motivation. 2 separate components of need for approval score were identified and found to be differentially related to avoidance behavior for men and for women. (15 ref)—*Journal abstract*.

11735. Mlott, Sylvester R. & Mlott, Yvonne D. (Medical U South Carolina) **Dogmatism and locus of control in individuals who smoke, stopped smoking and never smoked.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 53-57.—Tested the hypothesis that individuals who are able to terminate their smoking habits are less dogmatic and more internally controlled than those who continue to smoke or have never smoked. 25 men and 25 women were studied in each of 3 categories: terminated smoking, never smoked, and smoking. Both the Rokeach Dogmatism Scale and the Rotter Internal-External Control Scale were administered. Results show that (a) there was a significant ( $p < .05$ ) interaction between sex and smoker in relation to dogmatism score: males generally scored higher than females; (b) male nonsmokers were lowest on dogmatism; (c) no significant differences were obtained among the 3 female groups; and (d) Ss who had stopped smoking were more internally controlled than those who smoked or had never smoked. (18 ref)—R. S. Albin.

11736. Naditch, Murray P. (Cornell U) **Locus of control and drinking behavior in a sample of men in Army basic training.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 96.—Studied the relationship between internal-external control and drinking behavior in 517 men in basic training whose drinking behavior ranged from abstinence to problem drinking. Results show a clear pattern of increased externality with increased drinking.

11737. Netter-Munkelt, P. & Meyer, A. E. (U Mainz, Inst of Medical Statistics & Documentation, W Germany) **Sex differences in the intercorrelations of psychofe-**

mininity-masculinity variables.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 352-375.—Examined data obtained from 61 male and 61 female students to study the question of whether there exist sufficiently significant sex-specific differences in the intercorrelations of psychic variables to explain the different androgyny patterns of men and women. Ss were tested by masculinity-femininity questionnaires and Es compared the correlations and factor matrices from questionnaire scale scores and single questionnaire items. Results indicate that only 2 associations (femininity-schizothymia and masculinity-cyclothymia) and 3 factors (sturdiness, care for others, and social dominance) were common to both groups. The discrepancies between all the other factor pairs could not be compensated even by similarity rotation of factor matrices. It is concluded that the dimensions of psychomascularity-femininity in the 2 sexes are different and that the difference in the intercorrelations of psychic and morphologic variables in men and women may be understood as a consequence of their different psychic configurations. (English summary) (34 ref)—*T. Fisher*.

11738. Neuringer, Charles; Goldstein, Gerald & Gallahe, Richard B. (U Kansas) **Minimal field dependency and minimal brain dysfunction.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 20-21.—Hypothesized that the "normal range" of field dependency may be associated with minimal levels of undiagnosed brain damage. Data from 54 undergraduates given the Rod-and-Frame test and the Halstead Neuropsychological Test Battery suggest that there is a small but significant relationship between field dependency and performance on tests sensitive to brain dysfunction.

11739. Nogas, Catherine; Schweitzer, Kathy & Grumet, Judy. (Mt Holyoke Coll) **An investigation of death anxiety, sense of competence, and need for achievement.** *Omega: Journal of Death & Dying*, 1974(Fal), Vol 5(3), 245-255.—80 female undergraduates were administered 4 written questionnaires (e.g., the California Psychological Inventory) measuring death anxiety, sense of competence, need for achievement, and general anxiety. An open-ended question on the personification of death was also included. As predicted, a negative correlation was found between death anxiety and sense of competence. No correlation was found between death anxiety and need for achievement and no interaction effect occurred between need for achievement and sense of competence. General anxiety correlated highly with death anxiety. Degree of death anxiety and type of personification were also related.—*Journal abstract*.

11740. Nuttall, Ronald L. & Poggio, John P. (Boston Coll) **A cross-cultural, American and Puerto Rican study of personality structure.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 193.

11741. Parlee, Mary B. & Rajagopal, Jayalakshmi. (Radcliffe Inst, Cambridge, MA) **Sex differences on the Embedded-Figures Test: A cross-cultural comparison of college students in India and in the United States.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1311-1314.—Administered the Embedded Figures Test to 24 male and 24 female US undergraduates and to 23

male and 24 female Indian undergraduates. Data show significant sex differences, with males scoring higher than females in both samples ( $p < .01$ ). Some considerations relevant to the interpretation of such data are briefly discussed. (17 ref)—*Journal abstract*.

11742. Radley, A. R. (Loughborough U, England) **The effect of role enactment upon construed alternatives.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 313-320.—Conducted a study of a total of 20 university students to examine how individuals choose between alternative roles which they might play. 10 Ss were asked to outline from their usual perspectives, and then to enact in written form, those roles which they were most and least prepared to extend in the future. Results indicate that Ss were more prepared to change in ways outlined by use of the enactment procedure, and indicated these ways of changing to be of greater possible use to them than ways outlined from their usual role perspectives. A control procedure did not produce this effect when used by the other group of 10 Ss. It is argued that role enactment may be a formalized reflection of the constructive process through which a person is able to make explicit the alternative roles which his personal constructs define, in order that he might choose between them.—*Journal summary*.

11743. Ray, John J. (U New South Wales, Kensington, Australia) **Are trait self-ratings as valid as multi-item scales? A study of achievement motivation.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 44-49.—13 sociology students administered to Ss they selected a questionnaire composed of attitude scales that measure achievement motivation and a 5-point self-rating scale on need achievement. The 30-item Ray-Lynn "AO" scale and the 10-item Costello Task Orientation scale were used to measure achievement motivation. They correlated .323 and .243 with peer-rated need for achievement. Self-rating correlated only .19 with peer rating. Results support the expectation that multi-item scales do provide an increment in validity. (15 ref)—*J. C. Figurelli*.

11744. Reavley, William. (Graylingwell Hosp, Chichester, England) **The relationship of life events to several aspects of "anxiety."** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 421-424.—18 male and 22 female Ss completed the Social Readjustment Rating Scale (SRRS), a modified form of the Taylor Manifest Anxiety Scale, the Anxiety Questionnaire of the Institute for Personality and Ability Testing, and the symptom rating test (a sensitive measure of "state" anxiety). Scores on the SRRS correlated highly with the somatic concomitants of anxiety, a feeling of inadequacy, and concern with ability to realize self ideals.—*W. G. Shipman*.

11745. Regan, Judith W.; Gosselink, Holly; Hubsch, Janet & Ulsh, Elizabeth. (Wells Coll) **Do people have inflated views of their own ability?** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 295-301.—Conducted 2 experiments with a total of 98 female undergraduates to test a need-for-self-esteem notion that people inflate self-appraisals of ability, deny criticism, and overrespond to praise. In Exp I actor Ss and bystander Ss rated actors' performances on a nonobjective task after hearing the performance praised or criticized or before hearing it evaluated. No evidence of



self-enhancement was found: compared to bystanders, actors rated themselves harshly, lowered their ratings after criticism equally, and showed relief after praise. Exp II compared actor and bystander ratings of actors who expected evaluation of their performances or who expected no evaluation. Results suggest self-derogation by actors as a defense against possible loss of self-esteem. (15 ref)—*Journal abstract*.

11746. Robbins, Fred P. & Sadow, Leo. (Chicago Inst for Psychoanalysis, IL) **A developmental hypothesis of reality processing.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 344-363.—Describes the evolution of the function of reality processing beyond basic reality testing. A developmental approach is utilized. Reality processing is seen as primarily dependent on object relations and self-development. Biological and sociocultural contexts within which the psychological factors operate are briefly commented upon. (29 ref)—*Journal summary*.

11747. Roll, Samuel & Hertel, Paula. (U New Mexico) **Arrow-Dot measures of impulse, ego, and superego functions in noncheaters, cheaters, and supercheaters.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1035-1038.—The Impulse (I), Ego (E), and Superego (S) scales of the Arrow-Dot subtest (from the IES Test) and the Psychopathic Deviance scale of the MMPI were correlated with a measure of resistance to temptation. Using data from 76 male undergraduates (classified as noncheaters, cheaters, or supercheaters) positive correlations ( $p < .05$  and  $p < .001$ ) were found between the Impulse scores and yielding to temptation and the Ego scores and resistance to temptation. The correlations of the Psychopathic Deviance scale with both the Arrow-Dot test and the behavioral measure were not significant. The study provides evidence for the predictive validity of the Arrow-Dot test.—*Journal abstract*.

11748. Rotter, Julian B. (U Connecticut) **Some problems and misconceptions related to the construct of internal versus external control of reinforcement.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 56-67.—Research involving perceived internal vs external control of reinforcement as a personality variable has been expanding at a rapid rate. It seems clear that for some investigators there are problems associated with understanding the conceptualization of this construct as well as understanding the nature and limitations of methods of measurement. This article discusses in detail (a) the place of this construct within the framework of social learning theory, (b) misconceptions and problems of a theoretical nature, and (c) misuses and limitations associated with measurement. Problems of generality-specificity and unidimensionality-multidimensionality are discussed as well as the logic of predictions from test scores. (35 ref)—*Journal abstract*.

11749. Schatzberg, Alan F.; Westfall, Michael P.; Blumetti, Anthony B. & Birk, C. Lee. (McLean Hosp, Belmont, MA) **Effeminacy: I. A quantitative rating scale.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 31-41.—Describes the evaluation of a 67-item yes-no rating scale for effeminacy in homosexual males. The presence or absence of 37 behaviors is recorded, and 30 questions dealing with dress and grooming, based on the

hypothesis that such a dress-grooming scale would correlate poorly with indicators of effeminacy, are included. The scale was evaluated in individual interviews conducted with 16 homosexual and 16 heterosexual 21-50 yr old males. Results show that there were no significant differences between heterosexual and homosexual Ss on the Dress-Grooming scale. Data on the relationship between Kinsey numbers and effeminacy ratings are presented. It appears that knowledge of S's effeminacy rating is of little predictive value in determining his sexual orientation. High interrater reliability was obtained (.93) which suggests that the scale can be of value in studying effeminacy quantitatively. (15 ref)—*L. Gorsev*.

11750. Schill, Thomas & Althoff, Michael. (Southern Illinois U, Carbondale) **Drug experiences, knowledge, and attitudes of high- and low-guilt individuals.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 106.—Administered the Mosher Forced-Choice Guilt Inventory and a drug attitude and use questionnaire to 121 undergraduates. Findings clearly indicate a relationship between guilt and experience, attitudes, and knowledge about drugs and support D. Mosher's view that guilt as a personality predisposition results in the inhibition of behaviors that are culturally prohibited.

11751. Schneider, Johann F. & Schneider-Düker, Marianne R. (U Saar, Saarbrücken, W Germany) **Conservative attitudes and reactions to menstruation.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1304.—Results of a previous study by R. Ullrich (1973) show a significant correlation between female university students' scores on a German version of the Wilson-Patterson Conservatism Scale and various menstrual complaints. Additional data by the present authors suggest that conservative attitudes do not greatly influence somatic and psychic experiences of the menses but determine to some degree the way of handling possible somatic and psychic consequences.

11752. Schumacher, Gerhard & Cattell, Raymond B. **[Factor analysis of the German HSPQ: Investigations of the cross-cultural constancy of primary personality factors.]** (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 621-636.—Translated Forms A and B of R. B. and M. D. Cattell's High school Personality Questionnaire (HSPQ) into German and added 56 new items. Administration of the German HSPQ to 327 pupils 14-15 yrs old, factor analysis of the results, and rotation to maximum simple structure yielded 14 primary personality factors which correspond with high significance to the congruence coefficients of the American HSPQ. Consequently the structure of the primary personality factors in American and German pupils is basically the same. (English & French summaries) (29 ref)—*W. J. Koppitz*.

11753. Seitz, Frank C.; Andersen, Dennis O. & Braucht, George N. (Montana State U) **A comparative analysis of Rorschach signs of homosexuality.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1163-1169.—Previous research has suggested that content analysis of the Rorschach may be a useful tool in diagnosing homosexuality. To test this position, 5 Rorschach sign approaches were compared within a 3-group design employing a total of 45 heterosexual, sex-role disturbed, and homo-

sexual male psychiatric inpatients. Results indicate that all signs were able to differentiate the homosexual and heterosexual groups, but only R. Schafer (1954) and G. Ulett's (1950) signs discriminated between the sex-role disturbed and homosexual groups. Step-wise discriminant analyses were computed to determine what combinations of signs could most accurately differentiate the 3 groups.—*Journal abstract.*

11754. Sewell, Trevor E. & Severson, Roger A. (Temple U) **Intelligence and achievement in first-grade black children.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 112.—Studied the relationship between WISC IQ and academic achievement (Stanford Achievement Test) in 84 regularly placed 1st-grade black children. Subtest scores, intercorrelations, and IQ-achievement relations suggest that this sample differs from the WISC normative population and urge caution in the use of the individual subtests for diagnostic or predictive purposes.

11755. Shakurov, R. Kh. (Scientific Research Inst of Psychology, Kiev, Ukrainian SSR) **[A psychological analysis of the leadership quality of school directors.]** (Russ) *Voprosy Psikhologii*, 1974(Jul Aug), No 4, 105-114. Studied the structure of leadership among the directors of 38 outstanding and 35 average schools. Ss were rated by the teaching staff on 36 characteristics, sociometric studies were conducted, and questionnaire data collected. Reliability and validity of the measures were established, and Kendall's tau coefficients computed for all pairs of data. 5 personality characteristics appeared to underlie superior leadership: effective communication, group-based leadership, businesslike efficiency, innovation, and expectation of performance. Leadership was characterized not by one of these attributes but by all of them. The most important was group-based leadership, which was closely related to effective communication and dealing with people. This complex attribute differentiated the leadership styles of directors of the outstanding and the average schools. (English summary)—L. Zusne.

11756. Spreitzer, Elmer; Snyder, Eldon E. & Larson, David. (Bowling Green State U) **Age, education, and occupation as correlates of the meaning of leisure.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1105-1106.—Examined the extent to which leisure activity serves as a source of self-identity. Data from a mail survey of 236 males and 121 females aged under 65 yrs indicates that when age, education, and occupation were predictor variables, only about 10% of the variance in meanings was accounted for.

11757. Svinicki, John G.; Bundgaard, Christopher J.; Schwensohn, Carl H. & Westgor, Daniel J. (U Texas, Austin) **Physical activity and visual field-dependency.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1237-1238.—Results of administering the rod-and-frame test to active and inactive male and female students show no significant sex differences, that inactive Ss had more difficulty in adjusting the rod to true verticality on the 1 trial given, and that physically inactive Ss may be more dependent on the visual field than the active Ss.

11758. Tobacyk, Jerome J.; Broughton, Andrew & Vaught, Glen M. (State University Coll New York, Oswego) **Effects of congruence-incongruence between**

**locus of control and field dependence on personality functioning.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 81-85.—Studied H. Lefcourt and M. Telegdi's (see PA, Vol 47:903) concepts of congruence and incongruence between perceptual skills and expectancies. 132 undergraduates were given Rotter's Internal-External Control Scale and the rod-and-frame test. 4 groups were formed, with 5 male and 5 female Ss with extreme scores in each group. As predicted, the 2 theoretically congruent groups demonstrated better personality adjustment on a real-self, ideal-self Q sort than did the incongruent groups. The congruent groups also proved to be less susceptible to the autokinetic effect than did the incongruent groups.—*Journal abstract.*

11759. Wagner, Carl; Bourgeois, Anthony; Levenson, Hanna & Denton, Jane. (Texas A&M U) **Multidimensional locus of control and voluntary control of GSR.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1142.—Used H. Levenson's multidimensional locus of control scale with undergraduate Ss in order to understand more precisely the relationship between personality and the ability to control galvanic skin response (GSR) using biofeedback. It was found that those Ss who were best able to lower their GSR had significantly higher Internal (control of self) scale scores than those who could not make use of the biofeedback.

11760. Wagstaff, Graham F. (U Newcastle upon Tyne, England) **The effects of repression-sensitization on a brightness scaling measure of perceptual defence.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 395-401.—Investigated the relationship between perceptual sensitivity and stimulus emotionality employing a methodology designed to preclude the intervention of response variables. 23 male and 23 female university students estimated the relative brightness of pairs of physically identical light signals superimposed on subliminal words presented below the awareness threshold. The Repression-Sensitization (R-S) scale was used as a possible personality correlate. Results support the perceptual defense hypothesis, and significant differences in modes of responding were found between sexes and categories on the R-S scale.—*Journal abstract.*

11761. Wakefield, James A. et al. (U Houston) **Personality types and traits in the Vocational Preference Inventory.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 19-26.—Investigated the relationships between the 6 scales on which J. L. Holland's (1973) theory is based (Realistic, Investigative, Social, Conventional, Enterprising, and Artistic) and the 5 other scales of the Vocational Preference Inventory (VPI) developed by Holland in 1970 (Self-control, Masculinity Status, Infrequency, and Acquiescence), using canonical analysis. Considering the 6 personality-type scales as set of variables and the 5 trait scales of the VPI as the 2nd set of variables, 5 significant canonical correlations were obtained for 373 (mostly white) undergraduates. In a 2nd study, 3 significant canonical correlations were found for 115 black college students at another school. The weights of the VPI scales suggest that 3 patterns of relationships among the scales were shared by the black sample and the mostly white sample.—*Journal abstract.*

11762. Weisgerber, Charles A. (U Detroit) **A review of research on the use of the Minnesota Multiphasic**



**Personality Inventory (MMPI) with Catholic nuns, 1950-1973.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 192-193.

11763. Weitzenkorn, Steven D. (U Nebraska, Lincoln) **An adjusted measure of achievement motivation for males and females and effects of future orientation on level of performance.** *Journal of Research in Personality*, 1974(Dec), Vol 8(4), 361-377.—Developed an adjusted measure of achievement motivation using the Mehrabian Achievement Scale and Sarason's Test Anxiety Questionnaire. Ss were 59 female college and 279 high school students. Contingent instructions, in which college Ss were told success on a test was necessary to qualify for opportunities to succeed on subsequent tests (Exp I), were contrasted to performance in equivalent noncontingent situations and relative to adjusted achievement motivation for both male and female high school Ss (Exp II). In noncontingent situations Ss were told performance on any one test did not affect their opportunity to take subsequent tests. Support was obtained for the use of the above mentioned scales as a predictor of performance for both sexes but not for the Mehrabian by itself. Both male and female Ss high in achievement motivation consistently scored significantly higher than Ss low in achievement motivation in all conditions. Results do not provide statistically reliable support to the elaborated theory of achievement motivation. (17 ref) —*Journal abstract*.

11764. Wicklund, Robert A. **Discrepancy reduction or attempted distraction? A reply to Liebling, Seiler, and Shaver.** *Journal of Experimental Social Psychology*, 1975(Jan), Vol 11(1), 78-81.—In the context of an experiment that shows enhanced cigarette smoking due to the presence of a mirror, B. A. Liebling et al (see PA, Vol 52:12184) argued that drive theory has been pitted successfully against self-awareness theory. It is noted, however, that their experimental conditions did not allow for an unambiguous application of either theory, and that their results have little to say about the relative accuracy of the 2 theoretical approaches.—*Journal abstract*.

11765. Wilkie, Raymond. (U Kentucky, Coll of Education) **Authenticity in helping relationships.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.—Presents a model of authentic personhood, arguing that effective helping relationships are not merely techniques but must be an integral part of the helper. Authenticity includes the concept of psychological health, but goes beyond it to include the response of a helper who is an integrated person, seeking a more authentic life for himself, to another person for whom the helper desires authentic, integrated personhood.

11766. Witte, Hannelore & Witte, Erich H. (U Hamburg, Psychologisches Inst, W Germany) **[Self-descriptions of actual and ideal personality by juveniles from different social strata and by juvenile delinquents.]** (Germ) *Zeitschrift für Sozialpsychologie*, 1974, Vol 5(3), 219-232.—Studied the differences between personality self-descriptions of the "real self" and "ideal self" by 222 German male adolescents 16-18 yrs old as a function of their socioeconomic status. Students and a

special sample of juvenile delinquents answered the Cattell 16 Personality Factor Questionnaire, first as they believed themselves actually to be and then as they wished themselves to be. Differences between "real" and "ideal" self were largest for the highest social level and smallest for the juvenile delinquents. Ratings for "real self" were similar across social strata, while "ideal self" ratings were dissimilar. "Real self" ratings differed more between social strata in the emotionality sphere than in the extraversion sphere. Adolescents from higher socioeconomic levels described themselves as more radical than those from lower strata, and delinquents showed less persistence than matched groups of lower-class adolescents. (23 ref)—*English abstract*.

11767. Wortman, Camille B. (Northwestern U) **Some determinants of perceived control.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 282-294.—Tested the hypothesis that an individual will feel control over an outcome if he causes the outcome and if he knows before causing it what he hopes to obtain. 65 male undergraduates were shown 2 consumer items and told that they would get to win 1 by a chance drawing. 2 marbles of different colors were placed in a can and mixed up. One-third of the Ss were told that the E would pick a marble to determine their prize and were told beforehand which marble stood for which prize. Another third were told to select a marble to determine their prize and were told beforehand which marble stood for which prize. The remaining Ss were told to select a marble to determine their prize but were not told until after they had picked their marble which marble stood for which prize. Ss then received a marble which led them to win either the item they preferred or the item they did not prefer. Results strongly support the hypothesis: Ss who caused their own outcome and knew beforehand what they hoped to obtain perceived themselves to have more control over the outcome, more choice about which outcome they received, and more responsibility for their outcome than Ss in the remaining conditions. These results were replicated in a 2nd experiment with the same Ss. The relationship between these studies and previous experiments on control is explored, and some possibilities for future research on control are considered. (23 ref) —*Journal abstract*.

11768. Wunderlich, Richard A. (Catholic U of America) **Personality characteristics of super-obese persons as measured by the California Psychological Inventory.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1029-1030.—Results of a study of 23 super-obese males and females (mean weights = 341 and 263 lbs, respectively) show that females scored significantly differently from the normative group on 6 of the 15 California Psychological Inventory scales and males were different from the normative group on 9 scales.

11769. Yurkevich, V. S. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[Individual differences in self-regulation and the ability to learn.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 84-95.—Studied the relationship between learning ability and a number of indices of self-regulation. 31 9th graders participated. Learning ability was assessed by asking teachers to evaluate each student on his facility in

learning, and by computing each student's grade point average. Self-regulation indices were obtained from Brunder's task of artificial concept formation, response time stability, attentiveness, and questionnaire data concerning the S's behavior in everyday life. The high correlations among the indices of self-regulation are taken to indicate the existence of a general factor of self-regulation, and their correlation with school performance is considered to support the idea that individual differences in self-regulation are related to that aspect of general intelligence that manifests itself as learning ability. (English summary) (44 ref)—L. Zusne.

11770. Zuckerman, Miron & Gerbasi, Kathleen C. (U Rochester) **The relationship between four factors of Rotter's I-E Scale and other personality and attitudinal measures.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 191.

## PROFESSIONAL PERSONNEL

11771. American Psychological Assn. (Washington, DC) **Proceedings of the eighty-second annual convention.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 110.

11772. Androghetti, Teresa. (Appalachian Regional Hosp, AR-CAP, Beckley, WV) **The nurse and the alcoholic patient.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses the quality of the nursing care received by the alcoholic patient from the viewpoint of adequate preparation of the nurse. The role and training of the nurse as conceived and implemented by the Appalachian Regional Comprehensive Alcoholism Program are detailed.

11773. Bachrach, Henry; Luborsky, Lester & Mechanick, Philip. **The correspondence between judgements of empathy from brief samples of psychotherapy, supervisors' judgements and sensitivity tests.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 337-340.—Conducted a study of 25 psychiatric residents to investigate the relationship between segment-based judgments of empathy and skill with supervisors' ratings of empathy and skill based on 6 mo or more of meetings with each therapist. The Sundberg Test of Implied Meanings was employed as a measure of the therapist's ability to detect implied verbal meanings; the Spence-Rubin Double Profile was used as a measure of the therapist's sensitivity to nonverbal, subliminal cues. Results show that (a) judgments of empathy and skill obtained from brief segments correlated significantly with such judgments obtained from supervisors; (b) not only with such judgments obtained from supervisors and systematic relationships emerged between empathy and skill and the other sensitivity measures; and (c) the ability to detect implied verbal meanings was related to judgments of empathy and skill obtained from segments, but not supervisors' estimates of the same qualities. (19 ref)—M. E. Pounsel.

11774. Baker, E. Jo & McPheeters, Harold L. (Georgia Inst of Technology) **Middle-level workers: Characteristics, training and utilization of mental health associates.** *Community Mental Health Journal*,

*Monograph Series*, 1975, No 8, 67 p.—Supervisors of mental health associates (MHAs) rated them on characteristics and performance before and after training. Supervisor reactions were generally favorable. MHAs were seen as more dedicated than workers trained in traditional health-related fields, but were also considered to lack self-confidence and to need more supervision. (48 ref)

11775. Berry, Raymond G.; Davidson, Park O. & Gibson, David. (Ontario Dept of Health, Canada) **Advisory council provincial associations of psychologists: Archival comment.** *Canadian Psychologist*, 1974(Oct), Vol 15(4), 368-375.—Presents an account of the origins, growth, and current programs of the Advisory Council of Provincial Associations of Psychologists. The new national organization is discussed in relation to the Canadian Psychological Association, and some ongoing tensions in Canadian psychology are elaborated. (French abstract)

11776. Boyd, John D. & Pate, Robert H. (U Virginia) **An analysis of counselor verbal response scale scores.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 198.

11777. Carrera, Michael A. & Rosenberg, Gary. (Hunter Coll, Inst of Health Sciences, City U New York) **Inservice education in human sexuality for social work practitioners.** *Clinical Social Work Journal*, 1973, Vol 1(Special Issue), 261-267.—Outlines inservice human sexuality seminars developed at a medical center on Long Island. Emphasis in the training is on general education, rather than specific therapeutic and technical approaches. Rationale for the curriculum is provided. Cognitive, affective, and skill components combine to make up the total program. Though research evaluation of the seminars' effects has not yet been done, positive feedback from participants has been obtained.—S. R. Stein.

11778. Carroll, Jean & Becker, Selwyn. **The paucity of course work in medical care evaluation.** *Journal of Medical Education*, 1975(Jan), Vol 50(1), 31-37.—Out of 107 medical schools responding to a mailed survey, 24 indicated that they were providing training in the techniques of medical care evaluation. The need for physicians to become familiar with the principles and methods of scientific evaluation of medical care is discussed.

11779. Carter, Dianne K. & Pappas, James P. (U Iowa, Counseling Service) **Systematic desensitization and awareness treatment for reducing counselor anxiety.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 147-151.—Compared the effects of systematic desensitization, an awareness treatment designed to increase awareness of interpersonal anxiety, and no treatment on the reduction of counselor's anxiety. 4 counseling graduate students assigned to 1 of the treatment conditions served as Ss. With treatment intervening, Ss participated in pre- and postcounseling interviews with a client-accomplice. A multivariate analysis of postanxiety measures showed no difference between the treatment groups, but in comparison to the no-treatment control group both treatments were associated with significant anxiety reduction on 4 measures related to speech disturbance, extraneous body move-



ment, and self-reported anxiety. (24 ref)—*Journal abstract*.

11780. Degner, Lesley. (U Manitoba, School of Nursing, Winnipeg, Canada) **The relationship between some beliefs held by physicians and their life-prolonging decisions.** *Omega: Journal of Death & Dying*, 1974(Fal), Vol 5(3), 223-232.—Developed a Guttman scale to elicit physicians' tendencies in regard to life-prolonging decisions. 92 physicians in a nonsectarian hospital returned a mailed questionnaire containing the scale. It was found that the great majority (79.4%) of the Ss favored withdrawing treatment from terminally ill patients in at least 2 out of 3 imaginary situations. A comparison of the Ss' life-prolonging decisions by their beliefs in God and afterlife yielded no significant differences. Comparison of the Ss' life-prolonging decisions by their beliefs about death indicated that physicians who favored withdrawal of treatment from terminally ill patients viewed death more as a negative than as a neutral or positive phenomenon. (17 ref)—*Journal abstract*.

11781. Doyle, Brian B. & Smith, Walter J. (George Washington U, School of Medicine & Health Sciences) **Using short-term intervention with priests.** *Hospital & Community Psychiatry*, 1975(Jan), Vol 26(1), 30-32.—Discusses a short-term group program designed to increase priests' effectiveness in helping others. 10 1½-hr weekly sessions were held with 6 priests, aged 23-47 yrs, to increase their knowledge of mental health resources, break down stereotypes of mental health professionals and priests, and help them deal with changes occurring in the church organization. It was found that the priests were able to deal only superficially with issues such as identity and intimacy, but as a result of the experience, they could cope better with their day-to-day work and were better able to use mental health professionals as consultants.—*Journal abstract*.

11782. Dörken, Herbert. (U California, Langley Porter Neuropsychiatric Inst, San Francisco) **Private professional sector innovation in higher education: The California School of Professional Psychology.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 15-21.—Describes the Doctor of Psychology (PsyD) degree program offered by the California School of Professional Psychology, the only autonomous school in psychology in the country to offer this degree. The process leading to the funding, approval, and establishment of this school is discussed, and its educational innovations are outlined. Faculty appointments range from 1/5 to 3/4 time, over half of these being 1/2 time. The balance of the teaching load is carried by contract instructors. Since its inception in 1970 the number of formal applications for admission, complete with application fee, has substantially exceeded the projected student openings. Currently, there are 527 full-time students. The present curriculum model is described as emphasis on the need for well-trained professions. For those entering with a BA, completion of the PsyD can be done within 4 yrs; for those entering as PhD candidates, completion normally takes 2 yrs. The critical factor in training is that, throughout the program, students must demonstrate a capacity and interest for involvement in social problems and helping people.—R. S. Albin.

11783. Eastern Psychological Assn. **Proceedings of the forty-fifth annual meeting. Catalog of Selected Documents in Psychology, 1974(Fal), Vol 4, 110.**

11784. Elthammar, Olof. [A training program for mental health personnel in a northern county of Sweden.] (Swed) *Psykisk Hälsa*, 1972, Vol 13(2), 127-132.

11785. Eskedal, Glen A. (Suffolk U) **Symbolic role modeling and cognitive learning in the training of counselors.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 152-155.—Investigated the effects of symbolic role modeling on the cognitive learning of counseling techniques. The purpose was to test the relative efficacy of 2 different symbolic role modelings on the desired learning. The posttest-only control group design was used. Ss were 56 master's level counselor education students randomly assigned to the following treatment groups: (a) symbolic role modeling with attentional variables, (b) symbolic role modeling only, (c) control with attentional variables, and (d) control only. Results show statistical significance ( $p < .05$ ) in the level of acquisition responses by the 2 modeling treatments over the 2 control treatments and the modeling treatment with attentional variables over the modeling-only treatment. Implications for practice are discussed.—*Journal abstract*.

11786. Eysenck, H. J. (Inst of Psychiatry, London, England) **Some comments on the relation between A-B status of behavior therapists and success of treatment.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 86-87.—Argues that several weaknesses in L. E. James and M. E. Foreman's (see PA, Vol 51:7703) study do not support their conclusion that the A-B therapist variable is associated with outcomes of behavior therapy. The authors' concept of enuresis as a neurotic disorder is questioned, and the failure of the experimental design to insure a random assignment of the therapist to each case and the failure to investigate personality factors in both the children and their mothers are examined.

11787. Fischer, Michael J. & Apostol, Robert A. (U North Dakota) **Selected vocal cues and counselor's perceptions of genuineness, self-disclosure, and anxiety.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 92-96.—Investigated whether or not selected vocal cues emitted by a counselee influence the perception of her personality by observing counselors. Ss were 20 male and 20 female 2nd-semester master's level students in counseling and guidance. 2 vocal cues (filled and unfilled pauses) were selected, and it was determined whether a difference existed between them in their influence on the perception of the counselee's genuineness, self-disclosure, and anxiety. A significant difference was found among selected filled and unfilled pauses in the perception of self-disclosure but not in the perception of genuineness or anxiety. Findings are discussed, a possible pause gradient is hypothesized (increasing total pause time may lead to perceptions of increasing self-disclosure), and further research is recommended. (21 ref)—*Journal abstract*.

11788. Goepfert, S. [A sketch of a university curriculum for specialization in psychoanalysis.] (Germ) *Zeitschrift für Psychotherapie und medizinische Psycholo-*

gie, 1974(Jan), Vol 24(1), 21-30.—Notes that a university curriculum leading to specialization in psychoanalysis does not exist in West Germany even though student interest in psychoanalysis is increasing. Postgraduate training programs for psychoanalysis in the US and recently in West Germany give rise to questions about curriculum. Postgraduate psychoanalysis programs which stress clinical therapeutic aspects involve 2 dangers: (a) Too little attention will be paid to the development of psychoanalytic theories. (b) Public discussion of self-understanding and of the relationship between psychoanalysis and society will be avoided. A tentative curriculum for psychoanalysis training is offered for criticism.—*S. D. Babcock.*

11789. Halleck, Seymour L. (U North Carolina) **A troubled view of current trends in forensic psychiatry.** *Journal of Psychiatry & Law*, 1974(Sum), Vol 2(2), 135-157.—Discusses the increased involvement of psychiatrists in the resolution of social conflicts. It is suggested that while psychiatrists can sometimes help the courts make more informed decisions, there is reason to question whether much of current psychiatric involvement in legal issues serves a useful social purpose. The validity of attacks on certain psychiatric practices and the potential long-term effects on the treatment of patients are also discussed.—*Journal abstract.*

11790. Halliday, Gordon W. (U Kansas) **Reference time depth and duplications in doctoral dissertations in psychology.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 112.

11791. Heikkinen, Charles A. & German, Steven C. (Yale U, Medical School, Physician's Assoc Program) **Change of counselor attitudes: Complications due to closed-mindedness.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 170-172.—In line with C. G. Kemp's (see PA, Vol 37:6922) study, the present study examined the possibility that closed-mindedness as measured by the Rokeach Dogmatism Scale, Form E, may interfere with attitude-change findings in counselor education. Ss were 16 practicum and 16 control group students enrolled in a master's level counselor education program. Although results are not statistically significant, trends in the data conform closely enough to those of Kemp to raise the possibility that previous findings of counselor attitude change may be subject to reinterpretation once the distorting influence of conformism due to closed-mindedness is taken into consideration. Further research is recommended with larger and more representative samples.—*Journal abstract.*

11792. Hes, Jozef Ph. (Hebrew U, Jerusalem, Israel) **The changing social role of the Yemenite Mori.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

11793. Hummel, Thomas J.; Lichtenberg, James W. & Shaffer, Warren F. (U Minnesota, Education Career Development Office, Minneapolis) **CLIENT 1: A computer program which simulates client behavior in an initial interview.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 164-169.—Presents details of CLIENT 1 in which, through interaction with the counselor, a programmed client progresses toward the goal of verbalizing a specific problem statement. Client movement is a

function of the simulated variables: threat value of counselor and client statements, strength of the relationship, and an index of counselor competence. The simulation project is valuable as a means of training and evaluation in counselor education and in studying counselor cognitive processes. The program, written in FORTRAN IV, also provides an opportunity to test the sufficiency of an explicit set of theoretical constructs for explaining client behavior.—*Journal abstract.*

11794. Kaplan, Seymour R. et al. (Albert Einstein Coll of Medicine, Yeshiva U) **Teaching mental health administration to psychiatric residents and fellows: A progress report.** *Administration in Mental Health*, 1972(Win), 30-39.—Describes how to recruit, where to train, and what to teach in a curriculum for administrative psychiatry and mental health administration. (25 ref)

11795. Lally, John J. & Barber, Bernard. (Lehman Coll, City U New York) **"The compassionate physician": Frequency and social determinants of physician-investigator concern for human subjects.** *Social Forces*, 1974(Dec), Vol 53(2), 289-296.—Medical authorities have commented that the "compassion" of the physician-investigator for human Ss, together with his professional expertise and other individual qualifications, is more important than, and preferable to social controls, for the protection of Ss' rights and welfare. Data from interviews with 337 research physicians were used to study the concept, "compassion," and permit estimation of the frequency of general concern for human Ss among physician-investigators and their specific concern for the actual Ss of their own investigations. Some research-related social conditions which tend to engender or activate this concern are specified. Findings of earlier studies, which can lead to an unwarranted conclusion that virtually all research physicians are deeply concerned and involved with their Ss, are thus qualified. Data indicate that physician-investigator "compassion" for Ss is far from universal. The need for social controls, such as peer review, is reaffirmed. (23 ref)—*Journal abstract.*

11796. Lennard, Henry L.; Bernstein, Arnold & Epstein, Leon J. (U California, Family Study Station, San Francisco) **The psychotherapist as a double agent.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 419-422.—Discusses the extent to which a mental health professional's actions are determined by himself and the extent to which they are determined by the organization in which he acts. The therapist is viewed as an agent of the social system, the legal system, the medical system, and the hospital. Conflicts between personal values and career goals, and the treating of a patient's problem without regarding his/her social circumstances, are considered. The often crippling impact of a therapist's attention being directed to a theoretical model instead of focusing on what is actually going on with the patient is noted. The therapist is encouraged to first demystify the situation in which he practices before treating a client's problems.—*R. Tomasko.*

11797. Levinson, Daniel J. & Klerman, Gerald L. (Yale U) **The clinician-executive revisited.** *Administration in Mental Health*, 1972(Win), 64-67.—Discusses a reprinted 1967 paper by the authors (see PA, Vol 41:13723) on the problems of the mental health clinician



serving in an executive capacity and examines its relevance in 1972. All of the points made in the original paper are considered to be still valid, but even stronger emphasis is now placed on the need of the clinician-executive to be trained for managerial responsibilities. The concepts of power, external boundaries, and negotiation are particularly discussed.

11798. Maslin, Audrey & Davis, Jerry L. (Temple U) **Sex-role stereotyping as a factor in mental health standards among counselors-in-training.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 87-91. —Examined the possibility of multiple standards of mental health due to sex-stereotypic expectations in 45 male and 45 female counselors-in-training. 22 Ss were doctoral students and 68 were in the master's program. On a shortened version of the Stereotype Questionnaire, female Ss held an approximately uniform standard for healthy males, females, and adults (sex unspecified); male Ss subscribed to this standard for healthy males and adults but held another, more stereotypically feminine standard for healthy females. Possible restrictive effects of a double standard upon female clients, the need for determining by research the prevalence and forms of sex-biased attitudes and behaviors among counselors, and ways of reducing sex biases through counselor training are discussed.—*Journal abstract*.

11799. Maxmen, Jerrold S. (Albert Einstein Coll of Medicine, Yeshiva U) **Forecasting and medical education.** *Journal of Medical Education*, 1975(Jan), Vol 50(1), 54-65.—Describes modern forecasting techniques and criteria to evaluate prognostic endeavors, including intuitive forecasting, consensus methods, cross-impact matrix methods, and trend extrapolation. Examples of how these "futures research" techniques can be applied to medical education are provided. (22 ref)

11800. Melnick, Rosalie R. **Counseling response as a function of method of problem presentation and type of problem.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 108-112.—Investigated the effects of different methods of problem presentation and client problems on the counseling responses of 42 graduate students enrolled in counseling methods courses. Ss responded to client statements which involved both social-personal and vocational-educational concerns, and which were presented by typescript, videotape, and role-playing actors. Responses were rated for levels of empathy, respect, and genuineness, and for proportions of affective and exploratory responses. Analyses of variance and correlational procedures indicate that the method of problem presentation and type of problem had significant effects on counseling response, and that some predictable relationships existed. Implications for educators involved in the evaluation of counseling behaviors are discussed. (16 ref)—*Journal abstract*.

11801. **Midwestern Psychological Assn. Proceedings of the forty-sixth annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 110.

11802. Monty, Richard A. (US Army Human Engineering Lab, Aberdeen Proving Ground, MD) **An interdisciplinary directory of scientists engaged in the study of eye movements.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 160-161.

11803. Murray, Patricia. (Methodist Hosp, Brooklyn, NY) **Death education and its effect on the death anxiety level of nurses.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1250.—30 female nurses who participated in a 6-wk death education program were administered Templer's Death Anxiety Scale before, at the end of, and 4 wks after training. Death anxiety had decreased significantly during the 4th wk after but not during the 6 wks of the program.

11804. Naftulin, Donald H. & Andrew, Barbara J. (U Southern California, Medical School) **The effects of patient simulations on actors.** *Journal of Medical Education*, 1975(Jan), Vol 50(1), 87-89.—Medical histories, clinical interviews, and MMPI scores suggest that professional actors who have simulated patients for educational purposes demonstrate no greater physical or emotional consequences associated with their roles than professional actors who have not simulated patients.

11805. Nay, W. Robert & Kerkhoff, Thomas. (Virginia Commonwealth U) **Informational feedback in training behavioral coders.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1175-1181.—Used videotapes of children's behavior in a natural setting to train 24 undergraduates to use a coding system. Ss were randomly assigned to training under conditions of immediate feedback, delayed feedback, and no feedback. Analyses of Ss' responses to a criterion videotape following training showed that feedback was superior to no feedback. The superiority of immediate feedback to delayed feedback was shown in evaluating performance during training but not in comparing criterion responses after training.—*Journal abstract*.

11806. Patton, Kenneth. (U Maryland) **On cultural diversity.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 22-25.—Describes efforts made by faculty and students in the clinical psychology training program at the University of Maryland that reflects their support of the cultural diversity of the community. In trying to remedy the evident lack of minority group students in this program, members are trying to get out into the community more often. In addition, the clinical area is seeking to be a more central part of community life. The meaning of the term "scientist-professional" is discussed. Relationships between graduate students and faculty members are explored with reference to parent-child models and transference. Specific feelings of black students are cited.—R. S. Albin.

11807. Perlstadt, Harry. (Michigan State U) **MCAT: A gate in admissions and internship placements.** *Journal of Medical Education*, 1975(Jan), Vol 50(1), 78-81.—Surveyed 78 medical schools to examine the relationship between the admissions process, school characteristics resulting from the admissions process, and the proportion of the school's seniors placed in rotating internships. Results indicate that 3 mechanisms control the admissions "gateway": residency regulations, tuition costs, and scores on the Medical College Admission Test.

11808. Peterson, Craig M. (VA Hosp, Palo Alto, CA) **An experimental study of the effects of training on the ability of nonprofessionals to modify the behavior of psychiatric patients.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 197-198.

11809. Phelps, William R. (West Virginia Div of Vocational Rehabilitation, Charleston) **Some thoughts on speech problems for the vocational rehabilitation counselor.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 199.

11810. Phelps, William R. (West Virginia Div of Vocational Rehabilitation, Charleston) **Rehabilitation counseling information: Programmed instruction for the practitioner.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 133.

11811. Resta, Giorgio. [The teaching of psychosomatic medicine with special reference to the main aspects of psychology.] (Ital) *Medicina Psicosomatica*, 1972(Apr), Vol 17(2), 113-123.—Charges that to define psychology as "the science of behavior" is inadequate. The different disciplines studying behavior must be precisely distinguished: the study of behavior within the physical and clinical environment (psychophysiology), the study of behavior in the normal human environment (social psychology), and the study of behavior in a pathological human environment and in the process of recovery (psychotherapy). Psychosomatic medicine must evaluate its relationship with each of these 3 psychological disciplines. (French & English summaries)—D. L. Araoz.

11812. Rieger, Norbert I. & Devries, Alcon G. **The need and some specific suggestions for a standardized training program for a new professional: The child mental health specialist.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 177-187.—Proposes a standard training program for a new child care professional to be called a child mental health specialist (CMHS). The CMHS would work with children and adolescents who have problems of varying severity, in a wide variety of settings. Skills to be possessed by the CMHS and 4 levels of competency and training, ranging from 1 yr to the MA level, are proposed. Specific objectives of training are enumerated. Practical training in a variety of child care settings is stressed and a core program of academic subjects is described.—J. H. Feldstein.

11813. Rocky Mountain Psychological Assn. **Proceedings of the forty-fourth annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 111.

11814. Rusconi, S. [Human rapport in medicine.] (Ital) *Medicina Psicosomatica*, 1972(Apr), Vol 17(2), 135-144.—Stresses the importance of the doctor-patient relationship in view of the great incidence of psychosomatic symptoms. A theoretical-formative training is advocated, i.e., traditional teaching together with practical or formative training in psychological principles of communication and understanding. It is suggested that formative training is best carried on in self-awareness groups. (French & English summaries)—D. L. Araoz.

11815. Selfridge, Fred F. et al. (Valley Central Middle School, Montgomery, NY) **Sensitivity-oriented versus didactically oriented in-service counselor training.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 156-159.—Compared the effectiveness of 2 different in-service training workshops for counselors. 18 male and 15 female secondary school counselors with a mean age of 37.3 yrs and mean counseling experience of 6.3 yrs served as Ss. 22 Ss were given a 16-hr Carkhuff-type

refresher in facilitative interpersonal process plus 8 hrs either of sensitivity experiences or traditional didactic learning. 11 volunteers whose schedules could not be accommodated served as controls. Pre-post criteria of relationship skill were assessed in actual and simulated interviews. Results demonstrate the usefulness of Carkhuff-based training supplemented by group encounter as a professional-skills enhancer, and underscored the transferability of sensitivity training gains to counseling. It is concluded that the interpersonal learning that occurs in a sensitivity context may be a more valuable resource in real-life counseling situations than the learning effected by didactic materials. (17 ref)—*Journal abstract*.

11816. Shapiro, S. I. (U Hawaii) **Research writing and publication in psychology: A bibliography.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 112.

11817. Sindhu, S. S. (U Tasmania, Hobart) **Training of the medical undergraduate in the care of the mentally retarded.** *Australian Journal of Mental Retardation*, 1974(Jun), Vol 3(2), 56-57.—Suggests that the medical student's education should include training in (a) assessment of mental and physical handicaps; (b) need for early referral to the appropriate center for full investigation; (c) planning of future management in collaboration with social, educational, and therapeutic agencies; and (d) visiting local centers dealing in the care of the handicapped.—*Journal abstract*.

11818. Southeastern Psychological Assn. **Proceedings of the twentieth annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 111.

11819. Southern Society for Philosophy and Psychology. **Proceedings of the sixty-sixth annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 110.

11820. Southwestern Psychological Assn. **Proceedings of the twenty-first annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 111.

11821. Valko, Robert J. & Clayton, Paula J. (Washington U, Medical School) **Depression in the internship.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 26-29.—Conducted structured psychiatric interviews with 53 1st-yr residents to investigate depression and suicidal thoughts during the internship year. 30% of the residents experienced depressions during this time, the majority occurring during the initial months of the internship. Comparisons between depressed and nondepressed groups indicate that more depressed interns had suicidal thoughts, marital problems, previous depressions, and positive family psychiatric histories. There was a high correlation between long working hours and depression. The cause of the depression symptom complex is discussed in terms of a predisposition to depression and reaction to stress. It is suggested that changes in the internship be considered.—F. L. Beyer.

11822. Wehmer, Gerald; Cooke, Gerald & Gruber, John. (Harbor Light Alcohol Treatment Ctr, Detroit, MI) **Evaluation of the effects of training of paraprofessionals in the treatment of alcoholism: A pilot study.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 25-31.—Describes a pilot program for training paraprofessionals in the treatment of alcoholism. Ss were respondents



to a notice of the availability of training, which was conducted 4 days/mo for 5 mo by members of the Salvation Army Harbor Light Alcoholism Treatment Center and consultants from Wayne State University, Detroit. Demographic and background data regarding the Ss were obtained, and several questionnaires were administered pre- and posttest and during training. Training was followed 1 yr later by a standardized telephone interview to determine the effect of the program on the trainee's work. The statistical treatment of the data is described. Hypotheses were that (a) training would produce a positive change in attitude toward alcoholism and (b) information about alcoholism would increase. Tentative conclusions support the 1st hypothesis but not the 2nd. An important effect was that the trainees' therapeutic technique changed from directive to nondirective. Overall, the program enabled trainees to use a wider range of techniques to progress to higher-level jobs. (15 ref)—A. P. Balvère.

11823. Weitz, Lawrence J.; Anchor, Kenneth N.; Benefee, Lee & Sandler, Howard M. (George Peabody Coll for Teachers) **Professional preparedness, identity status, and graduate training in the counseling professions: A survey.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 132-133.

11824. Wendt, Ingeborg Y. **Scientific development aid: A proposal for more adequate medical faculties in third world regions.** *International Mental Health Research Newsletter*, 1973(Win), Vol 15(4), 9-10.—Proposes a model medical faculty in a Third World region, organized by a social scientist, to enable Third World medical students to study endemic diseases on location along with sociological and psychological factors influencing health. Close contact would be maintained between the medical faculty and Western individuals and organizations, and the flow of talent from the Third World would be stemmed.

11825. Western Psychological Assn. **Proceedings of the fifty-fourth annual meeting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 110.

## PHYSICAL AND PSYCHOLOGICAL DISORDERS

11826. Alley, Gordon R.; Snider, Bill; Forsyth, Robert A. & Optiz, Erica. (U Kansas) **Comparative parental MMPI protocols of children evaluated at a child development clinic.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1147-1154.—144 pairs of parents completed an MMPI upon evaluation of their children at a clinic before diagnosis. Parents were divided into 3 groups according to the diagnostic classification of the child: (a) minimal cerebral dysfunction, (b) behavior disorder, and (c) normal child. Separate multivariate analyses, computed for the groups by comparing the mean MMPI scores on the validity scales and the clinical scales for fathers and mothers, showed no significant differences in MMPIs of fathers on the validity scales. Also, no difference appeared on the 3 sex-determined analyses of the clinical scales. However, significant differences were found when scores for both the mothers alone and the combined fathers and mothers were analyzed across the

validity scales. The mothers of children with behavior disorders produced lower K scores (test-taking attitude). It is concluded that, while these parents could not be differentiated on the basis of clinical scales of the MMPI, they could be on the test-taking attitude of the mothers of those children evidencing behavior disorders.—*Journal abstract.*

11827. Brekke, Beverly W. & Williams, John D. (U North Dakota) **Educational disability and conservation.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11828. Green, Richard. (State U New York, Stony Brook) **The behaviorally feminine male child: Pretranssexual? Pretransvestic? Prehomosexual? Preheterosexual?** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11829. Heiman, Elliott M. & Cao Van Lê. (U Arizona) **Transsexualism in Vietnam.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 89-95.—Reports the case of a man raised in the Vietnamese peasant countryside who clearly fits the transsexual syndrome. On physical examination he appeared to be a normal male, yet he insists that he is a female. He dresses as a woman and is able to successfully "pass" in society. He relates that he felt he was a female from earliest childhood. He prefers nonhomosexual men, denies any heterosexual experience, and has an all-consuming desire for the sexual transformation operation. The social aspect of transsexualism and the manner in which a society, particularly the Vietnamese, may handle transsexual behavior is discussed. A case of a female transsexual is also briefly reported. (18 ref)—*Journal abstract.*

11830. Hoffmann, Norman G. & Butcher, James N. (U Minnesota) **Clinical limitations of three Minnesota Multiphasic Personality Inventory short forms.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 32-39.—Compared 3 MMPI short forms, the Mini-Mult, T. Faschingbauer's 166, and the MMPI-168, which were constructed by different methodologies, using 1,028 male psychiatric patients as Ss. Although the short-to standard-form correlations for all 3 short forms were generally high (ranging from .74 to .96 for the MMPI scales), the success in accurately predicting the code type was quite low. The hit rates in predicting the 58 code types used in the study were 36.7% for the Mini-Mult, 40.4% for the MMPI-168, and 49.4% for Faschingbauer's 166 form. An analysis of false positive and false negative test misses showed further weaknesses in MMPI short forms. Results question the use of MMPI short forms for clinical interpretation based on usual profile interpretation procedures (code-type analysis). (25 ref)—*Journal abstract.*

11831. Mikulec, A. & Rajsiglová, E. (Neurologické oddělení psychiatrické léčebny, Kroměříž, Czechoslovakia) **[Importance of echoencephalography for psychiatry.]** (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 170-179.—Describes echoencephalography as a time-saving and undemanding diagnostic tool. It helps differential diagnosis to reveal expansive processes in

pseudoneurasthenias and psycho-organic syndromes, and to identify hydrocephalic ventricular changes in some psychotic states. Several echograms are presented and explained. (Russian & English summaries) (40 ref) —V. Fischmann.

11832. Money, John. (Johns Hopkins U, School of Medicine & Hosp) **Ablatio penis: Normal male infant sex-reassigned as a girl.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 65-71.—Reports 45 cases of genetic males who were assigned and habituated as females, 43 because of a congenitally defective penis (micropenis with or without hypospadias), and 2 because of infantile ablatio penis. One of the latter has an identical twin brother as a control. Now 9 yrs old, she has differentiated a female gender identity in marked contrast to the male gender identity of her brother. Some of the other patients are now adolescent or adult in age. They demonstrate that the twin can expect to be feminine in erotic expression and sexual life. Maintained on estrogen therapy, she will have normal feminine physique and a sexually attractive appearance. She will be able to establish motherhood by adoption.—*Journal abstract.*

11833. Rassidakis, N. C.; Erotocritou, A. & Volidou, M. (U Athens, Greece) **The study of the etiology and pathogenesis of schizophrenia, the psychosomatic illnesses, diabetes mellitus and cancer.** *International Mental Health Research Newsletter*, 1973(Win), Vol 15(4), 14-16.—Presents the argument based on the findings of others and on personal work and observations that schizophrenia, the psychosomatic illnesses, diabetes mellitus, and cancer are all psychosomatic transformations of nuclear anxiety, and that these diseases all fall on the illness continuum first described by C. B. Bahnson (1969). Evidence mustered in support of the argument includes (a) the frequent appearance of these diseases around adolescence and the involutional periods; (b) the disappearance of anxiety once the disease is established; (c) the existence of carcinogenic, schizophrenogenic, and diabetogenic agents; and (d) the basic incurability of all these illnesses.—C. A. Heikkinen.

11834. Rorsman, B. (Lund U, Inst of Psychiatry, Sweden) **Mortality among psychiatric patients.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 354-375.—A study of mortality over a 6-yr span among patients seen during 1962 in the psychiatric department of a Swedish hospital revealed 260 deaths compared to 159 expected deaths in a corresponding general population sample. To determine high-risk groups within the psychiatric population, the patients who died were compared with a random sample of psychiatric patients still alive at the end of the observation time, on social and medical factors previously found to be related to mortality. Divorced persons were more common among those who died than among controls, and more males who died were living alone, alcoholics, unemployed, or invalid pensioners. The one outstanding psychiatric diagnosis among those who died was organic brain syndrome. More than 50% of the patients who committed suicide had previously attempted suicide. A high proportion of those who died were hospitalized in somatic wards and sent to the psychiatric outpatient department for psychiatric assessment. Common reasons for referral

were recently attempted suicide and pain, often of unknown origin. (50 ref)—*Journal abstract.*

11835. Shoham, S. Giora. (U Tel-Aviv, Law Faculty, Criminology Inst, Israel) **Society and the absurd.** New York, NY: Springer, 1974. xvii, 214 p. \$9.50.—Approaches "the absurd" from a sociological point of view and uses the concept as the basis for discussing various social themes, including social deviance, alienation, and madness. The relation of the absurd to the concept of norms and normative behavior is also considered. (12 p ref)

11836. Stever, Larry et al. (Stanford U, Medical School) **Gradients of biogenic amine metabolites in cerebrospinal fluid.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 13-16.—Assayed the concentrations of 5 hydroxyindoleacetic acid and homovanillic acid in the lumbar cerebrospinal fluid of 6 neurological and psychiatric patients in either sitting, lying, or after somersaulting positions. Patients tapped in the sitting position were shown to have a clear concentration gradient of acid metabolites in the spinal cord, which was not seen in patients tapped in the lying position or after somersaulting. The appropriateness of using cerebrospinal fluid metabolite concentrations as indexes of central nervous system metabolism is discussed. (42 ref) —F. L. Beyer.

11837. Stine, Oscar C.; Pacanowski, John P.; Roffman, Ruth V. & Heald, Felix P. **Two health questionnaires for adolescents.** *Journal of School Health*, 1974(Mar), Vol 44(3), 136-139.—Compared the sensitivity of a short and long health questionnaire to a physician's diagnosis in identifying problem areas in adolescents. Specific strengths and weaknesses in each form's ability to communicate between adolescent and physician are discussed in detail.

### Mental Disorders

11838. Fields, Francis R. & Fullerton, John R. (VA Hosp, Lebanon, PA) **Influence of heroin addiction of neuropsychological functioning.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 114.—Compared performance of 25 heroin-addicted veterans, 25 brain-damaged veterans, and 25 normal controls on the Halstead Impairment Index. All subtests significantly discriminated between the brain-damaged group and the heroin-addicted and normal groups, but there were no significant differences between the latter 2 groups.

11839. ———. **Identifying schizophrenia on worldwide basis.** *Health Services Reports*, 1973(Dec), Vol 88(10), 975-976.—Announces release by the World Health Organization of Vol 1 of an International Pilot Study of Schizophrenia, the result of a 10-yr research project that investigated 1,202 patients in 9 countries. The study proved that international collaboration is feasible, that research procedures for international use can be developed, and that similar types of schizophrenia could be found in the 9 countries.

11840. Allodi, F. A. (Clarke Inst of Psychiatry, Toronto, Ontario, Canada) **Accident neurosis: Whatever happened to male hysteria?** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 291-296.—Reports on 50 patients referred by the Workmen's Compensation Board for psychiatric evaluation, after disabling acci-



dents. Little evidence was found that the patients had had psychiatric problems before their accidents. Symptoms were mainly hysterical (conversion reactions). The patients did not respond to treatment; the question of their right to compensation had not yet been settled, which may have caused secondary gain. Suggestions are offered for planning further research on accident neurosis. (French summary) (23 ref)—*F. Auld*.

11841. **Andreasen, N. J. & Powers, Pauline S.** (U Iowa, Medical School) **Overinclusive thinking in mania and schizophrenia.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 452-456.—Evaluated 16 manics, 15 schizophrenics, and 15 normal controls using R. Payne's (see PA, Vol 37:3228) battery of tests for overinclusive thinking. The manics showed significantly more overinclusive thinking than the schizophrenics on 2 out of 3 tests in the battery and on total transformed score. Schizophrenics were underinclusive when compared with normal controls, and manics were overinclusive. These data suggest that overinclusiveness is not specific to schizophrenia and that it is associated with illnesses which remit or have a good prognosis. (19 ref)—*Journal summary*.

11842. **Antonelli, Ferruccio & Ancona, Leonardo.** (Catholic U, School of Psychiatry, Rome, Italy) **[Methodology in psychosomatic research.]** (Ital) *Medicina Psicosomatica*, 1972(Apr), Vol 17(2), 103-111.—Because the psychosomatic process affects the individual in every aspect of his existence—social, mental and biological—it is difficult to outline methodology appropriate to psychosomatic research. It is suggested that it would be more useful to differentiate methods according to possible research directions: etiology, pathogenesis, diagnosis, or therapy. (English & French summaries) (27 ref)

11843. **Aronow, Edward; Reznikoff, Marvin & Tryon, Warren W.** (Fordham U) **The interpersonal distance of process and reactive schizophrenics.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 94.—Attempted to determine whether process and reactive schizophrenic males would use their interpersonal space differently from each other and from a normal control group. Data from 4 measures of interpersonal distance do not indicate that process schizophrenics were more interpersonally distant than reactive schizophrenics or normals, but suggest that the hypothesized differences in social adequacy between process and reactive patients and normals were not reflected in their use of interpersonal distance.

11844. **Berg, Ian & Collins, Tony.** (Scalegor Park Hosp, High Lands Adolescent Unit, Burley-in-Wharfedale, England) **Willfulness in school-phobic adolescents.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 468-469.—Conducted a study with 43 school-phobic and 37 non-school-phobic Ss admitted to an adolescent inpatient unit to determine the amount of oppositional behavior shown by the Ss in the family setting. Ss were administered a 12-question rating scale designed to measure this behavior. No sex, age, social class, or school differences emerged from 1-way analyses of variance on the 1st 5 factor scores on the questionnaire. When comparisons were made between the 24 acute school phobics, the 19 chronic school phobics, the 12 Ss with

conduct disorders, and the 25 with other problems, it was found that Ss with conduct disorders were significantly more resistive. Results do not support the view that school-phobic children are unduly willful toward their parents, as compared to other psychiatric cases.—*Journal summary*.

11845. **Berg, Ian; Butler, Alan & Pritchard, Janice.** (Scalegor Park Hosp, High Lands Adolescent Unit, Burley-in-Wharfedale, England) **Psychiatric illness in the mothers of school-phobic adolescents.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 466-467.—Investigated maternal psychiatric illness in 100 school-phobic and 113 non-school-phobic children admitted to an adolescent unit. Results indicate that approximately 20% of the parents had a history of psychiatric disorder in both groups. Over 50% of the affected mothers in each group had suffered from an affective disorder. It was not possible to relate school phobia to the type of maternal mental illness.—*Journal summary*.

11846. **Campagna, Anthony F. & Harter, Susan.** (Whiting Forensic Inst, Middletown, CT) **Moral judgment in sociopathic and normal children.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 199-205.—A total of 44 mental age- and IQ-matched 10-13 yr old normal and sociopathic boys were administered L. Kohlberg's moral development interview and the WISC. Results reveal that level of moral reasoning was higher for normal than for sociopathic Ss at both mental age levels. Within each group, high-mental-age Ss tended to have higher moral judgment scores than low-mental-age Ss, suggesting the presence of a general cognitive factor underlying moral development. The poorer performance of the sociopathic Ss was interpreted as supporting the formulation that sociopathy is related to an arrest in moral development. Discussion focuses on the relative lack of opportunities for role-taking and identification in the families of sociopathic children. (20 ref)—*Journal abstract*.

11847. **Chesno, Frank A. & Kilmann, Peter R.** **Societal labeling and mental illness.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 49-52.—Studied the perceptions of mental illness among 52 male and female patients recently committed to a large state mental hospital. Their mean educational level was 9.8 yrs with a range from 3 to 16 yrs. 3 dependent measures were employed: (a) the Ego-strength Scale (F. Barron, 1953) as an index of health and adjustment, (b) the Critical Items Scale as an estimate of pathology, and (c) the determination made by staff concerning the patient's ability to cope with release from the hospital. Ss were seen within 12 hrs after arrival at the hospital. After completing the test items, 35 were randomly assigned to return to their wards. The remaining 17 were informed that although their test results did not reveal mental illness, they would have to remain for a 30-day observation period because of hospital regulations. This 2nd group showed a higher release rate than did the group labeled as mentally ill. Results are interpreted in terms of society's power to label and confirm mental illness.—*R. S. Albin*.

11848. **Clayton, Paula J.; Herjanic, Marijan; Murphy, George E. & Woodruff, Robert.** (Washington U, Medical School) **Mourning and depression: Their similarities and**

differences. *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 309-312.—Compared 34 randomly-selected persons whose spouses had died within a month previously with 34 psychiatric inpatients, matched on age and sex, diagnosed as having a primary affective disorder. The patients had more symptoms (average 15) than the grieving normals (average 7). However, there was so much overlapping of symptoms that the 2 groups cannot be differentiated by the symptoms they exhibited. For research purposes, it is recommended that people who are depressed after the death of a close relative should not be considered as suffering from primary affective disorder. (French summary)—*F. Auld*.

11849. Copeland, J. R. et al. (Inst of Psychiatry, London, England) **Diagnostic differences in psychogeriatric patients in London and New York: United Kingdom-United States diagnostic project.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 267-271.—Compares 50 patients 65 yrs old and older, consecutive admissions to 2 hospitals in New York City, with 50 similar consecutive admissions to 4 hospitals in London. A project team of psychiatrists diagnosed all patients, with satisfactory reliability. Although the New York psychiatrists called more of their patients "organic" than London psychiatrists did, the project diagnosticians did not find any marked difference between the New York and London patients. (French summary)—*F. Auld*.

11850. Costello, C. G.; Christensen, S. J. & Rogers, T. B. (U Calgary, Alberta, Canada) **The relationships between measures of general depression and the endogenous versus reactive classification.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 259-265.—Tested 95 patients, mostly consecutive admissions to the psychiatric unit of a general hospital, using the Pilowsky Questionnaire and 4 self-report measures of general depression. The measures of depression correlated strongly (average  $r = .72$ ) with the Pilowsky measures of endogenous and reactive depression; but these scales correlated weakly (average  $r = .33$ ) with the Pilowsky classification score, which is intended to discriminate endogenous from reactive depression. It is concluded that H. J. Eysenck's assumption that there is a sharp, binary distinction between endogenous and reactive depression is wrong. (French summary)—*F. Auld*.

11851. Crisp, A. H. & Kalucy, R. S. (U London, England) **Aspects of the perceptual disorder in anorexia nervosa.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 349-361.—Conducted 2 studies with a total of 10 female anorexia nervosa patients and 6 female hospital staff with normal and stable weight to investigate some of the factors contributing to anorexia nervosa. Ss' reported overestimates of their body widths. Results show that (a) in both studies, the anorexia nervosa patients' initial self-reports of body widths were in the same direction and of the same magnitude as those reported by P. Slade and G. Russell (see PA, Vol 51:9223); (b) the younger "normal" Ss exaggerated their body size almost as much as the anorexia nervosa patients; and (c) the anorexia nervosa patients who did well still overestimated their body widths by about 10% after recovery. (24 ref)—*M. E. Pounsel*.

11852. Davids, Anthony. (Brown U) **Effects of human and nonhuman stimuli on attention and learning in psychotic children.** *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 108-116.—Explored the effect of human stimuli on the performance of psychotic children in a visual fixation experiment and a simple discrimination learning task. In a comparison of psychotic, younger normal, and older normal boys (5 in each group), the psychotics showed attentional deficits ( $p < .05$ ), but they were not influenced by the social vs nonsocial nature of the stimuli. The psychotic children showed improvement under conditions of positive reward for correct performance ( $p < .05$ ).—*Journal abstract*.

11853. Delany, Frances I. & FitzPatrick, Mary M. (League School, Brooklyn, NY) **The use of conservation-type tasks with seriously disturbed, non-institutionalized children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

11854. Elsnitz, Alan J. (State U New York, Downstate Medical Ctr, Psychoanalytic Inst, Brooklyn) **On the metapsychology of narcissistic pathology.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 279-291.—Discusses modification of Freud's concepts of (a) object choice, wherein the major cathexis is directed to the self representation and (b) attachment object choice, wherein the major cathexis is directed to the object representation. The major advantages of the modification are presented. From this frame of reference narcissistic conflict, narcissistic defenses, and narcissistic pathology are discussed. Some clinical examples are given.—*D. R. Marino*.

11855. El-Gaaly, A. A. (Queen Street Mental Health Ctr, Toronto, Ontario, Canada) **Social dysfunction in depressives and attempted suicides.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 341-345.—Used the Depression Rating Scale of M. Hamilton and the Social Dysfunction Rating Scale of M. W. Linn et al to compare 17 female depressed patients who did not attempt suicide with 21 female depressed patients who attempted suicide. The 2 groups were comparable in social class and marital status. The suicidal group was younger. Results show no significant difference between the 2 groups in the degree of severity of depression, but there was a significant difference in the degree of social dysfunction: the suicidal younger group showed more dysfunction.—*Journal abstract*.

11856. Fast, Irene. (U Michigan) **Multiple identities in borderline personality organization.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 291-300.—Discusses the multiplicity of identities as a particular characteristic of borderline personality organization. These identity characteristics are conceptualized as stemming from the period in development in which the infant is making the transition from narcissism to a commitment to objective reality. Object relations show characteristics of the separation-individuation phase—a movement beyond symbiosis, but a continuing heavy dependence on the other person's confirming reaction



for a continuing sense of identity. It is suggested that, depending on other personality developments, these characteristics may occur in a wide range of age and pathology. (21 ref)—*Journal summary*.

11857. Finch, A. J.; Deardorff, P. A. & Montgomery, L. E. **Reflection-impulsivity: Reliability of the Matching Familiar Figures Test with emotionally disturbed children.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1133-1134.—Administered the Matching Familiar Figures Test to 30 emotionally disturbed children (mean age = 11 yrs) at the beginning and end of a 3-mo period. Neither latencies nor errors were reliable.

11858. Finch, A. J.; Nelson, W. M.; Montgomery, L. E. & Stein, A. B. (Virginia Treatment Ctr for Children, Richmond) **Reflection-impulsivity and locus of control in emotionally disturbed children.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 273-275.—Conducted a study of 10 reflective and 10 impulsive emotionally disturbed boys (as determined by scores on the Matching Familiar Figures Test) to investigate the relationship between the cognitive dimension of reflection-impulsivity and locus of control. It was hypothesized that reflective Ss would be more internal in their locus of control than impulsive ones. Findings indicate that there was no difference between Ss employing an impulsive and a reflective cognitive style on the Nowicki-Strickland Locus of Control Scale for Children.—*M. E. Pounsel*.

11859. Fleischer, J.; Kolibás, E. & Žucha, I. (U Komenského, Bratislava, Czechoslovakia) **[Problems of multifactorial genesis of mental disorders.]** (Slovak) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 153-158.—Theorizes about the multifactor etiology of endogenous psychoses and examines the relative importance of the endogenous, reactive, and semantic factors in their pathogenesis. It is concluded that when the involvement of the endogenous factor decreases, the importance of the other 2 factors increases, the course of the illness becomes more complicated and its symptomatology more variable, and a more differentiated use of pharmacotherapy is then appropriate and necessary. Graphic schemes are presented in which the position of each type of psychosis is determined by the relative pathogenic importance of the 3 factors. (Russian & English summaries) (17 ref)—*V. Fischmann*.

11860. Fleiss, Joseph L.; Gurland, Barry J. & Goldberg, Kenneth. (New York State Dept of Mental Hygiene, Biometrics Research, New York) **Independence of depersonalization-derealization.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 110-111.—Used data from structured mental state interviews given to 866 psychiatric inpatients to investigate the hypothesized independence of the depersonalization-derealization syndrome from diagnosis and other factors of psychopathology. Results support the hypothesized relation, and confirm previous findings that depersonalization and derealization are nonspecific to other behaviors, are not related to sex, and decrease with age.

11861. Gandini, G. **[Psychosomatic aspects of the cephalalgic syndrome.]** (Ital) *Medicina Psicosomatica*, 1972(Apr), Vol 17(2), 153-157.—Estimates that over 30% of all headaches are psychosomatic. Diagnosis is based

on the absence of organic alterations and on the presence of a real psychoaffective imbalance. Administration of psychomedication is indicated, but psychotherapy must accompany any chemotherapy for the latter to be effective and lasting. (French & English summaries)—*D. L. Araoz*.

11862. Gelfand, Michael. (University Coll Rhodesia, Salisbury) **Psychiatric disorders as recognized by the Shona.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974, xvii, 475 p. \$2.95.

11863. Ginath, Yigal. (Talbieh Psychiatric Hosp, Jerusalem, Israel) **Psychoses in males in relation to their wives' pregnancy and childbirth.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 227-237.—Describes the normal psychic reaction of the male to the pregnancy and childbirth of his wife, subscribing to the opinion that normally these processes form an important step in the mental development of the male. The many ramifications of these events are surveyed. Against this background an attempt is made to survey the psychic difficulties aroused under these circumstances in the male (e.g., envy of the woman for her capability to become pregnant and give birth, enmity feelings and rivalry toward the fetus or the baby, and inclination towards regression). Psychic difficulties generally revive the unsolved childhood conflicts of those fathers. The possible psychopathological reactions in the male in this condition are described, including psychoses in connection with pregnancy and childbirth. 2 patients in whom a psychosis developed after the 1st childbirth of their wives are described. In both cases the condition was re-exacerbated after further pregnancies and childbirths.—*Journal abstract*.

11864. Glatzel, J. (Johannes-Gutenberg-U, Neuro-Psychiatrische Klinik, Mainz, W Germany) **[Psychopathological aspects of cyclothymic depressive courses.]** (Germ) *Psychiatria Clinica*, 1974, Vol 7(2), 120-128.—Only some of the main symptoms of cyclothymic depression can be considered as autochthonic. The syndrome which usually constitutes the clinical picture of cyclothymia, and determines its transformation in the course of time, is the result of the patient's coping patterns with the impairments caused by the illness and the modifications of the expectations of those with whom they interact. At the beginning, both sides try to keep the behavioral nonconformity below the level of social perception. Later on, the environment reacts to the behavioral disorder of the patient, branding him as mentally ill, and finally, the patient finds in his depressive delusions a new pseudo-identity, which allows him through his delusionally newly adopted role to create new interactional relationships and, in this way, to achieve a partial comeback to social life. (18 ref)—*English summary*.

11865. Golding, Stephen L.; Becker, Ellen; Sherman, Scott & Rappaport, Julian. (U Illinois) **The Behavioral Expectations Scale: Assessment of expectations for interaction with the mentally ill.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 109.—Describes the development and evaluation of a behaviorally specific expectation scale to facilitate investigations of behavior-expectation effects in social interactions with

the mentally ill. Data indicate that the 21-item true-false scale may be useful in further studies of the role of expectation in attitudes toward the behavior of persons labeled "mentally ill."

11866. Halonen, P. E.; Rimon, R.; Arohonka, Katve & Jäntti, V. (U Turku, Finland) **Antibody levels to herpes simplex type I, measles and rubella viruses in psychiatric patients.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 461-465. Serum specimens from 318 psychiatric patients and 32 healthy medical personnel (controls) were collected for herpes simplex Type I virus plaque neutralization test, measles hemagglutination inhibition test, and rubella hemagglutination inhibition test. The *k*-values of herpes simplex Type I antibody were significantly higher in 56 patients with psychotic depression than in 32 controls, and 27% of the patients with depression had higher antibody values than the highest value in the controls. In 54 patients with schizophrenia and in 32 patients with other psychiatric diseases, the *k*-values of herpes simplex Type I antibody were also significantly higher than in the controls, but the difference was not as marked as in the patients with psychotic depression. The mean rubella antibody titres were not significantly higher in the patients with psychotic depression than in the controls, whereas the mean measles hemagglutination inhibition titres were lower in each psychiatric group tested than in the controls. (15 ref)—*Journal summary*.

11867. Harper, Juliet. (New South Wales Coll of Paramedical Studies, Sydney, Australia) **Infantile autism: Subclassification on the basis of neurological impairment.** *Australian Journal of Mental Retardation*, 1974(Jun), Vol 3(2), 49-55.—Reviewed case history data on 131 autistic children (mean age = 10.8 yrs) to test the proposition that subclassification based on the presence or absence of positive neurological findings is of prognostic value. Results indicate that this measure was of limited use in defining subclusters of the epidemiological data included in the research. However, it did suggest that reproductive complications were a frequent variable in the etiological histories of the organic group and that environmental stresses were associated with the non-organic group. With respect to follow-up on intellectual functioning and language development, evidence of neurological impairment had no predictive significance. (21 ref)—*Journal abstract*.

11868. Herzog, Alfred & Detre, Thomas. (Hartford Hosp, CT) **Postpartum psychoses.** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 556-559.—Present a follow-up of 13 cases selected from admissions to the Yale-New Haven Hospital Psychiatric Unit between April 1960 and April 1963. Follow-up letters were sent to all 13 patients who were interviewed either in person or by telephone. The interval since hospitalization ranged from 6 mo to 12 yrs. All patients were married and came from a middle-class background. The average age was 28.6 yrs. 3 patients were diagnosed as having a schizophrenic episode, 5 as having a unipolar depression, and another 5 as having manic-depressive states. Patients with rapidly alternating manic-depressive states are discussed in detail. The correlation of these mood states with the multiple and rapid hormonal changes occurring postpartum is discussed. These patients re-

sponded uniformly and well to electroconvulsive treatment. (24 ref)—R. S. Albin.

11869. Hoenig, J. (Memorial U Newfoundland, St John's, Canada) **The schizophrenic patient at home.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 297-308.—Conducted a 4-yr follow-up study to assess the progress of 120 schizophrenic patients, all 1st admissions to 4 different psychiatric units. The patients were managed largely extramurally and lived mostly at home. They spent little time in the hospital, but only a few of them remained symptom-free throughout the follow-up period. Many patients were able to work. The effect the patient had on the household was considerable in terms of loss of earnings, separations from children, and frequent disturbing behavior. Nevertheless, many families were able to endure this without complaining, especially if the psychiatric services were part of a general rather than a mental hospital.—*Journal abstract*.

11870. Houlihan, John P. (Malcom Grow Medical Ctr, Andrews Air Force Base, Camp Springs, MD) **Visual word recognition and autonomic responsivity of schizophrenic patients.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 195.

11871. Hullin, R. P. et al. **Urinary cyclic AMP in the switch process from depression to mania.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 457-458.—Results of a study of a 42-yr-old manic-depressive female indicate that variations of urinary excretion of adenosine cyclic 3' 5' monophosphate (cyclic AMP) were not always related to mood. The transient increase of urinary cyclic AMP excretion associated with a rapid change from depression to mania found by M. Paul et al (see PA, Vol 46:7189), did not occur in the S. Calculation of the results in terms of  $\mu$ Moles cyclic AMP excreted per gram of creatinine also showed no correlation between cyclic AMP and mood.—*Journal summary*.

11872. Ingvar, D. H. & Franzén, G. (U Lund Hosp, Sweden) **Abnormalities of cerebral blood flow distribution in patients with chronic schizophrenia.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(4), 425-462.—Studied 11 younger (mean age = 25 yrs) and 9 older (mean age = 61 yrs) chronic schizophrenic inpatients. The younger patients were well preserved intellectually. All the older ones showed advanced deterioration with autism, bizarre behavior, symptoms of catatonia, and ongoing hallucinations. Regional cerebral blood flow (rCBF) was measured in the dominant hemisphere at rest and during attempts at mental activation. Both groups showed normal mean rCBF variables. In the older group, significant correlations were established between the mean hemisphere flow level and the degree of psychosis. The regional rCBF distribution was normal in the younger group, with a predominance of high flows in frontal regions. In the older patients, a hypofrontal pattern was found with relatively low flows frontally, and, in many cases, relatively high flows occipitally. Psychological testing with Raven's Progressive Matrices in the younger group gave normal flow augmentations within expected hemisphere regions. In the most autistic older patients, only very slight flow changes were recorded postcentrally in connection with a simple picture test. The hypofrontal rCBF distribution pattern found in older deteriorated schizophrenics



indicates that an abnormally low level of activity may prevail within the frontal lobe in such patients. Similarities between the emotional defects, speech, and motor abnormalities seen in chronic schizophrenia, and symptoms found in patients with frontal lobe lesions are pointed out. (71 ref)—*Journal abstract*.

11873. Jacobson, Shirley; Fasman, Jean & DiMascio, Alberto. (Boston State Hosp. Collaborative Depression Study, MA) **Deprivation in the childhood of depressed women.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 5-14.—Tested the hypothesis that childhood deprivation (i.e., the lack, loss, or absence of an emotionally sustaining relationship prior to adolescence) is associated with the occurrence of adult depression using data from 347 depressed inpatient women, 114 outpatient women, and 198 normal control women. All Ss were white and ranged in age from 18 to 60 yrs. Interviews were conducted with all Ss to document events occurring during childhood that could be considered within the definition of deprivation. Ss were also assessed as to depriving childrearing experiences. Findings indicate no association between adult depression and overt childhood loss events, but do provide evidence to support an association of depriving childrearing processes with adult depression. Evidence of a relationship between the degree of the depriving childrearing experience with the severity of the adult illness as measured by hospital status was also obtained. (26 ref)—*Journal abstract*.

11874. Jones, Gerald C. (Queen Street Mental Health Ctr. Toronto, Ontario, Canada) **Classification of mental illness: The value of certain French nosological concepts.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 273-277.—Argues that a reintroduction of the concepts of psychosis derived from French psychiatry would be of value in terms of clinical precision, research, and treatment. The relatively few diagnoses used in North America for psychoses other than depressive and organic are contrasted with the more extended French classification system. The demonstrated usefulness of the precise classification of depressive patients suggests that similar discrimination applied to other psychoses would be useful.—*Journal abstract*.

11875. Kinston, Warren & Rosser, Rachel. (Maudsley Hosp. London, England) **Disaster: Effects on mental and physical state.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 437-456.—Reviews the literature concerning phenomenological and dynamic descriptions of mental effects of disaster as observed in individuals and groups, and suggests its implications for the planning of services associated with disaster. Preventive and planning measures are discussed. (117 ref)—*W. G. Shipman*.

11876. Klerman, Gerald L. (Massachusetts General Hosp. Boston) **The broadening scope of research in depressive disorders.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 3-4.—Briefly examines some of the sources of the renewed interest in the study of depression and its treatment. The importance of integrating not only biological but also sociological and psychodynamic factors in the study of human affect is noted.

11877. LaTorre, Ronald A. (McGill U, Montreal, Quebec, Canada) **Gender and age as factors in the attitudes toward those stigmatized as mentally ill.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 97-98.—36 male and 72 female undergraduates read 2 case histories of either a male or female and young or old obsessive-compulsive patient or a schizophrenic patient. Ss' ratings of the patients on 5 rating scales support the proposition that males rate such patients as less ill and perceive less difficulty in getting along with them than females; however, they contradict the idea that female patients are considered less severely ill than a similarly described male patient. Age had no significant effects.

11878. Locke, Susan A. (Bernard M. Baruch Coll, City U New York) **Temporal discrimination of brief auditory stimuli by schizophrenics, neurologically impaired, and normals.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1111-1120.—Compared 36 normal, 36 schizophrenic, and 36 neurologically impaired male adults for their ability to temporally discriminate brief auditory stimuli. The experimental task was the absolute judgment of 3, 5, or 9 stimuli ranging in duration from .10 to 1.90 sec. Univariate and bivariate information analysis showed that normal Ss obtained significantly higher information transmission scores than did either brain-damaged or schizophrenic Ss. The 2 clinical populations failed to produce the classical information-transmission function of a linear increase up to channel capacity, then virtually no change thereafter. Normal Ss also demonstrated less response stereotypy than did the schizophrenic and neurologically impaired Ss. (39 ref)—*Journal abstract*.

11879. MacCrimmon, D. J.; Sigal, J. J. & Streiner, D. L. (McMaster U, Hamilton Psychiatric Hosp. Ontario, Canada) **Differential diagnosis of schizophrenic and nonschizophrenic adolescents by tests based on interference theory.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 279-285.—Uses interference theory as a basis for choosing psychological tests to detect schizophrenic deficit. 6 tests requiring selective attention in the face of competing stimuli were given to 9 nonschizophrenic and 12 schizophrenic adolescent psychiatric inpatients aged 14-20 yrs (10 males, 11 females), consecutive admissions to the hospital. Although differences between groups were in the predicted direction for all 6 tests, only the difference on V. Rakoff's Competing Voices Task (see PA, Vol 47:5257) was statistically significant. (French summary) (21 ref)—*F. Auld*.

11880. Marfatia, J. C. **Schizophrenia in childhood.** *Child Psychiatry Quarterly*, 1972(Oct), Vol 5(4), 1-7.

11881. Meyers, C.; Donnay, J.-M. & Dethienne, F. **[Analysis of the present neuropsychiatric pathology of former prisoners of war, with special reference to age at onset of captivity.]** (Fren) *Acta Psychiatrica Belgica*, 1974(Jan), Vol 74(1), 80-99.—Examined the effect of age at the beginning of wartime captivity on later psychiatric consequences of such captivity. 80 hospitalized patients who had suffered 5 yrs of captivity in Germany during World War II were given a sociological questionnaire and a psychiatric screening test, the Cornell Index-Form N2. Results point to a significantly higher incidence of personality disorders among the Ss who were the

youngest (19-23 yrs) at the onset of captivity; they had to stop working earlier than the older Ss because of nervousness, anxiety, asthenia, hypochondria, neurocirculatory symptoms, and other psychological problems. (Dutch, English, German, Italian & Spanish summaries)—*Journal summary*.

11882. Monnelly, E. P.; Woodruff, R. A. & Robins, L. N. (VA Outpatient Clinic, Boston, MA) **Manic-depressive illness and social achievement in a public hospital sample.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 318-325.—Male inpatients, 25 with bipolar and 21 with unipolar primary affective disorders and all having brothers, were studied in an attempt to replicate previous findings that bipolar patients and their family members have higher levels of social achievement than unipolar patients and their family members. Results confirm previous results among publically hospitalized patients when they had a history of previous private hospitalization. The hypothesis that a social advantage is associated with bipolar primary affective disorder was not supported by data from publically hospitalized patients without a history of previous private hospitalization. There was no evidence that the patients differed significantly in social achievement from their own siblings. Possible reasons for these findings are discussed, as well as the type of study which would be required to resolve the questions raised by the present investigation.—*Journal abstract*.

11883. Moore, N. C. (Royal Air Force Hosp, Swindon, England) **Psychiatric illness and living in flats.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 500-507.—Used Ss' Cornell Medical Index scores and consultations with general practitioners to compare psychiatric illness among house and flat dwellers in a military community. Results indicate that flat dwelling did not cause an increase in psychiatric illness, familiarity did not cause an improvement, and increased exposure did not cause a deterioration. (32 ref)

11884. Morgan, R. & Cheadle, J. (St Wulstan's Hosp, Malvern, England) **A scale of disability and prognosis in long-term mental illness.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 475-478.—Studied 184 long-stay mentally ill patients over a 10-yr period. An evaluation of relevant nosological data on each patient indicates that the best prediction was furnished by 3 variables—J. K. Wing's classification group (see PA, Vol 36:4JQ62W), social withdrawal score, and work performance score. These items were the bases of a scale which may be useful for making prognoses, quantifying and communicating degrees of disability, predicting the caseload on scarce and expensive rehabilitation facilities, and making the best use of these facilities by improving the accuracy with which appropriate patients are selected for them.—*Journal summary*.

11885. Murphy, H. B. (McGill U, Montreal, Quebec, Canada) **Differences between mental disorders of French Canadians and British Canadians.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 247-257.—Analyzes data indicating that Canadians of British origin differ from Canadians of French origin in their symptoms and in frequency, course, and treatability of mental disorder. French-Canadian schizophrenics show more concern with disturbances of social relation-

ships; British-Canadian schizophrenics show less concern for such relationships and for the support that goes with them. French-Canadian depressives have more motor retardation and more somatic concerns; British-Canadian depressives have more guilt, more obsessions, and more thought disorder. It is concluded that attention to maintaining social ties is more important for the French-Canadian than for the British-Canadian patient, and that the latter emphasizes intrapsychic events. (French summary) (21 ref)—*F. Auld*.

11886. Müller, E.; Presslich, O.; Schuster, P. & Zapotoczky, H. G. (Psychiatrischen Universitätsklinik, Wien, Austria) **[Types of polygraphic reaction to individual-specific stress: An experimental investigation on patients with neurotic disorders.]** (Germ) *Psychiatria Clinica*, 1974, Vol 7(2), 89-100.—32 patients with neurotic, particularly polyphobic, disorders were polygraphically investigated (using as measures their EEG, heart rate, respiratory rate, skin resistance, and blinking rate) while at rest and while exposed either to nonspecific or to patient-specific verbal stimulation. The psychophysical values thus obtained were compared with data obtained from a list of psychic as well as autonomic symptoms. The conventional diagnostic categories of the neuroses did not correspond to any typical physiological patterns; however, some such patterns do appear to be linked to certain abnormal affective states.—*English abstract*.

11887. Nelton, Arne. **[Discussion regarding the concept of mental illness.]** (Swed) *Psykisk Halsa*, 1972, Vol 13(2), 97-113.—Traces the emergence of modern psychiatry, the relationship between physician, patient, and community, and the concept of mental illness. Thomas Szasz's approach, and the Swedish debate regarding illness and health are summarized. The psychologists' role within psychotherapy is discussed and Szasz's approach is described as a therapeutic alternative to conventional psychiatry.

11888. Nichols, Keith A. (U Exeter, Washington Singer Lab, England) **Severe social anxiety.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 301-306.—Discusses the classification and definition of phobic disorders and questions whether the category of social phobias should be included in such a classification. It is argued that a better term for this particular difficulty is social anxiety. Clinical data are presented in the form of a list of commonly observed features found in 35 people complaining of severe social anxiety. A tentative explanation of the development of social anxiety is discussed and emphasis is placed on certain personality traits and cognitive habits associated with the traits. (18 ref)—*Journal summary*.

11889. Peters, U. H. & Glück, A. (Johannes Gutenberg U, Neuro-Psychiatrische Klinik, Mainz, W Germany) **[The personality at the end of a depressive phase: Observations after termination of endogenous depressive phases.]** (Germ) *Nervenarzt*, 1973(Jan), Vol 44(1), 14-18.—Results of a follow-up study of 53 patients with endogenous depression suggest slow progressive transition, with restructuring of the personality, to a new "state." "Autistic" retreat from taxing interpersonal relations and various ego-protective defense strategies appeared. The relation of the findings to possible effects



of thymoleptic medication is discussed. Supportive psychotherapy for depressives is advocated. (18 ref)—*J. Rüschmann*.

11890. Pilowsky, I. (U Adelaide, SA, Australia) **Psychiatric aspects of stress.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974, 140 p. \$10.95.

11891. Příbyl, R. (Psychiatrická léčebna, Velké Leváre, Czechoslovakia) [Contribution to incorporating rehabilitated psychiatric patients into primary groups.] (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 190-194.—Examines attitudes and opinions of work group leaders concerning employment and work performance of ex-psychiatric patients. 65% of the respondents to an anonymous questionnaire would employ ex-patients and 23% would not. The opinion prevailed that it is easier to reintegrate manual than intellectual workers into primary work groups which have high performance requirements. Over half of the work group leaders had never read any publications about mental patients and based their opinions on their own personal experience. (Russian & English summaries)—*V. Fischmann*.

11892. Raskin, Allen; Crook, Thomas H. & Herman, Kenneth D. (NIMH, Psychopharmacology Research Branch, Rockville, MD) **Psychiatric history and symptom differences in black and white depressed patients.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 73-80.—Compared 159 black psychiatric patients with 555 white patients on a battery of social, personality, and psychiatric history variables, as well as presenting symptoms. In making these comparisons, race differences in age, social class status, and sex were controlled. Both black and white depressed patients were remarkably similar on presenting symptoms, especially the core symptoms of depression, when the groups were equated or controlled for age and social class differences. However, some differences did emerge on a number of hostility variables. There was a greater tendency toward negativism and the introjection of anger in blacks than in whites. In addition, depressed black males indicated that they were more likely than their white counterparts to strike back, either verbally or physically, when they felt their rights were being violated. There was also a very high incidence of suicide threats or attempts among the black males. (17 ref)—*Journal abstract*.

11893. Ringel, E. & Sonneck, G. (Psychiatrischen Universitätsklinik, Wien, Austria) [On the problem of a schizophrenic suicidal act: An exceptional case.] (Germ) *Psychiatria Clinica*, 1974, Vol 7(2), 101-119.—Reports on a case in which, with the help of an extensive self-description written over a short period during the initial stages of a schizophrenic illness, a reconstruction could be made of the development of the psychosis as well as of a so-called "typical" schizophrenic suicidal act. An attempt was made to differentiate the illness from "mediumistic psychoses" as described by H. Bender (1972). The development towards the suicide, the passage through the characteristic stages, and the establishment of the presuicidal syndrome were demonstrated. It is believed that this case can contribute to a better psychopathological understanding of the suicidal tendency which builds up gradually at the beginning of a

schizophrenic psychosis. However, the suicidal behavior which often breaks through suddenly in advanced processes does require further detailed investigations. (27 ref)—*English abstract*.

11894. Sathananthan, Gregory L.; Gershon, Samuel & Lenn, Ellen. (New York U, Medical Ctr) **Psychological profiles and effects in acute trauma: A pilot study.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 17-19.—Conducted social and psychological assessments of 24 trauma patients at Bellevue Medical Center's Trauma Unit. All patients were administered the Problem Appraisal, adapted from the admission profile, and Burdock's Structured Clinical Interview upon admission and discharge from the trauma service. Based on differences in assessments and case profiles, 3 categories of trauma patients were developed: those "actively" risking trauma, those "passively" receiving trauma, and psychotics. In terms of these new profiles, the severe depression characteristic of those patients passively receiving trauma suggests a need for psychiatric follow-up. In contrast, psychotic patients, alcoholics, and addicts are more in need of psychiatric treatment while receiving trauma care. The personality and behavioral characteristics of these 3 groups are discussed.—*F. L. Beyer*.

11895. Schmidt, R. M. & Zacher, G. (Martin-Luther U, Halle-Wittenberg, E Germany) [Fulminating catatonia: Disease entity or multigenetic syndrome? Survey and investigation on 50 cases.] (Germ) *Psychiatria Clinica*, 1974, Vol 7(2), 65-74.—Using 50 case histories, an attempt was made to clarify the nosographic and clinical validity of fulminating catatonia as an entity among the psychoses. 4 groups could be established: fulminating catatonia without organic disease; somatic diseases with fulminating catatonia; catatonic excitement states with an intercurrent organic process; and unclassifiable fulminating catatonia. On the basis of this analysis the syndrome cannot be regarded as possessing the characteristics of a special psychosis. It seems more appropriate to regard fulminating catatonia as a nonspecific symptom complex induced by a multilayered causation. (28 ref)—*English abstract*.

11896. Sharpe, Lawrence et al. (New York State Dept of Mental Hygiene, New York) **Comparisons of American, Canadian and British psychiatrists in their diagnostic concepts.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 235-245.—Compares diagnoses by psychiatrists in the US ( $n = 519$ ), Canada ( $n = 142$ ), and the United Kingdom ( $n = 222$ ). Videotapes of interviews with 3 patients who were difficult to diagnose were shown to subsamples of these psychiatrists. American psychiatrists were more likely to call the patients "schizophrenic"; British psychiatrists used the diagnoses "manic-depressive psychosis" and "personality disorder" more frequently than the Americans did. Canadians fell between the Americans and the British. All 3 groups gave the patients similar ratings on M. Lorr's Inpatient Multidimensional Psychiatric Scale. (French summary)—*F. Auld*.

11897. Smith, Richard H. & Lau, Mayin. (Children's Psychiatric Ctr, Eatontown, NJ) **Developmental lines of achievement.** *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 117-125.—Describes a technique





significant difference in enzyme activity between the patient and control groups. There were, however, significant negative correlations between dopamine  $\beta$ -hydroxylase activity and the time spent in the morgue before autopsy, and between enzyme activity of schizophrenics and dosage of chlorpromazine or its equivalent.—*Journal abstract.*

### Behavior Disorders

11906. ———. **Report on the N.Y.U. symposium: Suicide in prison: II.** *Journal of Psychiatry & Law*, 1974(Sum), Vol 2(2), 183-208.—Discusses results of the investigations of 20 suicides that occurred in New York City's correction institutions. The conceptual model on which the findings were organized and evaluated is presented.

11907. Abeleva, I. Yu. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) [Psychology of stuttering in adults during various phases of verbal communication.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 144-149.—Reviews the characteristics, factors, and possible mechanisms of stuttering. (52 ref)

11908. Ammon, Günter. [The psychodynamics of the suicide event.] (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(1), 1-18.—Discusses the psychodynamics of self-destructive behavior and analyzes 2 suicide cases. The underlying reason for suicidal action is understood as the expression of an archaic hidden identity conflict which develops in the interaction with a surrounding group. It goes back to archaic ego development disturbances and anxieties, the inability to build normal ego functions and ego boundaries, and the creation of an ego deficit (hole in the ego) which can neither communicate with nor separate from the early objects and which is caused by a mother and primary group unable to grow and experience. The potential suicide remains in a subconscious state of symbiotic dependence and object addiction. The loss of this pathological symbiosis and the challenge to have to find his own identity evokes archaic anxiety and leads to self-destruction. (English summary) (22 ref)—T. Fisher.

11909. Angushev, G. I. [An investigation of the interrelationships among mental functions in normal and stuttering adolescents.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 96-194.—520 Ss 11-13 yrs old, functional stutterers and normals, were given a battery of perceptual, motor, and cognitive tests. Analysis of results showed significant correlations even between seemingly unrelated functions, and support the idea of the unity of mental functions. The patterns of correlations in normals and in stutterers, however, were different. Factor analysis of the intercorrelations revealed different structures of relationships among the mental functions in the 2 groups that were related to the 2 modes of control, voluntary and involuntary. Stutterers bring to bear more voluntary control on their mental functions than do normals. This hampers the automatization of such functions. (English summary) (28 ref)—L. Zusne.

11910. Annesley, Frederick R. (James Cook U North Queensland, Townsville, Australia) **A study of the relationship between normal and behaviour problem**

**children on reading achievement, intelligence, self concept, and locus of control.** *Slow Learning Child: The Australian Journal on the Education of Backward Children*, 1974(Nov), Vol 21(3), 185-196.—Studied normal children and behavior-problem (BP) children, Grades 3-7, in North Queensland, Australia. BP children were identified by the Walker Problem Behavior Identification Checklist. Underachievement (as measured by the California Achievement Test) was shown by a large percentage of BP Ss, who also had a poorer self-concept than the normal Ss. Normals show higher intelligence (measured by the Australian Council for Educational Research Junior B Test of Intelligence). It is suggested that in working with BP children strong efforts be made to raise academic achievement in order to improve behavior, rather than trying to improve behavior in hopes of raising achievement. (28 ref)—C. L. Nicholson.

11911. Ball, John C.; Graff, Harold & Sheehan, John J. (Temple U, Health Sciences Ctr) **The heroin addicts' view of methadone maintenance.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 89-95.—Compared patient and staff attitudes on drug-taking and its treatment at the largest methadone maintenance program in Pennsylvania. 4 university medical students interviewed 224 heroin addicts in treatment on June 30, 1971, and 42 staff members at Philadelphia General Hospital and its 2 satellite clinics. 65% of the patients were black, 66% were under 30 yrs of age, and males outnumbered females 7 to 1. Analysis of responses revealed sharp disagreements between addicts and staff concerning the patients' problems. The staff saw patients as physically and mentally ill, while the addicts saw themselves as neither. This lack of agreement as to the reason for a drug problem leads to lack of communication and is aggravated by cultural conflict. The staff members seen by patients as most effective are ex-addict counselors, who are closest to the patient in background and experience. It is concluded that methadone clinics cannot expect great success until complementary views are achieved with patients.—A. P. Balevre.

11912. Bregant, Leopold. [Lowering of motivational level and deviant behavior: Significance of defense behavior and neutralization techniques.] (Slo) *Anthropos*, 1972, No 3-4, 61-62.—Discusses the relationship between deviant behavior and motivation. Deviant behavior is seen as chiefly the product of deficits in the socialization process caused by frustrations of sociocultural and family origin. These deficits lead to lower aspiration levels and to defensive behavior patterns which serve to protect the individual's self respect. If the underprivileged are subjected to the socialization criteria valid for the majority and consistent with social norms, the probability of deviant behavior increases rather than decreases through development of self-protecting mechanisms. Maintenance of motivational goals for the underprivileged based on conformity norms stabilizes deviant motivation techniques and increases the discrepancy between the high motivational requirements of the social environment and the individual's low aspirational motivation. Resocialization is often made impossible by the dogmatic belief that the same normative criteria of motivation are equally appropriate for all individuals

regardless of their different competitive abilities.—S. Slak.

11913. Cohen, Judith B. & Syme, S. Leonard. (U California, School of Public Health, Berkeley) **Epidemiologic approaches to the study of drug dependence.** *Bulletin on Narcotics*, 1973(Jul-Sep), Vol 25(3), 1-9. —Discusses (a) the distribution of drug dependence in the population, (b) clarification of the clinical picture by using exact definitions of drug dependence, (c) factors affecting the risk of drug dependence, and (d) the identification of new syndromes. (19 ref)

11914. Cornbleth, Terry. (University Drive VA Hosp, Pittsburgh, PA) **A psychosocial problem catalogue.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 194.

11915. Costello, Raymond M. & Manders, Kenneth R. (U Texas, Health Sciences Ctr, San Antonio) **Locus of control and alcoholism.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 11-17. —Studied the performances of 14 active and 14 recovered alcoholics on 2 measures of locus of control, Rotter's Internal-External (I-E) Control Scale and the Experienced Control (EC) Questionnaire by D. W. Tiffany et al. The Marlowe-Crowne (M-C) Social Desirability Scale was also administered to the 2 groups. Excessively low scores on the I-E for drinking groups, found by previous investigators, were replicated. A low scorer on the I-E tended to be a high scorer on the M-C and on EC-OE (the degree to which an individual feels he has control over forces coming from outside himself). A wider sample of Ss was employed to determine the reliability of the I-E as a monitor of the recovery process. The phenomenon measured by the I-E resisted manipulation over a 30-day treatment interval, suggesting that it was a relatively stable personality characteristic in this sample of problem drinkers. The I-E again was related to the EC at the external locus; high scorers on the I-E tended also to score high on the EC-FE (the degree to which an individual feels controlled by pressures, influences, or forces coming from outside himself). A racial effect on I-E was found, such that nonwhites scored higher than whites.—*Journal summary*.

11916. Faschingbauer, Thomas R. (Duke U. Medical Ctr, Highland Hosp, Asheville) **Enuresis: Its nature, etiology, and treatment: A review of the literature, 1924-1970.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 194-195.

11917. Gasser, Edith S.; Langrod, John; Valdés, Katharine & Lowinson, Joyce. (C. W. Post Ctr, Long Island U) **The Eysenck Personality Inventory with methadone maintenance patients.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 85-88. —Studied 3 groups, each of 34 members or less: narcotic-addict patients, addict patient-counselors (both groups on methadone maintenance), and psychology students. No using the Eysenck Personality Inventory (EPI) or significant differences in extraversion-introversion (E) or neuroticism-stability (N) were revealed; however, the student Ss showed a strong tendency to be less frank in admitting feelings and behavior than the 2 groups on methadone maintenance. The EPI did differentiate between short-term and long-term heroin users on the N scale ( $p < .05$ ). Long-term users demonstrated fewer

neurotic features. The inventory did not differentiate, however, between addicts, ex-addicts and nonaddicts; nor did it indicate addiction proneness. Heroin addicts now on methadone maintenance seemed no more anxious or unable to cope with stress than apparently normal Ss.—A. P. Baileve.

11918. Gillis, A. R. (U Western Ontario, London, Canada) **Population density and social pathology: The case of building type, social allowance and juvenile delinquency.** *Social Forces*, 1974(Dec), Vol 53(2), 306-314. —Argues that the number of individuals per unit space is less appropriate for humans than building type as a correlate of patterns that have been considered socially "pathological." Stepwise regression is used to analyze data from a Canadian city, with the census tract as the unit of analysis. Data show that when the effects of income and national origin have been removed, neither internal nor external density explains a significant amount of the variation in social allowance or delinquency, but building type remains a significant predictor of these variables. A path model is developed, showing that social allowance (welfare) rates, like the proportion of multiple dwellings, is an important predictor of juvenile delinquency rates. (61 ref)—*Journal abstract*.

11919. Goldfarb, Stephen et al. **Time perception of alcoholics and other psychiatric patients.** *Journal of Genetic Psychology*, 1974(Dec), Vol 125(2), 315-318. —A battery of time perception tests evaluating the areas of filled time estimation, empty time estimation, time in abstract reasoning, and short interval comparisons was administered to 30 alcoholic inpatients, 24 general psychiatric inpatients, and 17 normal controls. Tests of abstract reasoning and estimates of unfilled intervals discriminated between the alcoholic and general psychiatric group on the one hand, and the controls on the other. No significant differences between alcoholic and general psychiatric patients were found.—*Journal abstract*.

11920. Jacobson, George R. (De Paul Rehabilitation Hosp, Milwaukee, WI) **Field dependence among male alcoholics: Establishing norms for the Rod-and-Frame Test.** *Perceptual & Motor Skills*, 1974(Oct), Vol 39(2), 1015-1018. —Administered the Rod-and-Frame Test to 145 male alcoholic inpatients (mean age = 41.9 yrs). Data are compared with findings from normal Ss and psychiatric inpatients.

11921. Jones, Ben M. & Paredes, Alfonso. (U Oklahoma, Health Sciences Ctr) **Circadian variation of ethanol metabolism in alcoholics.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 3-10. —Determined the rate of ethanol metabolism for 20 alcoholics during afternoon and evening drinking sessions on 2 consecutive days. Ss metabolized ethanol faster in the evening than in the afternoon, suggesting a circadian variation in the rate of ethanol metabolism. Drinking on the 1st day appeared to increase the rate of ethanol metabolism on the 2nd day. This circadian variation, which was present after 2 wks of abstinence and 1 day of heavy drinking, differs from that reported for nonalcoholics. This suggests that other circadian rhythms may be affected in alcoholics, even after they have been dried out for several weeks. Altered rhythms may partially explain



alcoholics' difficulty in readjusting to social demands. —*Journal summary.*

11922. Kwaśniewski, Jerzy & Kojder, Andrzej. (U Warsaw, Poland) [Social reaction to deviant behavior: Problems, assumptions, research hypotheses.] (Polh) *Studia Socjologiczne*, 1974, No 2(53), 219-233. —Describes the construction of instruments that will be used in a national study of attitudes toward deviance. Research hypotheses, strategies, and procedures are reviewed at length.

11923. Maletzky, Barry M. (US Lyster Army Hosp, Ft Rucker, AL) **d-Amphetamine and delinquency: Hyperkinesis persisting?** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 543-547. —Explored the clinical efficacy of dextroamphetamine for delinquent behavior in adolescents and the relationships between such delinquency and hyperactivity of childhood. 14 pairs of male delinquent teenagers were examined. All were referred for psychiatric outpatient care because of antisocial behavior. The method of sequential analysis was used. A significant positive effect documented the efficacy of dextroamphetamine as compared to placebo when both were added to an ongoing psychotherapeutic regimen. Tolerance, withdrawal, and euphoria were not associated with dextroamphetamine use in the experimental Ss. A reanalysis of the data demonstrated surprisingly close links between a history or presence of hyperactive traits and a clinical response to dextroamphetamine. Difficulties in employing dextroamphetamine in this age group are acknowledged and suggestions for further research are offered. (20 ref)—*Journal abstract.*

11924. McAuliffe, William E. & Gordon, Robert A. (Harvard U) **Issues in testing Lindesmith's theory.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 196.

11925. Ostrianska, Zofia. (Polish Academy of Sciences, Inst of Juridical Sciences, Warsaw) [Self-aggression among recidivists.] (Polh) *Przegląd Penitencjarny i Kryminologiczny*, 1972, Vol 10(2), 20-34. —Studied 220 prisoners who had previously served at least 4 sentences. 123 (56%) had committed acts of bodily harm to themselves, had refused to eat, or had attempted suicide, 76% of them several times; 41% had committed these acts both in and out of prison. Recidivists who aggressed against themselves were significantly more often diagnosed as mentally ill than those who had not. 71% of the aggressors were alcoholics. They said their acts were motivated by frustration (60%), depression (21%), drunkenness (42%), and attempts to improve prison conditions (50%). Self-aggressors scored significantly higher on the Buss-Durkee scales of aggression and guilt feelings. On the F subscale of the MMPI the self-aggressors' mean score was 85, while that of the other recidivists was 75. Self-aggressors had begun their criminal activities earlier in life and offenses were more often directed against persons. (French summary)—A. Z. Arthur.

11926. Person, Ethel S. & Ovesey, Lionel. (Columbia U, Coll of Physicians & Surgeons, Psychoanalytic Clinic for Training & Research) **The psychodynamics of male transsexualism.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in*

*behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11927. Pospiszyl, Kazimierz. [Psychosocial characteristics of the young offenders.] (Polh) *Przegląd Penitencjarny i Kryminologiczny*, 1972, Vol 10(2), 35-51. —93 convicted young boys and girls and 62 controls in 6 schools and agencies were given the Maudsley Personality Inventory, Cattell's Test of Perseveration, and a sociometric test asking which persons the S liked, disliked, or was indifferent to. The Ss were classified according to the offenses committed: theft, hooliganism, prostitution, and rape, and into a group showing minor maladjustment or a group of normal controls. All criminal categories and the maladjusted showed more neuroticism than the controls; hooligans, prostitutes, and rapists were more extraverted; thieves and the maladjusted were more perseverative; prostitutes showed more positive sociometric ratings towards others, while hooligans, rapists, and the maladjusted showed more negative sociometric ratings. (French summary)—A. Z. Arthur.

11928. Pugliese, Anthony C. (Roosevelt Hosp, Methadone Clinic, Metuchen, NJ) **A study of the mental ability of methadone maintenance patients with the Wonderlic Personnel test.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 323-326. —Administered the Wonderlic Personnel Test to 65 ex-heroin addicts on methadone maintenance. Addicts' scores were compared with those of job applicants tested by Wonderlic and Associates. Results show a significant difference between the methadone Ss and Wonderlic's sample ( $N = 251,253$ ) of the total job market: however, when Ss were matched for education, there were no significant differences. Findings suggest that methadone clients are at a disadvantage in the job market since employers do not often consider comparable educational levels when looking for employees. —*Journal abstract.*

11929. Roessler, Richard T. & Bolton, Brian. (U Arkansas) **Behavior rating correlates of the 16 PF.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1160. —Of 256 possible correlations between major behavioral problems of 434 juvenile offenders and factors from the 16 Personality Factor Questionnaire, only 4 correlations were found.

11930. Schuckit, Marc A. & Gunderson, E. K. (US Navy Medical Neuropsychiatric Research Unit, San Diego, CA) **The use of alcoholic subtype diagnoses in the U.S. Navy.** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 563-567. —Studied alcoholism in a military population using 5 alcoholic subtypes as an aid in diagnosis: (a) chronic alcoholism, (b) acute alcoholism, (c) alcoholic psychosis, (d) alcoholic addiction, and (e) unspecified alcoholism. Posthospital course was determined for men who remained on active duty for 6 mo or more after hospitalization from a total sample of 2,949. Ss were categorized according to both this classification system and the Department of Defense Disease and Injury Code. The percentages of alcoholic psychoses in the 2 systems were similar and suggest constancy in diagnostic criteria and judgments. It is suggested, however, that clinicians follow the basic scheme outlined by the National Council on Alcoholism and assign each alcoholic a diagnosis of alcoholism without further subdivision. Only when necessary should

the additional diagnostic subdivisions be utilized. (20 ref)  
—R. S. Albin.

11931. Scott, P. D. (Maudsley Hosp, London, England) **Battered wives.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 433-441. Defines the battered wife as a woman who has suffered serious or repeated injury from the man with whom she lives. The phenomenon is described as a failure in adaptation rather than a disease entity, or as a failure to acquire adequate social learning. Among the arbitrary types of wife battering which are described, apart from the probably major cultural type, are men with (a) immature personalities; (b) other personality disorders, including the dependent and aggressive types; (c) jealousy reactions; and (d) addictions. Previous studies of small samples of child-battering fathers suggest that at least 25% of them also batter their wives.—*Journal summary*.

11932. Silberzahn, Mary. **Sensory integrative function in a child guidance clinic population.** *American Journal of Occupational Therapy*, 1975(Jan), Vol 29(1), 28-34.—Determined (a) whether sensory integrative disorders occurred in a child guidance population, (b) the nature of sensory integrative disorders found in such a group, and (c) whether there was any relationship between certain types of sensory integrative disorders and specific behavioral traits. Ss were 87 5-9 yr old children, the total number referred to a child guidance clinic because of problems in behavior. All Ss were administered the Southern California Sensory Integration Tests and were observed for neuromuscular deviations. Data from factor analyses show a high incidence of sensory integrative dysfunction in this population. There was considerable evidence of a syndrome known as postural and bilateral integration dysfunction, as well as a strong tendency to show various kinds of behavior problems. (17 ref)—*Journal abstract*.

11933. Skalar, Vinko. [Performance and motivation of prisoners during their prison terms.] (Sloe) *Anthropos*, 1972, No 3-4, 63-66.—Presents data on differences in intelligence test scores (Beta Series and Raven's Progressive Matrices) of 11 prisoners during and after their prison terms, indicating significantly higher postterm performance in normal life conditions. Motivational factors in the prison environment that cause lowering of ability scores and modification in personality inventory results are discussed, and methodological refinements in criminological studies are suggested.—S. Slak.

11934. Sohoni, Neera K. (International Council of Social Welfare, Research & Documentation Ctr in Social Welfare & Development, Bombay, India) **Women prisoners.** *Indian Journal of Social Work*, 1974(Jul), Vol 35(2), 137-148.—The percentage increase in women convicts between 1962 and 1965 was over 4 times the male prisoners. A study of these women indicates that women prisoners should be regarded as a distinctive group deserving specialized attention. A strong effort is called for to "stem the surging crime rate among women." Demographic data showed areas of the country where the female crime rate was highest. The relatively short stay of women in prison (only 5% stay more than 6 mo) raises problems regarding effective rehabilitation during the prison term. There is a discussion of the need to prevent criminal behavior, both before a woman

becomes an offender and in the immediate postrelease period.—I. W. Kidorf.

11935. Streiberg, Gerald. (U Salzburg, Inst of Psychology, Austria) [Juvenile exhibitionists: A casuistic study using the Rorschach Test and TAT.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 317-328.—Investigated the meaning and nature of exhibitionism in 19 randomly selected juveniles of various socioeconomic background, education, and intelligence. The case history of 1 14-yr-old boy is reported in detail. The examination consisted of the Rorschach test, the Thematic Apperception Test (TAT), a study of biographical data, and an analysis of exhibitionist occurrences. Results confirm the hypothesis that juvenile exhibitionists suffer from a typically disturbed personality structure which is characterized by an unsolved crisis of individuation; difficulties in the process of self-realization; and a distorted attitude toward sex, sex-role, and sex-specific sex-role expectations. The offenders' acts represent, symbolically, a sociopsychologically relevant attempt to break out of their developmental crisis. (English summary)—T. Fisher.

11936. Täschner, Karl-L. (Johann-Wolfgang-Goethe U, Frankfurt/Main, W Germany) **Social data and personality factors of clinically treated young drug users.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 67-74.—Compiled and interpreted clinical data on 147 habitual drug-user inpatients under 30 yrs of age. Data indicated that sex differences in drug usage are disappearing. Almost 60% of the Ss used several drugs, including opiates and hallucinogens. Nearly half were unemployed, and their social deterioration appeared to be increasing. As the average age of drug users decreases, the risk of untoward social consequences increases. More than 1/2 of the Ss had broken off their formal education. Ss' conflicts were seen as deriving from unrealistic social adjustment, with personal-familial, political, and legal repercussions. As a group, Ss were described as manifesting little psychical but great physical endurance. Physically, they were active, full of initiative, impulsive, and behaviorally uncontrolled. Although sociable and outgoing, they were seen as insecure, unstable, and sensitive, but they showed minimal anxiety and hostility. Use of alcohol was slight among these Ss, but tobacco usage was excessive. (19 ref)—A. P. Balvère.

11937. Weeks, Joseph L.; Mullins, Cecil J. & Vitola, Bart M. (Lackland Air Force Base, Personnel Research Div, TX) **Prediction of drug abuse by the Life Values Questionnaire.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 196-197.

11938. West Virginia Dept of Mental Health, Div on Alcoholism & Drug Abuse & West Virginia U, Medical School. (Charleston, WV) **Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973.** Morgantown, WV: West Virginia University, 1973. 165 p.

11939. West, Letitia & Driver, M. V. (St James' Hosp, Portsmouth, England) **Antisocial behaviour, barbiturate addiction and associated electroencephalographic changes.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 470-471.—Suggests that in view of the unreliability of urine testing, the EEG can be of value in assessing



those addicts who deny taking barbiturates and yet show clinical signs of possible barbiturate intoxication or who have a recent history of violence or behavior change. If the EEG shows little fast activity the denial may perhaps be believed, but if fast activity is prominent one should be very sceptical in accepting the addict's denial of barbiturate usage.—*Journal summary*.

### Learning Disorders & Mental Retardation

11940. Boyce, Lorinne & Dax, E. Cunningham. (Community Health Services, New Town, Tasmania) **Driving behaviour as differentiated by the Tasmanian Ten Year Old Intelligence Test: I. The types and varieties of traffic offences committed by young men of lower intelligence: II. The effect of driver education on the traffic offences committed by young men of lower intelligence.** *Australian Journal of Mental Retardation*, 1974(Jun), Vol 3(2), 40-48.—Compared 2 groups of 400 17-21 yr old males, one having IQs above 100 and the other IQs of 90 or below, as measured during their school years by the Tasmanian Ten Year Old Intelligence Test. Results show that, although the lower intelligence group held the same number of driving licenses, they had more total offenses, particularly nonmoving types. Possible reasons are given as to why these Ss tended to be convicted of these traffic offenses, and preventive actions which could be taken by the police are discussed. It is also shown that a compulsory high school driver education course, when renewed at intervals, reduced the number of nonmoving convictions which characterized persons of lower intelligence.—*Journal abstract*.

11941. Brown, Jason W. & Jaffe, Joseph. (Columbia U, Coll of Physicians & Surgeons) **Hypothesis on cerebral dominance.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 107-110.—Hypothesizes that cerebral dominance is a continuous process which evolves throughout life and which accounts for the age-dependent forms of aphasia. In addition to progressive (left) language lateralization, there may also be a continuing specification within the wider left-hemispheric speech zone. The notion of cerebral dominance must be qualified to mean "dominance for what function at what age under what conditions of testing?" Thus it might be argued that the right hemisphere is dominant during the prelinguistic period and that presumably nascent left-hemispheric skills are progressively brought into play as speech develops. The evidence points to a need for a "life-span" aphasiology. This hypothesis has testable consequences. (French & German summaries) (32 ref)—*Journal abstract*.

11942. de Villiers, Jill. (Harvard U) **Quantitative aspects of agrammatism in aphasia.** *Cortex*, 1974(Mar), Vol 10(1), 36-54.—Speech transcripts from 8 nonfluent aphasics and 5 normal controls were analyzed for the presence or absence of 14 grammatical morphemes in their obligatory contexts. A stable difficulty ordering was found for the aphasics which differed from the invariant order of acquisition of these morphemes established for children. Transformational and semantic complexity, redundancy, stress, and frequency are assessed as explanatory factors. Aphasics were also clearly different from normals in terms of the frequency of contexts for

the morphemes that could be identified in their speech.—*R. Gunter*.

11943. Downing, John. (U Victoria, British Columbia, Canada) **[Cultural and linguistic conflicts contributing to failure to learn to read.]** (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 93-110.—Information from 14 countries, including those that use different alphabets, those with alphabetic as opposed to ideographic writing, and those which differ markedly though using the same alphabet was examined with respect to factors involved in learning to read and write. There is more concern about reading disability in the US than in most countries but the incidence of reading disability is at least as great elsewhere, and the reason for between-country difference in concern is not clear. Whether the incidence of disability is greater among boys or girls seems to be associated with culturally determined sex-role expectations. In the interest of mental health, Scandinavian countries delay school entrance and are concerned about overall readiness for school rather than readiness for reading. Bilingualism, dialects, and the fact that in many languages words are not spelled as they are pronounced contribute to the incidence of reading retardation. Whatever the reason why a child has difficulty learning to read, lack of success produces a diminution of self-esteem which in turn hampers school learning of all kinds. (28 ref)—*S. S. Marzolf*.

11944. Flowers, Charles B. (U Washington) **Proactive interference in short-term recall by aphasic, brain-damaged nonaphasic and normal subjects.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 59-68.—18 aphasic, 18 brain-damaged nonaphasic, and 18 normal Ss performed a short-term recall task, and groups were compared with regard to (a) the amount of proactive interference occurring in short-term memory and (b) amount of proactive interference release occurring in short-term memory as a result of changing stimulus material. The aphasic Ss had, in general, mild communication problems. All 3 groups demonstrated approximately the same degrees of proactive interference and proactive interference release. However, the aphasic Ss were able to recall fewer items than the others. The relatively poor recall by the aphasic Ss appeared due to factors operating within trials during the recall task. (French & German summaries) (21 ref)—*Journal abstract*.

11945. Friedland, Seymour J. & Meisels, Samuel J. **An application of the Piagetian model to perceptual handicaps.** *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 20-24.—Discusses Piaget's proposition that the development of children's concepts of space is characterized by an advancement from an initially topological conception of space to a space characterized by Euclidean properties. The former is characterized by relationships between points which are unaffected by continuous deformation and transformation, while the latter is identified by relationships between various fixed coordinates and shapes. The usefulness of Piaget's work in providing a developmental explanation of some aspects of spatial organization associated with children with perceptual handicaps is examined.—*Journal abstract*.

11946. Gardner, James M. (U Queensland, St Lucia, Australia) **The legal rights of people in institutions.**

*Australian Journal of Mental Retardation*, 1974(Jun), Vol 3(2), 34-39.—Discussed the struggle to provide legal rights for people in institutions for the mentally retarded, with particular relevance to recent activities in the US. The major content areas include the right to treatment, the right to be free from involuntary servitude, and commitment laws. It is concluded that changes in the legal system, regardless of their positive worth, are only one phase in humanizing the lives of people who are labelled mentally retarded. (15 ref)—*Journal abstract*.

11947. **Geoffrion, Leo D.** (Johns Hopkins U) **Oral reading errors of normal and reading-disabled children.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 201.

11948. **Ghosh, A.** (Postgraduate Inst of Medical Education & Research, Chandigarh, India) **Mental retardation: Historical aspects.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 86-88.—Sketches the history of the treatment of mental retardation. It is felt that the future is full of promise because of improved attitudes toward the retarded and widespread attacks on the problem of retardation.

11949. **Goldstein, Earl H.** (Western Psychiatric Inst & Clinic, Pittsburgh, PA) **A multidisciplinary evaluation of children with learning disabilities.** *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 95-107.—Presents 5 clinical case studies of children with learning problems. The clinical application of the term "learning-disabled child" is discussed in relation to the cases. An informal educational evaluation for the physician in residency and in practice to recognize the learning-disabled child is outlined in detail. The role of the neurological examination and EEG in the field of learning disabilities is reviewed, and a multidisciplinary approach for the evaluation and treatment of these children is proposed.—*Journal abstract*.

11950. **Hamashige, Tamie.** (Tokyo U of Education, Japan) **[A study on the discrimination learning in mentally retarded children: Effects of attention to the stimulus dimension.]** (Japn) *Japanese Journal of Special Education*, 1974(Jun), Vol 12(1), 24-32.—Compared rates of discrimination learning of normal and retarded children, particularly with regard to color and form preferences.

11951. **Jackson, Merrill S.** (Monash U, Faculty of Education, Clayton, Vic, Australia) **The rights of the retarded.** *Australian Journal of Mental Retardation*, 1974(Jun), Vol 3(2), 30-33.—Reviews court cases as a means of illustrating the problems encountered by the mentally retarded and their families. The United Nations' "Declaration of the Rights of the Mentally Retarded Persons" is also presented and discussed.

11952. **Keele, Doman K. et al.** (Texas Southeastern Medical School) **Role of special pediatric evaluation in the evaluation of a child with learning disabilities.** *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 40-45.—Attempted to determine the precision of the special pediatric evaluation in correctly identifying children with learning disabilities, the proportion of learning disabled (LD) children who exhibit significant pediatric findings, and which LD children are benefited by a special pediatric evaluation. 2 pediatric specialists, utilizing 9 pediatric factors, diagnosed learning disabili-

ties correctly in 91% of the 629 cases evaluated but overdiagnosed it in 30% of nonlearning disabled children. The following were present in a significantly higher percentage of cases of learning disabled children compared to nonlearning disabled children: significant high risk conditions for brain damage or dysfunction in the medical history, minor neurological dysfunction, obesity, teacher and parents reporting a learning disability in the child, poorly drawn 2-dimensional figures, and delayed word recognition. Evaluation by a pediatric specialist in learning disabilities is indicated in the learning disabled child with motor hyperactivity and in certain other instances. Since an evaluation by a specialist in learning disabilities is not possible in every learning disabled child, a procedure for referral is suggested. (15 ref)—*Journal abstract*.

11953. **Mastyukova, Ye. M.** (Central Serbsky Forensic Psychiatry Research Inst, Moscow, USSR) **[Memory disorders in children with underdeveloped speech.]** (Russ) *Defektologiya*, 1972, No 5, 12-17.—Examines memory in 106 1st-8th grade students in a school for children with speech defects. All Ss had some mastery of sentences, but the level of mastery and the specific form of speech disturbance varied. Short-term visual and verbal memory, long-term verbal memory, and the influence of retroactive inhibition were tested. The extent to which memory was disrupted depended on the degree and character of speech underdevelopment; e.g., retroactive inhibition was manifested in the difficulty experienced by most Ss in correctly reproducing the first of 2 unrelated sentences or stories. The quality of this reproduction was a function of the level of development of the lexical-grammatical aspect of the S's speech. This task was particularly difficult for children with alalia or with underdevelopment of intellect and speech.—*E. C. Koffman*.

11954. **McConkey, Roy & Herriot, Peter.** (U Manchester, Hester Adrian Research Ctr, England) **The role of the blocked presentation in the elicitation of a categorical strategy of remembering with retarded adults.** *British Journal of Psychology*, 1974(Aug), Vol 65(3), 415-425.—Conducted 3 experiments with a total of 80 retarded adults to determine the role of blocked presentation of categorical material in increasing the number of items recalled by retarded Ss. With visually and simultaneously presented items in a multitrial free-recall procedure, it was found that (a) although blocked presentation of categorical material facilitated recall, the provision of category cues did not do so; (b) blocked presentation of unrelated items did not facilitate recall; and (c) those Ss who could form their own blocked presentation improved their recall as a result. It is concluded that blocked presentation facilitates recall because it draws attention to previously existing inter-item associations. (15 ref)—*Journal abstract*.

11955. **Murthy, R. S.** **Mental retardation: Scope for prevention: I. Nutrition.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 49-57.—Briefly reviews literature (chiefly research in India) on the relationship between retardation and malnutrition; the studies indicate a causal link. Recommended preventative measures are (a) improved agricultural methods, (b) curtailing population growth, (c) public education, and



(d) intensive research into fetal and infantile brain development. (20 ref)—J. H. Pflaum.

11956. Nagafuchi, Masaaki & Murakami, Teiji. (Tohoku U, Sendai, Japan) [Intelligibility of distorted speech sounds shifted in frequency and time in normal children and the mentally retarded.] (Japn) *Japanese Journal of Special Education*, 1974(Jun), Vol 12(1), 43-53.—20 monosyllabic sounds and 10 trisyllabic words were distorted by means of a speech stretcher; 3 levels of expansion and 3 levels of compression were used both on the frequency and the time. Ss were 160 normal children of chronological age (CA) 6-17, 10 young adults, and 97 retarded children of CA 6-17, mental age (MA) 3-12, and IQ 31-77. Intelligibility decreased with greater frequency distortion. It increased with CA up to 11 yrs in normal Ss, and with MA in retarded Ss. For time-compressed stimuli, the intelligibility was similar for both groups, while for time-expanded stimuli it was better for retarded children than for normals matched in MA. No sex differences were found. The intelligibility of greatly distorted stimuli dropped sharply in retarded Ss and was significantly lower in Ss with IQ 30 than in those with IQ 40. (English summary)—S. Ohwaki.

11957. Panda, Kailash C. & Lynch, William W. (SCS Coll, Puri, India) Effects of race and sex on attribution of intellectual achievement: Responsibility for success and failure situations among educable mentally retarded children. *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 72-80.—Conducted a locus-of-control study with 249 educable mentally retarded (EMR) children—157 boys (100 black, 57 white) and 92 girls (50 black, 42 white)—from 2 inner-city junior high schools in a midwestern city in the US. The Intellectual Achievement Responsibility test was administered. Ss indicated greater externality in described failure situations than in success situations ( $p < .05$ ), and male Ss appeared to be more internally controlled than females ( $p < .05$ ). Ethnic-group membership did not produce a significant main effect or a significant interaction with sex. Differences between EMR and normal Ss are discussed. (22 ref)—J. H. Pflaum.

11958. Robinson, M. R. (U Queensland, Fred & Eleanor Schonell Educational Research Ctr, St Lucia, Australia) The role of instruction in the acquisition of a concept of space: An exploratory clinical investigation. *Slow Learning Child: The Australian Journal on the Education of Backward Children*, 1974(Nov), Vol 21(3), 164-177.—Conducted an experiment on the acquisition of a concept of space, according to J. Piaget's theories and levels. Ss were 9 retarded children 3-5 yrs old. The various levels are described. Results confirm Piaget's observations. The age levels of spatial concept development need not be fixed, although their order may be constant. Instruction tended to improve Ss' performance. All were from culturally advantaged homes and were able to utilize language as a learning mediator in their approach to the task. It is suggested that the mentally retarded child may be capable of attaining higher levels of concept development than is generally assumed, given special instruction emphasizing his abilities.—C. L. Nicholson.

11959. Rosenheim, Harold D. & Ables, Billie S. (US Army Mental Hygiene Consultation Service, Ft Buckner,

Okinawa) Social deprivation and "mental retardation." *Child Psychiatry & Human Development*, 1974(Sum), Vol 4(4), 216-226.—Proposes that study of the effects of social deprivation may help to understand psychological etiological factors in "mental retardation." Social deprivation, a relative construct, is viewed as resulting from the difference between predeprived and deprived levels of adult social stimulation, and as being greatly affected by the rate of change. A case history illustrates how the relative social deprivation thesis can contribute to a better understanding of the child's emotional and intellectual development and of treatment techniques. (21 ref)—*Journal abstract*.

11960. Sasanuma, Sumiko. (Tokyo Metropolitan Inst of Gerontology, Japan) Kanji versus kana processing in alexia with transient agraphia: A case report. *Cortex*, 1974(Mar), Vol 10(1), 89-97.—A 43-yr-old, right-handed, Japanese school teacher exhibited the syndrome of alexia with transient agraphia as a result of a cerebrovascular accident. Examination of the syndrome revealed that 2 types of orthographic symbols in Japanese, *kana* ("syllabic" symbols) and *kanji* ("ideographic" symbols), were impaired in different manners; i.e., the patient used different strategies in trying to retrieve graph-meaning associations of words written in each type of symbol. The finding is interpreted to indicate that the processing of *kana* and *kanji* represents distinctively different modes of operation of linguistic behavior. The additional nonverbal symptoms exhibited by the patient included color-naming difficulty, topographical disorientation, impairment in written calculation, and visuoperceptual and visuoconstructional disabilities. Most of these symptoms were transient, however, and disappeared during the 1st few months after onset of illness.—R. Gunter.

11961. Schechter, Marshall D. (State U New York, Upstate Medical Ctr, Syracuse) Psychiatric aspects of learning disabilities. *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 67-77.—Discusses the necessity of the differential diagnostic and treatment processes required for working with learning-disabled children. Special consideration is given to the psychiatric implications of symptoms which accompany minimal cerebral dysfunction. Anxiety, depression, disturbance in primary attachment to adults, and negative self-image are considered.—E. S. Goodman.

11962. Schoenwetter, Charles D. (U Wisconsin, Madison) Primary care's responsibility to early success in school. *Journal of School Health*, 1974(Jun), Vol 44(6), 307-309.—Describes a treatment approach for children who are diagnosed early in their school careers as high risks to fail. Specific suggestions are made for ways in which physicians can contribute to the early diagnosis and help for children with perceptual difficulties.

11963. Semel, Eleanor M. & Wiig, Elisabeth H. (Boston U) Comprehension of syntactic structures and critical verbal elements by children with learning disabilities. *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 46-51.—Assessed the comprehension of syntactic structures and critical verbal elements in 34 learning disabled (LD) children using the Northwestern Syntax Screening Test (NSST) and the Assessment of Children's Language Comprehension (ACLC). Performances were

compared with normative data and with performances by 17 academically achieving controls. LD children scored significantly lower than their controls on the NSST receptive subtest, and a significant percentage scored below the 10th percentile when compared with normative data. Performances on the receptive and expressive subtests of the NSST correlated positively and significantly. LD children performed similarly to normative 6½-yr-olds on the ACLC while the academically achieving controls showed a ceiling effect. Findings suggest that the NSST and ACLC may be used for screening and identification of language comprehension deficits in LD children. Performances by younger (ages 7-9) and older (ages 9-11) LD children did not differ significantly, suggesting that deficits in auditory comprehension may not improve spontaneously with age. (19 ref)—*Journal abstract*.

11964. Spitz, Herman H.; Winters, John J.; Johnson, Shirley J. & Carroll, Janice G. (E. R. Johnstone Training & Research Ctr, Bordentown, NJ) **The effects of spatial, temporal, and control variables on the free-recall serial position curve of retardates and equal-MA normals.** *Memory & Cognition*, 1975(Jan), Vol 3(1), 107-112.—In Exp I 7 pictures were sequentially illuminated at a 3-sec rate through 7 translucent windows. A different window provided the starting point for each of 7 tests. 14 retarded and 14 normal children (mean chronological ages = 16.1 and 8.7 yrs, respectively) of equal mental ages (9.6 and 9.5 yrs, respectively) produced equivalent free recall and reliable recency effects. Although groups did not differ significantly at any portion of the curve, only the normals produced a significant primacy effect. The spatial end anchors produced no significant primacy or recency effects. In Exp II with similar numbers and types of Ss, total presentation time remained the same but the pictures were presented at a 1-sec rate. Variations in elapsed time and number of presentations produced a negative primacy effect, a result attributed to the prevention of selective rehearsal and the resultant interaction of trace decay and order of recall. Superior recall by the normals, particularly in the recency portion of the curve, was attributed to group differences in order of recall strategies. (19 ref)—*Journal abstract*.

11965. Tallal, Paula & Piercy, Malcolm. (John F. Kennedy Inst, Baltimore, MD) **Developmental aphasia: The perception of brief vowels and extended stop consonants.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 69-74.—12 developmental aphasic children and their 12 matched controls were examined for their ability to discriminate (a) 2 synthesized vowel-vowel syllables in Exp I and (b) 2 synthesized consonant-vowel syllables in Exp II. For both vowels and consonants, dysphasics were impaired when the discriminable components of the 2 stimuli were brief (43 msec) but unimpaired when these components were 95 msec or longer. It is concluded that developmental dysphasics have no difficulty in discriminating transitional auditory information as such and that their impaired discrimination of synthesized stop consonants is attributable solely to the brief duration of the discriminable components. (French & German summaries)—*Journal abstract*.

11966. Tomiyasu, Yoshikazu; Matsuda, Sei; Murakamai, Eiji & Emi, Yoshitoshi. (Inst for Develop-

mental Research, Aichi Prefectural Colony, Japan) **[Structure of the adaptive behavior of the mentally retarded: I. A factor-analytic study.]** (Japn) *Japanese Journal of Special Education*, 1974(Jun), Vol 12(1), 10-23.—Administered the Japanese translation of the Adaptive Behavior Scale to 1,971 retarded children and 6,092 retarded adults. Significant factors in Part I of the scale were Personal Independence (e.g., self-care and motor ability), Social Adjustment (e.g., telephone usage, locomotion, money handling, speaking, and writing), and Personal and Social Responsibility (e.g., initiative, persistence, self-direction, and socialization). In Part II, Antisocial-aggressive Behavior, Self-stimulating Behavior, and Deficient Interpersonal Behavior were 3 significant factors both for children and adults. (English summary)—S. Ohwaki.

11967. Vellutino, Frank R.; Steger, Joseph A.; Harding, Constance J. & Phillips, Forman. (State U New York, Albany) **Verbal vs non-verbal paired associates learning in poor and normal readers.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 75-82.—A total of 60 normal and 60 poor readers from 4th, 5th, and 6th grades were compared on verbal and nonverbal paired-associates tasks involving visual and auditory components. The performance of the poor readers was equivalent to that of the normals on the nonverbal tasks but inferior on the verbal tasks. Results are interpreted as consistent, either with the possibility of select language (intrahemispheric) disorder, in poor readers, or with dysfunction, unique to visual-verbal (interhemispheric) integration. These alternatives are discussed, and it is suggested that additional research is needed to evaluate their validity. (French & German summaries) (23 ref)—*Journal abstract*.

11968. Weinstein, Edwin A. & Pulg-Antich, Joachim. (Mt Sinai Hosp, New York, NY) **Jargon and its analogues.** *Cortex*, 1974(Mar), Vol 10(1), 75-83. Two patients with jargon aphasia exhibited verbal stereotypy, echolalia, and "officialese" in the course of recovery. It is suggested that these forms of language are analogous to jargon in that while the content lacks referential meaning, they serve as a mode of adaptation to stress.

11969. Wunderlich, Richard A. (Catholic U of America) **Effect of S-R discontinuity and double responding on two-odd oddity learning by retardates.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1327-1331.—36 institutionalized children whose mental age scores were at least 3 yrs below their chronological ages (12-17 yrs) were divided into 3 matched groups of 12 Ss each and presented with a 2-odd oddity discrimination. In 2 groups—stimulus-response (S R) and double-response—a 6-in spatial gap was imposed between the oddity stimuli and the site response. Group double-response differed from Group S-R only in requiring a double response (i.e., touching a chosen stimulus before making a response). In a 3rd group (S + R), no spatial discontinuity between stimulus and response existed; Ss responded directly to the oddity stimulus and not to the remote response block. In contrast to earlier studies there was little effect of discontinuity or of double responding on performance. Most Ss learned the oddity discrimination regardless of their experimental condition and in this regard were unlike retardates of other studies. (15 ref)—*Journal abstract*.



11970. Yeni-Komshian, Grace H.; Isenberg, David & Goldberg, Herman. (Johns Hopkins U, Medical School) **Cerebral dominance and reading disability: Left visual field deficit in poor readers.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 83-94.—Compared the performance of 19 good- and 19 poor-reading 5th-7th graders on dichotic listening of digits (DL), visual half-field presentation of Arabic numerals (VHF-N), and visual half-field presentation of digits written as words (VHF-W). Right ear superiority on the DL test was equal in both groups. The poor readers were more lateralized than the good readers on the VHF-N and VHF-W tests. Right VHF scores were at about the same level of accuracy in both groups. The deficit that the poor readers showed was most evident in their left VHF scores. Results suggest that poor readers either suffer from some form of degraded processing in the right hemisphere or that the transmission from the right to the left hemisphere is degraded. (French & German summaries) (33 ref) —*Journal abstract.*

### Speech Disorders

11971. Adams, Martin R. & Hutchinson, John. (Purdue U) **The effects of three levels of auditory masking on selected vocal characteristics and the frequency of disfluency of adult stutterers.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 682-688.—Tested the hypothesis that the growth function of the masking effect in stuttering behavior is promoted by systematic increases in vocal intensity. 16 normal-hearing young adult stutterers read aloud in 4 conditions (quiet and 10-, 50-, and 90-db sensation levels of continuous white noise). The oral readings were tape recorded. The recorded data were analyzed later to quantify Ss' vocal intensity, stuttering frequency, and reading time in each condition. Results show that under various levels of masking, there was an inverse relationship between vocal intensity and stuttering frequency. Results of reading time comparisons between conditions were affected by the absolute frequency of stuttering in quiet or the magnitude of the masking effect or both. Changes in vocal intensity are translated into physiological terms and interpreted in light of how they might promote fluency and reduce stuttering.—*Journal abstract.*

11972. Conture, Edward G. (Syracuse U) **Some effects of noise on the speaking behavior of stutterers.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 714-723.—Determined the influence of the loudness and spectrum of noise stimuli on stuttering frequency, reading rate, and vocal level of 9 adult male stutterers. During each of 6 noise conditions and 1 non-noise condition, Ss continuously read aloud prose passages during 4 successive 5-min periods. Low-pass, high-pass, and broad-band noise, psychophysically equated for loudness at 2 different levels, was presented during the 3rd period of the 6 noise conditions. Stuttering frequency, reading rate, and vocal level were measured for the 2nd and 3rd periods of all conditions. Ss increased their vocal level while decreasing their stuttering frequency as a result of the loudness rather than of the frequency spectrum of the noise. Reading rate was not significantly influenced by changes in loudness or frequency spec-

trum. Results do not support the findings of others that low-pass noise decreases stuttering more than does high-pass noise. (18 ref)—*Journal abstract.*

11973. Gabriyal, Talat M. (Ein-Shamskii U, Cairo, Egypt) **[An analytic study of situations associated with stuttering.]** (Russ) *Defektologiya*, 1972, No 5, 23-28.—Constructed a questionnaire containing a list of 129 situations and a scale to indicate the degree to which a given situation provokes stuttering. 50 stutterers (high school, institute, and university students) were asked to rate each situation on the scale, from 0 (stuttering absent) to 3 (marked stuttering present). The 129 situations were classified into 11 categories, each consisting of 2 groups of situations: those associated with an increase in stuttering and those associated with a decrease in or absence of stuttering. For each category the *M* values ascribed to its 2 groups were calculated and the statistical significance of the difference between the *M*s was ascertained through the use of a *t* test. This difference was significant in 10 of the categories. It is concluded that most situations leading to stuttering can be so classified and even predicted.—*E. C. Koffman.*

11974. Gilmore, Stuart I. (Louisiana State U) **Social and vocational acceptability of esophageal speakers compared to normal speakers.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 599-607.—Conducted a study with 2 esophageal and 2 normal male speakers which estimated the effect of (a) visual, auditory, and simultaneous audiovisual presentation of the speakers and (b) simple expository introductions of the speakers. A group of 480 members of business and professional men's groups evaluated the 4 speakers on 1 social and 3 vocational criteria. Statistical analysis indicated the esophageal speakers were perceived as being significantly less acceptable ( $p < .001$ ) than the normal speakers regardless of whether the judgments were based on visual, auditory, or simultaneous visual and auditory impressions. Information about the esophageal speakers significantly raised their acceptability, with the exception of the criterion of public contact in employment. The criterion measures used in this study might serve as objective indicators of the degree to which communicative disorders handicap adults. (35 ref) —*Journal abstract.*

11975. Soltøft-Jensen, Per. (School Psychological Office, Hobro, Denmark) **[Elective mutism in school psychological practice.]** (Danish) *Skolepsykologi*, 1975, Vol 12(1), 3-16.—Reviews the literature and presents 3 cases. The symptom is defined by selective speech even if language functions are sufficient for normal verbal reaction to situations. Etiological considerations may distinguish between simple-reactive and neurotic mutism; these may be total, elective, or hysterical-demonstrative. In separate categories are mutism connected with psychoses and cerebral disturbances of speech. Elective mutism patients seen in clinics are shy, withdrawn, and sensitive and often exhibit other neurotic symptoms. Intelligence seems normally distributed but the symptom may appear in families. Treatments may involve psychotherapy or behavior modification. The school has a central role in early diagnosis, support, and treatment.—*P. Mylov.*

11976. Woods, C. Lee. (U Iowa) **Social position and speaking competence of stuttering and normally fluent boys.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 740-747.—Obtained ratings of social position and speaking competence from 48 male, stuttering 3rd and 6th graders (24 mild and 24 moderate or severe) and from 562 of their normally fluent male classmates. Peer ratings, self-estimates of ratings, and reasons for certain ratings also were obtained. No significant differences between groups of stuttering Ss were found. Upon comparison with fluent Ss, stutterers expected to be and were rated significantly poorer as speakers than were the normally fluent. No significant differences were found, however, between stuttering and fluent Ss on social position measures, suggesting that whether or not an elementary-school-age male stuttered was of minor importance in determining his social role among his peers. (24 ref)—*Journal abstract*.

11977. Zimmermann, Gerald N. & Knott, J. R. (U Iowa, Div of Electroencephalography & Neurophysiology) **Slow potentials of the brain related to speech processing in normal speakers and stutterers.** *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 599-607.—Used a contingent negative variation (CNV) paradigm to study slow potential shifts of the brain in stutterers and normal speakers during speech and nonspeech verbal tasks and a nonverbal manual task. Ss were 9 male stutterers and 5 normal speakers ranging in age from 20 to 29 yrs. Results show that vertex CNVs were similar in normal speakers and stutterers in the verbal and nonverbal tasks. Differences were found between groups at the lateral electrode derivations in both verbal tasks. Preceding speech, 4 of 5 normal speakers showed a larger shift in the left hemisphere than in the right, while only 22% of the stutterers showed a left greater than right asymmetry. In the verbal condition in which Ss did not speak, similar relationships were observed. It is concluded that left and right inferior frontal areas of nonstutterers and stutterers performed differently even when stutterers were not approaching a moment of stuttering. (French summary) (29 ref)—*Journal summary*.

### Physical & Toxic Disorders

11978. Assal, G. & Müller, C. (U Lausanne, Switzerland) **[Delirious manifestations of long duration following traumatic and tumorous injuries of the central nervous system.]** (Fren) *Schweizer Archiv für Neurologie, Neurochirurgie und Psychiatrie*, 1973, Vol 112(1), 115-121.—Examined the clinical records of 244 patients with post-brain-damage traumas and 124 patients with brain tumors to investigate the occurrence of ensuing delirious-psychotic manifestations of long duration. 3 case histories are described and discussed. The delirium case histories are described and discussed. The delirium is seen as different from schizophrenia and interpreted as a psychotic reaction of compensation, its duration explained by the severely limited possibilities of readaptation.

11979. Baker, Susan W. & Ehrhardt, Anke A. (State U New York, Medical School, Buffalo) **Prenatal androgen, intelligence, and cognitive sex differences.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O.

Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11980. Basso, A.; Bisiach, E. & Faglioni, P. (U Milan, Ctr of Neuropsychology, Italy) **The Mueller-Lyer illusion in patients with unilateral brain damage.** *Cortex*, 1974(Mar), Vol 10(1), 26-35.—Assessed linear length discrimination and susceptibility to the Müller-Lyer illusion in normals and unilateral brain-damaged patients. Right brain-damaged patients with visual field defects were found impaired in linear length discrimination. Left brain-damaged patients showed a reduced susceptibility to the illusion. Corrections in the Müller-Lyer scores brought about by the scores of a test of oral comprehension were not significant. These findings are discussed in relation to the theory that hemispheric asymmetry in perception can be explained in terms of analytic vs holistic processing of patterns.—R. Gunter.

11981. Bauer, Rudolph & Kenny, Thomas. (U Maryland Hosp, Medical School, Baltimore) **An ego disturbance model of MBD.** *Child Psychiatry & Human Development*, 1974(Sum), Vol 4(4), 238-245.—Interprets minimum brain dysfunction (MBD) in terms of impairment of ego function, a concept which permits differentiation from other childhood disorders. The MBD child is described as mildly disturbed in the areas of autonomous function, cognitive focusing, and concept formation, whereas reasoning skills, reality testing, and synthetic function are normal. The disorder may be understood by the individual pattern of ego strength and impairment, which also suggests an appropriate therapeutic regimen, i.e., one which concentrates on areas of deficiency.—E. S. Goodman.

11982. Becker, Sheila. (Montreal Oral School for the Deaf, Quebec, Canada) **The performance of deaf and hearing children on a logical discovery task.** *Volta Review*, 1974(Dec), Vol 76(9), 537-545.—Adapted a nonverbal concept attainment task of Bruner and Goodnow for use with 42 deaf and 48 hearing children of school age. Scores of both groups improved with age, but at all ages the deaf Ss had a higher error score than the normals. Deaf Ss' oral ability was not related to their ability to form concepts. Deaf children used trial-and-error strategies slightly more than hearing children, and tended to apply sophisticated but inappropriate strategies. Results may provide some support for J. Piaget's theories about the relation between language and intellectual development.—W. A. Hass.

11983. Brown, Bill R.; Morgan, Ben B. & Alluin, Earl A. (Eds.). (U Louisville, Performance Research Lab) **Final report on the behavioral effects of infectious diseases.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 157.

11984. Chandrasekaran, R. (Postgraduate Inst of Medical Education & Research, Chandigarh, India) **Galactosemia: A short communication.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 98-102.—Galactosemia is a metabolic disorder involving a deficiency of galactose-1-phosphate uridyl transferase and making it impossible for the patient to assimilate milk or milk products. It is manifested in infants by listlessness, jaundice, failure to gain weight, and mental retardation. If a diet of atta, and/or other nutrients which do not contain galactose, is substituted for milk in early infancy.



intelligence can in many cases develop normally.—J. H. Pflaum.

11985. Diehl, L. W. (Freien U, Psychiatrische Klinik, Berlin, W Germany) [**Psychopathological syndromes in epilepsy.**] (Germ) *Psychiatria Clinica*, 1974, Vol 7(2), 75-83.—Systematic presentation of psychopathological syndromes in epilepsy indicates that the preoccupation with these phenomena is important to clarify essential problems in general psychiatry. Although there is a division into reversible and irreversible psychopathological syndromes, the different complexes of symptoms can nevertheless overlap. There is no nosologic specificity of psychopathological phenomena in epilepsy, which corresponds to general psychiatric experience. The division presented is to be understood as a coordinate system. The current state of development of pathological cerebral dysfunctions in a epileptic person is thus to be recorded in its course on the strength of psychopathological effects. (21 ref)—*English abstract.*

11986. Ehrhardt, Anke A. & Baker, Susan W. (State U New York, Medical School, Buffalo) **Fetal androgens, human central nervous system differentiation, and behavior sex differences.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

11987. Ellingson, Robert J.; Dutch, Stephen J. & McIntire, Matilda S. (U Nebraska, Medical Ctr, Omaha) **EEG's of prematures: 3-8 year follow-up study.** *Developmental Psychobiology*, 1974(Nov), Vol 7(6), 529-538.—A classification of apparently normal neonatal EEGs into 4 classes (A-D) on the basis of progressive maturity was devised and applied to 273 EEGs of 117 apparently normal newborns recorded between 24 and 50 wks conceptional age (CA). Both the order in which the 4 classes of EEGs occurred for Ss upon whom more than 1 EEG was obtained, and the distributions of the ages over which the 4 classes were observed confirm that the classes represented a maturational sequence of EEG pattern changes. Of the 81 original premature Ss, 46 underwent comprehensive clinical evaluation between 3 and 8 yrs. Results do not demonstrate the usefulness of the routine EEG as a prognostic indicator in neonates not displaying specific pathology at birth; they do offer some evidence of a relationship between immaturity of the EEG relative to CA in the neonatal period and the later manifestation of congenital disorders involving the brain. (21 ref)—*Journal abstract.*

11988. Forster, Francis M. et al. (U Wisconsin, Epilepsy Ctr, Madison) **Reflex epilepsy evoked by decision making.** *Archives of Neurology*, 1975(Jan), Vol 32(1), 54-56.—Describes the case of a 20-yr-old male patient who had seizures while playing chess or cards or when filling out complex forms, doing complex mathematical problems, and during certain parts of the neuropsychological testing. Seizures were myoclonic and accompanied an EEG dysrhythmia of the atypical spike and wave type. Evoked seizures were not related to visual, tactile, or auditory stimuli or clues. In chess, seizures occurred when he was on the defense and threatened. Simple decision making or physiologic stress did not evoke seizures nor did nonsequential decision making under verbal pressure. Evoking factors were

complex decision making in a sequential fashion and an element of stress or concern regarding the outcome of the decision making. Stimulus was usually nonverbal. 3 major factors—decision complexity, sequential factor, and related stress or concern—may have some reciprocal relationships.—*Journal abstract.*

11989. Froese, Arthur; Hackett, Thomas P.; Cassem, Ned H. & Silverberg, Elizabeth L. (Massachusetts General Hosp, Boston) **Trajectories of anxiety and depression in denying and nondenying acute myocardial infarction patients during hospitalization.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 413-420.—Out of 36 acute myocardial infarction patients (9 female, 27 male), 17 were classified as deniers and 19 as nondeniers; all were scored for anxiety, depression, and denial at 6 intervals (Days 1-2, 3-4, 5-7, 8-10, 11-14, and 15-25) during their hospital stay. Anxiety scores, high for both groups on the 1st 2 days, declined more rapidly for deniers. The latter were rated significantly less anxious by Days 3-4, while the nondeniers' level of anxiety remained elevated until Days 5-7. Depression scores dropped for deniers on Days 5-7; nondeniers showed no such change. Denial scores dropped significantly in both groups but occurred sooner for nondeniers (Days 8-10) than for deniers (Days 11-14). The decline of denial followed a fall in anxiety scores; however, denial continued to operate after this fall 3 times longer for the denier.—W. G. Shipman.

11990. Gallart Capdevila, José M. (U Barcelona, Spain) [**Psychological aspects of children suffering from cerebral palsy: Spastic and/or nonspastic.**] (Span) *Anuario de Psicología*, 1973, No 8, 53-71.—Presents a psychological analysis of 600 children with cerebral palsy, patients at a rehabilitation center (mean IQ = 60). Many psychometric and psychoaffective tests were administered. Analysis of results revealed no significant differences between spastic and nonspastic Ss. Therefore results did not support the findings of J. F. Garret and others that spastic Ss have experienced greater anxiety than normal Ss and that athetoid Ss have a greater need of affection and less tolerance of frustration than the normal population. (23 ref)—*English summary.*

11991. Goldman, Herbert et al. (VA Hosp, St Louis, MO) **Correlation of diastolic blood pressure and signs of cognitive dysfunction in essential hypertension.** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 571-572.—Studied the relationship between the degree of diastolic hypertension and frequency of errors made on a psychological test sensitive to cognitive dysfunction in a sample of 14 male essential hypertensives. 3 white and 11 black Ss were recruited from the St. Louis Veterans Administration Hospital Outpatient Clinic. Their mean age was 47.6 yrs and their mean educational level 9.3 yrs. None had been previously diagnosed or treated for hypertension. Both a subtest of the Halstead-Reitan Neuropsychological Test Battery for Adults and the WAIS were administered. While the correlation between degree of systolic hypertension and test scores was not significant, the correlation between diastolic hypertension and test score was significant. It is concluded that these findings support the concept that

hypertension has neuropsychological as well as cardiovascular consequences.—*R. S. Albin.*

11992. Gordon, H. W. (Technion-Israel Inst of Technology, Haifa) **Comparison of ipsilateral and contralateral auditory pathways in callosum-sectioned patients by use of a response-time technique.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 9-18.—6 epileptic patients with complete forebrain commissurotomy were used in a vocal response time test to contrast ipsilateral and contralateral auditory pathways. Callosal bisection and use of verbal stimuli and responses ensured exclusive use of the left hemisphere. Consequently, scores for the right and left ears reflected performance by contralateral and ipsilateral pathways, respectively. Simple words were repeated faster, but no more accurately, when presented to the right ear than to the left. Control Ss, including 2 partial commissurotomy patients, 5 normal Ss, and 2 epileptics, showed no ear differences. Nor were there differences on other control tests given to complete commissurotomy Ss. Possible sources for the difference between the ipsilateral and contralateral pathways are discussed. (French & German summaries) (25 ref) —*Journal abstract.*

11993. Grissom, Julie J.; Weiner, Barbara J. & Weiner, Elliot A. (Oklahoma State U) **Psychological correlates of cancer.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 113.—Administered the Recent Life Changes Questionnaire and the Tennessee Self-Concept Scale to 30 male lung cancer patients, 30 male emphysema patients, and 30 male well controls. Data suggest that there are definite indications of distinctive personality characteristics possessed by people who have cancer, which may have been characteristic of those people before their illness.

11994. Gustafson, Lars & Risberg, Jarl. (U Lund Hosp, Sweden) **Regional cerebral blood flow related to psychiatric symptoms in dementia with onset in the presenile period.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 516-538.—Measured regional cerebral blood flow (RCBF) by the intra-arterial <sup>133</sup>Xenon injection technique in 8 regions of the dominant hemisphere in 50 40-65 yr old patients with presenile dementia. Psychiatric ratings on 67 symptoms were factor analyzed, and the 14 factors obtained were correlated to the RCBF variables. 3 factors containing symptoms of pronounced mental deterioration (e.g., amnesia, apraxia, agnosia, and aphasia) showed the largest negative correlations to RCBF, suggesting that the most demented Ss had reduced oxygen metabolism and atrophic cortical changes in these regions. Symptoms of affective or other changes in these regions. Symptoms of affective or other changes of personality in organic dementia were found changes of personality in organic dementia were found in Ss with a relatively better preserved cerebral circulation. Ss with paranoid symptoms had a high grey matter blood flow, especially frontally in combination with decreased flow in the posterior temporal region. It is concluded that the RCBF technique can be applied to measure quantitatively general or regional cerebral dysfunction underlying various forms of dementia. (3 p ref) —*Journal abstract.*

11995. Harley, Randall & Spollen, John. (George Peabody Coll for Teachers) **A study of the reliability and validity of the Visual Efficiency Scale with low vision children.** *Education of the Visually Handicapped*,

1973(Dec), Vol 5(4), 110-114.—The Visual Efficiency Scale (VES), designed to assess visual discrimination of low-vision children, has 48 visual discrimination items grouped in 4 subtests. It was administered to 78 6-8 yr old low-vision children in residential schools. Results indicate that the VES has both content validity and internal consistency. Item analysis shows that most of the test items sufficiently discriminated between high and low scorers. Some items were inappropriately placed according to efficiency rating. Results agreed with those of a previous study with preschool normally-seeing children.—*C. L. Nicholson.*

11996. Hemsley, David. (Inst of Psychiatry, London, England) **Relationship between two tests of visual retention.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1132-1134.—Conducted a retrospective investigation of the relationship between the Revised Visual Retention Test (Administration A) and the Rey-Osterrieth test, used clinically in the assessment of brain damage on 31 patients. Differences between the tests are discussed, and agreement between the tests is noted to be dependent on the cut-off points chosen. Results indicate once again the difficulties inherent in the unitary concept of brain damage.—*Journal abstract.*

11997. Hoffmann, S. O. (Freie U Berlin, Psychiatrische Klinik II, W Germany) **[Reversion of a so-called dermatozoophobia after implantation of a pacemaker: On the problem of symptomatic psychoses in heart disease.]** (Germ) *Nervenarzt*, 1973(Jan), Vol 44(1), 48-51.—Describes 74-yr-old female with congestive heart failure (blood pressure 230/50, pulse rate 40), complex atrial arrhythmias and intermittent atrioventricular (AV) block, with a history of delusions and dermatozoophobia dating back about 2 mo. Neither pulse rate nor psychotic symptoms responded to pharmacologic treatments. After development of complete AV block, transitory spontaneous increases of pulse rate were associated with partial remission of psychopathological symptoms. Implantation of a pacemaker resulted in 160/80 blood pressure, 74 pulse rate, and complete reversion of delusions, with persistence of a mild organic brain syndrome. 2 possible mechanisms for psychosis associated with heart disease are suggested: (a) Up to age 55-60 with presumably only minimal arteriosclerotic changes, severe cardiac decompensation may lead to "absolute" insufficiency of cerebral blood flow; in patients that survive, the psychosis may be termed "cardiogenic." (b) After age 55-60 and with signs of arteriosclerotic changes, severe cardiac decompensation may lead to "relative" insufficiency of cerebral blood flow, and the appropriate label may be "symptomatic circulatory psychosis." (33 ref)—*J. Rutschmann.*

11998. Holland, Audrey L. & Sonderman, Judith C. (U Pittsburgh) **Effects of a program based on the token test for teaching comprehension skills to aphasics.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 589-598.—Designed a programmed training task based on the token test and administered it to 24 left-brain damaged adult aphasic patients. The point at which the failed the token test determined where he began the program and how many training sessions he would receive, provided he did not exceed the error rate before he finished the program. Improvement and errors within



the program were analyzed to evaluate this training. Mildly or mild to moderately impaired Ss showed significant improvement, while moderately and severely handicapped Ss did not. This training, however, did not generalize to other "direction-following" tasks for any group of Ss. Within the program, generalization items were the most difficult for all aphasics. Neither inpatient vs outpatient status nor frequency of training sessions were significantly related to success with this program. The only overlap between groups which emerged in this study involved the youngest S (24 yrs old), whose aphasia was the result of a recent traumatic injury.—*Journal abstract.*

11999. Jerger, Susan & Jerger, James. (Methodist Hosp, Texas Medical Ctr, Houston) **Extra- and intra-axial brain stem auditory disorders.** *Audiology*, 1975(Mar-Apr), Vol 14(2), 93-117.—Compared auditory test results in 28 patients with extra-axial, 11 patients with intra-axial, and 6 patients with combined extra- and intra-axial brain stem disorders. Ss with extra-axial lesions usually demonstrated sensitivity loss, marked adaptation on Békésy audiometry, impairment in maximum percent correct in performance on monosyllabic word lists (PBmax) and auditory symptoms on the ear ipsilateral to the radiographic abnormality. Ss with intra-axial brain stem lesions usually showed slight, if any, sensitivity loss, normal Békésy audiograms, relatively good PBmax scores, and auditory symptoms on both ears or on the ear contralateral to the radiographic disorder. In Ss with combined extra- and intra-axial disorders, auditory findings varied in relation to the extent of extra-axial involvement. (French summary) (41 ref)—*Journal abstract.*

12000. Johns, M. W. (Monash U, Melbourne, Vic, Australia) **Stress and coronary heart disease.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974, 140 p. \$10.95.

12001. Kershner, John R. & King, Audrey J. (Ontario Inst for Studies in Education, Toronto, Canada) **Laterality of cognitive functions in achieving hemiplegic children.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1283-1289.—7 left- and 7 right-hemiplegic 6-9 yr old children were compared with 7 physically normal children on the WISC and Reitan-Indiana Neurological Test Battery. Although the brain-injured Ss were achieving satisfactorily in school and no differences were found among the 3 groups on the Wide Range Achievement Test, the left hemiplegics were poorer than the normals in visuo-perceptual performance, and the right hemiplegics poorer than the normals in verbal intelligence. Results suggest that even in educationally advanced children, compensation for early, asymmetrical brain damage is not complete. Recommendations are made for early assessment of asymmetrical cognitive abilities and differential instructional procedures. (27 ref)—*Journal abstract.*

12002. Ketterings, K. & Korten, J. J. (Neurologische Klinik, Nijmegen, Netherlands) **[Psychological and clinical neurological observations in cases of essential tremor: With introductory brief literature review and concluding comparison between essential and parkinsonian tremor.]** (Germ) *Nervenarzt*, 1973(Jan), Vol 44(1), 19-25.—Presents neurological, personality, and bio-

graphical data on each of 7 males and 1 female with essential tremor and describes differences and similarities between these patients and patients with paralysis agitans. (32 ref)

12003. King, Ambrose J. **Homosexuality and venereal disease.** In J. A. Loraine, *Understanding homosexuality: Its biological and psychological bases*. New York, NY: American Elsevier, 1974, 217 p.

12004. King, Audrey J. (Ontario Inst for Studies in Education, Toronto, Canada) **Recreation as one of the needs of the physically disabled.** *Journal of Leisureability*, 1974(Apr), Vol 1(2), 21-28.—Describes the obstacles to social interaction faced by handicapped individuals (e.g., environmental barriers, transportation, and social stigma). Recreation is suggested as an area in which these obstacles could be overcome, permitting the disabled to develop feelings of self-worth and social skills.

12005. Klein, Robert F.; Garrity, Thomas F. & Gelein, Janet. (U Rochester, Medical School) **Emotional adjustment and catecholamine excretion during early recovery from myocardial infarction.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 425-435.—Studied 38 patients hospitalized for acute myocardial infarction in a cardiac care unit, using nurses' behavioral ratings, interviews, and bedside observations during the 1st 5 days after admission. Urinary epinephrine (E) and norepinephrine were measured for the same days from 8-hr collections corresponding to the period of behavioral observation. Ss with no adjustment during the study had significantly higher E excretion during the 1st day of hospitalization and on a repression-expression dimension. Rating periods characterized by high expression were associated with lower E excretion than periods characterized by high repression. (35 ref)—*W. G. Shipman.*

12006. Levine, Edna S. & Wagner, Edwin E. (New York U) **Personality patterns of deaf persons: An interpretation based on research with the Hand Test.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1167-1236.—Attempts to breach the stereotyped image of the "deaf personality" and to approach the study of the deaf with an instrument—the Hand Test—not previously used in the creation of that stereotype. Psychological research, measures used, and problems encountered in assessing the effects on personality of early severe deafness are reviewed, and theories concerning ego and superego development, mental functioning, and the role of nonverbal elements of human communication in the growth of the deaf personality are outlined. A description of the Hand Test and an investigation of its use in a study with 4 groups of deaf adults comprising 3 sharply divergent levels of linguistic competence (exceptional, marginal or illiterate, and average of typical high school) are detailed. Statistical findings and basic interpretations of the data from this study show that 20 of 24 Hand Test variables significantly discriminated among the 4 deaf groups. Protocols for administering, interpreting, and using the Hand Test for clinical assessment are described. It is provisionally concluded that, subject to further research and validation, the Hand Test is a useful diagnostic instrument, easily integrated into a battery of psychological tests for evaluating the individual deaf person. (4 p ref)—*B. McLean.*

12007. Litman, Theodor J. (U Minnesota, School of Public Health) **The family as a basic unit in health and medical care: A social-behavioral overview.** *Social Science & Medicine*, 1974(Sep), Vol 8(9 10), 495-519. —Reviews the literature on the role of the family in physical illness. It is suggested that future research efforts be directed at (a) developing a more reliable and valid measure of family interaction; (b) determining the impact of illness on the family; (c) investigating family adaptation, adjustment, and response to illness; and (d) exploring home treatment. —*M. E. Pounsel.*

12008. Lucas, Richard A. (VA Hosp, Durham, NC) **A comparative study of measures of general anxiety and death anxiety among three medical groups including patient and wife.** *Omega Journal of Death & Dying*, 1974(Fal), Vol 5(3), 233-243. A problem not yet extensively researched among hemodialysis patients and their families concerns matters of dying and death. This paper presents a comparative study of general and death anxiety among 3 different groups of 20 physically ill males (center and home hemodialysis patients and surgery patients) and their wives. The MMPI, the State-Trait Anxiety Inventory, and Templer's Death Anxiety Scale were administered to all Ss. In addition, a death questionnaire was used in a structured interview setting with dialysis patients and their spouses in their homes. Results show that (a) there were no significant differences between groups in death anxiety; (b) for both hemodialysis groups, wives had higher death anxiety than their husbands; and (c) for all Ss, death anxiety was no higher than that of previous normative samples. Results indicate that serious physical illness does not necessarily lead to heightened death anxiety. (19 ref) —*Journal abstract.*

12009. Mahapatra, S. B. (U Leeds, England) **Psychiatric and psychosomatic illness in the deaf.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 450-451. —Studied the prevalence of psychiatric and psychosomatic diseases in patients who had become deaf from otosclerosis in adolescence or in adult life. Assessment of 40 control Ss with a hearing loss of 40 db or more in 1 ear and of 49 deaf patients with bilateral hearing loss of 40 db or more, using the Cornell Index N2 Questionnaire and psychiatric interview, showed a significantly higher prevalence of psychiatric illness among the deaf. Among the deaf, depressive illness was found to be the predominant type of psychiatric illness. No significant difference emerged between deaf and control Ss with respect to psychosomatic illness. —*Journal summary.*

12010. Meyer-Bahlburg, Heino F. et al. (State U New York, Medical School, Buffalo) **Cryptorchidism development of gender identity, and sex behavior.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

12011. Meyer-Bahlburg, Heino F. (State U New York, Medical School, Buffalo) **Aggression, androgens, and the XYY syndrome.** In R. C. Friedman, R. M. Richart, R. L. Vande Wiele & L. O. Stern (Eds), *Sex differences in behavior*. New York, NY: John Wiley & Sons, 1974. xvi, 495 p.

12012. Montagu, J. D. & Swarbrick, Linda. (MRC Clinical Psychiatry Unit, Graylingwell Hosp, Chichester,

England) **Hyperkinesia: The objective evaluation of therapeutic procedures.** *Biological Psychology*, 1974, Vol 2(2), 151-155. —Describes 2 methods for measuring the unrestricted movements of a hyperkinetic child in an experimental room. One method makes use of an ultrasonic system which quantifies all motor activity. The 2nd method monitors only locational changes; it employs a matrix of electric pressure mats under the carpet. —*Journal abstract.*

12013. Nabelek, Anna K. & Pickett, J. M. (Gallaudet Coll) **Monaural and binaural speech perception through hearing aids under noise and reverberation with normal and hearing-impaired listeners.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 724-739. —Studied speech perception with 5 normal and 5 hearing-impaired college students in a single sound-treated room at reverberation times  $T = .3$  and  $.6$  sec. Binaural and monaural perception through hearing aids was compared in quiet and in the presence of a babble of 8 voices. The speech and noise sources subtended an angle of  $60^\circ$  on a circle 11 feet in radius centered at the S to give an advantage for binaural perception. Binaural gain was taken as the difference in speech-to-noise ratios for the same word-recognition score comparing binaural and monaural results. The average binaural gain was 3 db for normal and 1.5 db for hearing-impaired Ss at both values of reverberation. Only the hearing-impaired Ss showed an advantage for binaural listening in quiet. The small increase in reverberation caused a substantial decrease in word intelligibility. Hearing-impaired Ss performed an average of 7% poorer under the longer reverberation in the presence of noise and also in quiet. Normal Ss performed 15% poorer at longer reverberation only in the presence of masking noise. Data are presented describing the effects of these experimental conditions on perception of certain types of consonants and phonetic features of consonants. (33 ref) —*Journal abstract.*

12014. Oettinger, Leon; Majovski, Lawrence V.; Limbeck, George A. & Gauch, Ronald. **Bone age in children with minimal brain dysfunction.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1127-1131. —53 children (mean age = 8.5 yrs) diagnosed as having minimal brain dysfunction had X-rays of their left wrist and hand for the determination of bone age. All X-rays were read independently by 3 physicians skilled in radiology. The films were read blind (i.e., sex and case numbers but not age were available). The degree of interrater reliability was very high. Bone age for the group was significantly retarded ( $p < 0.01$ ) compared with the standard group's norms. Two-thirds of the Ss with the standard group's norms. No fell below the mean of the standard norms. No correlation was found between bone age and thyroid level. Findings suggest that children diagnosed as having minimal brain dysfunction may be physiologically retarded in their bone age, although marked individual variations remain. The concept of physiological immaturity should be considered by professionals in the education and social planning for the child with minimal brain dysfunction. —*Journal abstract.*

12015. Oleron, P. (U René Descartes, Lab of Genetic Psychology, Paris, France) **[Visual detection of differences by deaf children under simultaneous and successive presentation conditions.]** (Russ) *Defektslogiya*,



1972, No 5, 18-23.—Studied the ability of 31 deaf boys 11-15 yrs old to detect differences between 2 relatively complex illustrations. For 12 pairs of illustrations both cards were presented simultaneously; for 12 other pairs, the 1st and 2nd cards were presented successively. The Ss' performance on these tasks was compared to that of 11-15 yr old hearing Ss in a study by A. Pieron. While deaf and hearing Ss did equally well under conditions of simultaneous presentation, deaf Ss did less well when the stimuli were shown successively. Results are interpreted as indicating that the deaf do not experience a compensatory increase in the quality of their visual perception. The deaf Ss' difficulty with successive discrimination is explained by the presence in this task of a memory factor. Several theories about why the deaf might show a memory deficit are discussed.—*E. C. Koffman.*

12016. **Perenin, M. T. & Jeannerod, M.** (INSERM, Lab de Neuropsychologie expérimentale, Bron, France) **Residual vision in cortically blind hemifields.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 1-7.—Tested residual visual ability in perimetricaly blind regions of the visual field in 8 adult patients (6 with postgeniculate and 2 with pregeniculate lesions) by using patterned afterimages. None of the Ss experienced an afterimage, nor could they detect the shape of the pattern when flashed within their scotoma. Postgeniculate lesioned Ss, however, were able to point the finger at the origin of the flashes with good accuracy, although those with pregeniculate lesions could not. (French & German summaries) (22 ref)—*Journal abstract.*

12017. **Pöppel, Ernst & Shattuck, Stefanie R.** (Max Planck Inst for Psychiatry, Munich, W Germany) **Reading in patients with brain wounds involving the central visual pathways.** *Cortex*, 1974(Mar), Vol 10(1), 84-88.—Investigated the reading ability of 22 patients with penetrating head injury. In 12 Ss the injury had affected the central visual pathways, producing visual field defects; the remaining 10 had suffered lesions in more anterior parts of the brain not involving visual functions, and these Ss were used as a control group. The task was to read aloud 56 short sentences, presented not only in the usual format from left to right, but also in 7 other directions, around the clock. Although none of the patients with visual field defects complained of reading difficulties in daily life, their reading times for sentences presented in this fashion were twice as long as those of the control group. Reading time was not affected by the presence of a blind area in the reading direction.—*R. Gunter.*

12018. **Pritchard, Michael.** (London Hosp Medical Coll, England) **Meaning of illness and patients' response to long term haemodialysis.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 457-464.—Further observations on the meaning of illness to 5 male and 9 female patients undergoing long-term hemodialysis were made using a semantic differential along with the Response to Illness Questionnaire (RIQ). Analysis of the combined data produced 12 dimensions of meaning and/or response to illness (accounting for 99% of the total variance). These ranged from challenging appraisal/informed tolerance to self-involvement/positive acceptance. It is proposed that ratings on these dimensions

will relate to supposed determinants and outcome of illness.—*W. G. Shipman.*

12019. **Quarrington, Bruce & Solomon, Barbara.** (York U, Toronto, Ontario, Canada) **A current study of the social maturity of deaf students.** *Canadian Journal of Behavioural Science*, 1975(Jan), Vol 7(1), 70-77.—Administered the Vineland Social Maturity Scale to profoundly and prelingually deaf 5-16 yr olds. 40 Ss attended day school and 75 were in residential programs with frequent or rare home visits. In institutionalized Ss, the social maturity quotients derived from residential informants were significantly lower than those obtained from parental informants and were not significantly correlated. Social maturity quotients derived from parental interviews were found to be related to type of educational program and to be lowest for children in residential programs who visited their homes infrequently. (French summary)—*Journal abstract.*

12020. **Quigley, S. P.; Wilbur, R. B. & Montanelli, D. S.** (U Illinois, Inst for Research on Exceptional Children) **Question formation in the language of deaf students.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 699-713.—422 10-18 yr old deaf students and 60 hearing 3rd, 4th, and 5th graders responded to and judged the grammaticality of yes-no questions, wh-questions, and tag questions. Results indicate improvement with increasing age for deaf Ss. Even the youngest hearing Ss consistently obtained higher scores than most of the deaf. Yes-no questions were easier to comprehend and judge the grammaticality of than were wh-questions, which, in turn, were easier than tag questions. The acceptability of question variants, such as "Who did the boy hit the girl?" (copying) is also reported.—*Journal abstract.*

12021. **Sarachan-Deilly, Ann B. & Love, Russell J.** (Vanderbilt U, Medical School, Div of Hearing & Speech Sciences) **Underlying grammatical rule structure in the deaf.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 689-698.—Conducted a study using A. B. Sarachan's (1971) measure for assessing underlying language structure in the deaf. The rule-bound organization of the syntactic subcomponent of deep structure was investigated in 42 15-19 yr old congenitally deaf students with no known formal oral language stimulation prior to entering school and with 21 15-18 yr old normal-hearing high school students. Evidence suggests that deep structural differences in syntactic rules exist between congenitally deaf and hearing individuals. The evidence is interpreted as suggesting that these differences exist regardless of the method used in school to teach the deaf language, when the benefits derived from formal preschool language exposure are denied them. (29 ref)—*Journal abstract.*

12022. **Segers, Marie-Jeanne & Mertens, Charles.** (U Louvain, Ctr d'Etudes psycho-médico-sociales, Belgium) **Psychological and bioclinical CHD risk factors: Quantitative differences between obese, normal and thin subjects.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 403-411.—To clarify the etiological role played by obesity in coronary heart disease, 1,694 men in 2 age groups (over and under 45) and 3 weight categories (thin, normal, and obese) were given the Anxiety and the Depression Self-Rating Scales of the Institute for

**Personality and Ability Testing.** They were then compared on a number of bioclinical variables. Obese Ss, both under and over 45, exhibited higher bioclinical risks, but lower anxiety and depression, than normal and thin Ss. It is suggested that anxiety, depression, and their style of expression are key elements in the relationship between relative weight and proneness to coronary heart disease. (37 ref)—*W. G. Shipman.*

12023. **Sher, Abigail B.** (Michigan State U) **Factor-defined abilities in patients with unilateral brain lesions.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 101.—Administered a battery of 4 tests adapted from the structure of intellect model of differential abilities to 72 adults with right and left cerebral lesions and normals. Findings show that both brain-damaged groups exhibited slower response times than normals and that there was a relation between locus of the lesion and performance. However, results do not sufficiently demonstrate the advantage of factor-defined ability tests over tests of global intelligence and question the validity of these factor-defined tests in that they do not distinguish behaviors that are factorially distinct in normal populations.

12024. **Sher, Annabelle E. & Owens, Elmer.** (U California, Medical Ctr, San Francisco) **Consonant confusions associated with hearing loss above 2000 Hz.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 669-681.—Presented a 100-item test for the identification of phonemes to 2 groups of listeners: 35 adult patients with normal hearing up to 2,000 Hz accompanied by a high-tone loss and 28 adults with normal hearing who heard the speech stimuli presented through a low-pass filter with a cutoff at 2,040 Hz. There were no significant differences between the 2 groups in overall scores, in probabilities of error for individual phonemes, or in the kinds of error substitutions made. Findings show that (a) the overall scores indicated difficulty in phonemic identification and (b) the phonemes substituted for the stimulus phonemes in the initial position were the same in manner of articulation as the stimulus phoneme, and typically only 1 confusion occurred per stimulus phoneme. The phonemes substituted for the stimulus phonemes in the final position were not necessarily the same in manner of articulation as the stimulus phoneme, and more than 1 confusion generally occurred for each stimulus phoneme. (19 ref)—*Journal abstract.*

12025. **Sohmer, H.; Feinmesser, M. & Szabo, G.** (Hebrew U, Hadassah Medical School, Jerusalem, Israel) **Sources of electrocochleographic responses as studied in patients with brain damage.** *Electroencephalography & Clinical Neurophysiology*, 1974(Dec), Vol 37(6), 663-669.—Attempted to find corroborating evidence for the brain-stem origin of the set of 5 waves recorded from the ear lobe and vertex in both human and animal (cat) Ss. A comparison of electrocochleographic responses with clinical evidence in patients with various types of brain-stem tumors confirm the existence of brain-stem lesions and show that the 1st wave represents the response of the auditory nerve and that the later 4 waves are generated in the auditory nuclei. (French summary) (16 ref)

12026. **Spence, Michelle & Feth, Lawrence L.** (U Southern Mississippi) **Effects of off-frequency detection in brief-tone audiometry.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 576-588.—Cites studies of auditory temporal integration by pathological ears which have used listeners with an abrupt high-frequency hearing loss. While this configuration may lend itself to use of the listener as his own control, it presents the opportunity for detection of the low-frequency energy of the brief-tone bursts. The present study assessed the role of low-frequency energy in the determination of brief-tone thresholds of 6 adult male listeners with abrupt high-frequency losses due to cochlear pathology. 6 normal-hearing adult males also served as Ss. Low-frequency energy was reduced to subthreshold levels by passing the brief tones through a filter system which had a sharp high-pass characteristic. For both normal and impaired Ss, no significant differences in threshold were found between filtered and unfiltered brief tones. It is concluded that, although the opportunity for off-frequency detection was present, the abnormal temporal integration functions could not be attributed to stimulus artifact.—*Journal abstract.*

12027. **Stendig-Lindberg, G.** (Karolinska Inst, Stockholm, Sweden) **Hypomagnesaemia in alcohol encephalopathies.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 465-480.—Examined serum magnesium concentrations in patients with acute delirium tremens and patients with a diagnosis of alcohol encephalopathy (AE). Results indicate that a combination of hypomagnesaemia with delirium-predelirium tremens is of etiological significance for the occurrence of AE, which develops as a sequel to delirium tremens. (43 ref)

12028. **Sussman, Harvey M. & MacNellage, Peter F.** (U Texas, Austin) **Hemispheric specialization for speech production and perception in stutterers.** *Neuropsychologia*, 1975(Jan), Vol 13(1), 19-26.—Tested 25 right-handed and 3 left-handed 16-41 yr old stutterers on presumed indices of hemispheric specialization for speech production (pursuit auditory tracking) in Exp I and for speech perception (dichotic listening) in Exp II. 19 of the original sample plus one additional S served in Exp II. Previous studies of normal Ss have revealed a significant right ear advantage (REA) for tracking with a speech articulator but not with manual tracking. Stutterers showed no significant REA in either tracking condition but did show a significant REA, similar to that of normal speakers, in dichotic listening. Results are considered to differentiate this population of stutterers from normals in terms of hemispheric specialization for speech production but not for speech perception. (French & German summaries) (29 ref)—*Journal abstract.*

12029. **Tonkin, Roger S.; Robinson, Geoffrey C. & Kinnis, Claire.** (U British Columbia, Vancouver, Canada) **A study of kindergarten children in three socioeconomic areas of British Columbia.** *Health Services Reports*, 1973(Dec), Vol 88(10), 947-955.—Surveyed 279 kindergarten children and their families in 3 socioeconomic areas of British Columbia, examining a wide variety of health, social, and economic variables. Methods included physical and psychological examinations, anthropometric and laboratory measurements of the children, and interviews with the parents. Families of early registrant



for kindergarten showed distinct differences from families of late registrants and Indians. Late registrants and Indians were more likely to come from a family experiencing social and economic hardship. Such children had more severe dental disease, more frequent infection of skin, tonsils, and ears, and poorer school attendance and performance than their counterparts in the rest of British Columbia.—*Journal summary.*

12030. van der Linden, E. [Children with minimal brain dysfunction.] (Duth) *Nederlands Tijdschrift voor de Psychologie en haar Grensgebieden*, 1974(Nov), Vol 29(8), 601-630.—Presents the symptoms of minimal brain damage (MBD) among children. Neurological examination usually fails to indicate any anatomical or physiological disorders. Symptoms are varied: difficulties in training situations, unstructured behavior patterns, restlessness, inferior ability to differentiate among patterns of emotionalized behavior, difficulties in attentive behavior, high suggestibility, overreacting, and low frustration tolerance. The patient is characterized by a short attention span, disturbed space- and figure-ground perception, inadequate eye-hand coordination, clumsiness, obstinacy, ego-weakness and accident-proneness. The disorder is generally based on difficulties in perceptual differentiation, central inhibition, and integration. Although no standardized tests have been specifically constructed to identify the MBD child, some tests provide supporting evidence of the condition. Therapeutic measures include play therapy, operant conditioning, adult counseling, creative group therapy, speech training, motor therapy, and pharmacological therapy. (63 ref)—A. J. Ter Keurst.

12031. Waldton, Stig. (Beckomberga Hosp, Bromma, Sweden) **Clinical observations of impaired cranial nerve function in senile dementia.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 539-547.—Studied cranial nerve functions in 66 females with a diagnosis of senile dementia (mean age = 79 yrs). The study included a preliminary investigation and a 3-yr longitudinal study. The diagnoses in all Ss were later followed up at the autopsies. The clinical investigations were also carried out on 50 control cases. Results show a marked functional impairment of certain cranial nerves in senile dementia (particularly olfactory and gustatory nerves), which occurred relatively early in the disease and progressed with the course of the disease. The Ss differed markedly from the control group where only mild impairment of cranial nerve function occurred and no progression could be demonstrated.—*Journal abstract.*

12032. Yoshino, Tomoyoshi. (Tokyo U of Education, Japan) **A study of the cognition of deaf children: The developmental study by multiplicative classification.** *J (Japn) Japanese Journal of Special Education*, 1974(Jun), Vol 12(1), 33-42.—108 deaf children and 82 hearing children of chronological age (CA) 4-7½ yrs, with intelligence above average served as Ss in a 12-item matrix test, individually administered, with 2 or 3 dimensions in each matrix. Scores increased significantly with increasing age for both groups. At CA 5 the mean score was significantly higher for hearing than for deaf children. At CA 6 and 6½ the hearing group showed a paradoxical decline, indicating a transition from perceptual to conceptual response, which occurred at CA 6½

and 7 in deaf children. In concept formation, deaf children seemed to depend on perceptual elements longer than hearing children, who acquire a symbolic system through verbal functioning. (English summary)—S. Ohwaki.

## TREATMENT AND PREVENTION

12033. Anderson, J. A.; Basker, M. A. & Dalton, R. (Guy's Hosp Medical School, London, England) **Migraine and hypnotherapy.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 48-58.—Compared the treatment of migraine by hypnosis and autohypnosis with the treatment of migraine by the drug prochlorperazine (Stemetil). Random allocation of 47 patients was made to one or other prophylactic measure, followed by monthly assessments and independent evaluation of 1 yr of continuous care. Criteria of improvement were the number of attacks/month, number who had Grade 4 attacks, and complete remission. Results show that the number of attacks and the number who suffered blinding attacks were significantly lower for the group receiving hypnotherapy than for the group receiving prochlorperazine. For the group on hypnotherapy, these 2 measures were significantly lower when on hypnotherapy than when on previous treatment. Prochlorperazine seemed about as effective as previous treatment. 10 out of 23 patients on hypnotherapy achieved complete remission during the last 3 mo of the trial, compared to only 3 out of 24 on prochlorperazine. It is concluded that further trials of hypnotherapy are justified against some other treatment not solely associated with the ingestion of tablets. (German, French, & Spanish summaries)—*Journal abstract.*

12034. Angelergues, René [Paradoxes in psychiatry: Books that challenge psychiatry and its institutions.] (Fren) *Evolution Psychiatrique*, 1972(Jan), Vol 37(1), 5-40.—Compares psychiatry with anti-psychiatry, the new doctrine which seeks to have the mentally ill live in the social order at any cost; in fact it denies the reality of the entire concept of "mental illness." Psychiatry, despite its difficulties, is still the most promising way to unify mental and bodily functioning; anti-psychiatry borders on science fiction. (21 ref)

12035. Barte, H. (Psychiatric Hosp, Bonneval, France) **[Anti-psychiatry: Political discourse.]** (Fren) *Evolution Psychiatrique*, 1972(Jan), Vol 37(1), 41-48.—Contends that the motives and orientation of anti-psychiatry are political, not scientific. It claims that psychiatry's purpose in locking up the insane is merely to protect the interests of the established order. Its popularity comes not from successful treatment of patients but from its position of denial and its capacity to provoke.

12036. Bennett, Clint. (Madison Coll) **Speech pathology and the hearing impaired child.** *Volta Review*, 1974(Dec), Vol 76(9), 550-557.—Discusses the role of the speech therapist in dealing with hearing-impaired children, from initial assessment of language skills through development of training programs for home use.

12037. Best, J. Allan. (U British Columbia, Vancouver, Canada) **Tailoring smoking withdrawal procedures**

to personality and motivational differences. *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 1-8.—Used concentrated cigarette smoke as an aversive agent in the treatment of 89 habitual cigarette smokers. A factorial design assessed the incremental efficacy of 3 procedures, hypothesized to increase treatment durability, as a function of client characteristics. The 1st, treatment focus, contrasted procedures considered optimal for internal vs external locus of control clients (measured with Rotter's Internal-External Control Scale). The 2nd, punishment, assessed an instruction to punish postclinic smoking with stimulus satiation conditions. The 3rd, timing of attitude change, presented an attitude change manipulation either before or after behavior change. The Eysenck Personality Inventory and C. S. Keutzer's effective cognitive dissonance measure were also administered. Changes in smoking behavior were monitored over a 6-mo period. 2 of the 3 treatment factors, treatment focus and timing of attitude change, interacted significantly with client characteristics in determining treatment outcome. Findings support the principle of tailoring therapeutic procedures to individual differences. (25 ref)—*Journal abstract*.

12038. Coleman, Sara L. & Stedman, James M. (San Antonio Children's Ctr, TX) **Use of a peer model in language training in an echolalic child.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 275-279.—Describes the technique used with a 10-yr-old female diagnosed as autistic with chronic schizophrenic reactions. She was trained to speak in a normal voice volume and acquired a labeling vocabulary, via an imitation learning paradigm which utilized a peer model. Results indicate that the modeling paradigm facilitated both volume training and label acquisition.—*Journal abstract*.

12039. Cull, John G. & Hardy, Richard E. (Eds.). (Virginia Commonwealth U, Regional Counselor Training Program, Fishersville) **Behavior modification in rehabilitation settings: Applied principles.** Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.—Presents a collection of 11 papers aimed at helping the newly employed professional person explore basic concepts of behavior modification that are used in rehabilitation work. Topics include a description of token economies, modeling in prevocational training, behavioral group therapy with alcohol abusers, and self-modeling as a behavior modification technique.

12040. Deeble, J. S. (Monash U, Faculty of Economics & Politics, Clayton, Vic, Australia) **The economic approach to family health studies.** *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 529-533.—Examines factors that influence family decision-making concerning external health care services. It is suggested that a concept of family in terms of constituent "income units" would be preferable for economic studies. Statistical requirements are outlined.

12041. Ernst, K. (Psychiatrischen Universitätsklinik Zürich, Switzerland) **[The Burghölzli today.]** (Germ) *Schweizer Archiv für Neurologie, Neurochirurgie und Psychiatrie*, 1973, Vol 112(1), 41-48.—Reports on new developments at the Burghölzli Psychiatric Clinic of the University of Zürich. Topics include inpatient and outpatient capacity; aspects of the therapeutic communi-

ty (e.g., open door policy, work therapy, coeducational activities and programs, and patient participation in administrative and organizational matters); postgraduate training; and research work.—T. Fisher.

12042. Ey, Henri. **[Anti-anti-psychiatry, or the progress of psychiatric science.]** (Fren) *Evolution Psychiatrique*, 1972(Jan), Vol 37(1), 49-67.—Critiques anti-psychiatry as a purely negative ideology, much worse than the "psychiatric mythology" which it denounces. Some of its negative theses are specified; it is anti-nosography, anti-institution, and anti-therapy. Constructive suggestions for defending the anti-anti-psychiatry position are offered.

12043. Fucci, Donald J.; Curtis, Ann P. & Harnack, Martha M. (Ohio U, School of Hearing & Speech Sciences) **Oral vibrotactile stimulation: A method for monitoring change in lingual sensitivity as a function of time.** *Bulletin of the Psychonomic Society*, 1974(Dec), Vol 4(6), 573-574.—Describes assessment procedures used to monitor the change in lingual sensitivity of a 40-yr-old partial glossectomized female over a period of time. Oral vibrotactile thresholds were obtained from the right, midline, and left sections of the anterior dorsum of the tongue once a week for 7 wks while the S was receiving speech therapy. Improvement in sensitivity was noted for all 3 lingual sections. Implications for using oral vibrotactile threshold measurements for monitoring purposes are discussed.—*Journal abstract*.

12044. Goodkin, Robert. (New York U, Medical Ctr, Inst of Rehabilitation Medicine) **Modifying behavior: Applied techniques.** In J. G. Cull & R. E. Hardy (Eds.), *Behavior modification in rehabilitation settings: Applied principles.* Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12045. Greenblatt, Milton. (VA Hosp. Psychiatry Service, Sepulveda, CA) **Psychiatry: The battered child of medicine.** *New England Journal of Medicine*, 1975(Jan), Vol 292(5), 246-250.—Traces the historical development of psychiatry, from the "moral treatment" precipitated by the French Revolution, through the Industrial Revolution, to today's criticisms of the science. The criticisms against psychiatry include imprecise diagnoses, conceptual vagaries, jargon, therapeutic impotence, and class bias. It is pointed out that skills involved in the practice of psychotherapy are not unique to the profession, and that social ills, over which psychiatry has little control, play a large part in causing mental disability and retardation. Despite these charges, it is suggested that psychiatry has contributed to medical practice and to the humane consciousness of society. (17 ref)—*Journal abstract*.

12046. Herberger, L. **The demographic approach to the study of family health.** *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 535-544.—Analyzes the kinds of demographic data (population censuses, population sample surveys, statistical evaluations of population registers, and vital statistics) relevant to the study of family health and the implications of each method. (20 ref)

12047. Hult, Lloyd M. & Irwin, Ruth B. (Illinois State U) **Evaluation and multiple stimulation in the stimulus-response paradigm of articulation therapy.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1055-1061.—Con-



ducted a study with 60 normal-hearing and speaking college students in which the effects of evaluation and multiple stimulation, and changes in the natural latency between stimulus and response were observed. Results indicate that evaluation improved the effectiveness of the method, that multiple stimulation was more effective at the beginning of the learning task while single stimulation was more effective during the final modification stages, and that latency tended to decrease as responses became more accurate. (15 ref)—*Journal abstract*.

12048. Jungjohann, Eugen E. [Research and treatment of various forms of mental subnormality in the Soviet Union: Report on a trip to Leningrad and Moscow to study child psychiatry.] (Germ) *Nervenarzt*, 1973(Jan), Vol 44(1), 52-53.—Describes various aspects of child mental health care in Moscow and Leningrad, including the work of the Institute of Defectology, theoretical models under consideration, responsibilities of government ministries, diagnostic methods, dispensaries, special kindergartens and schools, etc. It is estimated that 1% of children under 16 in Moscow are oligophrenic. The findings of Ivanov and Pevzner on mental disability are summarized.

12049. Kiev, Ari (Ed.). (Columbia U. Coll of Physicians & Surgeons) *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.—This series of readings explores the beliefs, rituals, and symbols of primitive societies which are intended to heal the mentally ill. Topics include the psychotherapeutic aspects of shamanism, and patterns of psychiatric care in developing African countries.

12050. Kiev, Ari. (Columbia U. Coll of Physicians & Surgeons) *The study of folk psychiatry*. In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12051. Mauksch, Hans O. (U Missouri) *A social science basis for conceptualizing family health*. *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 521-528.—Discusses the implications of the increasing prevalence of emerging programs in family health care and the growing popularity of family medicine as an area of commitment for physicians in the US. A review of the background of family medicine, and a juxtaposition of the medical model and a construct of the family, suggest that the acceptance of the family as a target for health evaluation and health care requires serious reassessment of traditional practices. (55 ref)—*Journal abstract*.

12052. Maurel, Henri. ["Anti-psychiatry": Reflections on terminology and theme.] (Fren) *Evolution Psychiatrique*, 1972(Jan), Vol 37(1), 73-82.—Points out semantic inconsistencies and other flaws in the neologism, "anti-psychiatry." 7 major themes of the doctrine are critically discussed. The real nature and significance of anti-psychiatry are examined, and the need to demystify it is emphasized.

12053. May, Philip R. & van Putten, Theodore. (U California, Neuropsychiatric Inst, Los Angeles) *Treatment of schizophrenia: II. A proposed rating scale of design and outcome for use in literature surveys*. *Comprehensive Psychiatry*, 1974(Jul-Aug), Vol 15(4), 267-275.—Presents a scale for assessing the degree of

confidence with which the findings of a particular treatment outcome study can be applied to the clinical treatment of schizophrenia. Studies are first classified according to experimental design into 6 categories and then divided by execution of the study and analysis of the results. Detailed descriptions of the categories are presented. Tests measuring interrater agreement using the scale are cited, indicating that it may have sufficient discriminating ability to be a useful instrument.—R. Tomasko.

12054. McEwan, Peter J. (Fearadar House, Crathie, Scotland) *The social approach to family health studies*. *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 487-493.—Presents a psycho-sociological approach to using the family as a unit in health studies. 5 principal areas are covered: an examination of possible sources of information for a family oriented approach to the study of health and disease; an examination of the implications of recent developments in statistical methods and techniques; the formulation of guidelines and recommendations for the revision of standard vital and medical records; the discussion of various types of statistical studies and surveys required for expanding knowledge of the family regarding health status and patterns; and the identification of major gaps in statistical techniques and information. (54 ref)—M. E. Pounsel.

12055. Miller, F. J. (U Newcastle upon Tyne, England) *The epidemiological approach to the family as a unit in health statistics and the measurement of community health*. *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 479-482.—Discusses family health as a means of bringing a new dimension to measurement of community health and well-being. The development of a series of indices of family health "state" is suggested, which are susceptible to statistical treatment.

12056. Nielsen, Hans O. (Sct Stefan Guidance Ctr, Copenhagen, Denmark) [Treatment of acute behavior problems.] (Danh) *Skolepsykologi*, 1975, Vol 12(1), 17-22.—Presents the cases of 2 14-yr-old Ss, a girl and a boy, where traumatic changes in living conditions resulted in severe behavioral reactions. Support and coordinated interest from adults was sufficient for improvement, and removal from the milieu was contraindicated.

12057. Peršić, Nikola. [Social psychiatric trends in the psychiatric services in Yugoslavia.] (Srer) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(2), 69-81.

12058. Pulver, Sydney E. & Pulver, Mitchell P. (Inst of the Pennsylvania Hosp, Philadelphia) *Hypnosis in medical and dental practice: A survey*. *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 28-47.—Interviewed 101 professionals who were alumni of a course in medical and dental hypnosis. 75% used some hypnotic technique, either formal or informal, in their practice. The predominant technique was direct and indirect hypnotic symptom removal. A wide range of indications was described, the most frequent of which were obesity, anxiety, pain and discomfort, and excessive smoking. Illustrative cases are included. Few doctors encountered either difficulties with colleagues or complications with patients. Of those doctors who did not use hypnosis, the major reasons

mentioned were time, patient's unrealistic expectations and feelings of discomfort, lack of skill, and skepticism about hypnosis. The most striking finding was the efficacy of the course in causing enduring changes in the ongoing pattern of practice of a remarkably high percentage of the doctors. (German, French, & Spanish summaries)—*Journal abstract*.

12059. Reichman, Walter. (Bernard M. Baruch Coll, City U New York) **Conflict and cooperation among departments and agencies working in alcohol and drug abuse.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.

12060. Schafer, Donald W. (U California, Irvine) **Hypnosis use on a burn unit.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 1-14. Used hypnosis with 20 severely burned patients on a modern burn unit. 14 of the patients were benefited in the control of pain, especially during dressing changes. Half of these were either somnambulists or were capable of enough depth to control pain posthypnotically. The other half were benefited during the state of hypnosis even though their level was around 3 on a scale of 5. This 2nd half of "successes" found relief via a personalized recording when the author was not present. The 6 failures were, with 1 exception, under 21 yrs old. Morale, regression, and ward adjustment were improved by the presence of the author as both a psychiatrist and a hypnotist. (German, French, & Spanish summaries)—*Journal abstract*.

12061. Sluzki, Carlos E. (San Francisco General Hosp, Family Health Ctr, CA) **On training to "think interactionally."** *Social Science & Medicine*, 1974(Sep), Vol 8(9-10), 483-485.—Describes the approach used by a family health center in attempting to reduce contradictory messages in its training program and its inherent structure.

12062. Stollberg, Dietrich. **[Ministerial work in the therapeutic team.]** (Germ) *Dynamische Psychiatrie*, 1974, Vol 7(1), 58-67.—Discusses the important role of clergymen in psychiatric hospitals, their cooperation with therapeutic teams, their integration into the therapeutic community, and their diagnostic, therapeutic, communicative, and hermeneutic functions. West Germany's 4 centers for Clinical Pastoral Training and Education, their organization, and their work are described briefly. (English summary)—T. Fisher.

### Psychotherapy & Psychotherapeutic Processes

12063. Adler, M. (Facharzt für Psychiatrie, Berlin, W Germany) **[The relationship between psychotherapy and the natural sciences.]** (Germ) *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 428-432.—Examines the popular usage of the term "psychotherapy" and the methods of thinking and concepts of the natural sciences which are defined as pragmatic and positive. The which are defined as pragmatic and positive. The historical development of psychotherapy is traced from its late 19th century contrast with the natural sciences to the present state, where a dual system exists between the 2. The 2 approaches include insight, hypnotism, and nonverbal methods, as contrasted with technical, me-

thodically oriented, and verbal analysis methods.—R. Tomasko.

12064. Atanassov, A. et al. **First symposium of socialistic countries on psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 350-354.—Reviews the 1973 Prague Symposium discussing the problems of psychotherapy in the socialist social order and planning for increased coordination of psychotherapeutic activities among socialist nations. A joint memorandum on development of psychotherapy in socialist countries is presented in German.

12065. Bastiansen, Stein. (Oslo Mental Hosp, Denmark) **Psychotherapy and the autonomy of the individual.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 399-404.—Discusses the ethical implications and negative potentials of psychotherapy. Issues covered include the creation of models of the extension of power over other people, the therapist's use of manipulative strategies, restoration of a patient's sense of mastery, and the difficulties in drawing inferences from theory as to the actual behavior of an individual therapist. It is proposed that the therapist accept the right of the patient to preserve and develop his/her autonomy. Therapies leaning heavily on ideological foundations are assumed to imply possibilities for dogmatic attitudes and interference with the interests of some patients.—R. Tomasko.

12066. Benedetti, G. (Psychiatrische Universitätsklinik, Basel, Switzerland) **What is psychotherapy of psychosis?** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 327-336.—Discusses the psychotherapeutic treatment of psychosis and uses comments about the structure of psychotherapeutic interventions to describe the structure of schizophrenia. This type of therapeutic relationship results in the therapist's counter-identification with his/her patients and a readiness to assume the burden of their psychotic existence. Interpretations of psychotic experiences are viewed as organizing the split self into a whole, and the necessity for the therapist reaching the patient within his/her symptoms is stressed. The analysis is characterized as unbundling and ego-strengthening for the patient, and as a period of unconscious dream and fantasy involvement for the therapist.—R. Tomasko.

12067. Berger, Werner P. **[Parent participation in inpatient psychotherapy for children and juveniles.]** (Germ) *Praxis der Kinderpsychologie und Kinderpsychiatrie*, 1974(Aug-Sep), Vol 23(6), 193-202.—Argues for a working alliance between therapist and parents in inpatient child psychotherapy in order to guarantee cooperation during therapy and continued progress after discharge. Before admitting a child to a treatment home the therapist should consider the following points: (a) What are the parents' motives for having the child admitted to a home? (b) What are their expectations? (c) How is the child's problem interwoven into the family history? (d) How flexible is the participation of the parents? Various forms of parental participation during a child's stay in a home are described. (English summary) (28 ref)—H. A. Euler.

12068. Beutler, Larry E. et al. (Baylor Coll of Medicine, Houston, TX) **Attitude similarity and therapist credibility as predictors of attitude change and improvement in psychotherapy.** *Journal of Consulting &*



*Clinical Psychology*, 1975(Feb), Vol 43(1), 90-91.—Assessed the effects of therapist credibility and patient-therapist similarity (measured by the Situational Appraisal Inventory) on interpersonal persuasion and the relationship between patient attitude change and psychotherapy outcome. Data from 97 psychiatric patients and their 6 therapists suggest that initial patient-therapist similarity is inversely related to the therapist's persuasive influence, regardless of his perceived credibility.

12069. Blomquist, Karen & Blomquist, Kal. [An introduction to Gestalt therapy.] (Swed) *Psykisk Hälsa*, 1972, Vol 13(2), 114-126.

12070. Bowers, Kenneth S. (U Waterloo, Ontario, Canada) **The psychology of subtle control: An attributional analysis of behavioural persistence.** *Canadian Journal of Behavioural Science*, 1975(Jan), Vol 7(1), 78-95. Reports results of 2 experiments suggested by attribution theory, using a total of 65 undergraduates with high scores on the Harvard Group Scale of Hypnotic Susceptibility. Results of both experiments confirm the hypothesis that relatively subtle (i.e., unrecognized) control over behavior may be an important antecedent of its posttreatment persistence. Under certain S conditions, this persistence was undone by contingent reinforcement of the behavior already under subtle (i.e., posthypnotic) control. This debilitating impact of reinforcement may have been due to S's reactance against it, or possibly to their misattribution of behavior to the reinforcement. The psychotherapeutic implications of these and other similar findings are discussed. (French summary) (25 ref)—*Journal abstract*.

12071. Boyer, L. Bryce. (U New Mexico, Project for Field Research in Anthro-Psychoanalytic Techniques) **Folk psychiatry of the Apaches of the Mescalero Indian reservation.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974, xvii, 475 p. \$2.95.

12072. Branzel, Petre P. ("Socola" Clinic, Iasi, Romania) **Reflections on the significance of psychotherapy in contemporary medicine.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 460-464.—Emphasizes the dynamic, unitary character of psychiatry within the framework of contemporary medicine. The procedures of psychotherapy are viewed as complements of those of biological therapy. The works of J. Sournia, W. Bickmayer, J. Delay, A. Requet, and D. Danielopolu are reviewed. Psychotherapy is considered a determining attribute of medicine, and the fusion of psychiatry and psychology is expected to significantly commit society to the defense of its own mental health.—*R. Tomasko*.

12073. Chewick, Richard D. (Northwestern U, Medical School) **The special theory of psychotherapeutic interaction.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 433-438.—Outlines a theory of psychotherapeutic interaction that recognizes there is more to psychotherapy than the uncovering of unconscious material. The psychic field and the deep inner attitude of the therapist are viewed as critical to the patient-therapist relationship. Aspects of therapeutic interaction are described both in terms of scientific language (ego operations, countertransference structure, etc) and the language of humanistic imagination (self-actualization, I-Thou relationships, etc). The conflicts between opposing schools of

psychotherapy are said to be based in the usage of these 2 types of language to describe similar empirical data. The therapist is encouraged to be familiar with both types and to be able to shift from one to another.—*R. Tomasko*.

12074. Condrau, Glon. (Daseinsanalytisches Inst für Psychotherapie und Psychosomatik, Zürich, Switzerland) **[The existentialist view of psychotherapy.]** (Germ) *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 337-349.—Describes the role of the existential analytical view or phenomenological approach in the psychotherapist's search for the human cause of health and sickness in cases of neurotic, psychotic, and psychosomatic illnesses. The existential analytical approach is defined as a method which emphasizes insight into each individual patient's state of mind, in contrast with methods of the natural sciences which attempt to quantify the mind. The historical development of existential analysis is traced from Freud's psychoanalysis through M. Heidegger's philosophical existential analysis. The present trend among doctors and psychologists to abandon the dualistic view of body and soul in diagnosing and treating illness, and to rely on philosophically based confluence of both concepts, is noted. (English abstract)—*R. Tomasko*.

12075. Cremerius, Johannes. (U Freiburg, W Germany) **[The relationship between psychotherapeutic technique and theory of psychotherapy.]** (Germ) *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 238-248.—Discusses the necessity for having a theoretical basis for psychotherapeutic technique. The reasons for needing a systematic method include limiting spontaneity to give the therapist guidelines in order to avoid trial and error work and to free the therapist to devise the best therapeutic plan for the patient. Other reasons are the need to reduce the subjective autonomy and "godlike" role of the therapist, and the necessity to have a preformed theory in order to have scientific discussions in forums with other therapists. The role of the therapist in this process is described as working together with the patient leading to a new identity, and the aim of psychotherapy is said to be helping the patient to see the conflict between anxiety and freedom and to come to his/her own decision. (English abstract)—*R. Tomasko*.

12076. Deykin, Eva; Weissman, Myrna; Tanner, Jan & Prusoff, Brigitte. (Boston State Hosp, MA) **Participation in therapy: A study of attendance patterns in depressed outpatients.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 42-48.—Studied the attendance patterns of 36 25-60 yr old predominantly lower-class, depressed women receiving outpatient psychotherapy to determine the actual amount and frequency of therapy received in an 8-mo period. At the initiation of therapy, the majority of patients expressed either neutral or negative attitudes to therapy. Contrary to the usually held belief that indifferent attitudes to therapy coupled with the patients' low socioeconomic status augured poorly for the patients' continuation in therapy, the sample attended regularly and remained in therapy until the end of the prescribed 8-mo period. Missed appointments occurred rarely and were usually preceded by cancellations. The majority of therapy sessions were with patients, but provisions were available for the involve-

ment of spouses and other relatives where indicated. It is suggested that the time-limited nature of therapy, the delineation of short-term, realistically attainable goals, and the vigorous outreach techniques by the therapists may have contributed to the unexpectedly high therapy attendance.—*Journal abstract.*

12077. Fink, Max. (State U New York, Health Sciences Ctr, Stony Brook) **Brain function, verbal behavior, and psychotherapy.** *Comprehensive Psychiatry*, 1974(Jul-Aug), Vol 15(4), 257-266.—Develops a theoretical construct for combined psycho- and somatic therapies. A specific somatic therapy is selected because of defined neurophysiologic effects, which are monitored to explain individual differences in metabolism. Attitudinal, linguistic, and perceptual tests are used as predictors of adaptive response, and outcome is defined by changes in adaptation in the dyadic relationship. This model integrates the individual psychologic characteristics of the S with the induced neurophysiologic effects of available somatic therapies. (30 ref)—*R. Tomasko.*

12078. Fordham, Michael. **Defences of the self.** *Journal of Analytical Psychology*, 1974(Jul), Vol 19(2), 192-199.—Discusses ego defenses, transference, and countertransference psychoses. The analyst should not make confessions or give information about himself; nor should he become excessively passive or feel guilty because of the pain and terror that the patient claims the analyst causes.

12079. Fox, J. Robin. (London School of Economics & Political Science, England) **Witchcraft and clanship in Cochiti therapy.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12080. Frank, Jerome D. (Johns Hopkins Hosp, Phipps Clinic, Baltimore, MD) **Common features of psychotherapies and their patients.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 368-371.—Defines demoralization as the single condition common to all complaints for which patients seek psychotherapeutic help. Demoralization is the state of mind of a person feeling unable to cope with a particular life situation and is characterized by loss of self-confidence, failure feelings, guilt, shame, and isolation from potential sources of help. Specific symptoms are understood as direct expressions of the demoralized state of mind (e.g., depression) or as symbolic ways of attempting to express, evade, or cope with inner conflicts or stressful relations. Symptoms both reduce a person's coping capacity and vary with the degree of demoralization. Causes of demoralization are classified as psychological, structural (genetic), and environmental. 4 components of all forms of therapy are described: a therapeutic relationship, a therapeutic setting, a conceptual scheme, and a procedure or ritual based on the conceptualization. The function of all schools of therapy is considered to be restoration of the patient's morale.—*R. Tomasko.*

12081. Fusswerk-Fursay, J. **The method in psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 439-443.—Discusses the importance of linking the concepts of psychotherapy and beliefs in any theoretical study of the psychological basis of psychotherapy.

12082. Garfield, Sol L. (Washington U) **What are the therapeutic variables in psychotherapy?** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 452-474. Reviews the recent literature describing the possible variables which are therapeutic in psychotherapy. Topics include patient's perceptions and expectations, characteristics of the therapist, desensitization, insight-oriented therapy and its cultural bounds, patient confidence in the therapist, and degree of disturbance in the client. Nonspecific factors and the placebo response are discussed, and the lack of consensus and continued research on the essential variables producing change is noted. (30 ref)—*R. Tomasko.*

12083. Gomes de Aranha, H. A. (Univ. de Sta. Catarina, Porto, Portugal) **What is psychotherapy?** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 449-454.—Discusses the nature of psychotherapy with special reference to the work of K. Jaspers. An outline of principles, around which the therapeutic relationship develops, are presented. The importance of the ethical standards in which the relationship exists is stressed and the therapist is cautioned not to impose his personal values to impose on more reality-based ones of the patient. The therapist is expected to be willing to temporarily engage himself in the existential part of the patient, without becoming involved in the emotional texture of the conflict. The therapist is warned not to let psychotherapy become ingenuously dangerous by attempting to solve all the problems of society.—*R. Tomasko.*

12084. Hagelin, Agents & Lacer, Paul. **The Flomp Method: A method for therapy and development based on controlled daydreams.** *International Journal of the Research Newsletter*, 1974(Winter), Vol 1(4), 1-5. Describes the Flomp Method (FM) and its theoretical and utility, based on personal experience with the method in practice. Essentially an exercise method, FM consists of relaxation training, and then uses visualization techniques to help create an inner world, which then contains the positive forces within the client. The client uses this inner world to grasp feelings, emotions, and problems, and practice interpretations, resolutions, and daydreams, generated by these feelings and emotions. consist of a large number of controlled inner images, "controlling schemes" and controlling "personae" or "masks." If used intensively to reach a certain level, other therapies, FM functions effectively with a wide variety of clients.—*R. Tomasko.*

12085. Harbin, Henry C. (Marshall Medical Center, Baltimore) **Some advantages and disadvantages of conducting individual and conjoint family therapy by the same therapist.** *Journal of the American Academy of Psychotherapy*, 1974(Jan), Vol 20(1), 20-22. Presents some theoretical and practical issues concerning conjoint family therapy in transference in patients and family members, when, and therapy techniques which are involved when conducting individual and family therapy by the same therapist. Here these issues center and focus on the processes involved in this approach to therapy are discussed, using case examples as illustrations. It is suggested that the experience of family therapy is advantageous to the therapist in understanding the patient's conflicts.—*F. L. Ayer.*



12086. **Harfinger, Hanspeter.** (Oldenburgisches Landeskrankenhaus Wehnen, W Germany) [Communication between the psychiatrist and the patient.] (Germ) *Praxis der Psychotherapie*, 1973(Aug), Vol 18(4), 166-172.

12087. **Harris, Gloria G. & Wagner, Nathaniel N.** (Inst for Family Research & Training, San Diego, CA) *Treatment of sexual dysfunction and casework techniques.* *Clinical Social Work Journal*, 1973, Vol 1(Special Issue), 244-250.—Describes the sexual counseling program at the University of Washington Psychology Clinic. A modified version of W. H. Masters and V. E. Johnson's approach is used. Couples remain in their own homes and are seen 2 or 3 times a week for 3-10 wks. Case illustrations help to clarify some of the sexual problems encountered and the basic treatment methods.

12088. **Howells, J. G. & Cooke, D. K.** *The practice of occupational therapy in child psychiatry.* *Child Psychiatry Quarterly*, 1972(Oct), Vol 5(4), 9-12.

12089. **Hubback, Judith.** (Private practice, London, England) *Notes on manipulation, activity and handling.* *Journal of Analytical Psychology*, 1974(Jul), Vol 19(2), 182-191.—Handling is defined as the activity of the analyst, manipulation as the activity of the patient. When these activities occur in excess they hamper progress in the analytic sessions. They are analyzed as interactions in the transference and countertransference process. The patient makes use of the analyst's personality, handling, and style. (18 ref)—*P. Federman.*

12090. **Jörstad, Jarl.** (Dikemark Hosp, Oslo, Norway) *Psychotherapy in a psychiatric institution: Attitude and process.* *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 281-292.—Discusses the importance of the therapeutic attitudes of mental health center workers based on experiences with individual psychotherapy and milieu work in a mental hospital. The limitations of individual psychotherapy in an institutional setting—due to patient's ego weakness, the lack of experienced therapists, and the need to integrate it with other treatment modes—are considered, and the importance of the therapist acting as a model and a supervisor is emphasized. The reorganization of an institution's treatment milieu around a group-oriented system is presented, and the shift toward increased outpatient activity and work with the patient's families and social situation is discussed. Political aspects of extending psychiatric treatment in Norwegian society are considered along with the conflict between bureaucratic and therapeutic cultures. (29 ref)—*R. Tomasko.*

12091. **Kaplan, Bert & Johnson, Dale.** (Rice U) *The social meaning of Navaho psychopathology and psychotherapy.* In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today.* New York, NY: Free Press, 1974, xvii, 475 p. \$2.95.

12092. **Kessler, Morris M.** *Views on the dynamics of depression and mania following long psychotherapy of a case: The importance of denial.* *Dynamische Psychiatrie*, 1974, Vol 7(1), 32-57. Reports in detail the case history of a 33-yr-old woman suffering from alternating periods of depression and mania, treated by psychoanalysis for a period of 8 yrs. The psychogenesis and psychodynamics of depression and mania as shown by the case are discussed and analyzed in light of the theories of K. Abraham, Freud, B. Lewin, and others. The case is

interpreted as a defensive struggle of the ego to avoid the pain of an original traumatic situation between the patient and the mother figure, an ego using the active defense mechanisms of denial and repression rather than seeking a cure. Denial is the predecessor of repression and, if through denial the manic patient can avoid repetition of the traumatic experience, the ego may succeed in repressing the entire conflict. The severe pathological manifestations cease and the patient is "normally" neurotic only. Since the original internalized problem has not been removed, however, the patient remains extremely vulnerable to new attacks whenever the original problem is recathetized by a new trauma. (German summary)—*T. Fisher.*

12093. **Kielholz, P.** (Psychiatrische klinika university, Basel, Switzerland) [Present state of antidepressive therapy.] (Czech) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 145-152.—Discusses the symptomatology, diagnosis, and therapy of depressive states. In the last 20 yrs the number of depressed patients has increased, accompanied by a change of symptomatology. The first problem to be solved in any case of depression is the danger of eventual suicidal action. Exact differential diagnosis is essential to successful treatment; the choice of antidepressive drugs should depend on symptoms such as psychomotor retardation, depressed mood, and anxiety. The principal diagnostic characteristics of different depressive states are mentioned and the therapeutic actions of different antidepressive drugs are described. (Russian & English summaries)—*V. Fischmann.*

12094. **Kiev, Ari.** (Columbia U, Coll of Physicians & Surgeons) *Implications for the future.* In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today.* New York, NY: Free Press, 1974, xvii, 475 p. \$2.95.

12095. **Kirsch, Thomas B.** (C. G. Jung Inst of San Francisco, CA) *A clinical example of puer aeternus identification.* *Journal of Analytical Psychology*, 1974(Jul), Vol 19(2), 151-164.—Presents the clinical aspects of a patient identified with the *puer aeternus* archetype and points out many similarities to other cases. Interpretations and confrontations are effective with this type of patient. If interpretations are too early, however, the patient will abandon therapy; but if the therapist proceeds slowly the patient will gradually approach reality.—*P. Federman.*

12096. **Klein, Michael.** [Who really needs psychoanalysis? Notes on the International Congress for Group Psychotherapy at Zürich.] (Germ) *Kolner Zeitschrift für Soziologie und Sozialpsychologie*, 1974(Jun), Vol 26(2), 439-449.

12097. **Kohler, Christa & Seidel, Karl.** (Karl-Marx U, Leipzig, E Germany) [Relationship between image of man and psychotherapy.] (Germ) *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 203-211.—Discusses the lack of a specific medical concept of the essence of man as a whole, and explains the Marxist concept of "image of man" as resting on total interrelationships of man and society and nature. The Marxist concept is contrasted with E. Fromm's stress on minimizing instinctual drives and using depth psychological procedures on a large scale to cure mentally sick society. The

client-centered premises of the therapy of Rogers, Tausch, and Truax are reviewed as ignoring social and economic structures while still using Marxist values of consciousness and self-realization. Therapeutic benefit from increased adoption of the Marxist image of man in psychotherapy is predicted. (English abstract)—*R. Tomasko*.

12098. Kratochvíl, S. (Psychiatrická léčebna, Kroměříž, Czechoslovakia) [Psychotherapy in socialist countries.] (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 180-189.—Surveys the state of psychotherapy in 8 European socialist countries. Despite a considerable variety of approaches, 2 prevalent trends are found: (a) the use of hypnosis and autogeneous training, and (b) the development of dynamically oriented group therapy that uses principles of therapeutic community. (Russian & English summaries) (41 ref)—*V. Fischmann*.

12099. La Barre, Weston. (Duke U) **Confession as cathartic therapy in American Indian tribes.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12100. Lambo, T. Adeoye. (University Coll Ibadan, Nigeria) **Patterns of psychiatric care in developing African countries.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12101. Lambo, T. Adeoye. (World Health Organization, Geneva, Switzerland) **Psychotherapy in Africa.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 311-326.—Describes aspects of African culture important to understanding the practice of psychotherapy there. Determinants of health and disease are conceptualized holistically, and "reality" is defined as an acceptance of a life of acquiescence with beings and essences on a spiritual scale rather than as an attempt to master objects. Patient management involves a diagnosis directed at the immediate cause of the illness, the remote cause, and the determination of the form of therapy to be followed. The therapy is designed to involve the practitioner, the patient, his/her family and the community-at-large. An example of a village-based treatment of schizophrenic patients is presented. The importance of using multidimensional models of man's nature and therapy, and of making greater use of the empirically-derived experiences of African psychotherapy, are stressed. (24 ref)—*R. Tomasko*.

12102. Lester, David. (Richard Stockton State Coll) **Telephone counseling and the masturbator: A dilemma.** *Clinical Social Work Journal*, 1973, Vol 1(Special Issue), 257-260.—Describes difficulties experienced by female telephone counselors when the caller is masturbating. The psychodynamics of this type of caller are briefly pointed out and suggestions are made as to how to handle such calls. Telephone counseling is not considered an effective way of treating this type of problem.

12103. Madsen, William. (Purdue U) **Value conflicts and folk psychotherapy in south Texas.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12104. Marks, Isaac M. (U London, Inst of Psychiatry, England) **Empirical psychotherapeutic methods.**

*Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 222-237.—Examines recent advances in the application of psychotherapeutic techniques. 4 aims of psychotherapeutic procedures are identified: experiential, nurturing self-knowledge, confessional catharsis, and production of lasting behavior changes. Controlled empirical studies dealing with phobic disorders, obsessive-compulsive neurosis, anxiety states, social anxieties, abnormal personalities, marital and family pathology are reviewed; and effects resulting from 6 procedures (exposure treatments, operant shaping and biofeedback, meditation, self-regulation, modeling, and interpretive methods) are considered. The development of a global theory of psychotherapy is viewed as currently counterproductive. The importance of the empirical practice of psychotherapy is stressed. (2 p ref)—*R. Tomasko*.

12105. Morris, G. Barry. (U Alberta, Edmonton, Canada) **Personality change through bibliotherapy.** *Western Psychologist*, 1973, Vol 4(3), 61-71.—Discusses a theoretical model to explain bibliotherapy. The importance of both the cognitive and affective content of literature used in bibliotherapy is stressed. 19 books with affective content and 26 books with cognitive content are listed. A phenomenological model of personality is proposed, stressing the importance of affective and cognitive domains in personality growth. Hence, the client must both experience and understand the themes he reads about. He then becomes aware of the predominant theme in literature: man is active rather than reactive. He thus develops maximum utilization of his own activation energy. (32 ref)—*D. R. Evans*.

12106. Murphy, Jane M. (Cornell U, Medical Coll, New York) **Psychotherapeutic aspects of shamanism on St. Lawrence Island, Alaska.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12107. Öztürk, Orhan M. (U Ankara, Turkey) **Folk treatment of mental illness in Turkey.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12108. Plaut, A. (Middlesex Hosp, London, England) **Part-object relations and Jung's "luminosities": A comment on psycho-dynamic theories.** *Journal of Analytical Psychology*, 1974(Jul), Vol 19(2), 165-181.—Discusses the values of theories as a viewpoint and a frame of reference without which analysts can become lost and unable to function. Also considered are the compatibility of psychodynamic theories, the theory of object-relations and its bearing on analytical psychology, and the cultural and social setting in which psychodynamic theories function. (25 ref)—*P. Federman*.

12109. Prince, Raymond. (McGill U, Montreal, Quebec, Canada) **Indigenous Yoruba psychiatry.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12110. Prinz, Robert & Loney, Jan. (Louisa County Schools, IA) **Teacher-rated hyperactive elementary school girls: An exploratory developmental study.** *Child Psychiatry & Human Development*, 1974(Sum), Vol 4(4), 246-257.—Compared data on 8 1st 3rd grade and 8 4th-6th grade hyperactive girls with their classmates



controls. Behavior ratings were made by an art teacher trained in art therapy. No differences were found in either age group between hyperactive and control Ss on general adjustment, art creativity, or self-esteem, though self-esteem of older controls was higher than that of younger controls ( $p < .10$ ). For both age groups, hyperactive Ss were lower than controls in impulse control ( $p < .01$  and  $p < .001$ ). Comparison with findings on boys suggests that hyperactive girls may differ in important ways.—E. S. Goodman.

12111. Reiter, L. & Strotzka, H. (U Wien, Inst für Tiefenpsychologie und Psychotherapie, Austria) **Some problems concerning the goals in psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 423-427.—Discusses the forms of language used to describe goals in psychotherapy. The theories developed by various psychotherapeutic schools are viewed as contrasting descriptive sentences with sets of evaluative and prescriptive sentences. In this way, statements about reality are compared with statements having emotional content. 4 requirements for therapeutic activity are presented: (a) exact definition of goals, (b) elaboration of performance and judgment alternatives, (c) consideration of the range of knowledge of the consequences of actions and their side effects, and (d) modifying the present closed-system socialization of psychotherapists. (18 ref)—R. Tomasko.

12112. Roth, Marvin & Kuiken, Don. (U Alberta, Edmonton, Canada) **Communication immediacy, cognitive compatibility, and immediacy of self-disclosure.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 102-107.—Assessed the immediacy of self-disclosures of 24 conceptually complex and 24 conceptually simple introductory psychology students as a function of (a) the level of immediacy of a confederate's self-disclosures and (b) the similarity of the S's and confederate's levels of conceptual complexity. Equal numbers of male and female Ss were used. Ss were slightly more immediate when the confederate was immediate and conceptually complex than when he was nonimmediate and conceptually simple. However, when the confederate was conceptually simple, the effects of confederate immediacy were reversed, contrary to expectations based on social exchange theory but consistent with an interpretation based on the double-bind theory of communication. Female Ss were more immediate in similar than in dissimilar dyads, although this pattern did not occur for male Ss. (18 ref)—*Journal abstract*.

12113. Sacks, James. **The psychodramatic approach.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12114. Schmidt, K. E. (Sarawak Mental Hosp, Kuching) **Folk psychiatry in Sarawak: A tentative system of psychiatry of the Iban.** In A. Kiev (Ed), *Magic, faith, and healing: Studies in primitive psychiatry today*. New York, NY: Free Press, 1974. xvii, 475 p. \$2.95.

12115. Seguin, Carlos A. (Inst Peruano de Estudios Psiquiátrico-Sociales, Lima) **What folklore psychotherapy can teach us.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 293-302.—Folklore psychiatry is defined as the study of ideas, beliefs, and practices concerning

psychiatric conditions and their treatment as maintained by popular tradition in Western cultures. It is differentiated from ethno- and quack-psychotherapy. Studies from the Peruvian Institute for Socio-Psychiatric Studies are cited to outline factors important to the success of folklore therapy, including the use of aversion therapy, utilization of native plants and drugs, alternate forms of patient-group-healer relationships, and hypnosis. An example of the treatment of chronic alcoholism by native healers is presented and the urgency of incorporating knowledge of folklore psychiatry into the medical curriculum and psychiatric residencies is stressed. (21 ref)—R. Tomasko.

12116. Sidley, Nathan. (Fourth District Court of Eastern Middlesex, Woburn, MA) **On theories and rules of procedure in psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 384-388.—Presents a postulate system definition of mind based on concepts of the individual and his/her environment, action possibilities, emotional and informational systems. Psychopathology is viewed as a function of the mind leading to action less effective than some optimal action in a given situation. A set of rules for psychotherapy is presented: (a) The therapist is responsible for what happens in therapy. (b) There are no specific rules for patient behavior. (c) A therapist must think about the patient in the context of concepts of mind. (d) The therapist should provide the patient with tools to handle his/her own problems, rather than directly dealing with the problems. Several practical considerations regarding the conduct of therapy are also suggested.—R. Tomasko.

12117. Simon, Rita M. **Pictorial style as a means of communication.** *American Journal of Art Therapy*, 1974(Jul), Vol 13(4), 275-292.—Discusses a theory that the patient's artistic style ought to be considered separate from the specific content of the art when produced. The theory holds that there are 4 basic styles: traditional massive, traditional linear, archaic linear, and archaic massive. The archaic and traditional massive styles are considered in detail. A case study is presented to demonstrate a patient's ability to achieve mental stability of spontaneous art experiences in which therapeutic intervention was minimal. By understanding the patient's visual styles, the art therapist was able to follow his progress.—H. J. McWhinnie.

12118. Stone, Michael H. **Mesmer and his followers: The beginnings of sympathetic treatment of childhood emotional disorders.** *History of Childhood Quarterly: The Journal of Psychohistory*, 1974(Spr), Vol 1(4), 659-679.—Discusses the beginnings of the empathic and humanistic tradition in child psychotherapy in the 18th century with innovators such as F. A. Mesmer and J. M. G. Itard, and relates these beginnings to the foundations of sympathetic treatments of childhood emotional disorders in the 19th century. The return to nature in the tradition of Rousseau is cited as an important early event in the humane approach. 6 passages from the works of early Mesmerists are presented and discussed in terms of love and empathy with their patients. (19 ref)—J. Carlson.

12119. Strupp, Hans H. (Vanderbilt U) **"Spontaneous remission" and the nature of the therapeutic influence.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 389-393.—Examines the possibility that anyone claiming

treatment success with any given form of psychotherapy might be capitalizing on naturally occurring events—the problem of “spontaneous remission.” The nature of therapeutic influence is reviewed in the works of H. J. Eysenck, L. Subotnik, A. E. Bergin, T. S. Szasz, and J. D. Frank. Estimations of the spontaneous recovery rate and the degree of usage of nonpsychiatric treatment resources are discussed. A research effort comparing groups treated by professional therapists with groups treated by nonprofessional change agents is described as a way of determining the professional therapist's unique contribution to therapeutic change.—*R. Tomasko.*

12120. **Strupp, Hans H.** (Vanderbilt U) **On the basic ingredients of psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 249-260.—Presents essential conditions for psychotherapeutic change that are equally applicable to psychoanalytic and behavior therapies. 3 conditions are discussed: the creation of a helping relationship patterned after the parent-child relationship; the creation of a power base from which the therapist influences the client through common psychological techniques; and a client with the capacity to profit from the experience. To profit from therapy a client is assumed to have a degree of intelligence, an ability to view his/her feelings and behavior objectively, a willingness to undergo/relive painful experiences, as well as the time, money, and patience. Therapy is contrasted with childrearing, and the problem of how external controls are transformed into internal ones is viewed as one of psychotherapy's basic issues. (21 ref) —*R. Tomasko.*

12121. **Szasz, Thomas S.** (State U New York, Upstate Medical Ctr, Syracuse) **The myth of psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 212-221.—Discusses the metaphorical nature of psychotherapeutic interventions and examines linguistically the nature of mental illness. Several medical definitions of psychotherapy are reviewed and psychotherapeutic interventions are contrasted with other forms of medical treatments. The conflict between Freud and Jung is viewed in terms of the creation of psychoanalysis as a pseudoscience. The need to unmask psychotherapy's false medical conceptualizations and to cast them in a nonmedical, nondiagnostic, and nontherapeutic framework and vocabulary is stressed. Psychotherapy is concluded to be a form of secular ethics with its language that of medical jargon, its theology positivism, and its ultimate value Science.—*R. Tomasko.*

12122. **Tavormina, Joseph B.** (U Virginia) **Relative effectiveness of behavioral and reflective group counseling with parents of mentally retarded children.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 22-31.—Evaluated the relative effectiveness of behavioral and reflective group parent counseling. Ss were 51 mothers of mentally retarded children who were assigned to behavioral, reflective, or waiting-list control groups. 6 success criteria, including direct observations, attitudinal scales, maternal reports, and frequency counts, were used to measure outcome (e.g., Hereford Parent Attitude Survey and the Missouri Behavior Problem Checklist). Both types of counseling had a beneficial effect relative to the untreated controls, but the behavioral method resulted in a significantly greater

magnitude of improvement. The consistency of these results across measures strongly suggests that the behavioral technique was the treatment of choice for counseling parents of the retarded. (29 ref)—*Journal abstract.*

12123. **Tec, Leon.** (Mid-Fairfield Child Guidance Ctr, Norwalk, CT) **Flexibility within structure: A concept in psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 394-398.—Uses case examples to illustrate the need for a therapist to be skilled in more than 1 treatment method, and to be more attuned to the patient's individual needs than the requirements of a stereotyped technique.

12124. **Uchtenhagen, A.** (U Zürich, Switzerland) **[Problems of rehabilitating patients with chronic schizophrenic psychoses.]** (Germ) *Schweizer Archiv für Neurologie, Neurochirurgie und Psychiatrie*, 1973, Vol 112(1), 95-102.—Discusses problems of rehabilitating patients with chronic schizophrenic psychosis in general and the rehabilitation program of the Burghölzli psychiatric clinic service in particular.

12125. **Vander Well, Allen R. & Williams, Clive.** (U Alberta, Edmonton, Canada) **The psychotherapy relationship: Toward a behavioural definition.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 50-59.—Views the therapeutic relationship as a construct derived from behaviors which mutually affect 2 or more persons. Theoretical distinctions and research considerations are presented. (37 ref)

12126. **von Vexküll, Thure.** **[Information as communication and model.]** (Germ) *Praxis der Psychotherapie*, 1973(Aug), Vol 18(4), 137-150.—Discusses information theory as applied to the physician-patient relationship.

12127. **Walker, Preston A. & Halzlip, Thomas M.** (Dorothea Dix Hosp, Raleigh, NC) **Alternatives to chronic undifferentiated treatment.** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 551-555.—Explores techniques of child psychiatry incorporating both the traditional and the newer innovative techniques of psychotherapy. The Group for the Advancement of Psychiatry's classification for psychopathological disorders in childhood is discussed, illustrated with actual clinical cases. For the healthy response a therapeutic model is recommended characterized by counseling and guidance with the family in a supportive manner and with appropriate follow-up. In the treatment of developmental variations, a dual approach is recommended involving short-term insight-oriented psychotherapy with re-educative goals for the child and goal-directed casework for parents. For psychoneurotic disorders, an approach of child analysis or insight-oriented psychotherapy with informative alliance for the parents is suggested. A broad spectrum of approaches for personality disorders is recommended; the well-organized personality, the neurotic personality, and the impulse-ridden personality are discussed. Psychotic disorders require a total treatment situation including intrapsychic, interpersonal, and environmental approaches. Psychophysiological disorders, brain syndromes, and mental retardation are also detailed.—*R. S. Albin.*

12128. **Wang, Christine W.** (George Washington U, Medical Ctr) **Expressive drawings by a patient in two**



**unwed pregnancies.** *American Journal of Art Therapy*, 1974(Jul), Vol 13(4), 303-315.—Compared the art work of an unwed mother during 2 pregnancies 3 yrs apart, and analyzed her feelings as thus expressed. Similarities of circumstance and mental attitudes are noted.

12129. Witt, Jody. (Royal Ottawa Hosp, Ontario, Canada) **The team concept as interpersonal ping pong.** *Journal of Leisureability*, 1974(Apr), Vol 1(2), 14-20.—Uses the metaphor of a ping-pong game to examine patterns of interaction in the team approach to recreational and other types of therapy. A scenario of a staff meeting is presented in which the client is the "ball" who is "volleyed" by team members. Points are lost for hindering other team members or failing to provide good service. It is concluded that team members must either prevent the game from occurring or learn to stop it once it starts. Specific ameliorative and preventive techniques are listed, including emphasis on positive feedback and collaboration.—C. Wright.

12130. Wittkower, E. D. & Warnes, H. (McGill U, Montreal, Quebec, Canada) **Cultural aspects of psychotherapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 303-310.—Examines the cultural basis of several types of therapies. The emphasis on individualism, rational thinking, scientific idolatry, and toleration of dissent have facilitated the adoption of psychoanalysis in the US, while more authoritarian societies have tended to reject it. The use of work therapy and pathogenic psychotherapy in the Soviet Union and autogenic training in Germany are reviewed. The mysticism in Jung's analytic psychology is assumed to appeal to the Germans' mystical cultural leanings. Divergent views on the application of Western psychotherapeutic procedures to non-Western societies are discussed, and the difficulties arising when the mother tongue and basic world view of the therapist and client differ are noted. The services of traditional healers in developing countries are concluded to be indispensable for some time. 5 interim steps are suggested for the practice of therapy in a population undergoing Westernization. (18 ref)—R. Tomasko.

#### Drug Therapy & Drug Rehabilitation

12131. Aron, William S.; Alger, Norman & Gonzalez, Ricardo T. (Albert Einstein Coll of Medicine, Ctr for the Study of Social Intervention, Yeshiva U) **Chicanoizing the therapeutic community.** *Journal of Psychedelic Drugs*, 1974(Jul-Sep), Vol 6(3), 321-327.—Describes a drug-free therapeutic community oriented to the cultural values of a Chicano population. The need for separate treatment programs for Chicanos is stressed, and the characteristics of Mexican-American drug addiction in La Colonia, California, are discussed. 13 specific Chicano-oriented treatment concepts are presented and a 4-phase program is outlined. The importance of the integration of the program's graduates into the social structure of the larger Chicano community is highlighted as a method to discourage the use of drugs by youth.—R. Tomasko.

12132. Astrup, C. et al. (Tromsø U, Norway) **A study of flupenthixol decanoate and pipotiazine undecylenate in schizophrenics.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 481-491.—Treated 43 female schizophrenic inpatients with flupenthixol decanoate or pipotiazine

undecylenate for 8 mo. The Ss were evaluated in a double-blind study for 2 mo. The calculated daily dosage of both drugs was 6 mg. The trial started with 4-wk intervals between the injections, which had to be decreased to 2 wks for most patients during the open trial. No significant therapeutic differences could be established between the 2 drugs in the double-blind trial. All the laboratory data were normal, and the local tolerance was excellent. 18 Ss were improved, 14 unchanged, and 11 worse after 8 mo of treatment. The improvement was predominantly due to less inhibitory and paralyzing side effects than with previous sedative oral neuroleptic medication. It is also noted that 12 Ss, unwilling or unreliable in taking oral drugs, could be discharged as improved on stable medication.—*Journal abstract*.

12133. Benkert, O.; Gordon, A. & Martschke, D. (U München, Psychiatrische Klinik, W Germany) **The comparison of thyrotropin releasing hormone, luteinizing hormone-releasing hormone and placebo in depressive patients using a double-blind cross-over technique.** *Psychopharmacologia*, 1974, Vol 40(2), 191-198.—9 unipolar and 3 bipolar, endogenously depressed female patients were treated in randomized order with a single injection of 600 µg thyrotropin releasing hormone, 500 µg luteinizing hormone-releasing hormone, and placebo. Ss were rated for changes in depression scores over a 6-day period. No significant differences could be seen between the treatments, although transient elevations in mood were subjectively observed. Results are discussed in relation to other reports on the therapeutic benefit of peptide hormones in psychiatry. (22 ref)—*Journal abstract*.

12134. Black, Dora & Woollacott, Susan. (Hosp for Sick Children, London, England) **Acute toxic psychosis in two children treated with benzhexol hydrochloride (Artane).** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 483-484.—Reports 2 cases of toxic psychosis in children (ages 13 and 3½ yrs) given benzhexol hydrochloride in therapeutic doses. In both cases, complete recovery occurred rapidly when benzhexol was discontinued.

12135. Chinchund, Stephen J. (New York State Dept of Correctional Facilities, Taconic Correctional Facility, Bedford Hills) **A way to measure success in the rehabilitation of drug addicts.** *Social Work*, 1974(Nov), Vol 19(6), 737-740.—Proposes 4 questions for the drug addict to ask himself: "Do I want to live or die?" "Do I need help?" "Do I want help?" "Am I willing to make any sacrifices or take any risks to get the help I want?" The progressive attainment of positive answers to these questions is seen as one way to measure success in a rehabilitation program.

12136. Cohen, Wendy J. & Cohen, Norman H. (New York Medical Coll—Metropolitan Hosp Ctr, NY) **Lithium carbonate, haloperidol, and irreversible brain damage.** *JAMA: Journal of the American Medical Association*, 1974(Dec), Vol 230(9), 1283-1287.—4 acutely agitated patients with diagnoses of mania who were treated with a combined regimen of lithium carbonate and high doses of haloperidol developed severe encephalopathic syndromes. Symptoms consisted of lethargy, fever, tremulousness, confusion, and extrapyramidal and

cerebellar dysfunction, accompanied by leukocytosis and elevated levels of serum enzymes, blood urea nitrogen, and fasting blood glucose. 2 patients suffered widespread, devastating, irreversible brain damage, while 2 others were left with persistent dyskinesias. (30 ref)

12137. Coleman, James H. (U Tennessee, Coll of Pharmacy) **Concepts in beta blockade.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 46-47.—Briefly reviews recent reports on the usefulness of propranolol, emphasizing the drug's beta blocking activity. Some contraindications and precautions concerning propranolol use are included.

12138. Dasberg, H. & Van Praag, H. M. (U Groningen, Netherlands) **The therapeutic effect of short-term oral diazepam treatment on acute clinical anxiety in a crisis centre.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 326-340.—Hypothesized that oral diazepam treatment (20 mg daily) during 5 days in combination with active inpatient crisis intervention would have a favorable effect on acute clinical anxiety states. A double-blind, random, placebo-diazepam design was used with 30 crisis inpatients. Clinical improvement was defined as a difference score in ratings based on psychiatric interviews and ward observation. Evidence derived from anxiety, nurse's, and visual analog scales does not support the assumption that diazepam is therapeutically better than placebo if the 2 medication groups were compared as units. For patients with the highest levels of pretreatment anxiety, short-term administration of oral diazepam was a valuable adjunct to the crisis-intervention program. Moreover, diazepam had a selective action for the improvement of insomnia, respiratory, and gastro-intestinal complaints. Diazepam or some factor connected with it had an adverse influence on some autonomous complaints. The need for study of the relationship between clinical effect and pharmacokinetic values, especially plasma concentrations of the drug and its active metabolite, is suggested. (32 ref)—*Journal abstract*.

12139. DiMascolo, Alberto; Klerman, Gerald L. & Prusoff, Brigitte. (Boston State Hosp, MA) **Relative safety of amitriptyline in maintenance treatment of depression.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 34-41.—In the course of long-term treatment with amitriptyline of 212 depressed women, the patients' somatic complaints were assessed. These somatic complaints included most symptoms generally attributed as being adverse effects of amitriptyline and other tricyclics. The reputed adverse effects were very often reported by patients prior to the initiation of antidepressant medication. Except for reports of dryness of mouth, all somatic complaints were reduced in frequency and intensity during the course of clinical improvement. When patients relapsed, regardless of whether they were or were not on maintenance medication, these somatic complaints returned. Except for dryness of mouth, no relationship between somatic complaints and dosage of amitriptyline was found.—*Journal abstract*.

12140. Epling, W. F. & Bradshaw, Peter. (U Southampton, England) **An experimental analysis of the shaping, maintaining and elimination of drug abuse behaviour.** *British Journal of Medical Psychology*,

1974(Dec), Vol 47(4), 341-348.—Presents a behavioral approach to drug addiction. 3 major topics are discussed: (a) the acquisition or shaping of drug-taking behavior, (b) the maintaining of this behavior once established, and (c) the elimination of drug abuse behavior. The basic principles of operant conditioning are illustrated with relevant animal and human literature. Particular emphasis is placed on the effects of previous experience with drugs and the effects of schedules of reinforcement on self-administration of drugs in infrahuman Ss. (19 ref)—*Journal summary*.

12141. Feinberg, Irwin et al. (VA Hosp, San Francisco, CA) **Sleep amphetamine effects on MBDS and normal subjects.** *Archives of General Psychiatry*, 1974(Nov), Vol 31(5), 723-731.—Reports that EEG sleep patterns in 8 male 7-10 yr olds with minimal brain dysfunction syndrome (MBDS or hyperkinesis) before and during stimulant treatment differed little from those of age-matched controls. It is unlikely that the therapeutic mechanisms of amphetamines in MBDS are exerted on or reflected in physiological sleep patterns. Neither MBDS children nor 6 normal young adults showed withdrawal elevations of REM sleep after administration of amphetamines in constant dosage. Young adults showed REM rebounds only when the dosage was increased prior to withdrawal. In contrast to sedative-hypnotics, stimulant drugs did not reduce eye movement activity during REM sleep. This difference is emphasized for the specificity hypothesis—that different classes of psychoactive drugs differentially alter physiological sleep patterns—would be untenable if sedatives and stimulants produced the same effects on sleep. (31 ref)—*Journal abstract*.

12142. Gerlach, J.; Koppelhus, P.; Helweg, E. & Monrad, A. (St Hans Hosp, Roskilde, Denmark) **Clozapine and haloperidol in a single-blind cross-over trial: Therapeutic and biochemical aspects in the treatment of schizophrenia.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(4), 410-424.—20 male hospitalized schizophrenic patients participated in a study of the antipsychotic properties, tolerance, and side effects of clozapine and haloperidol. Both clozapine and haloperidol reduced the intensity of the core symptoms of schizophrenia. Clozapine, however, was significantly better than haloperidol for the treatment of somatic concern, anxiety, conceptual disorganization, tension, and mannerism—posturing. This difference manifested itself, in particular, in cases of severe schizophrenia. In addition to its antipsychotic effect, clozapine had a pronounced sedative and hypnotic effect, particularly during the initial stages. Both drugs were well tolerated. Clozapine induced autonomic side effects in the form of increased heart rate, orthostatic hypotension, and hypersalivation. Haloperidol caused extrapyramidal side effects. Determination of the homovanillic acid in the cerebrospinal fluid was carried out on 5 of the patients prior to and during treatment. Results suggest that haloperidol increases the turnover of brain dopamine to a greater degree than clozapine. (24 ref)—*Journal abstract*.

12143. Greenwood, Joseph J. (US Federal Reformatory for Women, NARA Program, Alderson, WV) **Drug treatment in an institution.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and*



**Drug Abuse Studies, June 17-22, 1973.** Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses drug-treatment programs and institutions as 2 separate problems. Drug addiction is considered from the point of view of the personality characteristics of the addict and of the qualities necessary for creating a successful therapeutic community for the addict's rehabilitation.

12144. Hansen, V.; Hagen, A. S.; Lehmann, E. H. & Astrup, C. **Simplified symptom registration in psychiatric trials: A statistical approach.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 492-495.—Performed a multivariate analysis of double-blind data on 43 female inpatients treated with flupenthixol decanoate and pipotiazine undecylenate. Brief Psychiatric Rating Scale (BPRS) scores were used as independent variables and Clinical Global Impression (CGI) scores as dependent variables. It was found that changes in global clinical impression scores mainly were determined by the following 4 BPRS items: Conceptual Disorganization, Blunted Affect, Unusual Thought Content, and Hallucinatory Behavior.—*Journal abstract.*

12145. Hansen, V.; Ravn, J. & Rud, C. (H. Lundbeck & Co, Copenhagen, Denmark) **Long-term treatment of psychiatric patients with clopenthixol: Analysis of laboratory tests with a view to long-term therapy.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 309-317.—Examined 57 female inpatients who had been treated for 3-9 yrs with clopenthixol alone, to determine the effects of long-term therapy with clopenthixol in terms of measurable laboratory parameters. 26 patients had psychiatric diseases only and 31 had concomitant somatic diseases. Several parametric and nonparametric statistical methods were used to study the relationships between the measured values, in particular variations within the normal range between the 2 patient groups. Age, dose, duration of treatment, and laboratory tests were the measured variables. There were no indications that long-term treatment with clopenthixol exerted a nephrotoxic, hepatotoxic, or hematotoxic effect. Changes did occur in certain parameters, predominantly within the range of normal, especially in thymol turbidity values and total leucocyte count.—*Journal abstract.*

12146. Haskell, David S.; DiMascio, Alberto & Prusoff, Brigitte. (Boston U, Medical School) **Rapidity of symptom reduction in depressions treated with amitriptyline.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 24-33.—Studied 172 25-60 yr old depressed women treated with amitriptyline with particular attention to the speed of response in different symptoms of depression and in psychotic as compared to neurotic depressives. Findings from clinical interviews for depression (derived from the Hamilton Rating Scale for Depression) and the Raskin Three Area Scale for Depression show rapid improvement in suicidal feelings, insomnia, and anorexia, but slower and more gradual improvement in impaired work and interests, retardation, and pessimism and hopelessness. Psychotic depressives did not show substantial improvement until the 3rd wk of treatment whereas neurotic depressives improved markedly within the 1st wk. It is suggested that the psychotic classification may be more useful as a predictor of speed of response than as a predictor of final treatment outcome. (16 ref)—*Journal abstract.*

12147. Jost, F. & Zmorski, T. (Psychiatrischen Klinik Beverin Cazis, Switzerland) **[Mesoridazine (TPS 23 Sandoz) in acute psychotic states.]** (Germ) *Schweizer Archiv für Neurologie, Neurochirurgie und Psychiatrie*, 1973, Vol 112(1), 131-142.—Conducted a double-blind comparative study to examine the therapeutic effects and general and local tolerance of the intramuscular type of mesoridazine (TPS 23) vs chlorpromazine. Ss were 30 patients divided into 2 equal randomized groups, with diagnoses of acute and exacerbated schizophrenia and mania. The drugs were administered intramuscularly and orally for 11 days. The dosage ranged from 100 to 550 mg/day (average 200-300 mg). Results indicate that (a) both drugs were equally effective as neuroleptic agents and dosages of 100-350 mg daily achieved a quick calming of Ss and antipsychotic results; (b) TPS 23 was effective in the treatment of acute and chronic-exacerbated psychoses with symptoms of aggressivity, agitation, tension, anxiety, and sleep disturbances; (c) the tolerance levels of the 2 drugs were about equal; and (d) an initial dose of 100-300 per day is indicated, with higher dosages given if and when needed. (English summary) (37 ref)—*T. Fisher.*

12148. Karis, Norman L. (Appalachian Regional Hosp, AR-CAP, Beckley, WV) **AR-CAP and its components.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973.* Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses the background, development, and implementation of the Appalachian Regional Comprehensive Alcoholism Program. The hospital which serves as a center for the program provides emergency and inpatient services, intermediate care, education and consultation, outpatient follow-up, and vocational rehabilitation, training, and research.

12149. Kiloh, L. G.; Neilson, Megan & Andrews, Gavin. (U New South Wales, Prince Henry Hosp, Little Bay, Australia) **Response of depressed patients to methylamphetamine.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 496-499.—191 patients, including 39 with endogenous depression and 56 with neurotic depression, were each given 15 mg of methylamphetamine intravenously. There was a strong tendency for all patients—including those with schizophrenia—to feel better, irrespective of diagnosis. No significant difference was found between the responses of patients with neurotic and those with endogenous depression. No significant relationship was established between prognosis on discharge from hospital and 6 mo later in any diagnostic group. Those patients who felt worse after methylamphetamine showed a high incidence of hysterical symptoms or hysterical personality traits. Among those reporting no change, there was a significant preponderance of those dependent on drugs or alcohol.—*Journal summary.*

12150. Kohrs, Eldean V. (Central Wyoming Counseling Ctr, Casper) **Behavioral approaches to problem drinkers in a rural community.** *Behavioral Engineering*, 1973(Sum), Vol 1(1), 1-10.—Describes a technique used to treat 20 court-referred chronic alcoholics by changing them into moderate drinkers. The concept of alcoholism as a disease is challenged. The program initially attempted to force the use of disulfiram but without

success. Later the individual was given a week's supply of the drug and a chart to note his own progress. Because the local bar is an important social gathering-place in rural areas, the goal was to allow the drinker to be able to return to the bar for recreation while controlling his drinking. After 1 mo the chemical was gradually eliminated and electrical aversion was substituted. Data on Ss' background and MMPI scores are given. Findings show that there was a high rate of success for the application of the method. Suggestions for future work and possible applications of the technique are offered. —A. Debons.

12151. Leonard, Charles L. (Appalachian Mental Health Ctr, Detoxification Unit, Elkins, WV) **Treatment of the alcoholic in a community hospital.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.

12152. Malcolm, M. T.; Madden, J. S. & Williams, A. E. (West Cheshire Hosp, Chester, England) **Disulfiram implantation critically evaluated.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 485-489.—Treated 62 alcoholic patients by disulfiram implantation. At follow-up only 3 patients described any reaction on drinking, and it is suggested that their symptoms were probably psychogenic. Blood disulfiram levels above .1 mg% were invariably found after oral disulfiram therapy. Such levels were occasionally recorded after implant, but only during the 1st postoperative week, when patients were usually still in the hospital. Carbon disulphide, a metabolite of disulfiram, was measurable in the exhaled breath of patients given oral disulfiram. Except in 1 case, this was not so after implantation. It is believed that implantation does not give the patient pharmacologically active disulfiram cover, and that the deterrent effect of the procedure is psychological. (18 ref)—*Journal summary*.

12153. Mason, Aaron S. (U Kentucky, Medical Ctr) **The psychotropic drug summary.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 44-45.—Discusses the importance of maintaining up-to-date psychotropic drug summaries in the medical records of mental patients. A brief sample of a drug summary is included.

12154. McBride, John. (Appalachian Regional Hosp, Beckley, WV) **Intermediate treatment services available for alcoholics at the Beckley Appalachian Regional Hospital.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.

12155. Mendez, Jorge S.; Cotzias, George C.; Mena, Ismael & Papavasiliou, Paul S. (Brookhaven National Lab, Medical Research Ctr, Upton, NY) **Diphenylhydantoin: Blocking of levodopa effects.** *Archives of Neurology*, 1975(Jan), Vol 32(1), 44-46.—Examined the effects of diphenylhydantoin (DPH) in adult inpatients: 5 parkinsonism and 2 chronic manganese poisoning Ss receiving optimal levodopa treatment and 2 Huntington chorea Ss receiving no other treatment. DPH diminished the therapeutic effects of levodopa both in parkinsonism and manganese poisoning Ss, as well as the levodopa-dependent dyskinesia for which the former were selected. In Ss

with chorea, DPH enhanced chorea and mental agitation and failed to conform with the postulated pharmacological reciprocity between parkinsonism and Huntington chorea. Findings are in agreement with experiments done in animals in which DPH blocked a neuronal response to dopamine. (30 ref)—*Journal abstract*.

12156. Mielke, D. H. et al. (Tulane U, Medical School) **Butaclamol hydrochloride (AY-23,028): An early evaluation in severely ill schizophrenics.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 7-8.—Investigated the effect of butaclamol hydrochloride (AY-23,028), administered during a 12-wk period, on 6 male and 6 female severely ill schizophrenic patients. All Ss received an initial daily dosage of 2.5 mg, gradually increased to a maximum daily dosage of 100 mg. Results indicate positive behavioral changes beginning at the 20 mg dosage level. Based on global ratings, only 2 Ss showed no significant improvement, while 10 Ss showed slight to marked improvement. Results of the Brief Psychiatric Rating Scale and the Nurses' Observation Scale for Inpatient Evaluation also reflect this clinical improvement. Laboratory findings indicated no abnormal changes. Side effects, similar to those associated with fluphenazine, responded to anticholinergic medication. These preliminary findings suggest that AY-23,028 is an effective antipsychotic drug.—F. L. Beyer.

12157. Morgan, Ben B.; Coates, Glynn D.; Brown, Bill R. & Alluisi, Earl A. (U Louisville, Performance Research Lab) **Effects of symptomatic treatment on sustained performance during illness with phlebotomus fever.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 157.

12158. Noyes, Russell & Dempsey, G. Michael. (U Iowa, Medical School) **Lithium treatment of depression.** *Diseases of the Nervous System*, 1974(Dec), Vol 35(12), 573-576.—Reviews data supporting the antidepressant effect of lithium when administered to depressed patients. Of more than 300 depressed patients treated with lithium, over half received benefit. The methodological deficiencies of the cited research are discussed as well as the ensuing difficulties of interpretation. For example, the duration of treatment was inadequate in many studies; patient selection was a problem in that depressions are heterogeneous; and the tendency toward spontaneous remission complicates results, especially when patient control groups are not utilized. However, it is suggested that the proven efficacy of lithium maintenance in the prevention or attenuation of recurrent episodes of manic-depressive illness may be additional evidence that the drug produces significant antidepressant action. The data suggest that mania and depression have a common pathophysiological substrate. It is concluded that lithium is an effective and safe treatment for depressions of the bipolar variety. Implications of its use are discussed with particular attention to its use among outpatients and among unipolar depressed patients. (35 ref)—R. S. Albin.

12159. Obholzer, A. M. (Tavistock Clinic, London, England) **A follow-up study of nineteen alcoholic patients treated by means of tetraethyl-thiuram disulfide (Antabuse) implants.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 19-23.—Conducted a follow-up survey on 19 alcoholic patients (18 males, 1 female) in



Volkenberg Hospital, South Africa, upon whom tetraethylthiuram disulfide (Antabuse) implant operations had been performed in 1968-1969. Minimum duration of alcoholism for most Ss had been 15 yrs. The majority were 40-55 yrs old, and 11 were unemployed at time of hospital admission. The interval between operations and follow-up was 2½-12 mo. Of the 19 Ss operated, 13 had maintained sobriety between implant and follow-up and 6 had reverted to drinking. 5 of the relapsed Ss reportedly drank without any disulfiram ethanol reaction; information was lacking on the 6th recidivist. Systematic side effects of the implant were minimal, but local complications, especially sepsis, occurred in 11 cases. Results of this series of implants are compared with those of other studies. The possible reasons for implant success are discussed. An S's faith in the implant appeared to be the only good predictive factor for postoperative sobriety, which was expected to be at best short-term.—A. P. Balevre.

12160. Penna, Manoel W. & Lion, John R. (U Maryland, Medical School, Inst of Psychiatry & Human Behavior, Baltimore) **Gilles de la Tourette's syndrome and depression: A case report.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 41-43.—Considers the diagnosis and treatment of a case of Gilles de la Tourette's syndrome in terms of previous findings. Several hypotheses concerning the depressive effect of haloperidol are discussed. (15 ref)

12161. Raskind, Murray & Bradford, Tamara. (U Washington, Medical School) **Methylphenidate (Ritalin) abuse and methadone maintenance.** *Diseases of the Nervous System*, 1975(Jan), Vol 36(1), 9-12.—Interviewed 40 methadone maintenance patients and 40 "street" heroin addicts in a residential treatment program in the Seattle area to explore differences in methylphenidate abuse. The groups were similar in age, sex, race, and length of treatment variables. In support of previous experience, results indicate that 18 of the methadone group used methylphenidate regularly while only 2 of the "street" group were regular users. The most salient attraction for the drug's abuse among methadone patients was the pleasurable "high" associated with intravenous injection. The medical and social implications of methylphenidate abuse are discussed and the need for methadone maintenance programs to attend to these issues is emphasized.—F. L. Beyer.

12162. Regan, Riley W. (Dept of Health & Mental Hygiene, Div of Alcoholism Control, Baltimore, MD) **An addict joins the professionals: Reflections on both worlds.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.—The author briefly describes his background as a former alcoholic and drug addict and traces his career as a professional in the field of alcoholism and drug-abuse treatment. 4 attributes of professionalism—high degree of knowledge, orientation to community interests, self-control of behavior, and a system of monetary and honorary rewards—are discussed as they apply to individuals and programs confronting the problems of drug abuse and alcoholism.

12163. Shader, Richard I.; Jackson, Anthony H. & Dodes, Lance M. (Massachusetts Mental Health Ctr,

Boston) **The antiaggressive effects of lithium in man.** *Psychopharmacologia*, 1974, Vol 40(1), 17-24.—Notes that, since J. F. Cade's (1949) original suggestions concerning the value of lithium in controlling patients' "ungovernable tempers," considerable evidence has accumulated to support this view. The present report reviews this evidence and describes an illustrative case of a 34-yr-old woman repeatedly hospitalized for antisocial reactions characterized by aggressive assault and destructiveness. The successful use of lithium therapy, as well as some important side effects of the drug, are summarized. (19 ref)—*Journal abstract*.

12164. Silberberg, Norman E. & Silberberg, Margaret C. (Sister Kenny Inst, Minneapolis, MN) **Glue sniffing in children: A position paper.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 301-308.—Examines the question of whether the preventive measures and cures for glue sniffing are more dangerous than the glue sniffing itself (e.g., by creating an interest in the use of glue). Research is reviewed which indicates that glue sniffing does not seem to occur in isolation but accompanies environmental stress. Clearly, much of the stress is a result of school failure. It is recommended that more energy be devoted to reducing the stress than to dealing with the sniffing itself. (15 ref)—*Journal abstract*.

12165. Sykes, Lantz M. (Greensboro Ctr for Alcohol Rehabilitation, Educational Services, NC) **The Greensboro story.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses the development of the Greensboro, North Carolina, alcohol rehabilitation program for use in the local courts to help alleviate the problem of the public drunkenness offender. The 7 elements of the program are described: administration, alcohol education, court class, youth program, industrial programs, and alcoholism detoxification unit.

12166. Thorell, Lars-Hakan & Wretmark, G. (U Linköping, Sweden) **A comparative study of N 7001 (Metrisil®) and imipramine on a series of depressive patients.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(5), 508-515.—Conducted open and double-blind studies of N-7001 and imipramine in 60 psychiatric inpatients with depressive symptoms. Results confirm those of previous studies which showed that N-7001 is as effective as imipramine in the treatment of depressive illness. 5 Ss had to discontinue imipramine treatment because of deteriorated mental status, although none had to be discontinued among those receiving N-7001. Staff ratings after 8 days of treatment indicated improvement among the N-7001 Ss, but not among the imipramine Ss. Data suggest that if the S exhibited obvious neurotic traits, the outcome with N-7001 was worse than if he did not exhibit such symptoms. This finding did not apply to imipramine. Ss rated as inhibited showed better outcomes on N-7001 than those rated as not inhibited. This difference was not significant for imipramine vs N-7001 ( $p < .05$ ).—*Journal abstract*.

12167. Trow, Jesse E. (Dept of Health & Welfare, Program on Alcohol & Drug Abuse, Concord, NH) **Techniques to initiate positive community response.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June

17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.—Discusses aspects of a statewide, community-based alcohol and drug-abuse program in New Hampshire. The program aims specifically to work with at least 1 medical doctor in each of the larger communities to motivate and encourage him to participate actively in working with alcoholics and drug-dependent people.

12168. Turek, Ibrahim S. & Rocha, Juracy. (Maryland Psychiatric Research Ctr, Baltimore) **Oral thyrotropin-releasing hormone (TRH) in depressive illness.** *Journal of Clinical Pharmacology*, 1974(Nov-Dec), Vol 14(11-12), 612-616.—Examined the effects of thyroid-release hormone on depressives. The drug failed to change the thyroid function or to improve depression.

12169. van der Velde, Christiaan D. & Kiltie, Harriet. (Norwich Hosp, A. Ribicoff Research Ctr, CT) **Effectiveness of loxapine succinate in acute schizophrenia: A comparative study with thiothixene.** *Current Therapeutic Research*, 1975(Jan), Vol 17(1), 1-12.—Compared the clinical effectiveness of loxapine succinate, a new neuroleptic agent, with the efficacy of thiothixene and placebo during a 6-wk, double-blind study with 76 patients hospitalized with acute symptoms of schizophrenia. Loxapine appeared to be clearly superior to placebo and significantly superior to thiothixene on many items and factors of the Brief Psychiatric Rating Scale and the Nurses' Observation Scale for Inpatient Evaluation. On the Clinical Global Impressions, loxapine was significantly superior to placebo and superior to thiothixene at Weeks 3 and 6. All tests were completed 6 times during the study. No efficacy measure showed superiority of thiothixene over loxapine.—*Journal abstract*.

12170. Vandecasteele, A. J. & Vereecken, J. L. (Psychiatric Hosp "Sancta Maria," Noordwijk, Netherlands) **A double-blind clinical evaluation of penfluridol (R 16 341) as a maintenance therapy in schizophrenia.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(3), 346-353.—Studied 2 groups of female chronic schizophrenic inpatients, all of whom had been successfully maintained on penfluridol for at least 6 mo, to assess the effectiveness of penfluridol as a basic maintenance therapy. Group I (10 patients) received penfluridol, and Group II (11 patients) received placebo under double-blind conditions for 6 mo. Patients were evaluated using a 36-item questionnaire completed before and after 1, 3, 4 and 6 mo of treatment. When at any time during the study a patient deteriorated, haloperidol in individually adjusted doses was added to her treatment regimen. By the end of the study, 8 of the 11 placebo patients received additional haloperidol, whereas only 3 of the penfluridol patients did. Evaluation of the scores on the rating scale showed no significant differences between the 2 treatment groups. The trial confirmed previously gained experience that penfluridol is a suitable drug for the maintenance therapy of chronic schizophrenic patients. (15 ref)—*Journal abstract*.

12171. Ylialo, Eugene. (Appalachian Regional Hosp, AR-CAP, Beckley, WV) **A basis for advocacy: Alcoholism intervention.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.—Considers

alcoholism as a treatable, chronic illness and argues that a comprehensive, long-term intervention program is necessary for its treatment. 8 components of service provided by the Appalachian Regional Comprehensive Alcoholism Program are detailed, national and state laws concerning the problem are discussed, and further legislation and implementation of the laws are urged.

### Behavior & Group Therapy

12172. Alexander, James F. (U Utah) **Behavior modification and delinquent youth.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12173. Ascher, L. Michael & Cautela, Joseph R. (Eastern Pennsylvania Psychiatric Inst, Philadelphia) **An experimental study of covert extinction.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 233-238.—A 2 x 3 study, using performance on a pseudo concept-formation task as the dependent variable, tested the efficacy of covert extinction (CE). 6 groups of 15 college students each received either CE instructions, overt extinction (OE) instructions, or no instructions, and either reinforcement or no reinforcement. Data reveal no significant difference between the unreinforced CE and OE groups but do indicate significant differences between these groups and the unreinforced group receiving no instructions. Parallel results were obtained for the 3 similar reinforced groups. The conclusion, based on these data, is that CE was effective in facilitating the course of extinction whether or not the environment continued to provide reinforcement for the specific response.—*Journal abstract*.

12174. Balch, Philip & Ross, A. William. (U Arizona) **A behaviorally oriented didactic-group treatment of obesity: An exploratory study.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 239-243.—Applied a behaviorally oriented didactic-group approach to the treatment of obesity with a diverse population of female employees and patients in a medical school setting. Group I (19 Ss, full treatment), Group II (15 Ss, partial treatment), and Group III (11 no-treatment controls) were compared in numbers of pounds and percent body weight lost over a 9-wk treatment program, the goals of which were 1-2 lb weekly weight loss. Findings reveal significant differences between Group I vs II and III, but not between Groups II and III. The weight loss for the full treatment group (mean loss = 10.6 lb) was consistent with the goals of the program, and results of the 6-wk follow-up indicate that Group I members acquired the skills necessary to maintain weight loss and/or continue gradual reduction. The applicability of the current program to the increasing numbers of obese as well as the possibility of paraprofessionals leading such programs are discussed.—*Journal abstract*.

12175. Battagay, Raymond. (U Basel, Psychiatric Clinic, Switzerland) **Group psychotherapy as a method of treatment in a psychiatric hospital.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.



12176. **Bellack, Alan S.; Schwartz, Jeffrey & Rozensky, Ronald H.** (U Pittsburgh, Clinical Psychology Ctr) **The contribution of external control to self-control in a weight reduction program.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 245-249.—A weight reduction program emphasizing self-control was presented to 20 volunteers (mean age = 28 yrs) under 3 different conditions. One group met weekly with E and received mild social reinforcement for progress. A 2nd group had contact only by mail. They self-monitored food intake and mailed the records to E daily; he mailed a new supply of envelopes back to them each week. A 3rd group had no ongoing contact. There were no differences in weight loss between the contact groups, and both lost significantly more weight than the no-contact group. Results are discussed in terms of the information value or signaling function of external contact in treatment programs emphasizing self-control. (16 ref)—*Journal abstract*.

12177. **Berger, Milton M.** (Columbia U, Coll of Physicians & Surgeons) **Video in group psychotherapy.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12178. **Bornstein, Philip H.** (U Montana) **Training parents as behavior modifiers: A bibliography 1959-1973.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 130.

12179. **Boszormenyi-Nagy, Ivan.** (Eastern Pennsylvania Psychiatric Inst, Family Psychiatry Div, Philadelphia) **Ethical and practical implications of intergenerational family therapy.** *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 261-268.—Defines and discusses the nature of intergenerational family therapy (IFT). The essence of IFT is viewed as the scope of the therapist's responsibility and commitment, rather than as an outcome of specific techniques. The ethical position of a therapist contracting for care of an entire family is contrasted with that of the individual therapist. The family system is compared with a ledger of accounts, and the importance of understanding the impact of an imbalanced relationship of 1 generation on a family member of the next generation is stressed. The integrated therapeutic framework offered by IFT is concluded to hold possibilities for the redefinition of concepts in the fields of health, pathology, prevention, individual legal rights, and international relations.—*R. Tomasko*.

12180. **Bouchal, M.; Dufková, D.; Robeš, M. & Sekaninová, Z.** (U Jan Evangelista Purkyně, Brno, Czechoslovakia) **[Thematic psychotherapeutic group.]** (Czec) *Československá Psychiatrie*, 1973(Jun), Vol 69(3), 163-169.—Describes the functioning of thematic group therapy with ambulatory and hospitalized neurotics. At the beginning of each psychotherapeutic session the therapist selected for group discussion one of the following categories of themes: childhood memories and fantasy life; attitudes and emotions; topics related to the body and somatic functions; interests and social situations; or interpersonal relations. In another alternative, the therapist asked the group to participate in nonverbal expressive behavior. Thematic psychotherapy was found particularly suitable for open groups of beginners because it prevented the accumulation of tension and

anxiety, which inhibit active group involvement by all participants. (Russian & English summaries)—*V. Fischmann*.

12181. **Brayboy, Thomas L.** (Youth Development Ctr, Newark, NJ) **Black and white groups and therapists.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12182. **Bugental, James F.** **Confronting the existential meaning of "my death" through group exercises.** *Interpersonal Development*, 1973-1974, Vol 4(3), 148-163.—Describes a series of 4 procedures to aid group participants in confronting meaningfully the concept, "my death." These procedures are (a) drawing a life line, (b) confronting contingency, (c) the Orpheus experience, and (d) writing obituaries. The importance of subtle forces (e.g., group leader and participants' mood affecting the experiences) is emphasized, and illustrative styles of approach are recounted.—*Journal abstract*.

12183. **Bunker, Barbara B.** (State U New York, Buffalo) **The Tavistock approach to the study of group process: Reactions of a private investigator.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12184. **Bunker, Douglas R.** (State U New York, Buffalo) **Social process awareness training: An NTL approach.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12185. **Calef, Ruth A. et al.** (West Virginia Wesleyan Coll) **Facilitation of group desensitization of test anxiety.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1285-1286.—To enhance the effects of group desensitization in the treatment of test anxiety, a modified desensitization procedure was used, calling for pairing a stimulus (tone) with relaxation training, then presenting the stimulus while Ss completed the test-anxiety hierarchy. 60 college freshmen with high scores on the Text Anxiety Scale were divided into 4 groups of 15 Ss each. One group received the modified group-desensitization procedure while a 2nd group received conventional group desensitization. 2 control conditions were included: presentation of a tone while completing the test-anxiety hierarchy, and an attention-placebo condition. The modified desensitization procedure was more effective than conventional desensitization and the control conditions.—*Journal abstract*.

12186. **Cautela, Joseph R.** (Boston Coll) **The use of covert conditioning in hypnotherapy.** *International Journal of Clinical & Experimental Hypnosis*, 1975(Jan), Vol 23(1), 15-27.—Covert conditioning involves the manipulation of imagery to modify behaviors such as phobias, alcoholism, and sexual deviations. A rationale and description of covert conditioning procedures are described, and covert conditioning and hypnotic induction procedures employing imagery are compared. The advantages and disadvantages of combining covert conditioning and hypnosis are discussed. It is concluded that some of the issues raised in this paper can only be resolved by controlled research. (German, French, & Spanish summaries) (40 ref)—*Journal abstract*.

12187. Chazan, Rachel. (Kfar Shaul Government Hosp. Jerusalem, Israel) **A group family therapy approach to schizophrenia.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 177-193.—Describes a study based on 4 years' work with a multiple family therapy group on an acute psychiatric admission unit. The group was run as an open one; families were asked to participate together with the admitted patient. The rationale was to treat the family structure as "patient," to look for and point out disturbance in family relationships. One of the aims was to encourage free expression of emotion in the group. Families had been avoiding such expression and apparently regarded it as dangerous. An attempt was also made to reactivate interpersonal conflict, which had been largely converted into intrapsychic conflict concentrated in the sick member. Aspects of resistance to the group and manifestations of the pathological family process in the group are discussed, as well as the special feature of such a multiple group compared to work with individual families. (22 ref)—*Journal abstract*.

12188. Creer, Thomas L.; Weinberg, Eugene & Molk, Leizer. (Children's Asthma Research Inst & Hosp, Denver, CO) **Managing a hospital behavior problem: Malingering.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 259-262.—Notes that malingering can pose a serious problem to attending medical personnel. A technique employed at the Children's Asthma Research Institute and Hospital (CARIH) to successfully modify this behavioral pattern—time-out from positive reinforcement—is described as used with a 10-yr-old male with intractable bronchial asthma. In addition, procedures are presented both for shaping up socially appropriate behaviors and for insuring that gains are maintained when the S returns home.—*Journal abstract*.

12189. de Schill, Stefan & LaHullier, Denise. (American Mental Health Foundation, New York, NY) **Mental health groups: An intensive, low-cost treatment method.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.

12190. de Schill, Stefan (Ed). (American Mental Health Foundation, New York, NY) **The challenge for group psychotherapy: Present and future.** New York, NY: International Universities Press, 1974. xxviii, 366 p.—Presents a collection of 10 papers on the recent and current status of group therapy theories and procedures. Topics include the theoretical foundations of group psychotherapy, group therapy as a method of treatment in a psychiatric hospital, group analysis and the insights of the analyst, and analytic group therapy with the aged.

12191. Deffenbacher, Jerry L. (VA Hosp. Psychology Service, Portland, OR) **Group desensitization for heterogeneous phobias.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 305.—Outlines modifications in group desensitization procedures which make possible the simultaneous desensitization of individuals with heterogeneous anxieties or phobias. The treatment retains the flexibility of individual therapy and the economy of group procedures and is amenable to combination with other behavioral therapies.

12192. Denes-Radomisl, Magda. (Adelphi U) **Gestalt group therapy: Sense in sensitivity.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12193. Durkin, Helen E. (Postgraduate Ctr for Mental Health, New York, NY) **Theoretical foundations of group psychotherapy: I.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.

12194. Eitzen, D. Stanley. (Colorado State U) **Impact of behavior modification techniques on locus of control of delinquent boys.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1317-1318.—Administered the Nowicki-Strickland Locus of Control Scale to 21 juvenile delinquent boys residing in a behavior modification treatment setting. Ss' scores at the posttest were significantly more internal than those from the pretest phase.

12195. Ellis, Albert. **Rationality and irrationality in the group therapy process.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12196. Farrall, William R. (Farrall Instrument Co, Grand Island, NB) **Selection and use of stimulus material for aversion therapy and desensitization.** *Behavioral Engineering*, 1973(Sum), Vol 1(1), 1-7.—Discusses aversive conditioning and systematic desensitization as techniques in the treatment of various sexual disorders and phobias. A description of apparatus and procedure is given. In aversion therapy the main emphasis should be transferred from the aversion stimuli to the aversion-relief stimuli. The functions of both sets of stimuli are discussed. A step-by-step description of the treatment of a child molester and his family shows the method in use. The preparation and use of photographs and slides for aversion therapy are discussed in detail.—*A. Debons*.

12197. Forehand, Rex; Cheney, Thomas & Yoder, Pam. (U Georgia) **Parent behavior training: Effects on the non-compliance of a deaf child.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 281-283.—Examined the effects of a parent-centered behavioral training program on the noncompliance of a 7-yr-old deaf male. The program, which was designed to alter general parent-child interactions, involved initially teaching the mother reinforcement skills for desirable behavior and, subsequently, a time-out procedure for deviant behavior. Results indicate that a general behavioral program could be rapidly learned by a mother and applied to the special problems of a deaf child. Changes occurred in both the child's compliance and in the mother's behavior and attitudes toward the child.—*Journal abstract*.

12198. Friedemann, Adolf. **Theoretical foundations of group psychotherapy: II.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.

12199. Gerber, Kenneth. (U Arizona) **Behavioral approaches to obsessive-compulsive neurosis: A com-**



prehensive research review. *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 130-131.

12200. **Hedberg, Allan G. & Campbell, Lowell.** (Schick Hosp, Fort Worth, TX) **A comparison of four behavioral treatments of alcoholism.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 251-256. —45 male and 4 female alcoholics (mean age = 38 yrs) were administered either a behavioral family counseling, systematic desensitization, covert sensitization, or a shock presentation treatment program. The treatment program was conducted in an outpatient setting using both professional and paraprofessional therapists. Each S's therapy regime adhered to a standardized sequence of treatment sessions over a 1-yr period. Additionally, each S was offered the opportunity to establish a treatment goal of either controlled drinking or complete abstinence. Data indicate that behavioral family counseling was the most effective alcoholism treatment method of the 4 procedures studied. Systematic desensitization was highly effective in modifying excessive alcohol consumption, with covert sensitization being only moderately effective. Presentation of shock resulted in little behavior change, suggesting that the procedure may have only limited utility for alcoholism treatment in an outpatient facility. Controlled drinking appeared to be an appropriate and practical treatment alternative to the traditional treatment program requirement of complete abstinence. Implications for the operation of behavioral alcoholism treatment programs in outpatient facilities are summarized and discussed. (31 ref)—*Journal abstract*.

12201. **Herman, Steven H. & Prewett, Michael.** (VA Hosp, Miami, FL) **An experimental analysis of feedback to increase sexual arousal in a case of homo- and heterosexual impotence: A preliminary report.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 271-274. —The effect of informational feedback concerning level of penile responding on subsequent sexual arousal was examined in a case of homo- and heterosexual impotence in a 51-yr-old male. Penile response to slides of nude males and nude females during separate measurement sessions without feedback was significantly increased during a phase where treatment sessions contained contingent feedback, decreased when feedback was administered noncontingently, and increased once again when contingent feedback was reinstated. The increase in penile responding was paralleled by achievement of ejaculation during masturbation, changes in masturbatory fantasy, and reports of homo- and heterosexual arousal outside the laboratory. —*Journal abstract*.

12202. **Hoerl, Richard T.** (Denver General Hosp, CO) **Encounter groups: Their effect on rigidity.** *Human Relations*, 1974(May), Vol 27(5), 431-438. —Studied changes in flexibility, as measured by the Flexibility and Tolerance for Ambiguity scales of the California Personality Inventory, in 112 encounter group participants. Significant differences were found between volunteer and nonvolunteer groups but not between encounter and nonencounter groups. It is concluded that treatment effects depend more on who attends the group than on what is done. People who volunteer for encounter groups are already more flexible than those who do not.—*W. W. Meissner*.

12203. **Hogan, Peter.** (New York U-Bellevue Medical Ctr, NY) **Some aspects of my theory and practice of therapy.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12204. **Horan, John J.; Baker, Stanley B.; Hoffmann, Alan M. & Shute, Robert E.** (Pennsylvania State U) **Weight loss through variations in the covert control paradigm.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 68-72. —Assigned 40 overweight female Ss to 1 of 8 treatment combinations in a  $2 \times 2 \times 2$  matrix. The use of positive coverants produced significantly ( $p < .005$ ) more weight loss than negative coverants. No differences were found between those Ss employing highly probable eating and noneating behaviors. Group counseling enabled a larger percentage of Ss to lose at least 1 lb/wk than did individual intervention followed by self-management. It is suggested that L. E. Homme's paradigm should be shortened to 3 steps when applied to the problem of weight loss since certain treatment combinations were nearly 100% effective. (15 ref)—*Journal abstract*.

12205. **Horan, John J.; Hoffman, Alan M. & Macri, Marygrace.** (Pennsylvania State U) **Self-control of chronic fingernail biting.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 307-309. —Volunteer chronic fingernail biters participated in a behavioral program that employed self-monitoring, self-punishment, and self-reward techniques. Gains persisted through a follow-up evaluation, indicating the comprehensive self-control program to be highly effective.

12206. **Houston, Fred.** (McMaster U, Hamilton, Ontario, Canada) **Respiratory relief treatment of a case of phobia with spasmodic torticollis.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 305-307. —Tried an aversive conditioning treatment with a 28-yr-old married woman who suffered from phobias and from torticollis. During the 5th session of therapy, the patient suddenly recalled with excitement a forgotten childhood incident. After this abreaction, the torticollis disappeared and did not return during a 6-mo follow-up period. (French summary)—*F. Auld*.

12207. **Hymowitz, Arthur E. & Hymowitz, Norman.** (Coll of Medicine & Dentistry of New Jersey) **Operant conditioning of feeding in a blind profoundly retarded girl.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 58-64. —Describes the successful use of behavior modification procedures to restore feeding behavior in a recently blind 11-yr-old profoundly retarded female. The patient was rewarded by being allowed to play a music box. Despite the girl's progress, she was withdrawn from the program after 14 days of treatment when her mother observed one of the nurses scolding and shaking her. The importance of staff cooperation is emphasized.—*J. H. Pflaum*.

12208. **Kazdin, Alan E.** (Pennsylvania State U) **Comparative effects of some variations of covert modeling.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 225-231. —In covert modeling, Ss imagine a model rather than observe a live or film model. In a  $2 \times 2$  design, multiplicity of models (imagining 1 vs 3 different models) and variation of fear stimuli (imagining the model perform with 1 vs 2

different snakes) were combined in a study with 52 snake-phobic undergraduates. A no-model control group of 16 Ss was included in the design to control for fear-related imagery in the absence of a model. Ss who imagined multiple models, as opposed to a single model, showed greater avoidance reduction on behavioral and self-report measures at posttreatment and at a 3-wk follow-up assessment. Ss who imagined a single snake and those who imagined different snakes were not different in avoidance. In general, results support the efficacy of covert modeling over no-model controls. (21 ref)—*Journal abstract*.

12209. Krasner, Jack D. (Iona Coll) **Analytic group psychotherapy with the aged.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.

12210. Le Boeuf, Alan. (St Brendan's Hosp, Dublin, Ireland) **An automated aversion device in the treatment of a compulsive handwashing ritual.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 267-270.—A 49-yr-old male with a 25-yr history of compulsive handwashing was treated by the implementation of a self-control procedure. Treatment was effective only when a powerful external reinforcer (shock) was added to the procedure to increase the patient's capacity for initiating self-control. Ritualistic handwashing had virtually ceased after 42 days and remained absent at a 12-mo follow-up.—*Journal abstract*.

12211. Lebovici, Serge. (U Paris, France) **A combination of psychodrama and group psychotherapy.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future*. New York, NY: International Universities Press, 1974. xxviii, 366 p.

12212. Lehman, Robert E. (U Idaho) **The disinhibiting effects of visual material in treating orgasmically dysfunctional women.** *Behavioral Engineering*, 1974(Fal), Vol 1(2), 1-3.—Discusses the value of visual material in disinhibiting sexual attitudes and behaviors in orgasmically dysfunctional females, with emphasis on changing the negative attitudes towards self-stimulation. The use of an automatically timed slide projector, the importance of a female being on the staff, and the length of presentation are discussed. Components of desensitization, modeling, and vicarious learning are presented as possible causes for the success of the program to date.—A. Debons.

12213. Longin, Harold E.; Kohn, James P. & Macurik, Kenneth M. (Weston State Hosp, WV) **The modification of choreal movements.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 263-265.—Used training in an incompatible response to decrease the symptomatic movements associated with Sydenham's Chorea in a 63-yr-old male psychotic inpatient. Training was conducted for 30 sessions on a lever pullbutton press apparatus. Results indicate a decrease in inappropriate spasmodic movements both during the treatment sessions and on the ward. Results were maintained 16-20 wks after treatment termination.—*Journal abstract*.

12214. Mahoney, Michael J. & Jeffrey, D. Balfour. (Pennsylvania State U) **A manual for self-control procedures for the overweight.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 129.

12215. Mastellone, Max. (Trenton Neighborhood Health Ctr, NJ) **Aversion therapy: A new use for the old rubber band.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 311-312.—An aversion therapy technique, involving the self-administered snapping of a wrist-worn rubber band is described and discussed. Case illustrations, involving a 15-yr-old female compulsive hair-puller and a 27-yr-old male homosexual, are presented.

12216. Maultsby, Maxie C. (U Kentucky, Medical School) **Introduction to rational behavioral therapy.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.

12217. McGrath, Michael. (West Virginia Dept of Mental Health, Div on Alcoholism & Drug Abuse, Charlestown) **Behavioral psychology and the treatment of alcoholism.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.

12218. McLean, Peter D. & Cragg, Kenneth D. (U British Columbia, Vancouver, Canada) **Evaluating treatment effectiveness by monitoring changes in problematic behaviors.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 105.—Suggests the use of a problem-oriented approach for the measurement of change in patient status, using an ordinal scale format. Correlational data and findings from the use of this approach with spouses and patients receiving conjoint family therapy are presented to illustrate the advantages of the method.

12219. McNamee, S. & Peterson, J. (Case Western Reserve U) **Observed versus potential behavior in the follow-up results in a typical behavior modification program.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 131.

12220. Mealiea, Wallace L. (Dalhousie U, Psychological Services, Halifax, Nova Scotia, Canada) **Implications of Piaget's theory for behavior modification with children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12221. Miklich, Donald R. & Creer, Thomas L. **Self modeling as a behavior modification technique.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12222. Milman, Donald S. & Goldman, George D. (Eds). (Adelphi U) **Group process today: Evaluation and perspective.** Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.—Presents a collection of 19 papers on recent research, theory, and practice in group process techniques and therapy. Topics include rationality and irrationality in the group therapy process, a conceptual model of group psychoanalysis, social process awareness training, and the use of videotaping in group psychotherapy.



12223. Mintz, Elizabeth E. **Marathon groups as intensive psychotherapy.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12224. Mitchell, Kenneth R. & Orr, Fred E. (U New South Wales, Kensington, Australia) **Note on treatment of heterosexual anxiety using short-term massed desensitization.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1093-1094.—Conducted a study of 29 undergraduate males who reported having difficulty in social situations to examine methods of reducing heterosexual anxiety. Ss were assigned to either traditional desensitization, short-term desensitization, relaxation training, or no-treatment groups. Data from traditional and short-term desensitization procedures show decreased anxiety associated with paper-and-pencil measures of heterosexual interactions. However, the 2 desensitization groups were not significantly different, and a relaxation and a no-treatment group did not differ in reports.—*Journal abstract*.

12225. Moser, Adolph J. (Indiana Youth Ctr, Psychology Section, Plainfield) **Covert punishment of hallucinatory behavior in a psychotic male.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 297-299.—A 24-yr-old male paranoid schizophrenic inpatient exhibiting hallucinatory behavior was subjected to a self-monitoring procedure utilizing covert punishment. In an own-control, AB design, the application of covert punishment eliminated reported hallucinations. Other favorable changes in behavior also occurred.—*Journal abstract*.

12226. Neumann, M. & Goni, B. (Shalvata Hosp, Hod Hasharon, Israel) **Types of patients especially suitable for analytically oriented group psychotherapy: Some clinical examples.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 203-215.—Briefly reviews the different attitudes toward group therapy in the literature. Analytically oriented group therapy is seen as a treatment in its own right, equal in value to individual therapy and in some cases as the treatment of choice. 6 types of patients for whom group therapy has distinct advantages are described and clinical examples given. These types do not fit any known nosological categories but are characteristic of patterns of behavior and specific personality makeups. (22 ref)—*Journal abstract*.

12227. Nielsen, Eggert. [7th Scandinavian Mental Health Seminar.] (Swed) *Psykisk Hälsa*, 1972, Vol 13(2), 133-154.—Describes proceedings of a seminar on family therapy. Topics included theories and explanatory models, the 1st contact, and special techniques for conducting this therapy.

12228. Nimmer, William H. & Kapp, Richard A. (Brooke Army Medical Ctr, Ft Sam Houston, San Antonio, TX) **A multiple impact program for the treatment of injection phobias.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 257-258.—3 female college students with longstanding histories of aversive reactions to injections were treated by a multifaceted program consisting of prolonged presentations of hierarchical stimuli, in vivo work, modeling, and "homework." An average of 5

sessions was needed to complete therapy. Follow-up contacts 6 mo after therapy indicated that there had been no return of the original aversive reactions.—*Journal abstract*.

12229. Ortlieb, P. [Social-psychological observations on the cathartic effects of aggressive behavior.] (Germ) *Zeitschrift für Klinische Psychologie und Psychotherapie*, 1973, Vol 21(4), 329-334.—Surveys old and new theories on the subject. It is suggested that factors of social learning are more effective in matters of behavior modification and reduction of aggression than the systematically provoked abreaction of determinant factors. Successful behavior modification can be achieved best through replacing the utilitarian value of aggression by newly developed preferable behavior alternatives. (English summary) (46 ref)—T. Fisher.

12230. Paterson, Gerry. (U Alberta, Edmonton, Canada) **A historical review and classification system of the new group therapies.** *Western Psychologist*, 1973, Vol 4(3), 79-87.—Briefly reviews the history of group therapy, and proposes a classification system for current group therapy methods. Groups are placed on a continuum, from Tavistock groups to Reichian groups, which fall into 3 categories; those emphasizing (a) group processes, (b) interpersonal relationships, and (c) intrapersonal relationships. The categories take different views of how man is controlled: by external forces (group processes category), by internal forces (intrapersonal relationships) or by both (interpersonal relationships). It is emphasized that all workers in the social sciences must become familiar with group therapies, which are now a permanent aspect of psychology.—D. R. Evans.

12231. Pierrakos, John C. **Observations and techniques in bioenergetic group therapy.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12232. Prochaska, James et al. (U Rhode Island) **Remote-control aversive stimulation in the treatment of head-banging in a retarded child.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 285-289.—Response-contingent shock has been demonstrated to reduce the rate of head-banging, but poor generalization has frequently resulted. The treatment of a 9-yr-old profoundly retarded, head-banging female demonstrated similar problems with generalization when stationary shock equipment was used, but remote-control apparatus was able to overcome generalization problems and reduce head-banging to zero.—*Journal abstract*.

12233. Ramsey, Gregory. (Hogan Regional Ctr, Hathorne, MA) **Use of electric shock in the classroom: The remediation of self-abusive behavior.** *Behavioral Engineering*, 1974(Fal), Vol 1(2), 4-9.—Describes the successful use of a portable shock apparatus to eliminate the self-abusive behavior of an 11-yr-old retarded child in the classroom. Several other positive side effects were noted: a decrease in aggression by the child toward others, improvement in academic performance, and an increase in command-following behavior. However, the effects were severely limited in that there was no generalization beyond the classroom. No negative side

effects were observed for either the child or the other children in the class.—*Journal abstract.*

12234. Rimm, David C.; Saunders, William D. & Westel, William. (Southern Illinois U, Carbondale) **Thought stopping and covert assertion in the treatment of snake phobias.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 92-93.—Evaluated the use of thought stopping and covert assertion in treating the snake phobias of 21 female undergraduates using 4 behavioral avoidance tests and the Fear Survey Schedule. Findings suggest that the thought-stopping-covert-assertion treatment package holds considerable promise as an efficient and effective clinical tool.

12235. Rosenbaum, Max. **An overview of group psychotherapy and the present trend.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12236. Ross, Steven M. (VA Hosp, Drug Dependence Treatment Ctr, Salt Lake City, UT) **Behavioral group therapy with alcohol abusers.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles.* Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12237. Rozensky, Ronald H. (VA Hosp, Psychology Service, Butler, PA) **The effect of timing of self-monitoring behavior on reducing cigarette consumption.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 301-303.—Conducted a clinical study with a 49-yr-old female to compare the effectiveness of keeping a written record of each cigarette before vs after its consumption. The introduction of a self-monitoring procedure prior to rather than subsequent to cigarette consumption completely eliminated the smoking behavior.—*Journal abstract.*

12238. Schwartz, Emanuel K. **Psychoanalysis in groups: A conceptual model for practice.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12239. Shepard, Martin. **A personalized discussion about groups.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12240. Shorkey, Clayton T.; Himle, David P. & Collins, Mary A. (U Texas, School of Social Work, Austin) **Behavior modification in groups: An annotated bibliography.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 129.

12241. Siegel, Leonard I. & Dulfano, Celia. (Roosevelt Hosp, New York, NY) **Multimodal psychotherapy: Multiple marital couple group therapy, augmented by phase-specific individual, couple and conjoint family therapy.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12242. Slavson, S. R. (New York U) **Types of group psychotherapy and their clinical applications.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future.* New York, NY: International Universities Press, 1974. xxviii, 366 p.

12243. Spanjaard, Jacob. (Psychoanalytic Inst, Amsterdam, Netherlands) **Group therapy in a psychoanalyt-**

**ic institute.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future.* New York, NY: International Universities Press, 1974. xxviii, 366 p.

12244. Spontitz, Hyman. **Group psychotherapy with schizophrenics.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12245. Turner, R. K.; Pielmaier, H.; James, S. & Orwin, A. (U Leicester, School of Social Work, England) **Personality characteristics of male homosexuals referred for aversive therapy: A comparative study.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 447-449.—Compared male homosexuals who were in aversive therapy treatment ( $n = 51$ ), had previously been in treatment ( $n = 42$ ), or had never received treatment ( $n = 18$ ) with respect to 2 personality measures—the Eysenck Personality Inventory and the Sixteen Personality Factor Questionnaire. Those who sought treatment for homosexuality were found to differ significantly from nonpatient homosexuals who had never sought treatment. The data are interpreted as evidence in support of the hypothesis that personality characteristics are significant in candidacy for treatment.—*Journal summary.*

12246. van den Blink, A. J. (Trinity Counseling Service, Princeton, NJ) **Family therapy and pastoral care.** *Journal of Pastoral Care*, 1974(Sep), Vol 28(3), 183-198.—Discusses the history and characteristics of family therapy, illustrating its main themes by examples of the work and thought of several therapists. The implications as to pastoral initiative, religious experience, and training for pastoral care are considered.

12247. Vassiliou, George. (Athenian Inst of Anthropos, Greece) **What general systems theory offers to the group therapist.** *International Mental Health Research Newsletter*, 1973(Win), Vol 15(4), 8-9.—Outlines advantages and risks of General Systems Theory (GST) for group therapists. In particular, while GST clearly defines the role of the therapists, it also challenges the therapist to become a model of proper human functioning, maintaining organization in openness, and openness in organization.

12248. Watson, J. P. & Lacey, J. H. (Guy's Hosp Medical School, London, England) **Therapeutic groups for psychiatric in-patients.** *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 307-312.—Conducted a study of 12 psychiatric inpatients and staff to test the hypotheses that (a) therapeutic groups would have an anxiety-provoking effect such that patients would rate themselves as more anxious after than before participation in the groups, and more anxious after than before control periods; and (b) participants would rate groups as "good" when they felt less anxious at the end of sessions than before them. Results indicate that patients were significantly more anxious before and after groups than before and after control periods, and also after groups than before them. "Good" groups tended to be those associated with anxiety relief. Factors contributing to these results are discussed.—*Journal summary.*

12249. Wieman, Robert J.; Shoulders, David I. & Farr, Jo-Ann H. (Norristown State Hosp, PA) **Reciprocal reinforcement in marital therapy.** *Journal of Behavior Therapy & Experimental Psychiatry*, 1974(Dec), Vol 5(3-4), 291-295.—Extends R. B. Stuart's (see PA, Vol



44:3932) behavior exchange model of marital therapy to include the supplementary use of both communication and sexual skill training. The approach is exemplified by the case study of a 31-yr-old couple who had sought help in resolving marital conflict. The treatment follows a multiple-baseline design across different behaviors. Results confirm the efficacy of the approach in positively modifying the behavior patterns of distressed spouses.—*Journal abstract.*

12250. Wilder, Joseph. (New York Medical College, NY) **Group analysis and the insights of the analyst.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future.* New York, NY: International Universities Press, 1974. xxviii, 366 p.

12251. Williams, J. David & Martin, Randall B. (Northern Illinois U) **Immediate versus delayed consequences of stuttering responses.** *Journal of Speech & Hearing Research*, 1974(Dec), Vol 17(4), 569-575.—Conducted a study in which 12 young adult stutterers read a list of 50 sentences 5 consecutive times. Frequency of stuttering was studied when (a) electric shock was administered contiguous to each observed occurrence of stuttering on a word; (b) each S received a shock for each word stuttered during the reading of a sentence, but the shocks were not delivered until the sentence was completed; and (c) no shock was employed (control condition). No significant difference was found between the 2 shock conditions, but there was significantly less stuttering throughout the shock conditions than in the control condition, and significant adaptation occurred in all 3 conditions. The hypothesis of a greater punishment effect occurring under contiguous shock than under noncontiguous (delayed) shock was not supported. (16 ref)—*Journal abstract.*

12252. Wolf, Alexander. (New York Medical College, NY) **Psychoanalysis in groups.** In S. de Schill (Ed), *The challenge for group psychotherapy: Present and future.* New York, NY: International Universities Press, 1974. xxviii, 366 p.

12253. Wolpin, Milton & Kirsch, Irving. (U Southern California) **Visual imagery, various muscle states and desensitization procedures.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1143-1149.—30 psychiatric technicians and nurses were asked to imagine 8 different scenes in each of 3 conditions: muscle relaxation, muscle tension, and usual muscle state. Degree of muscle tension significantly affected the quality of the imagery. Tension resulted in images which were described as more active, more frightening, more out of proportion, less friendly, less attractive, and as containing louder sounds and poorer solutions. Ss also reported feeling more a part of the scene and less safe in the tension condition. No significant differences were found in the vividness or clarity of imagery among 3 conditions. Implications for desensitization and related therapies are discussed.—*Journal abstract.*

### Psychoanalysis

12254. Ammon, Günter. (Deutschen Akademie für Psychoanalyse, Lehr- und Forschungsinstitut für Dynamische Psychiatrie und Gruppendynamik, Berlin, W Germany) **What is psychoanalytic therapy?** *Psychotherapie & Psychosomatics*, 1974, Vol 24(4-6), 355-358.—Views

the goal of psychoanalytic therapy as helping the patient free himself from the unconscious compulsions expressed in his symptomatic behavior. In addition to symptom-removal, the patient is expected to understand the personal meaning of the symptom, the communication it contains, and the motive it expresses. The range of psychoanalytic therapy formats is considered to reflect alternative interpersonal situations facilitating the integration of a patient's unconscious with his actual experiences. The role of language as the medium of the therapeutic process is discussed, and its dual nature of ego-definition and ego-extension is described. Psychoanalytic therapy is seen as focusing on the sick person rather than the illness.—*R. Tomasko.*

12255. Baudry, Francis. **Remarks on spoken words in the dream.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 581-605.—Examines the hypothesis proposed by O. Isakower that "spoken words in the dream are a direct contribution from the superego to the manifest content of the dream." Careful evaluations of patients' dreams indicates that spoken words do not express superego content, but are closer to a daydream—a continuation of some presleep preoccupation, with the mental apparatus not yet sufficiently regressed to allow visual imagery. It is suggested that conflicts involving the issue of guilt do not always occur in the analysis of dreams with spoken words, and that important elements of drive and defense also contribute to the meaning and form. Such dreams are particularly noted in patients who cannot tolerate regression. It is concluded that the multiple role of speech is reflected in its multiple meaning in the dream.—*J. Z. Elias.*

12256. Calogeras, Roy C. (US Army Hosp, Frankfurt/Main, W Germany) **Lévi-Strauss and Freud: Their "structural" approach to myths.** *American Imago*, 1973(Spring), Vol 30(1), 57-79.—Compares and discusses aspects of Lévi-Strauss's and Freud's structural approaches to mythical thinking. Specifically, the Oedipus myth and the Asdiwal myth of the Tsimshian tribes of the Pacific Northwest are examined. Similarities between the methods and research strategies of both are noted. Both Lévi-Strauss's model and the psychoanalytic model search for unconscious or latent meaning of the individual and collective dream. Lévi-Strauss's codes and Freud's dream-work are compared with regard to their structural components. Their concepts of the relationship between myth/dream and sociocultural reality are compared. Biases and problems within the work of each man are noted. (28 ref)—*R. S. Albin.*

12257. Easser, B. Ruth. **Empathic inhibition and psychoanalytic technique.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 557-580.—Discusses the usual treatment difficulties met in the psychoanalysis of the narcissistic personality disorder. Such patients have repressed their capacity for empathic response as a defense to protect oedipal triumph. This illusion of oedipal triumph is essential for maintaining their primary omnipotency core. Such a grandiose self-concept, with its roots in early development, protects the patient against the confusing early mother-child relationship, which was experienced by the child as threatening because of the irreconcilability of what he perceived and what he was told. The retention of omnipotence

preserves him against overwhelming helplessness and anxiety as he is flooded with tension in the face of the conflicting stimuli which cannot be organized.—J. Z. Elias.

12258. Falk, Avner. **Border symbolism.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 650-660.—Psychoanalytically examines the meanings of dreams and the symbolisms of crossing borders.

12259. Fischer, Newell. **Multiple induced abortions: A psychoanalytic case study.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 394-407.—Presents the case of a young married woman who had 5 induced abortions. The patient's unconscious fantasies and conflicts are described and clarified in an attempt to underscore the multifaceted and complex determinants of this ego-dystonic pattern of behavior. Such psychoanalytic investigation, it is hoped, will stimulate the interest of analysts in the new pattern of wholesale abortions.—*Journal summary.*

12260. Gilberg, Arnold L. (Southern California Psychoanalytic Inst, Beverly Hills) **Asceticism and the analysis of a nun.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 381-393.—Surveys the psychoanalytic literature on asceticism and presents the case history of a nun, with special attention to the ascetic motivation, through the early, middle, and terminal phases of her analysis. Whereas asceticism has been viewed as a core oedipal problem, this case suggests that early pregenital traumata are also important in the ascetic search. The oedipal phases of development cannot be synthesized until these pregenital needs are resolved. (19 ref)—*Journal summary.*

12261. Goldberg, Arnold I. (Michael Reese Hosp, Inst for Psychiatric & Psychosomatic Research & Training, Chicago, IL) **On the prognosis and treatment of narcissism.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 243-254.—Points out how the work of H. Kohut follows directly from and expands upon the concepts expressed by Freud regarding narcissism. Basic definitions and a reorientation are followed by a clinical example. The implications for psychoanalytic theory are discussed.—D. R. Marino.

12262. Keiser, Sylvan. (Brookdale Hosp Medical Ctr, Brooklyn, New York) **Sociologic variables and their effect on the language of the psychoanalytic patient.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 329-343.—Contends that cultural disparity influences the development of speech and the quality of the intellectual processes. In turn, both of these influence the psychoanalytic process, particularly by facilitating or hindering communication between analyst and analysand. (15 ref)—*Journal summary.*

12263. Kernberg, Otto F. (Columbia U, Coll of Physicians & Surgeons) **Contrasting viewpoints regarding the nature and psychoanalytic treatment of narcissistic personalities: A preliminary communication.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 255-267.—Examines the areas of agreement and disagreement regarding the metapsychological assumptions and treatment of narcissistic personalities. Discussion includes the relationship of narcissism to borderline conditions and the psychoses, and the relationship of normal to pathological narcissism. Psychoanalytic techniques, narcissistic transference, and the prognosis of narcissism, treated and untreated, are considered.—D. R. Marino.

12264. Miller, Frank & Bashkin, Edmund A. **Depersonalization and self-mutilation.** *Psychoanalytic Quarterly*, 1974(Oct), Vol 43(4), 638-649.—Discusses the problem of severe self-mutilation in psychotic patients, illustrated by a case history with a psychoanalytic theoretical interpretation.

12265. Rosenkötter, Lutz. [The psychoanalytical situation as the basis for psychoanalytical therapy.] (Germ) *Praxis der Psychotherapie*, 1973(Aug), Vol 18(4), 173-181.

12266. Schwartz, Lester. **Narcissistic personality disorders: A clinical discussion.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 292-306.—Discusses 2 questions: (a) Can cases of narcissistic personality disorder be differentiated? (b) If there is a separate category of such cases, are there clear-cut narcissistic transference phenomena? Material is presented which supports the position that predominantly narcissistic disorders can be described and that it is useful to consider narcissistic transference developments. Special emphasis is placed on early magic breast-phallus fantasies and primitive sadomasochistic fantasies as indicators of specifically narcissistic pathology. The role of defective reality testing is touched on and a number of technical issues are raised. (21 ref)—*Journal summary.*

12267. Spruiell, Vann. **Theories of the treatment of narcissistic personalities.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 268-278.—Presents 12 issues by which to compare and contrast the clinical approaches of Kohut, Kernberg, and their coworkers to narcissistic personalities. Alternative psychoanalytical approaches are considered, particularly in terms of the role of the Oedipus complex and the theoretical difficulties created by attempts to conceptually separate the ego from the self. (16 ref)—*Journal summary.*

12268. Wylie, Harold W. **Threads in the fabric of a narcissistic disorder.** *Journal of the American Psychoanalytic Association*, 1974, Vol 22(2), 310-328.—Describes an adult male in his 1st 4 yrs of analysis. He had been troubled throughout his life by grandiose fantasies and disturbed relationships. The meaning of these disturbances is discussed, and their connection with an early childhood relationship in which a grandiose self-image was pathologically reinforced. Early childhood trauma interfered with the normal developmental maturation of narcissism, and the grandiose self persisted without transformation into adult life. Traces of this grandiosity are viewed as threads woven into the fabric of the patient's character.—*Journal summary.*

#### Counseling & Community Mental Health & Crisis Intervention

12269. ———. **Alternatives to inpatient care: Organizing for community acceptance.** *Innovations*, 1973(Fal), Vol 1(1), 5-11.—Describes the operation of a county comprehensive mental health center and its success in treating patients in their own communities, thus eliminating the need to send them to the state mental hospital. Funds that ordinarily would be desig-



nated for the state facility were allocated instead to the county center, and the support of the local community was enlisted.

12270. ———. **Alternatives to inpatient care: Keeping it close to home.** *Innovations*, 1973(Fal), Vol 1(1), 12-16.—Describes a community effort in crisis therapy aimed at replacing inpatient care in state institutions. Therapeutic teams of psychiatrists, psychologists, social workers, nurses, occupational therapists, and psychiatric technicians work with patients in a given geographical area providing local inpatient, outpatient, and aftercare services as well as school and agency consultation and prevention services.

12271. Akeret, Robert U. **Drug abuse, community group process, and the training of natural talent.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12272. Berghofer, Mladen. [The approach to problems of primary prevention in psychiatry.] (Ser) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(2), 21-41.—Proposes that primary prevention in the mental health field is the most acute need of modern society. It is suggested that training in preventive techniques be incorporated into the curriculum of medical workers. The development of preventive activities is linked with outpatient services, but it is felt that to be successful it must be a national policy involving various institutions and social agencies. (40 ref)—*English summary*.

12273. Dettmering, Peter. (Gesundheitsamt Charlottenburg, Abteilung Sozialpsychiatrischer Dienst, W Germany) [The role of a social psychiatric service in working with psychiatric patients: Problems of extramural psychiatry.] (Germ) *Nervenarzt*, 1973(Jan), Vol 44(1), 26-30.—Illustrates with several examples how a social-psychiatric service attempts to treat patients for as long as possible extramurally, in the community, without denying hospitalization to those who require it. Discusses role conflicts, management of borderline cases, adaptation to new social and physical environments in old patients, nature of dependency of patient on service, cooperation between service and inpatient facility, etc.—*J. Rutschmann*.

12274. Dressler, David; Donovan, James M. & Fitzgibbons, David J. (New Britain General Hosp, CT) **The development of a mental health entry service.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 88-92.—Describes a team system approach introduced in a community mental health center and evaluates its impact on institutional operation, personnel functioning, and patient care. It is suggested that an effective entry system, the first contact a patient has with a program, is the most important part of the system as the major interface between patient and institution. This service provides a comprehensive diagnostic assessment and, when indicated, brief treatment in the form of brief psychotherapy or crisis intervention. Transfer is expedited for clients requiring longer term treatment to other programs. Both client dispositions and clinician attitudes toward the service are examined. The program has fostered increased referrals and patient-staff contacts, and clinicians have received the service favorably. The

strengths and weaknesses of the team approach are discussed.—*R. S. Albin*.

12275. Fields, Suzanne. **Unified Services: I. Getting it together.** *Innovations*, 1974(Win), Vol 1(2), 3-5.—Discusses the concept of unified service systems of mental health care in the context of the June 1973 New York State unified services bill. The approach attempts to integrate state institutions (schools and hospitals) and community mental health and retardation programs.

12276. Fields, Suzanne. **Unified Services: II. Brick and phantom hospitals.** *Innovations*, 1974(Win), Vol 1(2), 6-11.—Presents samples of new unified-services mental health programs by discussing, in interview format, the New York facilities at Creedmore State Hospital, Queens, and South Beach Psychiatric Center, Staten Island. Problems of community participation and reaction to the unified services approach are discussed. New unified services programs were developed, such as employing elderly blind people to work with older, chronic patients; voter registration drives; staff BA and MA degree programs; and day-care facilities for children of staff and community members.—*J. Carlson*.

12277. Giamartino, Gary A. (Western Kentucky U) **Electroconvulsive therapy and the illusion of treatment.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1127-1131.—Discusses the moral and ethical considerations surrounding the practice of electroconvulsive therapy. It is pointed out that most research has been devoted to noting this treatment's efficacy, but conclusive empirical evidence in favor of it does not, as such, exist. The argument that psychiatrists use electroconvulsive therapy solely to prevent harm to the patient is examined and rejected. The illusion of treatment implies that psychiatrists may have ulterior motives in turning to this mode of therapy. If these ulterior motives influence a psychiatrist's choice of treatment, the treatment may be considered morally wrong.—*Journal abstract*.

12278. Gordon, James S. (NIMH, Ctr for Studies of Child & Family Mental Health, Rockville, MD) **The Washington, D.C. runaway house.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 68-80.—Describes the program and presents case histories in a home in which runaway children can "cool off" and "get their heads together" upon their return to the community. The poor treatment accorded them by their parents prior to the event is interpreted in a framework of societal attitudes toward children.

12279. Halpern, Joseph & Binner, Paul R. (U Denver) **A model for an output value analysis of mental health programs.** *Administration in Mental Health*, 1972(Win), 40-51.—Presents a simple model using the economic value of the patient and the value of patient improvement to estimate program output as related to program costs, resulting in estimates of the rate of return and the degree of effectiveness.

12280. Harris, Sandra L. (Rutgers State U, Douglass Coll, New Brunswick) **Involving college students and parents in a child care setting: A day school for the child with autistic behaviors.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 188-194.—Describes a day treatment program for children with severely deviant behavior. Operant techniques were employed to increase deficient language and social behaviors in 7 boys and 3

girls 5-12 yrs old. Preliminary results indicate improvement in all children except one. The program employed 60 undergraduates as individual tutors and required regular parent participation in behavior modification workshops. Child care workers may play an important role in training parents to work with their own children, supervising the training of college students, and utilizing such students effectively in the care of deviant children.

—J. H. Feldstein.

12281. Hefez, A. (Rambam Hosp, Haifa, Israel) **The psychiatric work village in Israel: The Mazra experiment in rehabilitation.** *Israel Annals of Psychiatry & Related Disciplines*, 1974(Sep), Vol 12(3), 194-202.—Previous authors have questioned the concept of the work village as a lifetime residence for chronic deteriorated psychotics in light of the "community movement" in psychiatry. The present article outlines the organization and therapeutic principles underlying the functioning of the Mazra village settlement in Israel. The frustration arising from the long-term management of such patients led the responsible staff to reconsider the issues and try new means for rehabilitation. A survey of the 277 residing patients was carried out in 1959 to evaluate their rehabilitation potential. However, with the change in hospital policy, the village was transformed in 1963 into an all-purpose psychiatric hospital. 10 yrs later, an outcome study was made by the author in order to follow the fate of the original work village population. Results clearly point out that the majority of these patients needed further hospitalization. This strongly supports the ideology that led to the creation of psychiatric village-settlements.—*Journal abstract.*

12282. Hunter, R. C. (U Toronto, Ontario, Canada) **Notes on five years of office consultations in psychiatry.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 297-303.—Gives statistical data on 169 patients referred for psychiatric consultation in the years 1968-1972. These data are compared with health clinic statistics for Ontario. Some factors involved in managing a consulting practice are considered. (French summary) —*Journal abstract.*

12283. Kaplan, Seymour R. (Albert Einstein Coll of Medicine, Yeshiva U) **Characteristic phases of development in organizations.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12284. Krieger, Howard et al. (American U, Counseling Ctr) **The American University "hotline": A model crisis intervention telephone service.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 193-194.

12285. Kuhn, Roy. (U Wisconsin, Milwaukee) **Implications of Seidl's paper for child care practice.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 164-165.—Discusses possible improvements in child care based on the use of community-oriented residential institutions. These would require the employment of more able staff, trained to assist in community problems. Attempts to substitute foster and group homes for institutional care are described and are attributed to economic motives.—J. H. Feldstein.

12286. La Rocco, J. M.; Biersner, R. J. & Ryman, D. H. (US Navy Medical Neuropsychiatric Research Unit,

San Diego, CA) **Mood effects of large group counseling among Navy recruits.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 127-131.—Investigated the effects of a group counseling program introduced into the US Navy basic military training curriculum. A modified version of the Mood Adjective Checklist consisting of 40 items was administered to 1,196 male Navy recruits at 4 different times during basic training. 5 stable mood factors—anger, activity, depression, fatigue, and pleasure—were found. With the exception of anger, negative moods declined and positive moods increased over the course of training for both control and experimental groups. The experimental group, however, consisting of recruits who had received group counseling sessions, reported significantly less anger and significantly more pleasure than the control group. It is concluded that counseling of large groups of men can significantly reduce feelings of anger and enhance feelings of pleasure among Navy recruits.—*Journal abstract.*

12287. Leonard, Charles L. (Appalachian Mental Health Ctr, Detoxification Unit, Elkins, WV) **The role of the community hospital in treatment of the alcoholic patient.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies*, June 17-22, 1973. Morgantown, WV: West Virginia University, 1973. 165 p.

12288. Mikesell, Richard H. & Barry, John R. (U Georgia) **Community psychology consultation in planning social change programs.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 111.

12289. Milčinski, Lev. [Tertiary prevention in outpatient mental health care.] (Srcr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(2), 59-68.—Defines tertiary prevention as the effort to decrease residual disorders following mental illness. The activity should begin while the patient is still in treatment and should include elements and persons in his social environment. It is addressed to those iatrogenic and social agents that act to distort the patient's personality and prevent his return to active social life. The basic methods used are sociotherapy and community therapy. A survey of institutions practicing tertiary prevention is given and the roles of psychiatrists and other mental health workers are discussed. (English summary)—*English summary.*

12290. Petrović, Dušan. [Secondary prevention in outpatient mental health care.] (Srcr) *Anali Zavoda za Mentalno Zdravlje*, 1972, Vol 4(2), 43-58.—Discusses prevention of mental illness on the community level. Early diagnosis is considered most important. The patient must be willing to undergo examination and adequate services must be available. Secondary prevention also involves wide use of various screening methods and early treatment of newly detected cases. Applications of these principles to all age groups are discussed.—*English summary.*

12291. Richter, Horst-Eberhard. (Psychosomatische Universitätsklinik, Giessen, W Germany) [Community development and psychotherapy in ghettos.] (Germ) *Psychotherapy & Psychosomatics*, 1974, Vol 24(4-6), 269-280.—Examines the higher incidence of psychological disorders among ghetto inhabitants compared to middle class persons in terms of several socioeconomic factors. The causes among lowest class persons include



lack of access to psychotherapy facilities, mistrust of revealing one's problems, a childhood learned reliance on pragmatic work, and an aversion to introspection as a means of solving inner stresses. An innovative project of team action in ghettos is described in which student action groups and psychotherapists unified efforts to provide services to 120 selected ghetto families and their 400 children. Proposed tasks for the groups included crisis counseling and youth counseling. Questions are posed about what contribution the normally non-interfering psychotherapist can make in this new role of active participation in therapy. (English abstract) (24 ref)—R. Tomasko.

12292. Saper, Bernard. (Florida International U, Miami) **Right, liberty and the pursuit of mental health.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 3-14.—Describes the impending collision of 3 trends: (a) the momentum of the patients' rights movement, (b) the emergence of behavior modification as a cardinal therapeutic modality, and (c) the impetus to convert old fashioned state hospitals into truly responsive and effective residential treatment facilities. Problems inherent in the court system in defining and protecting individual rights include the use of expert testimony and improper intrusiveness. It is asserted that mental illness is a misnomer and that persons so categorized should really be permitted a more neutral and less damning label. 3 targets of legal concern are outlined: (a) the underlying principles of social learning, the complex systems and laws of operant and respondent condition, and the scientific-professional foundation of behavior change; (b) the technologies that presumably derive from these underlying principles of behavior—behavior therapy, behavior modification, contingency management, token economy, desensitization, etc; and (c) the organizational, bureaucratic, and administrative considerations which drastically qualify the effectiveness of treatment. The use of a treatment contract is suggested. (34 ref)—R. S. Albin.

12293. Schaefer, Jacqueline W.; Palkes, Helen S. & Stewart, Mark A. (St Louis Children's Hosp, MO) **Group counseling for parents of hyperactive children.** *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 89-94.—Describes a procedure in which parents of hyperactive children (3-12 yrs old) learned how to make and enforce rules, and how to influence their children's behavior by using the principles of learning theory. 9 couples met weekly for 10 sessions of group counseling and discussion. This procedure is proposed as an effective alternative or adjunct to drug treatment when specific advice and support are also given to the children's teachers.—E. S. Goodman.

12294. Scher, Murray. (Tusculum Coll) **Verbal activity, sex, counselor experience, and success in counseling.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 97-101.—Examined the contribution made by client and counselor verbal activity, client and counselor sex, and counselor experience to satisfaction and symptom relief. Ss were 18 male and 5 female counselors employed at a university counseling service (9 of whom were experienced), 34 undergraduates, and 2 graduate students. 20 of the students were female and 16 were male. Counselor-offered facilitative conditions were held

constant. Data were analyzed using a multiple regression analysis. Clients seeing experienced counselors reported better outcomes. Neither sex nor activity of the therapeutic participants contributed to therapeutic success. Explanations of findings and implications for counseling practice are discussed. (16 ref)—*Journal abstract*.

12295. Seidl, Fredrick W. (U Wisconsin, Madison) **Community oriented residential care: The state of the art.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 150-163.—Discusses how child care institutions can be community oriented. Criteria of community-oriented care are (a) community participation in planning, (b) utilization of community services, (c) preparation of children for community living, and (d) participation of residents in community activities. Evidence indicating a positive relationship between family contact, adjustment, and learning ability is cited. Programs employing family members, foster grandparents, and home visits with community members are discussed, and also the difficulties of liaison with local schools. European children's villages are described as models of family-style living. In addition, institutional personnel may provide community services. (34 ref)—J. H. Feldstein.

12296. Silver, Maurice J.; St Clair, Catherine H. & Siegel, Jerome M. (Hahnemann Community Mental Health/Mental Retardation Ctr, Philadelphia, PA) **Parental satisfaction at follow-up of child outpatients from an urban mental health center.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 36-39.—Conducted a follow-up study of parents of 105 child outpatients from 4 clinics of an urban community mental health center. Parent contacts were made several months after discharge regarding perceptions of the center and satisfaction with the help received. The nature of treatment had been eclectic with a multidisciplinary team approach offered by psychiatrists, psychologists, social workers, and paraprofessionals. Problems parents reported frequently as causing the child to be brought to the center were school behavior (23%), learning difficulty (20%), defiance with adults (15%), unethical behavior (11%), truancy (11%), anxiety (11%), aggressiveness (9%), shyness (8%), depression or suicide attempts (6%), bizarreness (6%), and a scattering of other problems. Satisfaction was high with courtesy and help received, regardless of clinic populations' differing demographic characteristics. 70% reported the child's major problem improved, 30% "greatly improved," and about 90% would return to the center and recommend it to others.—R. S. Albin.

12297. Silverman, Jerome S. (New York Council of Child Psychiatry, Committee on Clinics, New York) **The child/adolescent and urban psychiatric clinics: Summary of a survey of mental health clinic care for children in New York City.** New York, NY: Health Sciences Publishing, 1974. 181 p. \$7.95.—Presents the results of a study of the organization, administration, and clinical practices in 85 children's mental health facilities in New York City. Specific aspects of the services discussed include intake and diagnostic procedures, staffing and staff training, clinic schedules, eligibility requirements, treatment programs for parents, and the roles of the psychiatrist, social worker, and psychologist.

12298. **Speer, David C. & Schultz, Mark.** (Crisis Service of Erie Cty. Buffalo, NY) **An instrument for assessing caller-reported benefits of calls to a telephone crisis center.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 102.—Briefly reports 3 studies to obtain evaluative data from hotline users using a 14-item, 4-scale (communication of understanding by counselor, "goodness" of call, caller's emotional state since call, and surveying of alternatives, planning, and action) rating measure. Validity and reliability data suggest that the measure has a promising potential for assessing telephone counseling effectiveness.

12299. **Speer, David C.** (Erie County Suicide Prevention & Crisis Service, Buffalo, NY) **The role of the crisis-intervention model in the rehabilitation of criminal offenders.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 133.

12300. **Sundin, Bertil.** (U Stockholm, Sweden) **[Primary intervention and mental health.]** (Swed) *Psykisk Hälsa*, 1972, Vol 13(2), 87-96.—Describes common shortcomings of mental health programs, including the culture-bound values of mental health concepts and the use of deviant and high-risk labels. The community is recommended as the unit of analysis, with the individual identified within communal settings. The psychologist's role in community work is discussed in terms of professional identity, consultation or administration, and loyalty conflicts. Primary intervention should consider the importance of separating professional and personal roles, of recognizing that the individual and community do not stand in a mechanical relationship, and of initiating social action.—*R. J. Simeonssen.*

12301. **Tischler, Gary L.; Henisz, Jerzy; Myers, Jerome K. & Garrison, Vivian.** (Yale U, Medical School) **The impact of catchmenting.** *Administration in Mental Health*, 1972(Win), 22-29.—Compared a catchment community mental health center (CMHC) with a noncatchment multiservice treatment facility, both in New Haven, Connecticut. Overall admissions showed a significantly greater representation of disadvantaged groups in the CMHC patient population. When the noncatchment service area was sociodemographically matched to the CMHC service area, the differences between the 2 patient populations disappeared, but the CMHC had a greater number of patients. It is concluded that catchmenting per se was effective at correcting sociodemographic biases in treatment populations. When the proportions of illness categories are compared in the 2 populations, catchmenting was ineffective in correcting for imbalances in services to categorical populations.—*R. J. Albers.*

12302. **West Virginia Dept of Mental Health, Div on Alcoholism & Drug Abuse.** (Charleston) **The concept of Alcoholics Anonymous in a treatment setting.** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973.* Morgantown, WV: West Virginia University, 1973, 165 p.

12303. **Winter, Metta L. & Peters, Donald L.** **Day care is a human system.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 166-176.—Discusses characteristics of staff, parents, and children in day care centers, and the centers' effects on these groups. Children are described in terms

of age, socioeconomic, and family characteristics, and parents' ages, income, education, occupations, and attitudes are discussed. Parents are basically concerned with education while program directors emphasize goals such as self-reliance and cooperation. Parents and staff also tend to disagree about opportunities for parent participation. Day care centers appear beneficial in terms of family income, professional opportunities for women, and marital satisfaction.—*J. H. Feldstein.*

12304. **Wodarski, John S.; Rubelz, Ghassan M. & Feldman, Ronald A.** (U Tennessee, School of Social Work) **Program planning for antisocial boys.** *Social Work*, 1974(Nov), Vol 19(6), 705-713.—Evaluated the extent to which program planning affects the behavior of antisocial children, with 8-16 yr old anti- and prosocial boys as Ss. 8 categories of activities were measured—verbal activity, "it" games, team sports, free swimming, arts and crafts, special events, transitional activity, and written tasks. Those activities that tended to decrease antisocial and nonsocial behavior and those that tended to increase the incidence of prosocial behavior are described. Results show that program planning is a pertinent variable in controlling the behavior of antisocial children.—*Journal abstract.*

### Physical Treatment

12305. **Damásio, António R.; Lima, Almeida & Damásio, Hanna.** (Ctr de Estudos Egas Moniz Hosp de Santa Maria, Lisbon, Portugal) **Nervous function after right hemispherectomy.** *Neurology*, 1975(Jan), Vol 25(1), 89-93.—A hemispherectomy was performed on a 20-yr-old female because of progressively uncontrollable seizures and behavioral changes resulting from major head trauma at the age of 5 yrs. Psychomotor development up to this age had been normal. Examination 14 yrs after the hemispherectomy shows that she had little impairment in higher nervous function depending on the ablated hemisphere. Left-sided motor performance improved and sensory deficit was scant. There was no hemianopia and the right-eye visual field was enlarged. Dichotic listening showed left-ear preference and no lesion effect. Findings suggest that significant and positive adaptation may occur in mature brain. (25 ref) —*Journal abstract.*

12306. **Goldstein, Marvin N.; Joynt, Robert J. & Hartley, Ronald B.** (Monroe Community Hosp, Rochester, NY) **The long-term effects of callosal sectioning: Report of a second case.** *Archives of Neurology*, 1975(Jan), Vol 32(1), 52-53.—Cites a case previously reported by M. N. Goldstein and R. J. Joynt (see PA, Vol 43:10127) and presents the case of a male who had the corpus callosum sectioned at 7 yrs of age. Testing him 32 yrs later revealed defects in transfer of learning and crossed (mixed-modality) matching. This points out that defects may persist long after such surgery and that early reports of negative results of callosal section in patients were probably not correct.—*Journal abstract.*

12307. **Hore, B. D.; Nicolle, F. V. & Calman, J. S.** (University Hosp of South Manchester, England) **Male transsexualism in England: Sixteen cases with surgical intervention.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 81-88.—Presents a detailed clinical description of 16 male transsexuals seeking sex reassignment surgery.



Practically all patients had been aware of incorrect sex assignment during childhood and had cross-dressed in either childhood or adolescence. The majority were exclusively homosexual. 68% were regarded as socially stable, but 50% had suffered some form of psychiatric illness. Only 1 patient had not assumed a female role when seen. All patients had expectations of surgical reassignment. Techniques of the operation are outlined, and follow-up evaluation of 16 patients are reported which indicate that 11 have benefited both objectively and subjectively from the reassignment.—*Journal summary.*

12308. Höweler, M.; de Munnik, D. & Boertien, A. H. (Free U, Amsterdam, Netherlands) **The effects of mild electrostimulation on migraine and tension headache.** *International Mental Health Research Newsletter*, 1973(Win), Vol 15(4), 11-13.—Studied the effectiveness of electrostimulation (ES) in decreasing chronic migraine headache symptoms, based on a review of the causes of and treatment for headache symptoms and the association between ES and relaxation in earlier studies. 11 Ss selected as chronic migraine patients each received 20 treatments of mild ES of 1 hr duration using the apparatus Electroderm I. Ss received no additional therapy during the treatment period except for medication, and measurements were made during 3-wk periods pre- and posttreatment. The probable confounding effects of medication prevented statistical analysis. Results show strong improvement in 27% of the Ss, slight improvement in 27%, and no improvement in 46%. It is concluded that ES may be helpful in combination with behavioral and environmental therapy for migraine symptoms, and with insight therapy for predominantly tension headache symptoms. An advantage of ES is that non- or paraprofessionals can administer it. (26 ref)—*Journal summary.*

12309. Kalucy, R. S. & Crisp, A. H. (St George's Hosp Medical School, London, England) **Some psychological and social implications of massive obesity: A study of some psychosocial accompaniments of major fat loss occurring without dietary restriction in massively obese patients.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 465-473.—Treated 20 massively obese patients by ileo-jejunal bypass surgery. 18 were studied postoperatively through personal interviews, questionnaires (concerning degree of satisfaction with outcome of the operation and family attitudes), and the Middlesex Hospital Questionnaire. Almost all Ss went through "low" periods in the 1st 12 mo, and this was most marked in the 1st 6 mo after the operation. There was, overall, a change in affect from one of shame to one of more mature and positive interdependence. In general, the 2-yr outcome, both physical and psychological, is good even for patients with psychoneurotic disorders. (32 ref)—*W. G. Shipman.*

12310. Rogers, Malcolm P. & Kelly, Martin J. (US Public Health Service Indian Hosp, Rosebud, SD) **General hospital consultation.** *Psychiatric Opinion*, 1974(Feb), Vol 11(1), 36-42.—Describes a psychiatric consultation with a 36-yr-old male patient who had undergone kidney transplant. The significance of the time and circumstances of the consultation is pointed out. The patient's problems and difficulties in deciding

to have the operation, especially in discussing it with his wife and doctors, are detailed. The fundamental psychic meaning of hospitalization for the patient is presented. The great need for empathy with the patient in psychiatric consultations is emphasized.—*R. S. Albin.*

12311. Ruff, Carol F. & Templer, Donald I. (Western State Hosp, Hopkinsville, KY) **Psychoticism of schizophrenics who received many electroconvulsive treatments.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 132.

12312. Squire, Larry R. & Miller, Patricia L. (U California, San Diego) **Diminution of anterograde amnesia following electroconvulsive therapy.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 490-495.—24 psychiatric patients receiving a series of bilateral electroconvulsive therapy (ECT) for relief of depressive illness were given learning tests after each of their 1st 4 ECT treatments. Learning sessions took place 20, 50, and 180 min after each treatment, and different material was learned at each session. Results indicate that (a) the ability to retain newly learned material was initially impaired and then improved during the hours after each ECT treatment, (b) the ability to retain material for a 30-min interval was impaired to about the same extent and improved at about the same rate after each of the 1st 4 ECT treatments, and (c) the ability to retain material for a 24-hr interval was significantly poorer and improved more slowly after the 4th ECT treatment than after the 1st ECT treatment. Findings are consistent with the hypothesis that forgetting of material learned after ECT is abnormally rapid because the ability to store information is impaired. Results also demonstrate the usefulness of long-delay retention tests for assessment of ECT-produced memory impairment. (20 ref)—*Journal summary.*

12313. Westman, Jack C. & Zarwell, David H. (U Wisconsin, Madison) **Traumatic phallic amputation during infancy.** *Archives of Sexual Behavior*, 1975(Jan), Vol 4(1), 53-63.—Reports an unusual case of phallic amputation to illustrate the complex issues involved in considering transsexual surgery during early life. The lack of ambiguity regarding this patient's physiological gender at the age of 15 mo permitted his management to rest solely on the long-range social and developmental implications of his phallic defect. The impact of this event on the child's family, on the community, and on professional workers was profound, leading to a series of circumstances that affected objectivity and the decision-making process. The decision to retain the male gender was based on the uncertain long-range effects of the loss of capacity for procreation and the surgical procedures and hormone therapy necessitated by gender change. (17 ref)—*Journal abstract.*

#### Social Casework & Rehabilitation

12314. Barklind, Kenneth. (Wisconsin State U, River Falls) **Modeling in prevocational training.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12315. Bennett, Lawrence A. **Self-esteem and parole adjustment.** *Criminology: An Interdisciplinary Journal*, 1974(Nov), Vol 12(3), 346-360.—Examined the relation-

ship between self-esteem of prison inmates just prior to their release and their postinstitutional adjustment at 6-mo, 1-yr, and 2-yr follow-ups. Ss were a total of 142 male felons with a median age of 38 yrs and a median time served of 2 yrs, 9 mo. Results show a small but statistically significant positive correlation ( $p < .01$ ) between prerelease self-esteem and parole adjustment, supporting the hypothesis. Because of the low correlation, however, other areas of study are suggested. (21 ref) —*Journal abstract.*

12316. Bowman, James T.; Cook, Sherry D. & Whitehead, Garry. (Mississippi State U) **Pre-release training of female public offenders.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1193-1194.—Assessed the effect of prerelease training on the personalities of 16 incarcerated females and 8 controls. Ss' pre- and posttraining scores on the 16 Personality Factor Questionnaire show significant differences between groups on 7 factors.

12317. Broekema, Marilyn C.; Danz, Kathleen H. & Schloemer, Carleen U. (U Wisconsin, Madison) **Occupational therapy in a community aftercare program.** *American Journal of Occupational Therapy*, 1975(Jan), Vol 29(1), 22-27.—Describes an aftercare program for psychiatric patients aimed at facilitating their adequate and independent adjustment to the community. The development of the program's behavioral rehearsal model is outlined, and the function of the occupational therapist as a case manager of the treatment team is discussed.

12318. Dallas, Don. (Memorial Hosp of DuPage County, Elmhurst, IL) **The forgotten remnant: The elderly in need.** *Social Work*, 1974(Nov), Vol 19(6), 733-736.—Discusses the need for protective services for elderly sick persons with no cooperative relatives or friends. 2 case examples point up the need for geriatric foster homes or some like service other than state or local mental hospitals which often are unsuited to the person's needs.

12319. DeMars, Patricia K. (St Catherine Coll, St Paul, MN) **Training adult retardates for private enterprise.** *American Journal of Occupational Therapy*, 1975(Jan), Vol 29(1), 39-42.—Describes a community-based program for placing low-level retardates with no prior work experience or job training into work positions in private business and industry compatible with their needs and abilities. The various problems and solutions encountered in the attempt to match the needs of employers, who experienced rapid turnover and motivation problems of employees in routine work tasks, with the needs of low-level, nonworking, adult retardates who showed potential for these types of jobs are analyzed. —*Journal abstract.*

12320. Ganzer, Victor J. (Child Study & Treatment Ctr, Fort Steilacoom, WA) **The use of modeling techniques in rehabilitation of the juvenile offender.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12321. Hardy, Richard E. & Cull, John G. (Virginia Commonwealth U) **Developing psychological services in vocational rehabilitation work.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation*

*settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12322. Hartlage, Lawrence C. (Medical Coll of Georgia, Augusta) **Peer group influence in behavior modification of the mentally retarded.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12323. Hoxworth, David H. (Iroquois Mental Health Ctr, IL) **A case presentation of the treatment of dyspareunia.** *Clinical Social Work Journal*, 1973, Vol 1(Special Issue), 251-256.—Describes in some detail the treatment of a young married woman suffering from dyspareunia. The need for social workers to become more involved in discussing and working with sexual problems is emphasized.

12324. Mahoney, Kathryn & Mahoney, Michael J. (Pennsylvania State U) **Psychoanalytic guidelines for child placement.** *Social Work*, 1974(Nov), Vol 19(6), 688-696.—Contends that psychoanalytic theory is not sufficient for establishing guidelines for child placement. The issues of continuity and multiple parenting are tested against available empirical evidence. It is suggested that legal recommendations drawn from psychoanalytic theory may warrant re-evaluation, and that the best interests of the child are not deducible from theory. (35 ref)—*Journal abstract.*

12325. McEwen, J. C. (South Australian Inst of Technology, Adelaide) **Working conditions with different types of disability.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.—Reports that the distribution of mental retardates in various work areas of a large rehabilitation workshop was significantly different from that of psychiatric patients. Retardates tended to be found in jobs where noise levels and demands for speed, exactness, and team work were relatively high, and psychiatric cases in jobs where all these demands were lower. A model relating performance to arousal level and the ability to withstand stress is presented to account for the results. (French & German summaries)

12326. Phelps, William R. (West Virginia Div of Vocational Rehabilitation, Charleston) **Coordination of vocational rehabilitation and department of welfare activities.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 133-134.

12327. Phelps, William R. (West Virginia Div of Vocational Rehabilitation, Charleston) **A project for the expansion of vocational rehabilitation services in rural hospitals in cooperation with the welfare medical assistant program.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 134.

12328. White, Mary E. (Metropolitan Toronto Assn for the Mentally Retarded, Adult Support Services, Ontario, Canada) **Children's games for the adult mentally retarded.** *Journal of Leisureability*, 1974(Apr), Vol 1(2), 4-7.—Suggests that leisure programs for retarded adults are often overorganized, emphasizing childlike behaviors and activities. It is recommended that such programs encourage independence and teach normal adult social skills to retarded adults.



### Hospital Programs & Hospitalization & Institutionalization

12329. Balch, Philip & Balch, Koreen. (U Arizona) A racial comparison of admissions, diagnoses, and releases of patients in a state mental hospital system: A five year review. *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 197.

12330. Boenheim, Curt. (Columbus State Hosp, OH) Psychoanalysis and activities therapy. *American Journal of Art Therapy*, 1974(Jul), Vol 13(4), 293-302.—Presents a case study to demonstrate the utility of an activities therapy program in treating hospitalized patients. Focus is on the interrelations of all parts of the therapy programs.

12331. Coe, William C. (California State U, School of Natural Sciences, Fresno) Token economies: A description. In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12332. Collins, Malcolm J. & Rodman, Doris H. (Massachusetts Dept of Mental Health, Region IV, Wakefield) A residential program for the developmentally disabled. *Social Work*, 1974(Nov), Vol 19(6), 724-726.—Describes a network of 5 community residences for the developmentally disabled established by a state institution in cooperation with nonprofit organizations. Advantages of the public-private partnership are detailed.

12333. Cooklin, A. I. (North East Metropolitan Regional Hosp Board, London, England) Exploration of the staff-patient "contract" in an acute female admission ward. *British Journal of Medical Psychology*, 1974(Dec), Vol 47(4), 321-335.—Describes the development of a "contract" program in which 116 psychiatric patients on an acute female admissions ward were assisted in defining individual treatment programs. Results indicate that the program was successful in (a) establishing a meeting place between patient and staff at all levels which held real and shared responsibility; (b) increasing recognition of the "adult," "healthy" part of the patient; (c) redefining the function of inpatient treatment, particularly for crisis admissions; (d) increasing staff confidence and participation by both staff and patients; (e) easing ward management; (f) increasing the admission rate to the ward by 33%; and (g) encouraging the widespread use of contract conferences.—*M. E. Pounsel*.

12334. Corder, Michael P.; Kiehle, Jane; Ledbetter, Doris & Flannery, Eugene P. (Latterman Army Medical Ctr, Presidio of San Francisco, CA) Cancer patient care in a general hospital. *Military Medicine*, 1975(Jan), Vol 140(1), 44-46.—Describes the objectives, personnel, inpatient and outpatient care services, clinical organization and functions, research, psychological support services, and record-keeping procedures in a medical cancer care program in a general hospital. The use of discussion groups and individual counseling with the cancer patients is noted.

12335. Cross, K. W. & Turner, R. D. (U Birmingham, England) Patient visiting and the siting of hospitals in rural areas. *British Journal of Preventive & Social Medicine*, 1974(Nov), Vol 28(4), 276-280.—For 1 wk all visitors to patients in geriatric, psychiatric, and subnor-

mal hospitals were asked to give details of their journey to hospital, including the addresses from which they set out in order to examine (a) the effect of distance of the patient's home from hospital upon the frequency of visiting, and (b) the likely consequences of adopting a policy of concentration of all resources at 2 district general hospitals. Whereas greater distances between home and hospital (up to 20 miles) resulted in little reduction in the frequency of visiting of short-stay (less than 6 mo) geriatric patients and of both short- and long-stay psychiatric patients, they resulted in much less frequent visiting of long-stay geriatric patients. The large majority of subnormality patients were in hospitals outside the county. It is concluded that in the predominantly rural area, the provision of all hospital services at 2 district general hospital sites would greatly reduce distances traveled by visitors to psychiatric patients and to subnormal patients, and would increase distances to geriatric patients. It is suggested that there is a case for siting long-stay (over 6 mo) geriatric patients in units near their homes, and possibly also psychiatric and subnormal patients if their homes are at inconvenient distances from the district general hospital.—*Journal abstract*.

12336. Dorrucchi, Fernanda. (Montefiore Home, Cleveland, OH) Classes for adult children of the aged. *Social Work*, 1974(Nov), Vol 19(6), 732-733.—Describes a program designed to help adult children prepare for the institutionalization of aged parents. Group sessions held with institution staff were found to be effective in helping those beset with anxiety, guilt, and indecision.

12337. Friesen, Deloss D. (U Nebraska, Lincoln) The use of behavior modification techniques with the mentally ill. In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12338. Gelman, Sheldon R. (Pennsylvania State U) Periodic review of mentally retarded residents. *Social Work*, 1974(Nov), Vol 19(6), 726-729.—Presents findings of a study investigating the implementation of legislation requiring the periodic evaluation of mentally retarded patients in state facilities. Reasons for an insufficient number of patients being moved into the community are given.

12339. Hoffmann, Helmut. (Willmar State Hosp, MN) County characteristics and admission to state hospital for treatment of alcoholism and psychiatric disorders. *Psychological Reports*, 1974(Dec), Vol 35(3), 1275-1277.—Studied 1,270 male and 112 female alcoholic and 350 male and 447 female psychiatric admissions to a state hospital in 1971 and 1972 to determine the correlations between the utilization rate of alcohol and psychiatric treatment in a state hospital and characteristics of 20 rural counties. Alcoholics were affected by more characteristics than were psychiatric patients. Unemployment appeared more important than poverty. The distance to the hospital was negatively related to utilization of the hospital for males but not for females.—*Journal abstract*.

12340. Holroyd, Jean; Brown, Nancy; Wikler, Lynn & Simmons, James Q. (U California, Neuropsychiatric Inst, Los Angeles) Stress in families of institutionalized and noninstitutionalized autistic children. *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 26-31.—Ex-

plored the relationships between parents' reports of personal and family problems (viewed as stress indicators) in their attempts to deal with an autistic child. 2 variables were examined: institutionalization and the age of the child. Parents in 29 families with autistic children (28 mothers and 22 fathers) were interviewed and completed a questionnaire as part of a larger follow-up study. Children ranged in age from 1 to 18, with 1 aged 24. 78% were male and all but one were Caucasian. The families were evaluated for level of stress by combining parent interview responses. No differences were found between families of institutionalized and noninstitutionalized children. There was some suggestion, however, that among children kept at home, stress ratings were higher for families of older children than of younger children.—*R. S. Albin.*

12341. Katz, Roger C. & Woolley, F. Ross. (U of the Pacific) **Criteria for releasing patients from psychiatric hospitals.** *Hospital & Community Psychiatry*, 1975(Jan), Vol 26(1), 33-36.—Conducted a pilot study to determine the kinds of criteria being used by mental health professionals in discharging patients from mental hospitals. 21 criteria were identified in the first phase of the study, and 43 staff members later rated the items according to their perceived importance. Although there was general agreement on most of the items, reliable differences of opinion were expressed in some instances. The differences were attributed less to the respondents' professional discipline than to their hospital affiliation—Veterans Administration (VA) or non-VA. The need for developing a standardized list of discharge criteria is emphasized, and uses for such criteria are discussed.—*Journal abstract.*

12342. Kennedy, Donald et al. (Rideau Correctional Ctr, Burritts Rapids, Ontario, Canada) **Crisis intervention in a correctional centre.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 93-94.—Describes an approach to the treatment of inmate crises in correctional institutions. Alternatives to medication are suggested. A relaxation and self-control technique is described which has been used with about 200 inmates for approximately 6 mo. 70% of the crises were alleviated with this method. Additional benefits of the treatment include the encouragement of medicine and psychology to develop other liaisons, the increased acceptance of the professional staff by corrections personnel, and the placement of this training within the context of a life-skills course. The procedure is economical in that it can be administered by other than psychological staff.—*R. S. Albin.*

12343. Kirstein, Larry; Weissman, Myrna M. & Prusoff, Brigitte. (Yale U, Medical School) **Utilization review and suicide attempts: Exploring discrepancies between experts' criteria and clinical practice.** *Journal of Nervous & Mental Disease*, 1975(Jan), Vol 160(1), 49-56.—Studied the discrepancies between experts' criteria for hospitalization of suicide attempters ( $N = 248$ ) and actual clinical practice to develop utilization review criteria which reflect current clinical thinking and which could form guidelines for the assessment of clinical care. Experts' criteria predicted that a hospitalized group of suicide attempters did not require hospitalization and that a nonhospitalized group

of suicide attempters required hospitalization. Examination of the discrepancies between clinical practice and experts' criteria not only revealed that incorporation of clinical measures of depressive symptomatology (e.g., Hamilton Rating Scale for Depression) could improve the experts' criteria for hospitalization but also showed that clinicians did not hospitalize a group of markedly symptomatic and socially impaired white suicide attempters. (27 ref)—*Journal abstract.*

12344. Levenson, Herbert S. & Balson, Paul M. (McAuley Neuropsychiatric Inst, Child Psychiatry Service, San Francisco, CA) **Behavioral and milieu management of acute psychiatric inpatients.** *Military Medicine*, 1975(Jan), Vol 140(1), 36-38.—Reports the developmental and operational aspects of a treatment program for psychiatric inpatients that combined both milieu and behavioral principles. Basic concepts in the design of the program included the idea of a therapeutic community, the reinforcement of adaptive behavior, the identification and subsequent ignoring of maladaptive behaviors, and the maintenance of family and community contacts to insure environmental support for the patient's return to everyday life. Details of the behavioral modification and therapeutic community procedures used are described, and evaluative data are presented which show that in an 18-mo period, of 595 consecutive admissions, 584 were eventually discharged. The average stay was 11-12 days.—*L. Gorsev.*

12345. MacDonald, Marian L. (State U New York, Stony Brook) **Methods for the assessment of change in hospitalized psychiatric populations: A substantive review.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 131.

12346. Maratos, Jason & Kennedy, Margaret J. (London Hosp, England) **Evaluation of ward group meetings in a psychiatric unit of a general hospital.** *British Journal of Psychiatry*, 1974(Nov), Vol 125, 479-482.—2 psychiatric wards in a general hospital containing a total of 90 patients were used alternately as S and control groups, each taking part for a 9-wk period in weekly ward and staff meetings. The effect on patients' behavior was assessed by comparing the number of disruptive incidents recorded in the nurses' notes, and by scores on 2 rating scales—the Ward Atmosphere Scale and an attitude scale designed to elicit feelings about ward meetings. The former measure showed significant differences in patients' behavior, particularly in a reduction of the number of times medication was refused and the number of abscondings on both wards during the periods in which meetings were held. It is suggested that ward meetings, in providing an opportunity for verbal expression of hostility, prevented some of the nonverbal acting out of these feelings.—*Journal summary.*

12347. Marquis, Hugh & Gendreau, Paul. (Rideau Correctional Ctr, Burritts Rapids, Ontario, Canada) **Short-term educational upgrading on a contractual basis.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 94-95.—Examines the effectiveness of a contractual method for obtaining educational services for inmate training from outside a correctional institution. 22 inmates in a correctional institution were studied; 12 completed a 3-mo course, and 10 were offered no



training but were also tested after 3 mo. Results show that, compared with controls, experimental Ss increased by a half grade level in arithmetic and spelling. There was little change in reading ability. It is concluded that educational upgrading is a slow process when educational programs of this type are involved.—*R. S. Albin.*

12348. Meikle, Stewart; Gerritse, Richard & Pearce, Keith. (U Calgary, Alberta, Canada) **Diagnostic practice in a psychiatric unit.** *Canadian Psychiatric Association Journal*, 1974(Jun), Vol 19(3), 287-290.—Studied diagnoses of 161 consecutive inpatient admissions, at admission and at time of discharge. Some diagnoses made on admission were more stable than others: 80% of those initially diagnosed as schizophrenic were given the same diagnosis on discharge, but only 55% of those initially diagnosed as neurotic had the same diagnosis on discharge. (French summary)—*F. Auld.*

12349. Menolascino, Frank J. (U Nebraska, Psychiatric Inst, Omaha) **Changing developmental perspectives in Down's syndrome.** *Child Psychiatry & Human Development*, 1974(Sum), Vol 4(4), 205-215.—Studied 30 male and 42 female 25-45 yr old patients with Down's syndrome at a large public institution. Observations showed a wide and a heightened range of developments which are inconsistent with the low expectations usually voiced and practiced by professionals. Study results strongly suggest that the old set of ideas concerning individuals with Down's syndrome—from the prognosis of very low social-adaptive levels to the need for prompt and prolonged institutionalization—must be re-evaluated. (26 ref)—*Journal abstract.*

12350. Niskanen, P. (Helsinki U Central Hosp, Psychiatric Clinic, Finland) **Treatment results achieved in psychiatric day hospital care: A follow-up of 100 patients.** *Acta Psychiatrica Scandinavica*, 1974, Vol 50(4), 401-409.—A series of 100 consecutive day-hospital patients were evaluated for their clinical condition and working ability at the beginning and end of their initial day hospitalization and again 4 yrs after discharge from the day hospital unit. Results show that in 52 cases, the patient's clinical condition improved under day hospitalization, whereas in the remaining 48 cases it either remained unchanged or deteriorated. In 30 cases, the patient's working ability improved. The 4-yr follow-up revealed that in 77% of the 52 patients whose condition had improved, the favorable treatment results had been of a lasting character. In the 48 patients who had failed to make improvement during day hospitalization, improvement in clinical condition was observed in 40% and improvement in working ability in 36% of the cases. Results demonstrate that these patients, who had been unable to benefit by day hospitalization, later showed as much as or even more improvement than those patients who had made improvement under day hospital treatment.—*Journal abstract.*

12351. Schwartz, Jeffrey & Bellack, Alan S. (U Pittsburgh) **A comparison of a token economy with standard inpatient treatment.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 107-108.—Used the Nurses Observation Scale for Inpatient Evaluation (NOSIE-30) to evaluate a token economy ward at a large psychiatric hospital in comparison with 3 nontoken wards in the same unit. The token economy

appeared to be more effective in generating a broad range of behavior changes, including both an increase in positive behaviors and a decrease in negative behaviors.

12352. Smith, Stuart L. & English, John. (St Joseph's Hosp, Inpatient Service, Hamilton, Ontario, Canada) **The training and role of nurse-therapists in a general hospital's psychiatric unit.** *Hospital & Community Psychiatry*, 1975(Jan), Vol 26(1), 21-24.—Describes the training of the 1st nurse-therapists on a general hospital psychiatric unit and the 3-level training system established to make the program self-sustaining. The nurse-therapist system is currently used on several psychiatric units in the hospital. Problems in role relationships and schedules are discussed. It is believed that, considering the patient-care, economic, and staff benefits, the system would be especially useful in small inpatient units.—*Journal abstract.*

12353. Tansella, Michele. (U Padova, Istituto di Clinica Psichiatrica di Verona, Italy) **An institution-based register in a psychiatric university clinic.** *Psichiatrica Clinica*, 1974, Vol 7(2), 84-88.—Discusses the functions and limitations of psychiatric registers and describes the automated data collection system in use at the Psychiatric University Clinic of Verona, Italy. Results of the periodic monitoring of the 1st 3 years of activity of this institution show that (a) the number of inpatient neurotics decreased and schizophrenics increased as a function of later initiated outpatient service; (b) overall average length of hospitalization remained unchanged; (c) females tended to stay in the hospital longer than males regardless of age or diagnosis; (d) the number of admissions for attempted suicides increased steadily; and (e) only 1.6% of the patients were transferred to the psychiatric hospital under certificate, indicating that a psychiatric department in a general hospital can cope with a wide range of patients. (15 ref)—*Journal abstract.*

12354. Wershow, Harold J. & Reinhart, George. (U Alabama, Birmingham) **Life change and hospitalization: A heretical view.** *Journal of Psychosomatic Research*, 1974(Dec), Vol 18(6), 393-401.—Hypothesized that a high proportion of newly admitted patients would have high life change unit (LCU) scores based on the Schedule of Recent Experiences and that the scores would be higher in the 6 mo immediately preceding hospitalization than in the 7-12 mo before. 88 male patients (90% over 40 yrs old) were studied. No significant relationships were found.—*W. G. Shipman.*

12355. Whittaker, James K. (U Washington, School of Social Work) **Evaluating residential treatment.** *Child Care Quarterly*, 1974(Fal), Vol 3(3), 195-196.—Criticizes research on effectiveness of residential treatment programs and points out difficulties of various research methods. The single-case design, involving comparison of baseline and treatment conditions, is suggested as a potentially useful alternative.

## EDUCATIONAL PSYCHOLOGY

12356. Anastasio, Ernest J. **Computer-based education: Obstacles to its use and plans for future action.** *Viewpoints*, 1974(Jul), Vol 50(4), 11-37.—De-

scribes a study designed to identify the specific obstacles to acceptance of computers in education, and to evaluate plans for surmounting them. Various examples are quoted to show how a multilevel program of research and implementation might be directed toward overcoming the most critical obstacles.

12357. Anderson, G. Ernest. **The computer in education: Yesterday, today, and . . . ?** *Viewpoints*, 1974(Jul), Vol 50(4), 1-10.—Considers the background of computer use in education, and current attendant problems, such as what happens to people in organizations with the advent of the computer.

12358. Bickel, P. J.; Hammel, E. A. & O'Connell, J. W. (U California, Graduate Div, Berkeley) **Sex bias in graduate admissions: Data from Berkeley.** *Science*, 1975(Feb), Vol 187(4175), 398-404.—Examined the aggregate data on admissions to the University of California Graduate Division for fall 1973, showing a clear but misleading pattern of bias against female applicants. The disaggregated data, however, revealed few units showing significant departures from expected frequencies of female admissions and about the same number of units favoring females as favoring males. Pooling the data and correcting for the tendency of females to apply to departments more difficult for applicants of either sex to enter, a small but significant bias in favor of females appeared. Departments that are easier to enter are generally those which require more mathematics in the preparatory courses, from which it is concluded that the bias in the aggregated data stems, in part, from prior screening at lower educational levels. Females are directed by their education and socialization toward fields that are more crowded, less productive of degrees, and less well funded and that frequently offer poorer professional employment opportunities. It is suggested that the university can, through research and use of its powers, determine where and how much bias exists and equalize the preparation of males and females at primary and secondary levels for entry into all academic fields.—*Journal summary*.

12359. Bjerstedt, Ake (Ed.). (Malmö School of Education, Sweden) **Environment-oriented and organization-oriented research: Some current projects at the Malmö School of Education.** *Educational & Psychological Interactions*, 1974(Dec), No 50, 29 p.—Details the aims, backgrounds, and main features of 3 educational research projects: (a) the combination of individualized teaching and social training by varying the sizes of groups and by team teaching and the construction of suitable evaluation instruments, (b) the development of preschool activities and materials and the promotion of organizational collaboration between preschool and primary school levels, and (c) the development of search strategies for educational research and documentation.—B. McLean.

12360. Bortner, Rayman W.; Dubin, Samuel S.; Hultsch, David F. & Withall, John. (Pennsylvania State U) **Adults as learners: Proceedings of a conference.** University Park, PA: Pennsylvania State University, 1974. 200 p.—Presents a collection of 11 conference papers which examined issues related to adult learning. Topics include the social significance of adult learning, a

humanistic approach to adult education, and information processing in adult learners. (19 ref)

12361. Gran, Bertil; Gran, Birgitta; Rudvall, Göte & Röhr, Gunilla. [Some current research and development projects in the Malmö region with relevance for the proposals by SIA, the Swedish State Committee on the internal work of the school.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Nov), No 259, 63 p.

12362. Hale, Frank W. (Ohio State U) **A sprinkle of pepper: The state of black influence in white colleges and universities.** *Journal of Non-White Concerns in Personnel & Guidance*, 1975(Jan), Vol 3(2), 45-52.—Reviews continuing sources of discrimination affecting black students in white colleges and universities. Problems involving black faculty and administrators are also noted.

12363. Huff, Terry M. & Schnelle, John F. (Middle Tennessee State U) **Discrimination between appropriate and inappropriate classroom behaviors by well behaved and poorly behaved students.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1247-1253.—Compared 14 well-behaved male 5th, 6th, and 7th graders with 16 poorly behaved Ss in ability to point out inappropriate behaviors on a video tape. Ss' responses were compared to responses made by 4 teachers who saw the same video tape. Well-behaved and poorly behaved groups were defined by 2 different categorization methods: teachers' judgment and behavioral rating by independent Os. A Group  $\times$  Categories analysis of variance with repeated measures on categories yielded no significant differences between groups with either definition of groups. A point-biserial correlation of -.22 was found between the grouping of Ss by teachers' judgments and the behavioral ratings.—*Journal abstract*.

12364. Siegel, Arthur I.; Federman, Phillip J. & Burkett, James R. (Applied Psychological Services, Wayne, PA) **Increasing and evaluating the readability of Air Force written materials.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 201.

12365. Sklerov, Audrey J. (City Coll, City U New York) **The effect of preschool experience on the cognitive style of reflectivity-impulsivity of disadvantaged children.** *Graduate Research in Education & Related Disciplines*, 1974(Spr-Sum), Vol 7(2), 77-91.—Attempted to determine whether children who had attended a 1-yr Project Head Start preschool program would demonstrate a more reflective conceptual tempo than children from similar backgrounds who had not participated in such a program. The 32 Ss came from 2 kindergarten classes, taught by the same teacher, in a public school in a lower-class area of New York City. The 16 experimental Ss, participants in the Head Start program, were matched for sex, race, and age with 16 nonparticipating Ss. The preschool form of the children's version of the Matching Familiar Figures Test was administered to all Ss after 2 mo of kindergarten experience. The test was scored for response latency and errors. Results support the hypothesis, since the Ss with Head Start experience had significantly longer response time and significantly fewer errors than the control Ss. (30 ref)—C. Tatham.

12366. Williams, Allan R.; Siegel, Arthur I. & Burkett, James R. (Applied Psychological Services, Wayne, PA)



**Readability of textual material: A survey of the literature.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 202.

### School Administration & Educational Processes

12367. Arundel, Geraldine. (Norwalk-La Mirada Unified School District, CA) **An exploratory study comparing attitudes of three groups of educators toward orthopedically handicapped children as measured by pupillary dilation.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 138.

12368. Bjerstedt, A. (Ed.). (Malmö School of Education, Sweden) **Teacher-oriented research: Some current projects at the Malmö School of Education.** *Didaktik*, 1974(Dec), No 46, 34 p.—Summarizes 4 research projects concerned with the role of the teacher in education: (a) an analysis of the extent to which teacher training matches the requirements of the present and future roles of the teacher, and the development of teacher-training materials; (b) an analysis of the effects of closed-circuit TV and video recorders on student-teachers' perception and evaluation of their own teaching performance; (c) job analyses to determine the training and further education needed by school principals, lecturers in methodology, and tutors; and (d) construction of a model for the planning, execution, evaluation, and revision of job training for principals, methods lecturers, and tutors.—*B. McLean*.

12369. Calkins, E. Virginia et al. (U Missouri, Medical School, Kansas City) **Impact on admission to a school of medicine of an innovation in selection procedures.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1135-1142.—Reports the impact of innovative selection procedures on admission to a university's 6-yr combined baccalaureate and doctor of medicine program. In 1973 and 1974, the school's Council on Selection de-emphasized high school academic performance but continued to consider extensive biographical and interview data. Significant differences emerged in the correlations of various selection criteria with the Council's ratings of candidates in 1973 and 1974 in comparison with the prior years. Specifically, admission test score which had the highest correlation (.58) in 1972 was only .18 in 1973. The negative correlation (-.30) of race (discriminatory toward nonwhites) in 1972 was not present in 1973 or 1974. Instead, the highest correlations were the interviewers' ratings and recommended decisions.—*Journal abstract*.

12370. Crabtree, Walden. (U Akron) **A clarification of the teacher's role in moral education.** *Religious Education*, 1974(Nov-Dec), Vol. 69(6), 643-653.—Discusses value-related goals of public education and how teachers can attain them, since studies show that teachers influence values either deliberately or inadvertently and are expected to be value educators. Inappropriate methods of character education are those that indoctrinate rigidly, or assume that all values are already known, or fail to be open-minded and objective. Appropriate methods are consistent with 2 goals: a process of intelligent valuing and a commitment to justice. 5 indirect and 4 direct modes of value change are discussed and recommended. (18 ref)—*R. D. Kahoe*.

12371. Cruickshank, Donald R.; Kennedy, John J. & Myers, Betty. (Ohio State U) **Perceived problems of**

**secondary school teachers.** *Journal of Educational Research*, 1974(Dec), Vol 68(4), 154-159.—Collected from a national sample of secondary school teachers, raw problems perceived by them. These problems served as the basis for a 105-problem checklist administered to a 2nd teacher sample for verification. This sample represented 10% of faculty members in 26 schools. 310 teachers returned the mailed checklist. Of the problems on the checklist, teachers indicated that 42 were bothersome, frequently occurring, or both. Teacher bothersomeness and frequency responses were factor-analyzed, resulting in 7 salient factors for the bothersomeness data (Efficiency, Support, Invigoration, Control, Inclusion, Nurturance, and Influencing) and 7 factors for the frequency data (Security, Remediation, Invigoration, Control, Satisfaction, Support, and Time). Findings indicate that, with respect to bothersomeness factors, Invigoration and Control possessed the greatest number of significantly bothersome specific problems. The findings suggest that particular human needs are exacerbated when the role of secondary teacher is assumed.—*Journal abstract*.

12372. Dawson, Patrick J.; Dawson, Karen E. & Forness, Steven R. (U California, Los Angeles) **Effect of video feedback on teacher behavior.** *Journal of Educational Research*, 1975(Jan), Vol 68(5), 197-201.—Employed undergraduate student-teachers as their own models in videotape sequences of classroom performance. In Exp I, 1 male and 1 female teacher of adolescent students were given video feedback of their teaching behavior in regard to 2 types of teacher "postures," the effect of which was to change their behavior in specific directions. Exp II, a replication with 3 female teachers, was conducted with elementary students and demonstrated that change in specific teacher behaviors appeared to produce changes in academic response rate in pupils. Results are discussed relative to teacher training.—*Journal abstract*.

12373. Fritzell, Christer. [The teacher's occupational functions: Evaluations of interview and critical incident material.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Nov), No 256, 81 p.—Presents questionnaire data on school-leaders' and teacher-trainers' evaluations of variables based on interviews and critical incident studies. The 2 sets of variables are evaluated according to 2 different criteria: the importance and the adequacy of present teacher education. Results are detailed with respect to factor analyses and evaluations of structural units by different subgroups. (15 ref)—*English summary*.

12374. Green, James A. & Gerard, Harold B. (U California, Los Angeles) **School desegregation and ethnic attitudes.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12375. Hall, Keith A. **CARE: Computer assisted renewal education.** *Viewpoints*, 1974(Jul), Vol 50(4), 65-79.—Describes a special program developed at Pennsylvania State University, comprised of a series of mobile computer assisted instruction courses for training teachers of handicapped children.

12376. Harbet, Shelia C. (Queensborough Community Coll) **Prevention through drug education: A behavioral**

**approach.** *Journal of School Health*, 1974(Apr), Vol 44(4), 221-222.—Describes workshops for elementary and secondary school teachers who wish to learn more about drug abuse. Methods and content of such workshops are discussed.

12377. **Heinrich, Hanns Ch.** [Assessment scales for expressions of positive and negative reinforcement by teachers.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 530-545.—Asked 560 boys and girls 9-14 yrs old to characterize the behavior of their home room teachers on a questionnaire consisting of 23 positive and 22 negative reinforcement statements. Factor analysis of the results yielded a final questionnaire of sufficient discriminatory power and reliability, consisting of 15 statements of each type. Both male and female teachers were considered severe more often by boys than by girls. Younger children found teachers' behavior more supportive than did older children. (English & French summaries)—*W. J. Koppitz*.

12378. **Holt, James.** Involving the users in school planning. *School Review*, 1974(Aug), Vol 82(4), 707-730.—Asserts that school planners need to maintain direct, continual involvement with the users of school facilities—the students, the teachers, and the citizens who must pay the bills.

12379. **Julian, Joseph & Layne, Phillip J.** (U Nebraska, Lincoln) Effectiveness and styles of leadership in black student programs. *Journal of Non-White Concerns in Personnel & Guidance*, 1975(Jan), Vol 3(2), 66-73.—Surveyed the directors of black student programs in 15 midwestern universities. The importance of adequate student financial support, tutorial assistance, and a democratic leadership style in program administrators is stressed.

12380. **Meyers, C. Edward; Yoshida, Roland K. & Genrich, Carol J.** (U Southern California) A symposium on some unheralded parameters of Piaget in the schools. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12381. **Nolen, Patricia.** (U Washington) Piaget and the school psychologist. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.—Considers that, despite their differences, the work of Piaget and of the school psychologist are in fundamental correspondence. A school psychologist's assessment of the learning problems of an elementary school child, examination of cognitive strategies, interpretation of intelligence and achievement test results, and planning of remediation are discussed from the point of view of Piagetian concepts.

12382. **Peterson, Richard E.** (Educational Testing Service, Berkeley, CA) Institutional goals and curriculum planning. *Findings*, 1974, Vol 1(2), 5-8.—Discusses institutional goals and curriculum planning at California state colleges. Of the 180 accredited institutions in

California, 116 distributed the Institutional Goals Inventory in the late spring of 1972. The 20 goal areas covered by this instrument were academic development, accountability/efficiency, advanced training, community, cultural awareness, democratic governance, freedom, humanism, personal development, innovation, intellectual environment, intellectual orientation, meeting local needs, off-campus learning, public service, research, social criticism, social egalitarianism, traditional religiousness, and vocational preparation. Chief areas of conflict among faculty, students, and trustees were individual personal development, social/political relevancy, and career preparation with students typically in conflict with the rest of the university community. Implications for student behavior are drawn.—*R. S. Albin*.

12383. **Pohlmann, John T.** (Southern Illinois U, Carbondale) A multivariate analysis of selected class characteristic and student ratings of instruction. *Multivariate Behavioral Research*, 1975(Jan), Vol 10(1), 81-91.—Administered the Instructional Improvement Questionnaire to more than 33,000 students at a single university to obtain ratings of the characteristics of 1,247 courses and determine the relationship between these characteristics and student ratings of the instructors. Results indicate that the class characteristics that had the strongest influence on the results of instructor ratings were the grades expected by students and the percentage of students in the class taking the course as an elective.—*Journal abstract*.

12384. **Qurik, Thomas J.; Trismen, Donald A.; Nalin, Katherine B. & Weinberg, Susan F.** (Principia Coll) The classroom behavior of teachers during compensatory reading instruction. *Journal of Educational Research*, 1975(Jan), Vol 68(5), 185-192.—Investigated the classroom behavior of 135 teachers in compensatory reading programs (Grades 2, 4, and 6) in 21 cities. A special observation instrument was designed to categorize teacher behavior during reading instruction, and reliability data are reported for the 46 Os (mostly teachers) who were trained to use this instrument. Each class was visited on 9 occasions for 15 min of coding during each visit. Data are reported in terms of the average amount of time spent in each mode and content activity across the teachers in these programs.—*Journal abstract*.

12385. **Robison, Helen; Jagoda, Eleanor & Blotner, Roberta.** (Bernard M. Baruch Coll, City U New York) Competency-based teacher training: Skinner vs. Piaget in classification. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12386. **Rodewald, H. Keith.** (Central Michigan U) Reply to Walsh's comments on Rodewald and Carroll. *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1254.—Considers inaccuracies in J. A. Walsh's (1974) comments on H. K. Rodewald and J. L. Carroll's (see PA, Vol 53:1952) project on scaling of students' attitudes toward their professors. A restatement of the scaling problem is made.



12387. Romine, Stephen. (U Colorado) **Student and faculty perceptions of an effective university instructional climate.** *Journal of Educational Research*, 1974(Dec), Vol 68(4), 139-143.—Sought to ascertain perceptions of an effective instructional climate through use of a 71-item questionnaire, administered to 1,237 students and 268 faculty members representing all levels of undergraduate and graduate students and faculty. Statistical analysis yielded a list of 40 significant attributes grouped into 7 clusters. Factor-loading values were derived for the attributes to facilitate utilization in describing and assessing instructional climate. Students and faculty agreed generally on a global concept of instructional climate and as to the significance of many individual attributes. Greater significance was attached to instructors and their teaching role than to students and their learning role. Practical uses of the results are suggested.—*Journal abstract*.

12388. Schafer, Paul J. (Saint Bonaventure U) **Critical thinking ability of teachers.** *Journal of Instructional Psychology*, 1974(Fal), Vol 1(4), 39-40.—Administered the Watson-Glaser Critical Thinking Appraisal to 200 teachers. Findings indicate that (a) female teachers demonstrated a higher level of critical thinking than male teachers; (b) suburban teachers showed a higher level of critical thinking than city teachers; (c) teachers who were graduated from a liberal arts college demonstrated a higher level of critical thinking than teachers graduated from a state college; and (d) teachers with various years of experience exhibited no significant difference in their ability to think critically. The 1st 3 differences were significant ( $p < .05$ ). There was no significant difference among the scores for teachers with various years of experience.—P. O'Brien.

12389. Shapiro, Stewart B. & Shiflett, John M. (U California, Santa Barbara) **Loss of connectedness during an elementary teacher training program.** *Journal of Educational Research*, 1974(Dec), Vol 68(4), 144-148.—Evaluated the impact of Gestalt awareness training as a component in a 1-yr preservice elementary teacher training program. Ss were 70 trainees. An unanticipated finding emerged when both experimental and control groups displayed a statistically significant decrease in "connectedness" (a general attitude of trust and positive affiliation with others). This major finding from D. T. Campbell's connectedness scale was subjected to a detailed statistical analysis and supplemented by intensive clinical interviews. Major alternative statistical and substantive hypotheses are explored utilizing the expanded data base, and possible implications for teacher training programs are considered. (27 ref)—*Journal abstract*.

12390. Smith, H. W. & Meyer, F. J. (Southwestern at Memphis) **Parent and teacher attitudes toward and knowledge of drug abuse.** *Journal of School Health*, 1974(Mar), Vol 44(3), 152-155.—Administered a questionnaire on knowledge about drugs and attitudes toward drug abuse to elementary school teachers, high school teachers, and parents in a southeastern urban area in order to provide information for the development of a drug education program in the public schools. Results indicate a general lack of accurate drug information among parents and teachers, suggesting that neither

group is qualified to provide drug information to students. Parental responses were generally more conservative than teacher responses, especially in areas of drug control and legalization. Although the majority of each group indicated a willingness to contribute to drug prevention efforts, the lack of accurate drug information and the initial reluctance to participate in the survey pose potential problems for an effective drug prevention program in the public schools.—A. de la Haba.

12391. Struck, Ursula. [Studies of the effectiveness and problems of preschool education in the United States.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(1), 36-48.—Discusses studies by J. McV. Hunt (1961) and B. S. Bloom (1964) in which concern with minorities is seen as vitally important to preschool programs. Also discussed are the evaluation of creativity, motivation, and emotional stability of pupils, and the effect of various kinds of teachers on individual children and on the permanence of educational gains. (41 ref)

12392. Wax, Douglas E. (U Michigan, Medical Ctr) **A collaborative-interactive model for mental health consultation: Teacher inservice education by psychiatric clinicians.** *Child Psychiatry & Human Development*, 1974(Win), Vol 5(2), 78-88.—Presents a consultation model, based on a didactic use of humanistic psychology, in which educator and clinician collaborate in seeking answers to questions raised by current examples from the teachers' classroom experience. Excerpts from a 4-yr program and data regarding effectiveness are given.—E. S. Goodman.

12393. Woods, Linda L. & Woods, Thomas L. (Chicago Public Schools, IL) **Substitute: A psychological study.** *Elementary School Journal*, 1974(Dec), Vol 75(3), 162-167.—Compares the reactions of pupils to a substitute teacher with that of children reacting to a step-parent. If the relationship between the regular teacher and the class was good, pupil reaction to the substitute should in a measure continue to be favorable. If the regular relationship was strained, pupils may compensate either by various forms of disorder or by excessive friendliness, openly comparing the regular teacher unfavorably with the substitute. The regular teacher may also have negative or positive feelings toward the class and toward the substitute. The substitute may in turn compensate for these varied responses. It is recommended that the substitute should receive training in performing her delicate task of interaction and adjustment. The school administrator should not consider the substitute as a "baby-sitter" but as a colleague.—A. J. Ter Keurst.

12394. Zwick, Mark L. (Dept of Mental Health, Stanislaus County, Modesto, CA) **Parent education groups.** *Social Work*, 1974(Nov), Vol 19(6), 729-731.—Contends that parental involvement is an essential ingredient of the educational process. Findings of a county program involving groups of teachers, administrators, and parents are presented to support the contention.

#### Curriculum Development & Teaching Methods

12395. American Psychological Assn, Div on the Teaching of Psychology. (Washington, DC) **Teaching of psychology newsletter: 1965-1974. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 107-108.

12396. **Ariel, Abraham.** (California State U, Los Angeles) **Piaget, behavior modification and the adolescent with learning disabilities.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12397. **Ažman, Jože.** [Why students learn particular subjects.] (Sloe) *Anthropos*, 1972, No 3-4, 71-74.—Studied reasons why Slovenian high school students learned various subjects. Multiple-choice questions offered 3 alternative answers: (a) "for life," (b) "for the grade," and (c) "because I must." Ss were 101 male and 119 female 11th grade students. Results show that 2 languages, Slovenian and English (but not French and German) were the most popular subjects while history, national defense, and mathematics were the least popular. Female students preferred languages, male students preferred the mathematical sciences. A detailed list of reasons why students like or dislike various subjects is given. Implications for educational practices are discussed.—S. Slak.

12398. **Baker, L. J.** (U Dublin, Trinity Coll, Ireland) **Comparison of a lecture course with a Keller course in introductory psychology for university freshmen.** *Irish Journal of Psychology*, 1974(Win), Vol 2(3), 183-201.—47 undergraduates enrolled in a general studies school for psychology were matched into pairs on the first quiz of an F. Keller (1966) course. Half continued in the Keller course and the other half received lectures for the course. The Keller or quiz course students were found to be superior in performance on a number of measures: attendance, laboratory reports, preference for examination, quiz, or essay, and a posttest quiz. There was no difference in performance by the 2 groups on the posttest essay or the final examination essay. The question is raised of whether previous studies reporting improvement in student essay examinations can be assumed to have shown that such procedures will improve essay performance in the traditional European essay writing examination as opposed to the rather different American essay examination. It is suggested that Keller courses in the British Isles should be planned to strengthen this particular behavior in students subjected to the European tradition of university examination. (40 ref)—*Journal abstract*.

12399. **Barr, Rebecca A.** (U Chicago, Reading Clinic) **Instructional pace differences and their effect on reading acquisition.** *Reading Research Quarterly*, 1973-1974, Vol 9(4), 526-554.—Explored the influence of homogeneous and differential pacing of classes on basal word learning and mastery, and the effect of basal word learning on general reading achievement. In one investigation, 19 pupils paced homogeneously were compared with 20 paced differentially; in another, 45 pupils from 4 classes that differed in differential pacing were compared. Ss were classified in terms of aptitude, and multivariate analysis was used to test the effects of various levels of pace on Ss' word learning. In classes that were differentially paced at relatively high rates, mean level of word learning and variance were higher than in classes differentially paced at slow rates or for

those homogeneously paced. Generally, a faster rather than a slower pace facilitated learning and mastery of a sight vocabulary for most high-aptitude and some average pupils. All low-aptitude pupils were paced slowly; their word learning and mastery tended to be lower than that of other children. For students paced differentially, basal words learned during 1st grade accounted for a considerable portion of the variance of word recognition measured at the end of 1st grade and of vocabulary and comprehension measured at the end of 2nd grade. Although the trends were the same for pupils paced homogeneously, the percentage of shared variation was considerably less. (French & Spanish summaries)—*Journal abstract*.

12400. **Bearison, David J.** (Graduate School & University Ctr, City U New York) **Is "school achievement" enhanced by teaching children operational concepts?** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12401. **Bengis, Laraine.** (City Coll, City U New York) **The degree of persuasibility among open classroom children and traditional classroom children: A comparative study.** *Graduate Research in Education & Related Disciplines*, 1974(Spring-Summer), Vol 7(2), 53-76.—Tested the hypothesis that children who have experienced 3 yrs of open classroom schooling will be less persuasible than comparable groups of children who have experienced 3 yrs of traditional schooling. Abelson and Lesser's Persuasibility Booklet was administered to 56 3rd-grade students from 2 New York City schools, 30 from a traditional classroom and 26 from an open classroom. Persuasibility was scored as the number of agreements between the communicator and the child. The  $t$  value was significant ( $p < .01$ ), thus supporting the hypothesis. It is concluded that children from open classrooms seem to be more autonomous and more independent in their thinking than traditionally-taught students. (16 ref)—C. Tatham.

12402. **Birk, Janice M. et al.** (U Maryland) **A content analysis of sexual bias in commonly used psychology textbooks.** *Catalog of Selected Documents in Psychology*, 1974(Fall), Vol 4, 107.

12403. **Biskin, Donald & Hoskisson, Kenneth.** (Virginia Polytechnic Inst & State U) **Moral development through children's literature.** *Elementary School Journal*, 1974(Dec), Vol 75(3), 153-157.—Presents L. Kohlberg's stages of moral thinking as a basis for selecting children's literature for moral education. These stages are as follows: (a) The child confuses obligation with his own desires. (b) His obligation is the result of external coercion. (c) His obligation is to satisfy his own needs to the exclusion of the needs of others. (d) He feels obligated to be "good and nice" as a result of social expectation. (e) Obligation and responsibility are linked to maintain social order. (f) The child feels an obligation to personal values as well as to societally determined rules. (g) Moral judgments concerning a personal obligation are based on a universal moral right. Children's literature has an enormous potential to develop



moral structures. As the development in moral thinking differs little from the development of cognitive thinking, the school's program should be based on developmental stages, regardless of the culture or social background of the children.—A. J. Ter Keurst.

12404. Bleil, Gordon B. (Edmark Assoc, Bellevue, WA) **Evaluating educational materials.** *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 12-19.—Offers methods for individual teachers to use in selecting and evaluating educational materials. Good and bad things to look for subjectively are specified and techniques of objective evaluation are suggested. The need for standards of accountability is stressed.

12405. Boseman, F. Glenn & Schellenberger, Robert E. (Temple U) **Business gaming: An empirical appraisal.** *Simulation & Games*, 1974(Dec), Vol 5(4), 383-402.—Examines the perceptions and attitudes of students toward management games as a teaching aid and tests actual learning attainment in business policy courses.

12406. Broughton, Sam F. (U Georgia) **The unwitting behavior modifier.** *Elementary School Journal*, 1974(Dec), Vol 75(3), 143-151.—Suggests that many teachers develop control over unmanageable pupils through conditioning processes which they use unconsciously. They overlook the conditioning mechanisms which are continually found to some degree in all behavior of all learning organisms. Positive reinforcement, punishment, vicarious consequences, and extinction are discussed. Teachers are constantly conditioning their pupils, who in turn condition their teachers. Few individuals have such a catholic view of their own behavior that they are aware of their own conditioning patterns and how they are conditioned by others. Several studies illustrate the results of the conditioning processes among pupils. (20 ref)—A. J. Ter Keurst.

12407. Caliguri, Joseph P. (U Missouri, Kansas City) **Traditional and emerging policy issues for staff development with particular implications in drug education.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 331-336.—Presents an overview of policy issues regarding staff development programs and incentives to increase motivation and productivity in educational programs. Issues related to governance and accountability are also discussed.

12408. Chistyakova, G. D. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of General & Pedagogical Psychology, Moscow) **[A psychological study of the content structure of a text in relation to the problem of comprehension.]** (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 115-127.—Studied the relationship between the structure of educational texts and their comprehensibility. Popular scientific texts in 3 areas were analyzed and their denotative structures diagrammed. Comprehension was studied by comparing the accuracy of Ss' reports on their readings with the original text as a function of the number of perusals and the particular denotative structure of the text. Depth of comprehension was specific by referring it to hierarchical levels of the text structure. It is argued that a text reflects the object relations of reality, and these may serve as a measure of the reader's ability to comprehend the text. (English summary)—L. Zusne.

12409. Christopher, G. Ronald. **An administrative perspective on computer assisted instruction.** *Viewpoints*, 1974(Jul), Vol 50(4), 53-63.—Presents objective data, subjective conclusions, and personal reactions regarding computer assisted instruction at Ohio State University.

12410. Clark, Alice T. (U North Dakota) **Follow-up on follow through.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 234-238.—Describes a technique to evaluate a local Follow Through project by the people involved with it. Subjective judgments were collected and systematically organized through the use of a paired-comparison inventory requiring 58 professional and parent participants to make 120 paired comparisons on 16 traits identified as most characteristic of the Follow Through program. The 2 most valued characteristics of the program were "classroom aides" and "individualized instruction in small groups." The 2 least valued characteristics were "parent involvement" and "parent coordinators." Implications for local Follow Through program, the National Follow Through office, and the non-Follow-Through classrooms in the schools are noted.—*Journal abstract.*

12411. Cohen, Stuart J. & Hillman, Stephen B. (U Toledo) **The effects of behavioral objectives on the achievement of students knowledgeable about the use of objectives.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 136.

12412. Collins, J. K.; Francis, R. D. & Cassel, A. J. (Macquarie U, North Ryde, NSW, Australia) **The teaching and assessment of introductory psychology at Macquarie University: History and self appraisal.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 35-43.—Evaluated an introductory course in psychology. Assessment was of 2 types: (a) examination of 268 students and (b) evaluation by the students. Students were given a pre- and post-course multiple-choice objective test. All items were from C. T. Morgan and R. A. King's "Objective Questions for Introduction to Psychology" (1971). Students rated their lectures, using a 7-point scale, for rated content, delivery, perceived interest, speed of presentation, and level of presentation. The findings indicate a need to improve introductory psychology courses in universities.—J. C. Figurelli.

12413. Crutchfield, Marjorie A. (Loyola-Marymount U) **Conservation training and school readiness.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12414. Dennison, Paul E. **Reading programs are means—not ends.** *Reading Teacher*, 1974(Oct), Vol 28(1), 10-12.—Challenges the idea that reading is merely a process of decoding an objective message existing outside of the reader. This attitude does injustice to the reader and to what he reads. It fails to recognize that reading is a part of the language acquisition process, and therefore an inherently subjective activity. Real reading must be an experience, not just an exercise. Coordinators, directors, administrators, and teachers of reading must remember that the "end" is the growing child. His self-concept as a worthwhile human being, capable of

solving problems, finding order in chaos, and teaching himself, is all that a teacher can really give him.—P. D. Leedy.

12415. Durkin, Dolores. (U Illinois) **Some questions about questionable instructional materials: I. Reading Teacher**, 1974(Oct), Vol 28(1), 13-17.—Conducted a 6-yr study that revealed 2 clear and persistent features of classroom instruction: (a) Teachers were spending time on unnecessary and even erroneous instruction. (b) Such instruction was often the result of an unquestioning use of basal reader manuals and workbooks. Mistakes in teaching children to read that stem from the materials given the children are pointed out.—P. D. Leedy.

12416. Evans, David R.; Hearn, Margaret T. & Zwirner, Walter W. (U Western Ontario, London, Canada) **Need achievement training with grade-nine students. Canadian Journal of Behavioural Science**, 1975(Jan), Vol 7(1), 54-59.—To examine the effect of achievement motivation training on academic achievement, 81 students were given a 15-wk need achievement training course as part of their regular curriculum during the 1st semester of Grade 9. They were compared with 108 Grade-9 students in another school who did not receive the course. The difference in mean change in language arts and science was not significant, while the mean change in need achievement, mathematics, social studies, and academic average was significant and in the predicted direction. (French summary)—*Journal abstract*.

12417. Faust, Gerald W. **Design strategy and the TICCIT system. Viewpoints**, 1974(Jul), Vol 50(4), 91-101.—Discusses the design science approach to educational innovation, particularly in the area of computer assisted instruction, and describes currently produced courseware design strategies.

12418. Frederick, Franz J. **PLANIT: A "machine-independent" CAI language and system. Viewpoints**, 1974(Jul), Vol 50(4), 81-90.—Describes the ICU/PLANIT system, a computer assisted instruction language and system designed to be relatively machine independent. Configuration and implementation details and basic costs are specified.

12419. Gheorghiu, Alexandru & Cretu, Virginia. **[Efficiency of the teaching process when integrated with school television broadcasts.] (Fren) Revue de Pedagogie**, 1973, No 7, 84-96.—420 3rd-yr lyceum students in human anatomy and physiology classes were tested for proficiency in the subject matter, first under traditional teaching conditions, then when the teaching was supplemented by the use of TV. 3 levels of course objectives were defined: knowledge of facts (Ca), generalization to and correlation with already known concepts (Cb), and application to concrete situations (Cc). After traditional teaching, 22% of the Ca objectives, 9% of the Cb objectives, and 3% of the Cc objectives were met. A pretest of the students' knowledge of the material to be taught with TV revealed that 18% of the Ca, 25% of the Cb, and 15% of the Cc objectives were already met. After TV lessons, which maximized illustrations and applications, were added to the regular teaching, 80% of the Ca, 50% of the Cb, and 62% of the Cc objectives were met. Gains in motivation and

performance quality were also noted. (English summary)—L. R. Johnson.

12420. Goldstein, Bobbye S. (PS 9, Manhattan, NY) **What's cooking in the reading program? Reading Teacher**, 1974(Oct), Vol 28(1), 22-25.—Describes how a reading specialist at a public school in New York City maintains a reading resource room and skills center and has developed creative readers through the use of cookbooks which the children illustrate.

12421. Gorelick, Molly C. (California State U, Northridge) **A classification of concept representations. In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.**

12422. Hambleton, Ronald K.; Rovinelli, Richard; Sheehan, Daniel & Newby, John. (U Massachusetts) **A comparative study of middle school students in different instructional programs. Catalog of Selected Documents in Psychology**, 1975(Win), Vol 5, 199-200.

12423. Hansson, Göran. **[Creativity in school: A project survey.] (Swed) Pedagogisk Dokumentation**, 1974(Dec), No 33, 20 p.—Summarizes a recently completed research project which included development and trial of Swedish tests for creativity, studies of relations between these tests and various personality variables, surveys of opinions about how to promote creativity in schools, classroom observations on creativity-relevant teacher-student interactions, and attempts to construct and evaluate potentially creativity-promoting study materials integrated with regular school work. General conclusions and recommendations for future developments are sketched.—*English summary*.

12424. Harshbarger, Thad R. (City College, City U New York) **Easy numbers for statistics homework and examination problems. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 109.

12425. Johnson, Margo & Daniel, Robert S. (American Psychological Assn, Washington, DC) **Comprehensive annotated bibliography on the teaching of psychology at the undergraduate level through 1972. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 108.

12426. Judd, Wilson A.; O'Neil, Harold F. & Spelt, Philip F. (U Texas, Computer-Assisted Instruction Lab, Austin) **Individual differences and learner control: I. Program development and investigation of control over mnemonics in computer-assisted instruction. Catalog of Selected Documents in Psychology**, 1975(Win), Vol 5, 204.

12427. Judd, Wilson A.; O'Neil, Harold F. & Spelt, Philip F. (U Texas, Computer-Assisted Instruction Lab, Austin) **Individual differences and learner control: II. Investigation of control over pictorial mediators in computer-assisted instruction. Catalog of Selected Documents in Psychology**, 1975(Win), Vol 5, 204-205.

12428. Kapes, Jerome T. & Strickler, Robert E. (Lehigh U, School of Education) **A longitudinal study of change in work values between ninth and twelfth grades as related to high school curriculum. Journal of Vocational Behavior**, 1975(Feb), Vol 6(1), 81-93.—Hypothesized that important changes in work values occur between 9th and 12th grades and that these changes



differ depending on the students' high school curriculum. The Occupational Values Inventory (OVI), an ipsative instrument with a forced choice format containing work value statements with a 7th-grade reading level, was readministered to 659 high school seniors who had taken the OVI 3 yrs previously when they were in 9th grade. Results indicate that 5 of the 7 OVI values did change over the 3-yr period and at least some of this change appeared to be related to the students' high school curriculum. Other important findings are that (a) the "Salary" value experienced the greatest increase; (b) value intensity changed so that strong values grew stronger and weak values weaker; and (c) the Home Economics curriculum, which was totally female, experienced almost no change in work values while all other curriculums changed on at least 3 values. (29 ref) —*Journal abstract.*

12429. Kappelman, Murray et al. (U Maryland, Medical School, Baltimore) **A unique school health program in a school for pregnant teenagers.** *Journal of School Health*, 1974(Jun), Vol 44(6), 303-306.—Describes a special school system for the pregnant teenager and outlines a new and unique school health program developed specifically for use within this system. Program results are discussed and recommendations are made for improvements in the approach.

12430. Kerin, Roger; Harvey, Michael & Crandall, N. Frederick. (Southern Methodist U) **Student course selection in a non-requirement program: An exploratory study.** *Journal of Educational Research*, 1975(Jan), Vol 68(5), 175-177.—Administered a questionnaire to 100 business school university undergraduates to investigate the decision process of course selection in a nonrequirement program in which the student was primarily responsible for program planning. It was hoped that findings would (a) serve as a diagnostic tool for administrators evaluating the merits of nonrequirement programs and (b) serve a pragmatic purpose for administrators as a source of data from which predictions of success or failure of nonrequirement systems could be made. Results show that major considerations in course selections were personal interest in the area, course content, compatibility with major field, and instructor. Major information sources used by Ss were friends, catalog descriptions, and faculty members (other than advisors). Therefore, both informal and formal information sources were explored by students.—*Journal abstract.*

12431. Kingsley, Edward H. & Stelzer, John. (Human Resources Research Organization, Alexandria, VA) **A theoretical basis for individualized instruction.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 203.

12432. Kirkwood, J. M. (U Lancaster, England) **Analysing the linguistic and cultural content of foreign language text-books: An application of variety theory.** *IRAL: International Review of Applied Linguistics in Language Teaching*, 1973(Nov), Vol 11(4), 369-385.—Analyzes 2 texts on English as a foreign language from the point of view of the number and realism of different speaker roles and of the sociolinguistic contexts presented.

12433. Knowles, Lyle. (Pepperdine U) **The traditional and tutorial classrooms compared: Academic performance among undergraduate students in basic statistics courses.** *Journal of Instructional Psychology*, 1974(Fal), Vol 1(4), 18-25.—Investigated empirically measured differences in academic performance of 117 undergraduate statistics students by comparing achievement in 2 traditional classroom modes and the new weekend tutorial mode. All classes were conducted in identical ways except for differences in time frame. Background data are examined among the groups, as well as scores on 9 performance variables. Results show that, except for initial "slow start," the weekend tutorial mode students, who were older and full-time employed, performed as well as younger, part-time employed students who attended class sessions in the traditional 2 mornings/wk mode. Performance was highest in the 1 evening/wk mode among older, full-time employed students who were enrolled in fewer academic units for the school term.—*Journal abstract.*

12434. Kobayashi, Yukiko. (Tokyo U of Education, Japan) **[Effects of teacher's question on the learning of prose material.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 120-125.—Describes how children's learning is affected by the timing and frequency of questioning, by the amount of information included in the questions, and by pupils' knowledge of the results. Other factors discussed include reinforcement, the teacher-pupil relationship, and the structure of teaching materials.—*S. Choe.*

12435. Komachiya, Megumi. (Komatsugawa High School, Japan) **[On the training of oral summarization of English reading materials by the direct method.]** (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 91-99.—Asked 87 Japanese high school students in 3 groups to read and summarize a story written in English. Measures of useful communication unit, useless communication unit, summarization judgment, and the number of words were compared with posttraining measures of the same variables. During the training period Experimental Group 1 was asked to summarize the story following a model summary given by E. Experimental Group 2 was asked to answer orally questions which covered the same information contained in the model given to Group 1. Results show that the method of questions and answers was most effective for acquisition of oral communication skills. (English summary)—*S. Choe.*

12436. Kurtz, P. D. (Pennsylvania State U) **The effect of instructional objectives on student learning.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 327-333.—Examined the effect of student knowledge of instructional objectives on learning from written material. 140 Grade-6 Ss were randomly assigned to either a group which was given practice in objectives or one which was given no practice in objectives. After 3 practice sessions, all Ss were given a 1,500-word prose passage to read. Prior to reading the passage, Ss received 1 of the 3 orienting stimuli: (a) application objective, (b) recall objective, and (c) directional statement. Using analysis of covariance to compare groups, results indicate that the type of instructional objective did not facilitate application, recall, or incidental learning.

Practice in the use of instructional objectives had a significantly negative effect on immediate and delayed incidental learning. Findings suggest that knowledge of an objective prior to instruction does not stimulate learning.—*Journal abstract.*

12437. Langer, Philip. (U Colorado, School of Education) **Phase II: A modularized/individualized secondary educational psychology program.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 135-136.

12438. Lewis, John & Adank, Richard. (Winona State Coll) **Mastery or trial-and-error learning in an individualized program.** *Journal of Instructional Psychology*, 1974(Fal), Vol 1(4), 26-27.—Conducted an investigation to determine if 300 elementary school pupils in an individualized program were reacting to learning unit mastery tests in a trial and error manner. A tabulation was made of the frequency of passing and failing on mastery tests which were given at the end of each learning unit for pupils in grades 1 through 6 at a school in which the Westinghouse PLAN method of individualized instruction was used. 80% of all mastery tests were passed on the 1st trial, and those failed on the 1st effort were usually passed on the 2nd. Significant differences appeared among grade levels ( $p < .001$ ) and subject areas ( $p = .001$ ).—*Journal abstract.*

12439. Lindell, Ebbe. [Two research projects on language education: A review.] (Swed) *Pedagogisk Dokumentation*, 1974(Nov), No 30, 15 p.—Summarizes language-education projects which have (a) mapped instructional goals and constructed tests in connection with them, (b) used the tests to make the goals explicit for teachers and students, (c) used the measures as pretests to make individualization possible, (d) attempted measures for such individualization, (e) investigated students' work during the studies, and (f) experimentally tried different contents and methods. Problems concerning the planning of university education are discussed. (41 ref)—*English summary.*

12440. Lowe, A. J. & Follman, John. (U South Florida, Coll of Education) **Comparison of the Dolch List with other word lists.** *Reading Teacher*, 1974(Oct), Vol 28(1), 40-44.—Attempted to determine the rankings of the 1st 150 Dolch words in 4 other ranked word lists and 3 word list studies of basal readers. The hypothesis that the 1st 150 words of the Dolch List would be useful at any teaching level (kindergarten through adult) was confirmed by statistical tests.—*P. D. Leedy.*

12441. Lucas, Ann F. (Fairleigh Dickinson U) **Educational implications of Piaget's theory: Montessori a viable option.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12442. Lutz, John. (East Carolina U) **Some comments on psycholinguistic research and education.** *Reading Teacher*, 1974(Oct), Vol 28(1), 36-39.—Oversimplified language in primers seems to be the result of the fallacious notion that reading development must recapitulate speech or general language development. It is contended that reading is an outgrowth of language, and

therefore reading development need not return to the original developmental level of general language ability. The child should be allowed to use the language structures which he already knows.—*P. D. Leedy.*

12443. Margolis, Joseph A. (Brooklyn Coll, City U New York) **An experimental lesson in drug education.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 327-330.—Describes a method of making drug education more relevant for today's high school and college student through the use of an experimental lesson on drug taking. The lesson examines the reasons and motivations for drug taking in a setting that is close to reality. It describes a methodology for stimulating student interest in an area where young people may feel they have exhausted much of the drug education information available to them.—*Journal abstract.*

12444. McCracken, Robert A. (Western Washington State Coll) **A comparative study of modalities in beginning reading instruction.** *Reading Teacher*, 1974(Oct), Vol 28(1), 6-9.—Attempted to determine if children who were taught using the sapiditory modality learned more effectively when the modality was used alone or in combination with auditory, visual, and kinesthetic modalities. All Ss were kindergarten and 1st-grade children from families with incomes below the poverty level. All learned equally well under each of the 4 modalities.—*P. D. Leedy.*

12445. McLaughlin, T. F. & Malaby, J. E. (U Kansas) **Set of procedures to improve accuracy of performance and decrease time to complete mathematics problems.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1092.—2 experiments show that 6th graders increased their accuracy of performance, maintained perfect or near perfect scores, and decreased the amount of time to complete mathematics problems when given token reinforcement points for doing so. When given points for poor performance and more time to complete the problems, Ss' performance decreased and the time to complete the problems increased.

12446. McLaughlin, T. F. & Malaby, J. E. (U Kansas) **Note on combined and separate effects of token reinforcement and response cost on completing assignments.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1132.—A study of a combination 5th- and 6th-grade class indicates that approximately 100% of the class completed their work each time token reinforcement and response cost procedures were both in effect. When each procedure was used alone, the percent of assignments completed decreased.

12447. McLaughlin, T. F. (U Kansas) **A review of applications of group-contingency procedures used in behavior modification in the regular classroom: Some recommendations for school personnel.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1299-1303.—Reviews selected studies on the use of group contingencies in regular school classroom research. A comparison between the effectiveness of group and individual contingencies and the positive and negative features of group contingencies is presented. Recommendations for the school practitioner are included.—*Journal abstract.*

12448. Melching, William H. **Qualitative review of terminal objectives in reading.** *HumRRO Professional Paper*, 1974(Nov), No 21-74, 8 p.—Describes an attempt



to apply a specially developed classification system to a set of terminal objectives in reading. The classification system contained 5 factors, of 3 levels each. Some 312 terminal objectives (and 766 approximations) were classified by 3 raters. Agreement among raters was sketchy at the start of the rating but improved dramatically with practice. It is concluded that (a) classifying objectives is a useful procedure by which to evaluate their communicability, (b) the verb is probably the most important aspect of an objective, and (c) reading objectives are no more difficult to classify than are objectives in other instructional content areas.—*Journal abstract.*

12449. Michaels, James W. **Classroom reward structures and academic performance.** *Center for Social Organization of Schools, Johns Hopkins University*, 1974(Dec), No 186, 38 p.—Discusses the general shortcomings of the traditional classroom reward structure in light of performance-reward principles of demonstrable effectiveness. 4 alternative general reward structures are analyzed and studies comparing their effectiveness are reviewed. Although none of the reward structures was found to be consistently superior in terms of strengthening academic performance, group reward structures were consistently superior to individual reward structures in strengthening several intra-group processes. Although the appropriateness of a particular general reward structure may vary from one case to another according to resources and goals, effectiveness is apparently strongly affected by the particular operationalization of the general reward structure. (28 ref) —*Journal abstract.*

12450. Morrell, James E. et al. (Centennial Public School District, Warminster, PA) **Cognitive and affective effects of audio-programed electronic feedback and oral teacher feedback.** *AV Communication Review*, 1974(Fal), Vol 22(3), 303-315.—2 groups of 5th graders received daily instruction in a science unit followed by a summary, review, and reinforcement session conducted either by a teacher or via audiotape. 85 teacher-directed Ss were asked to respond to questions orally while 53 Ss using the tapes responded to questions in a multiple-choice format by pressing one of 3 keys on the tape machines. There were no differences between the 2 groups in achievement nor in anxiety or defensiveness (as measured by the Test Anxiety Scale for Children and the Defensiveness Scale for Children). Boys consistently achieved higher scores than girls. Differences were also found between high-ability and low-ability groups.—*D. E. Anderson.*

12451. Myers, Eddie E. (Educational Research Council of America, Cleveland, OH) **The effects of a drug education curriculum based on a causal approach to human behavior.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 309-316.—Used a pretest-posttest design to measure the effects of a senior high school drug education curriculum. Content and activities were directed toward education in human behavior and potential, in general, as well as specifically applied to drug use and abuse. Data from 1,031 treatment Ss demonstrate positive effects upon student drug knowledge, behavior knowledge, and developmental attitudes when compared to 624 control Ss.—*Journal abstract.*

12452. New York State Coalition for Family Planning, Sex Education Task Force, College Subcommittee. **Position paper: Human sexuality programs on the college campus.** *Journal of School Health*, 1974(Mar), Vol 44(3), 126-129.—Discusses the importance of implementing programs in sexuality on college campuses. In accepting their responsibility to educate the whole person colleges cannot ignore the concept of sexuality, a crucial developmental issue during college years. A comprehensive program must include areas other than sex education (e.g., counseling services, health and medical services, and student personnel services). Examples of programs in each of these areas are included. The need to evaluate the effectiveness of any program implemented is emphasized.—*F. L. Beyer.*

12453. Newman, Arthur J. (U Florida) **On the desirability of conditioning for world peace.** *Elementary School Journal*, 1974(Dec), Vol 75(3), 138-142.—Discusses whether childhood indoctrination is compatible with the democratic ethic. It is not if the indoctrination process induces agreement by irrational means disguised to seem reasonable. Children's acceptance of war illustrates the conditioning process that incorporates irrational indoctrination.

12454. Nilsson, Bengt. [Sentence elements and sentence structure in the teaching of German: A comparison between German newspaper text (Bildzeitung) and Swedish textbooks in German.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Jun), No 242, 112 p.—Examines the way in which sentence elements are constructed (word-class structure) and analyzes the contents of Swedish textbooks. The text in 6 issues of the German daily newspaper *Bildzeitung* is studied. Pedagogical recommendations are made on the basis of the results, and models for an alphabetic and a frequency word-list based on the text from *Bildzeitung* are presented. (46 ref)—*English summary.*

12455. Novak, Mark W. (U Winnipeg, Quebec, Canada) **Living and learning in the free school.** *Interchange*, 1974, Vol 5(2), 1-10.—Examines the problems that arose at 1 free school as staff members tried to define their pedagogy, their curriculum, and their organization. The teachers used a special vocabulary of motives that emphasized members' involvement or noninvolvement in activities. Involvement was viewed as the major criterion for evaluation. Success was expressed in terms such as social solidarity and gregariousness; reclusivity and nonparticipation in activities were viewed as indications of failure.—*H. E. Yuker.*

12456. O'Rourke, Thomas W. & Barr, Sanford L. (U Illinois) **Assessment of the effectiveness of the N.Y. State Drug Curriculum Guide with respect to drug attitudes.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 347-356.—Assessed the effectiveness of the revised edition of the *New York State Curriculum Guide* with respect to the affective domain dealing with the drug topic. Drug attitude test score comparisons were made between 234 high school students who received the Curriculum Guide program and 199 comparable students receiving a traditional program. Results show a significantly higher score for the experimental group. However, closer analysis revealed that the program

seemed to be effective for males but not females.—*Journal abstract.*

12457. Panepinto, Joseph. (Ctr on Alcoholism & Drug Abuse, Morgantown, WV) **Drug abuse prevention: Real or unreal?** In *Selected papers delivered at The Ninth Annual West Virginia School on Alcohol and Drug Abuse Studies, June 17-22, 1973*. Morgantown, WV: West Virginia University, 1973. 165 p.—Considers that drug-abuse prevention is possible and is contingent on the ability to develop relevant methods of preventive education, preventive treatment, and preventive rehabilitation. Specific suggestions for educational programs—from infant-parent levels through elementary and high schools to college curricula—are offered.

12458. Pikulski, John J. (U Delaware, Reading Study Ctr) **Criterion referenced measures for clinical evaluations.** *Reading World*, 1974(Dec), Vol 14(2), 116-128.—Urges that criterion-referenced measurement should be an essential activity, particularly in clinical reading programs. These measures are simply ways of determining whether goals have or have not been met. (17 ref)

12459. Rabinowitz, Herbert S. & Zimmerli, William H. (United Way of Buffalo & Erie County, Community Services Group, NY) **Effects of a health education program on junior high school students' knowledge, attitudes, and behavior concerning tobacco use.** *Journal of School Health*, 1974(Jun), Vol 44(6), 324-330.—Administered a 58-item questionnaire concerning health knowledge, attitudes, and behavior to pupils from 36 randomly selected classes in Grades 7 through 9 from five rural and urban school districts. Half the Ss received classes in health care while the other half did not. Results show that in only 2 groups was a significant difference obtained between the instructed and noninstructed groups. Significant differences in attitudes toward health but not in behavior also were demonstrated. Implications for smoking behavior are drawn. Suggestions for other ways of improving health knowledge and attitudes are presented. (25 ref)—R. S. Albin.

12460. Read, Donald A. (Worcester State Coll) **The come alive classroom: Personal approaches to good teaching in health.** *Journal of School Health*, 1974(Apr), Vol 44(4), 225-227.—Describes the "values clarification" approach to teaching used at Worcester State College. This humanistic approach to teaching utilizes processes of prizing, choosing, and acting which lead to the development of affective responses. Human relations training and transactional analysis are also included.

12461. Richardson, William M. **Research and implementation of CAI in elementary and secondary schools.** *Viewpoints*, 1974(Jul), Vol 50(4), 39-51.—Presents the results of 3 programs of Computer Assisted Instruction (CAI), carried on as part of a county project. The high school study, involving 137 students, indicated that it was possible, with computer support, to provide an individualized program in geometry for greater numbers of students per class with no significant differences in achievement. In the secondary school study, involving 58 matched pairs of students, individualized computer-based programs produced significantly greater achievement gains in arithmetic than traditional classroom drill. The 3rd study showed that 10 mentally retarded high school students benefited significantly

from a CAI arithmetic diagnostic and drill program developed for the regular school population.—G. Lowe.

12462. Rix, K. J. (U Aberdeen, Scotland) **Evening classes on alcoholism: An experiment in alcoholism education.** *British Journal of Addiction*, 1974(Mar), Vol 69(1), 33-34.—Describes an experiment in educating the general public about alcoholism through a series of 5 evening classes, conducted weekly by the Aberdeen (Scotland) and District Council on Alcoholism. Average attendance was 35. Evaluation of the lectures and suggestions for other courses, obtained by questionnaire from some of those attending, are reported. It is concluded that such classes can reach both laymen and professionals and that media involvement can heighten the effect of such classes. Objective measurement of the results of such alcoholism education is needed.—A. P. Balevre.

12463. Robertson, Douglas J. & Trepper, Terry S. (California State U, Northridge) **The effects of I.T.A. on the reading achievement of Mexican-American children.** *Reading World*, 1974(Dec), Vol 14(2), 132-139.—52 Mexican-American bilingual 4th graders, 26 who were initially instructed via the Initial Teaching Alphabet (ITA) and 26 who were taught using traditional orthography, were tested on a variety of reading achievement tests. ITA Ss scored significantly higher than the traditional group on all tests, including their reading grade level. Some reasons for the success of ITA with Mexican-American children are given.—*Journal abstract.*

12464. Shapiro, S. I. & Talone, James M. (U Hawaii) **Teaching resources for humanistic psychology.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 108.

12465. Shapiro, S. I. (U Hawaii) **Teaching the psychology of death: Fictional and nonfictional resources.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 108-109.

12466. Singer, Harry; Samuels, S. Jay & Spiroff, Jean. (U California, Reading & Language Development Committee, Riverside) **The effect of pictures and contextual conditions on learning responses to printed words.** *Reading Research Quarterly*, 1973-1974, Vol 9(4), 555-567.—Studied the effect of presenting 4 printed words in 4 different ways on the acquisition of reading responses by 164 1st and 2nd graders. The printed word was presented alone, in association with a picture, embedded in a sentence, or in a combination of sentence plus a picture. This procedure attempted to resolve the seeming conflict between Samuels's focal attention theory and Goodman's findings that presenting words in a context helped children to identify the words. The focal attention theory contends that picture and context cues deter acquisition of reading responses because they enable the child to identify the word in practice without focusing on its graphic features. Comparing both theories on trials to a criterion and on correct responses on test trials, the Ss scored best on word alone, next on word plus picture, third on word plus sentence, and worst on word plus sentence and picture. Results are seen as supporting Samuels's theory. (French & Spanish summaries)—*Journal abstract.*



12467. Snow, David L. & Brooks, Robert B. (Yale U, Medical School) **Behavior modification techniques in the school setting.** *Journal of School Health*, 1974(Apr), Vol 44(4), 198-205.—Reviews specific behavior modification techniques and aspects of the theory and procedures involved in this approach. Initial considerations include designation of the behaviors that need to be modified, obtaining a baseline measure of that behavior, and developing an appropriate intervention program. A schedule of the reinforcement needed to change behavior, and ways of increasing appropriate and decreasing inappropriate behavior, must be derived. Social reinforcement, tangible reinforcement, and token reinforcement are discussed. Time out from positive reinforcement and punishment are cited with regard to their effectiveness in changing behavior. Modeling is described as a process in which more appropriate behavior is learned through observation of significant others. (55 ref)—R. S. Albin.

12468. Sommer, Robert & Becker, Franklin. (U California, Davis) **Learning outside the classroom.** *School Review*, 1974(Aug), Vol 82(4), 601-607.—Asserts that a multiple approach to teaching-learning is necessary, in which teachers creatively integrate experiences from the field, the classroom, and the library.

12469. Stolurow, Lawrence M. **Suggestions for CAI curriculum development.** *Viewpoints*, 1974(Jul), Vol 50(4), 103-133.—Considers the problem of developing curriculums for computer assisted instruction (CAI) in the context of instructional technology. CAI aids the process of managing the individualized and personalized instructional environment. Furthermore, it can utilize more of the emerging hypotheses regarding the structuring of learning environments. Reference is made to the assessment and evaluation processes associated with and supportive of CAI curriculum development. The power of CAI in this context is based on its capabilities of replication, control of variables and conditions, and data generating potential. (34 ref)—G. Lowe.

12470. Vacca, Richard T. & Vacca, Joanne L. (Northern Illinois U) **Consider a stations approach to middle school reading instruction.** *Reading Teacher*, 1974(Oct), Vol 28(1), 18-21.—Discusses key aspects of the stations approach to reading instruction which make it worthy of consideration, especially at the middle school level. Its structure frees the teacher from the role of central performer in front of the class; he becomes a facilitator rather than the chief actor. A stations approach involves a unifying psychological principle which establishes for the pupil a rationale behind the instruction.

12471. Vandever, Thomas R. & Neville, Donald D. (Inst on Mental Retardation & Intellectual Development, Nashville, TN) **Modality aptitude and word recognition.** *Journal of Reading Behavior*, 1974(Jul), Vol 6(2), 195-201.—Determined modality aptitude for 282 2nd graders. 72 children who learned significantly more or fewer words when they were presented in one of 3 methods (visual, auditory, or kinesthetic) than in the other 2 were selected as Ss. 6 categories of Ss resulted: visual strength, visual weakness, auditory strength, auditory weakness, kinesthetic strength, and kinesthetic weakness. Visual strength and visual weakness Ss were

assigned to classes in which visual methods were used to teach. The same procedures were used for those having auditory and kinesthetic strengths and weaknesses. After 6 wks of instruction, analysis of covariance revealed that children taught to strength did no better than those taught to weakness. (18 ref)—*Journal abstract*.

12472. Vezin, Liliane. (U Paris VIII, Psychologie Lab, France) **[Effect of different forms of guidance in teaching the identification of a principle.]** (Fren) *Enfance*, 1974(Jan-Apr), No 1-2, 65-79.—Investigated the role of different forms of guidance in the identification of the principle governing the operation of a set of gear wheels. Ss were assigned to 4 experimental groups and 1 control group, each group consisting of 8 boys and 8 girls. The experimental group procedures differed in the kind and amount of supplementary information provided; the control group had no guidance. Success was evaluated by 2 tests, one calling for application of the principle and the other for transfer of the principle to another problem. Ss indicated the degree of certainty they felt about their answers to questions. All experimental groups did better than the control group on both tests. Transfer was best in the group that was led to explore the material, and this group expressed confidence in their responses more often than Ss in the other groups. The degree of correctness in estimation of responses was the same for all groups.—S. S. Marzoff.

12473. Walden, Toimi. (California State U, Fresno) **The classification skills of five, six, and seven year old bilingual, biliterate, and monolingual children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12474. Weiss, Nancy L. & Peterson, Rolf A. (U Illinois, Chicago Circle) **A simple training procedure for improving Bender-Gestalt performance.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1299-1305.—To determine whether the performance of kindergartners who score poorly on the Bender Gestalt Test could be improved by training, protocols of 32 Ss who performed most poorly on an initial administration of the Bender were examined for change in number of errors. Protocols clearly indicate that the training resulted in significantly improved Bender scores. Poor performers who initially had a large number of rotation errors and poor performers with a large number of nonrotation errors showed about the same overall improvement in subsequent Bender performance. (18 ref)—*Journal abstract*.

12475. Werden, Patricia. (U Denver) **Health education for Indian students.** *Journal of School Health*, 1974(Jun), Vol 44(6), 319-323.—Describes the particular cultural factors that are important in developing health education programs for American Indian students. Reservation conditions coupled with lack of information about health and low socioeconomic status combine to produce a high risk population. Education for the children of this milieu should be directed toward these problems. (15 ref)

12476. Willis, Sherry L.; Cohen, Allan S. & Clement, Janet W. (Pennsylvania State U) **Formative evaluation in a cognitive developmental program for young children.**

In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12477. Winitz, H. & Reeds, J. A. (U Missouri, Speech & Hearing Science Lab, Kansas City) **Rapid acquisition of a foreign language (German) by the avoidance of speaking.** *IRAL: International Review of Applied Linguistics in Language Teaching*, 1973(Nov), Vol 11(4), 295-317.—Presents an automated method of language teaching based on a theory that comprehension should precede production in 2nd-language learning, since it does in 1st-language acquisition. Translation and pronunciation are avoided until comprehension, expressed nonverbally, is established. (German & French summaries)—C. A. Sherrard.

12478. Yawkey, Thomas D. & O'Meara, Karen R. (U Wisconsin, Early Childhood Study Ctr, Madison) **Precision techniques in the management of children's and teacher's behavior in an open education classroom.** *Journal of Instructional Psychology*, 1974(Fal), Vol 1(4), 9-17.—Examined the use of techniques of precision teaching in mathematical performances with 10 6-yr-old and 10 7-yr-old white middle-class Ss in an open education classroom. Ss using precision techniques significantly outperformed those not using precision teaching in acquiring single and double digit addition skills. Percentage differences between groups demonstrated the facilitative effects of precision teaching techniques with young children. (21 ref)—*Journal abstract*.

### Academic Learning & Adjustment & Achievement

12479. Baird, Leonard L. (Educational Testing Service, Princeton, NJ) **A portrait of blacks in graduate studies.** *Findings*, 1974, Vol 1(2), 1-4.—Describes the demographic characteristics of blacks in graduate programs across several disciplines. Data were collected from 278 blacks and 7,326 whites who were graduates of 94 colleges and universities in the US on a 225-item questionnaire. In addition, another sample of 126 black and 2,026 white graduate and professional school students were queried. Of 141 pertinent questions, black and white responses differed on only 22 or not quite 16%. Important differences included variations in the fields of study chosen by the 2 groups. For example, blacks tend to enter education, the social sciences, and social work but not engineering and the biological sciences. Other differences in the groups' descriptions of their graduate or professional training were evident; for example, the over-indebtedness of blacks compared to whites. Indications were that blacks were being actively recruited by schools for student positions. It is concluded that the differences between blacks and whites concerning educational opportunities and experiences are narrowing.—R. S. Albin.

12480. Colton, Frank V. (U Kentucky, Coll of Education) **Effects of giving students data on task completion time in a college media course.** *AV Communication Review*, 1974(Fal), Vol 22(3), 279-294.—Examined the premise that giving college students

time-to-task data helps their performance. Implications for individualized instruction are indicated.

12481. Cottle, Thomas J. (Children's Defense Fund of the Washington Research Project) **The felt sense of studentry.** *Interchange*, 1974, Vol 5(2), 31-41.—Asserts that institutions of higher education do not pay sufficient attention to the psychological well-being of students. College students need to renounce the past and learn to live in a new social context that usually emphasizes separation from home. They experience feelings of loneliness and have strong unmet needs for interaction with adults. Although students have reported such needs for interaction with faculty members, few institutions provide it. Furthermore, universities usually operate in such a way that they exclude discussion of the student's personal feelings. (29 ref)—H. E. Yaker.

12482. Dutch, R. D. & McCall, J. (U Aberdeen, Coll of Education, Scotland) **Transition to secondary: An experiment in a Scottish comprehensive school.** *British Journal of Educational Psychology*, 1974(Nov), Vol 44(3), 282-289.—Assessed the attainments, attitudes, personality characteristics, and friendship relations of 3 successive year groups of boys and girls ( $N = 254, 252$ , and  $234$ ) near the end of their 1st term in secondary school; the 1st group had transferred directly to the secondary school from various primary schools while the other 2 groups had spent 1 yr in a transition department. The children from the transition department were found to be better adjusted in the social and emotional domains than those who had not had this experience. These differences were more pronounced in the case of girls, children of average and low VRQ, and children coming from small primary schools.—*Journal abstract*.

12483. Eaton, M. J. & Houghton, D. M. (Orangefield Boys' School, Belfast, Northern Ireland) **The attitudes of persistent teenage absentees and regular attenders towards school and home.** *Irish Journal of Psychology*, 1974(Win), Vol 2(3), 159-175.—Administered a questionnaire to 120 persistent teenage absentees to sample their attitudes towards home and school. Their attitudes were compared with those of a matched group of regular offenders. The needs of the 2 groups at home and school were similar. There was a trend for the persistent absentees to be less satisfied that these needs were met although only among the older grammar school boys were such differences between absentees and regular attenders consistently significant ( $p < .01$ ). Persistent absence was found to be linked more with the adolescents' belief that school failed to meet their emotional needs than with any attitudes towards home. It is suggested that in cases of persistent absence in teenagers, features of school should be considered carefully before attributing such behavior to a pathological disorder.—*Journal abstract*.

12484. Farver, Albert S.; Sedlacek, William E. & Brooks, Glenwood C. (U Maryland, Baltimore County) **Longitudinal predictions of university grades for blacks and whites.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 243-250.—Compared predictions of freshman- through senior-year grades for 259 black and white college freshmen who enrolled in 1968 and 1969. Predictors were Scholastic Aptitude Test (SAT) Verbal and Mathematical scores and high school grades that



were used in multiple regression equations. Different patterns of prediction for different race-sex subgroups emerged. High school grade averages were less useful in predicting grades beyond the freshman year and consistently poor predictors for black males. Black males were the least predictable, and white females were the most predictable subgroup. It is concluded that predicting grades beyond the freshman year is useful and that separate prediction equations for race-sex subgroups should be employed. (26 ref)—*Journal abstract*.

12485. Fennema, Elizabeth. (U Wisconsin, Madison) **Sex differences in mathematics-learning: Why??? Elementary School Journal**, 1974(Dec), Vol 75(3), 183-190. —Considers possible causes for girls' inferior performance in mathematics. After the 4th grade the difference between the sexes seems to increase with each grade. Male superiority in the performance of spatial tasks has been confirmed, and has been attributed to the play activities of boys. Girls should actually show superior mathematical abilities because they surpass boys in verbal ability and verbal and mathematical skills are closely related. L. R. Aiken has reported that college males have a more positive attitude toward mathematics than college females, and concluded that mathematics is associated with masculine interest patterns. (34 ref)—*A. J. Ter Keurst*.

12486. Foilman, John. (U South Florida, Coll of Education) **Student ratings and student achievement. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 136.

12487. Foorman, Barbara R. (U California, Reading & Language Development Program, Berkeley) **A look at reading diary studies: The state of the art and some implications from cognitive-developmental theory.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50. —Recommends the use of diary studies to assess individual strategies in the reading acquisition process. Discussions of 2 studies of miscue analysis (R. M. Weber, 1970; A. Biemiller, 1970) in the light of K. Goodman's (1969) general taxonomy, and of a reading diary study (R. Soderbergh, 1971) are presented, and a brief review of Piagetian and reading literature is included. (24 ref)

12488. Francis, Hazel. (U Leeds, England) **Social background, speech and learning to read. British Journal of Educational Psychology**, 1974(Nov), Vol 44(3), 290-299. —Administered a devised measure of the structural complexity of language and the Schonell Graded Word Reading Test to 50 5-7 yr olds to test the language skills of children entering school from different social backgrounds; the relationship between spoken language skill and progress in learning to read was also investigated. Results show that the speech of the socially disadvantaged children was less well-developed than that of the advantaged, but at each testing during the 1st 2 yrs of schooling this difference lay in the frequency of use of various complex forms, not in their presence or absence. Differences between children within social groups were considerable. Reading ability was related to vocabulary

skill, but there was no correlation with speech structuring skill, which was generally adequate in both groups to support early reading.—*Journal abstract*.

12489. Haase, Ann M. & Wood, John. (U Massachusetts) **The application of aptitude treatment interaction analysis to reading research. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 137-138.

12490. Heinen, James R.; Kulhavy, Raymond W. & Dyer, James W. (Old Dominion U) **Context and the meaning of words in prose. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 137.

12491. Holmstrom, Engin I. (American Council on Education, Office of Research, Washington, DC) **"Older" freshmen: Do they differ from "typical" undergraduates? ACE Research Reports**, 1973(Oct), Vol 8(7), 46 p. —Presents the 3rd and final report of the American Council on Education's study of atypical undergraduates. 844 students 20 yrs old or older at time of matriculation were compared with 1,675 students less than 20 yrs old to determine differences in completion of the baccalaureate degree within 4 yrs. Older Ss differed from younger ones in demographic and academic background, had lower degree aspirations, and completed the degree less often within 4 yrs. Multistage step-wise regression analyses indicate that, with differences in ability controlled, older students, particularly older women, who enrolled in highly selective 4-yr institutions were more likely to attain the baccalaureate.—*J. B. Francis*.

12492. Holmstrom, Engin I. (American Council on Education, Office of Research, Washington, DC) **Low-income students: Do they differ from "typical" undergraduates? ACE Research Reports**, 1973(Sep), Vol 8(5), 46 p. —Analyzed population estimates for a subsample of 63,510 students in the American Council on Education Cooperative Institutional Research program to determine which college characteristics give low-income students the best chances to complete their degree. Results indicate that low-income students tended to enroll in public, smaller, less selective 2- and 4-yr colleges; tended to have the same life goals, degree aspirations, activities, and interests as more affluent students; and were more likely to drop out temporarily.

12493. Hoon, Peter W. (Dalhousie U, Halifax, Nova Scotia, Canada) **Efficacy of three common study methods. Psychological Reports**, 1974(Dec), Vol 35(3), 1057-1058. —30 college males in liberal arts curricula were assigned to study passages by (a) reading, (b) reading with underlining, and (c) reading with note-taking. When verbal intelligence (measured by Verbal score on the Scholastic Aptitude Test) was held constant, the 3 groups did not differ on questions about comprehension of passages.

12494. Leeds, Donald S. (Kean Coll) **Content, interest and role as sociological factors affecting reading performance. Reading World**, 1974(Dec), Vol 14(2), 149-159. —Discusses minority groups in our society and the detrimental effect of the minority role on the self-concept of emerging individuals. It is suggested that educators, aware of the influence of textbooks on those who read them, should be alert for bias and slanted views in teaching materials. (29 ref)

12495. Liem, G. Ramsay. (Boston Coll) **Performance and satisfaction as affected by personal control over salient decisions.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 232-240.—Investigated the effects of decision-making power on achievement in an introductory psychology course as well as attitudes toward the experience. Decision-making was manipulated by (a) allowing some of the 171 undergraduate participants to choose the type of recitation section they preferred (choice) while others received their preference by chance (no choice) and (b) manipulating the amount of student choice in the ongoing conduct of recitation sections (structured and unstructured). Choice Ss did significantly better on 1 of 3 course exams than did no-choice Ss and reported greater satisfaction with their sections and leaders. Similarly, Ss in unstructured classes gave higher ratings of satisfaction with their sections than did Ss in structured classes. Implications for structurally related but broader social problems are discussed. (18 ref)—*Journal abstract*.

12496. Lückert, Heinz-R. [Psychological aspects of maladjustment in school.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(1), 49-74.—Analyzes school difficulties as problems of a psychology in failure. Data are presented about the frequency of learning difficulties, retention in grade of boys and girls in schools of different levels, and reasons for academic failures advanced by other researchers. The importance to students of a positive self-concept and of peer acceptance in relation to achievement are discussed. The lack of agreement between intelligence and grades is mentioned. It is recommended that older students be taught how to educate younger children, that class sizes be reduced, that age requirements for school entrance be more flexible, and that less stress be placed on spelling. (English summary) (75 ref)—*W. O. Horn*.

12497. Morstain, Barry R. (U Delaware, Office of Academic Planning & Evaluation) **The relationship between students' personality characteristics and educational attitudes.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 251-258.—Administered the Omnibus Personality Inventory (OPI) and the Student Orientations Survey (SOS) to 410 undergraduates at 3 institutions. Substantial correlations between various scales of these 2 inventories were obtained. Ss were also grouped into 1 of 3 intellectual disposition categories based on their pattern of scores on the OPI. Analyses of variance of group differences in educational attitudes were significant ( $p < .001$ ) on all 10 SOS scales. A stepwise multiple discriminant analysis indicated that 6 scales were salient definers of group differences. On the whole, Ss' educational attitudes were consonant with their general personality characteristics and orientations. (16 ref)—*Journal abstract*.

12498. Nickel, Horst; Schlüter, Peter & Fenner, Hans-J. (U Düsseldorf, W Germany) **[Anxiety scores, results of intelligence testing, and the influence of the teacher's personality on students in schools of different levels.]** (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(1), 1-13.—Employed 2 American scales (the Text Anxiety Scale for Children and the Children's Manifest Anxiety Scale), adapted for German use, together with W. O. Horn's tests of 6 primary mental

abilities and R. Brickenkamp's test of concentration, to investigate the influence of anxiety on 459 boys and 383 girls aged 10, 12, and 14 yrs. Performances in German and mathematics were used for correlations and comparison of extreme groups. Girls admitted significantly more anxiety, especially at age 12. Anxiety diminished with age, quality of education, higher social class, and intelligence, and with increasing introversion and dominance of the teacher. With increasing dominance of the teacher, girls participated more, boys less, and the speed and vigilance of both boys and girls declined. (English summary) (40 ref)—*W. O. Horn*.

12499. Olson, David R. **Mass media versus schoolmen: The role of the means of instruction in the attainment of educational goals.** *Interchange*, 1974, Vol 5(2), 11-17.—Makes a distinction between knowledge and skill. Knowledge refers to information about the world and objects and events in it. Skill or ability refers to particular activities that are performed in many different contexts; i.e., ability to do something. Knowledge and skill are learned in different ways. The acquisition of knowledge, which is of secondary importance, should be turned over to the mass media. But the mastery of skill requires active performance and suitable feedback, and thus must remain in the hands of teachers. (23 ref)—*H. E. Yaker*.

12500. Prokop, M. (U Alberta, Edmonton, Canada) **Sequential analysis of foreign language verbal interaction.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 334-341.—Used a Flanders-type observation instrument to code verbal interactions among 50 students and 4 instructors in foreign-language classes. The interaction process was conceptualized as having cyclical characteristics, and each utterance was classified as being either an initiator of information-processing, a response, or an evaluation in function. The resulting strings were ordered and assigned to groups on the basis of commonalities in their internal pattern structure. 7 such response pattern types were observed, 2 of which accounted for almost 90% of all occurrences; in turn, these patterns were realized in 32 response modules depending on the type of communicative content function of initiators, responses, and evaluators. Other inferences concerning the structure of the foreign-language teaching and learning process are discussed. —*Journal abstract*.

12501. Resnik, Anton. **[Objective assessment of motivational components and their relation with academic success.]** (Slo) *Anthropos*, 1972, No 3-4, 51-60.—Investigated the association between 3 levels or types of motivation—ideational, formal, and actual—and between type of motivation and variables of academic achievement and ability, in 77 7th grade Slovenian pupils. Ideational level was measured by the number of terms of foreign origin selected by pupils from a list as being appropriate for learning. Formal level was measured by the number of arithmetic problems pupils selected as their voluntary homework, and actual level by the number of such problems solved. Ability was measured by differential aptitude tests, a battery of tests for industry, and a vocabulary test. Data were collected on academic achievement in biology, mathematics, geography, English, and Slovenian. As predicted, there



was no correlation between ideational motivation and the other 2 levels, but a strong correlation between formal and actual motivation. Ideational motivation was slightly correlated with abilities and with achievement in Slovenian, while formal and actual motivation showed strong correlations with academic achievement across subjects and ability variables. Correlations between ability, motivation, and achievement were higher when actual motivation was higher.—*S. Slak.*

12502. Rodgers, D.; Slade, K. & Conry, R. (U British Columbia, Vancouver, Canada) **Oral language, reading ability, and socioeconomic background in three grade one classes.** *Alberta Journal of Educational Research*, 1974(Dec), Vol 20(4), 316-326.—Studied 81 English-speaking Grade-1 students to examine the differences in oral language competence which exist in the "average" Canadian urban classroom. Cluster analysis was used to create 3 S groups using 7 measures of oral language competence. Results show that group membership was highly predictive of reading proficiency measured at the end of Grade 2. Further, there is evidence to support a relationship between socioeconomic area of school location and oral language competence.—*Journal abstract.*

12503. Rude, Robert T.; Niquette, Sheldon & Foxgrover, Phyllis. (Rhode Island Coll) **The retention of visual and auditory discrimination reading skills.** *Journal of Educational Research*, 1975(Jan), Vol 68(5), 192-196.—The retention of basic visual and auditory discrimination skills is of interest to kindergarten and 1st-grade teachers. The present study measured kindergartners' retention abilities over the summer vacation period, using 2 subtests from the Wisconsin Tests of Reading Skill Development-Word Attack and 2 subtests from the Murphy-Durrell Reading Readiness Analysis. Ss were 194 children in 7 kindergarten sections in all-white elementary schools. Results show that visual discrimination skills were retained to a higher degree than was the measured auditory discrimination skill. Sex of S and chronological age were not significant factors affecting retention, whereas IQ was significant. Implications for researchers and educators are discussed briefly. (20 ref)—*Journal abstract.*

12504. Sappington, Andrew & Grizzard, Robert. (U Alabama, Birmingham) **Self-discrimination responses in black school children.** *Journal of Personality & Social Psychology*, 1975(Feb), Vol 31(2), 224-231.—Previous studies have found that the performance of blacks on intellectual tasks decreases in the presence of whites. The present study attempted to determine whether this performance decrement still exists by administering 3 trials of a digit symbol task (the WAIS Digit Symbol subscale) to 40 black male 7th and 8th graders in the presence of either white or Negro counselors. The digit symbol task was labeled as either intellectual or motor skill. In addition, tests (e.g., the MMPI) were used to measure expectancy, incentive, anxiety, hostility, defensiveness, and task satisfaction. It was found that the students performed better in the presence of whites and that this was a function of task complexity and task labeling. Of several theories considered, K. W. Spence's (1958) analysis of the relationship of drive level to performance can best explain the data. No source for the

increased drive in the presence of whites was found.—*Journal abstract.*

12505. Schaller, Joseph. **Residential change and academic performance.** *Goteborg Psychological Reports*, 1974, Vol 4(6), 20 p.—Studied physical mobility as it related to both academic performance and specific areas of the curriculum. Ss were 895 Swedish elementary school children in Grades 3-8, less than half of them always in the same school. Results suggest both short- and long-term effects of a residential change for school-age children. The effects were, however, small.—*Journal abstract.*

12506. Siler, Earl R. (Clarion State Coll) **The effects of syntactic and semantic constraints on the oral reading performance of second and fourth graders.** *Reading Research Quarterly*, 1973-1974, Vol 9(4), 583-602.—Investigated the effects of syntactic and/or semantic violations on the oral reading performance of 2nd and 4th graders. Repeated measured analysis of variance for oral reading response time identified Grade Placement, Syntax, and Semantics as significant factors. Similar analysis for total sentence accuracy produced the same results. Subsequent comparisons of individual means, using the Newman-Keuls method, indicated significant changes in both criterion measures for syntactic violations, semantic violations, and combined syntactic and semantic violations ( $p < .01$ ). Syntactically violated sentences did not differ significantly from sentences violated both syntactically and semantically; however, sentences violated semantically differed significantly from sentences violated both syntactically and semantically. Findings indicate that sentences violated syntactically were also violated semantically. Syntax appeared to have a greater effect than semantics on oral reading performance. Present and past data suggested that accurate assessments of syntactic and semantic constraints on oral reading performance require the development of semantic taxonomies comparable in sophistication to those developed for syntax. (French & Spanish summaries) (32 ref)—*Journal abstract.*

12507. Soar, Robert S. & Soar, Ruth M. (U Florida, Coll of Education) **Classroom behavior, pupil characteristics and pupil growth for the school year and the summer.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 200.

12508. Symmes, Jean S. (NIH, National Inst of Child Health & Human Development, Children's Diagnostic & Study Branch, Bethesda, MD) **Reading difficulty in advantaged children.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 138.

12509. Williamson, Leon E. & Young, Freda. (New Mexico State U, Coll of Education) **The IRI and RMI diagnostic concepts should be synthesized.** *Journal of Reading Behavior*, 1974(Jul), Vol 6(2), 183-194.—Analyzed reading errors in terms of criteria from 2 informal diagnostic techniques, the Informal Reading Inventory (IRI) and the Reading Miscue Inventory (RMI). Ss were 30 upper-elementary school children who demonstrated a 5th-grade instructional level in reading. Results are interpreted by comparing reading performances at Ss' instructional and frustrational level. Percentages of miscues indicate that reading behavior was different at these 2 levels.—*W. L. Chovan.*

12510. Wilson, J. A. **Canonical relationships between environment and education.** *Irish Journal of Psychology*, 1974(Win), Vol 2(3), 129-147.—Applied canonical correlation analysis to environmental and educational variables for each of 4 samples (approximately 1,000 pupils each): 7-yr-old boys and girls and 10-yr-old boys and girls. Results confirm the hypothesis that the environmental-educational relationship is complex, but more so for 7-yr-olds than for 10-yr-olds. The nature of the relationships was inferred from an examination of the correlations of the original variables with the canonical variates. In addition to a "general" environmental-educational relationship for each sample, environmental relationships were found for brightness, backwardness, ratings, ability-attainment disparities, and test-rating disparities. Findings corroborate those of a previously reported factor analysis, and provide further evidence of a nonlinear multivariate relationship between environment and education.—*Journal abstract.*

12511. Zorman, Leon. [Theoretical and applied aspects of motivation in educational practices.] (Sloe) *Anthropos*, 1972, No 3-4, 17-25.—Opposes P. Kogej's view that secondary schools in Slovenia should consist of 25% of the most intelligent pupils, since data from the Slovenian republic show that motivational factors are much more important for academic success than intelligence. Motivation for learning is said to depend on pupil's awareness of relevance and applicability of subject matter and its appropriateness to the pupil's abilities. The correlation between socioeconomic status and educational-employment aspirations, which is higher in Slovenia than in many nonsocialist countries, also is discussed.—*S. Slak.*

### Special Education

12512. Abbott, John C. & Sabatino, David A. (Pennsylvania State U) **Teacher-mom intervention with academic high-risk preschool children.** *Exceptional Children*, 1975(Jan), Vol 41(4), 267-268.—Measured the effectiveness of having mothers serve as teachers in an experiment using the Frostig Program for the Development of Visual Perception. 25 experimental and 25 control Ss were 4-5 yr old perceptually handicapped children from a racially balanced inner-city school district. Mothers of experimental Ss administered the Frostig program for 10 wks. Control Ss followed the regular curriculum. Findings indicate that the experimental group made significant gains ( $p < .05$ ) over the control group on the Marianne Frostig Development Test of Visual Perception, and that Ss who spent more than the mean time of 525 min in intervention activities made gains over those who spent less than the mean time.—*P. O'Brien.*

12513. Allen, K. Eileen. (U Washington, Child Development & Mental Retardation Ctr, Developmental Disabilities Project) **Behavior modification principles with disadvantaged and deprived.** In J. G. Cull & R. E. Hardy (Eds), *Behavior modification in rehabilitation settings: Applied principles*. Springfield, IL: Charles C Thomas, 1974. xvii, 251 p.

12514. Bisno, Ann. **An application of the Piaget model to a curriculum for deaf-blind children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings*

*Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12515. Davis, Patricia A. (Baltimore County Public Schools, MD) **Education of the visually impaired in the Soviet Union.** *Education of the Visually Handicapped*, 1973(Dec), Vol 5(4), 120-124.—Presents an overview of the education of the visually impaired in the USSR. Special education is generally carried out in residential schools of at least 7 different types. Children can be admitted at the age of 7 yrs. Before that age, they are the responsibility of the parent. There is very little preschool training in special education areas. Teachers of exceptional children are carefully screened, and only about 1/2 of applicants are accepted. Very little research on education of the visually handicapped has been published, or else it is inaccessible outside the USSR. It is noted that Soviet research rarely includes statistics.—*C. L. Nicholson.*

12516. Engelmann, Siegfried & Rosov, Robert. (U Oregon) **Tactual hearing experiment with deaf and hearing subjects.** *Exceptional Children*, 1975(Jan), Vol 41(4), 243-253.—Proposed to show that adequate training is necessary with a tactual device before a healthy S can perform consistently on the early words to be discriminated. In 2 experiments with a tactual vocoder it was found that both hearing and deaf Ss could learn to discriminate between words that were minimally different, and could attend to other prosodic features of language such as pitch and stress. Hearing Ss were 4 female instructors aged in their 20s; deaf Ss were 4 boys aged 8-14 yrs. Ss were tested regularly on word identification, neither looking at the trainer nor receiving any information other than that transmitted through the vocoder. 1 deaf S achieved a tactual vocabulary of 150 words and had a new word mastery rate increase of 46 times during his 48-wk training period. It is concluded that (a) deaf Ss can be taught to hear fine speech discriminations through the tactual mode, (b) the performance of Ss is positively correlated with practice and seems to be clearly a function of training, and (c) the quest for the appropriate tactual display of speech must be conducted within the training context.—*Journal abstract.*

12517. Evans, David R.; Horvath, Peter; Sanders, Sidney & Dolan, James. (U Western Ontario, London, Canada) **Reinforcement of attention and academic performance in a special education class.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1143-1146.—Exposed 14 special education students (mean age = 8 yrs) to 5 successive treatments designed to increase their attention and academic performance. Attention and Wide Range Achievement Test Reading scores were increased with the inclusion of a teacher's assistant in the setting and not as a result of token-reinforcement programs.—*Journal abstract.*

12518. Ferdinand, W. & Uhr, R. **[Are workers' children less intelligent—or really just "die Dummer?"]** *Psychologie in Erziehung und Unterricht*, 1973, (Germ) Vol 20(1), 31-35.—Compared the socioeconomic status (SES) of 2,600 pupils in schools for the mentally handicapped with the status of an unselected sample of



pupils in schools for normal children. Only 6.3% of the children in the special schools came from middle-class families, compared to 29.4% of the children in normal schools. 265 of the pupils in special schools had normal IQs (90-116), but of this group 98% were children of skilled and unskilled workers, craftsmen, and minor clerks. Of the special school students with lower IQs (42-89), over 90% came from lower socioeconomic levels. It is concluded that children of lower SES are grossly overrepresented in special schools, and that lift courses should be offered in normal schools, at least for all children of average intelligence and low achievement, to avoid their placement in special schools. (English summary) (19 ref)—*W. O. Horn.*

12519. Finch, A. J.; Pezzuti, K. A. & Nelson, W. M. (Virginia Treatment Ctr for Children, Richmond) **Locus of control and academic achievement in emotionally disturbed children.** *Journal of Consulting & Clinical Psychology*, 1975(Feb), Vol 43(1), 103.—Administered a standard achievement test and the Nowicki-Strickland Locus of Control Scale for Children to 48 emotionally disturbed children (mean age, 11.4 yrs). Results indicate that those emotionally disturbed children who perceive a relationship between their own behavior and resulting consequences obtain higher achievement scores than those who do not.

12520. Gray, William M. (U Dayton) **The integrated cognitive structures of EMH (educationally mentally handicapped) children.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975, 348 p. \$7.50.

12521. Hargis, Charles H.; Gickling, Edward E. & Mahmoud, Cathy C. (U Tennessee, Knoxville) **The effectiveness of TV in teaching sight words to students with learning disabilities.** *Journal of Learning Disabilities*, 1975(Jan), Vol 8(1), 37-39.—Used television to teach a set of sight words to 8 learning disabled children. Prior to the television presentations, 2 separate sets of sight words were selected and matched on the basis of equivalent difficulty level. 1 set was presented using a National Educational Television program in a series of 32 daily broadcasts; the other set of words was not presented by any teaching procedure. After instruction, each student was tested on his ability to recognize both sets of sight words. Results indicate that scores obtained through the television medium were no higher than scores which received no presentation. Results suggest that the research procedure used has relevance for individual classroom teachers and teachers dealing with small numbers of students. — *Journal abstract.*

12522. Hart, Verna. (U Pittsburgh, Program for Early Childhood Education for the Handicapped) **Beginning with the handicapped.** Springfield, IL: Charles C Thomas, 1974, xi, 128 p.—Offers behavioral approaches to changing the conduct of the handicapped child. 5 chapters are included: Where to Begin, Self-Care Skills, Motor Development, Adaptive Behavior, and Communication.

12523. Hofmeister, Alan M. (Utah State U) **Texas Sensori-Motor Training Project: A critique.** *Slow Learn-*

*ing Child: The Australian Journal on the Education of Backward Children*, 1974(Nov), Vol 21(3), 178-184.—Evaluates a project carried out at the Denton State School, using the Dolman-Delacato treatment program. The following project areas are considered: (a) control of the effects of individual attention, (b) structured instruction and testing, (c) research environment, and (d) subject identification and generalizability. It is felt that this was one of the better research projects using the Dolman-Delacato program.—*C. L. Nicholson.*

12524. Hull, Wilma A. & McCarthy, Daniel G. (Boston Coll, Campus School, Pre-School Program for Low Vision Children) **Supplementary program for pre-school visually handicapped children: Utilization of vision/increased readiness.** *Education of the Visually Handicapped*, 1973(Dec), Vol 5(4), 97-104.—Describes a supplementary program for 14 preschool visually handicapped children of the Campus School at Boston College. The goals of the program were: (a) to develop the visually impaired child's visual perception and visual efficiency; (b) to prepare the low-vision child more adequately for beginning reading; and (c) to provide evidence to determine whether the educational medium should be print or Braille, when necessary. The curriculum of the program is briefly described. Improvement was shown in the areas of visual efficiency, visual-motor integration, body image, and development of prereading skills. A questionnaire to parents indicated that (a) they reacted positively to the program; (b) the children enjoyed participating; and (c) the parents would recommend the program to other parents of visually handicapped children. (18 ref)—*C. L. Nicholson.*

12525. Jackson, Merrill. (Monash U, Clayton, Vic, Australia) **Visual feedback in word acquisition behaviour in moderately retarded subjects.** *Slow Learning Child: The Australian Journal on the Education of Backward Children*, 1974(Nov), Vol 21(3), 155-163.—Taught 12 moderately retarded children (mean age 122 mo, mean IQ 41.6) to discriminate 6 words of 3 letters each. The words were presented orally and the child was to select the printed word. 9 of the 12 Ss were able to reach criterion, indicating that such children are able to make the kind of discrimination associations necessary for reading behavior. The finding that there was no difference between the Down's syndrome Ss and the others is considered important and may serve to dispel some misgivings about their educational possibilities. Analysis of Ss who failed showed that some had not understood the association principle. (15 ref)—*C. L. Nicholson.*

12526. Kaur, Ravinder & Sen, Arun K. **Training and education of the mentally retarded children: A survey report.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 65-71.—Notes that Indian institutions for educating and training the mentally retarded can provide care for only 2,400 patients out of the estimated 5-19 million retarded in the country. In a New Delhi home serving 87 mildly and moderately retarded children, 73 came from homes on the lower socioeconomic level. 40 had serious speech defects and 41 were retarded in motor development. It is felt that institutional care is preferable to home care for such children, since trained therapists and teachers achieve improvement in behavior and

learning that overprotective parents cannot. (17 ref)—J. H. Pflaum.

12527. Marchi, J. U. (ARAMCO Schools, Dhahran, Saudi Arabia) **Comparison of selected Piagetian tasks with the WISC as measures of mental retardation.** In G. I. Lubin, J. F. Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12528. Mittler, Peter. (U Manchester, Hester Adrian Research Ctr, England) **Progress and problems in the education of the mentally handicapped in the U.K.** *Slow Learning Child: The Australian Journal on the Education of Backward Children*, 1974(Nov), Vol 21(3), 140-154. —Briefly summarizes recent progress and problems in the education of the mentally retarded in the United Kingdom. In 1971 responsibility for the education of mentally handicapped children was transferred from the health to the education authorities. No child is now regarded as "ineducable" or unsuitable for education in school and all children are included, regardless of severity of the mental handicap. The following areas are discussed: early education of the child, the content of education, planning for the individual child, teacher training, experiments in integration, and post-school education. Each area is considered in terms of past practices, present status, problems encountered, and future goals.—C. L. Nicholson.

12529. Nikashina, N. A. (USSR Academy of Pedagogical Sciences, Scientific Research Inst of Defectology, Moscow) [The pedagogical study of children with a delay in psychological development.] (Russ) *Defektologiya*, 1972, No 5, 7-12.—Uses observations by scholars at the Institute of Defectology to describe the degree to which the preschool development of children with a delay in psychological development (minimal brain damage) prepares them for the mastery of school subjects, and discusses several aspects of their school performance. Suggestions are made for remediating various impediments to academic success which these children exhibit.—E. C. Koffman.

12530. Oshio, Chikamori; Tomiyasu, Yoshikazu & Komiya, Mitsuya. (Inst for Developmental Research, Aichi Prefectural Colony, Japan) [Shaping appropriate eating behavior of a profoundly retarded boy.] (Jpn) *Japanese Journal of Special Education*, 1974(Jun), Vol 12(1), 1-9.—A profoundly retarded 9-yr-old boy underwent 47 training sessions to shape appropriate eating behavior. After 5 baseline periods, his hand was manually guided by a trainer for 10 sessions. For the next 20 sessions, verbal punishment and time-out were delivered contingent upon finger feeding. For the last 12 sessions, time-out was used when he threw utensils or food, and verbal praise was given after every 2 successful spoon feedings. The progress record indicated that both positive and negative reinforcements were effective in maintaining appropriate self-feeding. During the training, the S began to interact with others in nontraining situations. (English summary)—S. Ohwaki.

12531. Pimm, June B. (U Miami, Mailman Ctr for Child Development) **The clinical use of Piagetian tasks with emotionally disturbed children.** In G. I. Lubin, J. F.

Magary & M. K. Poulsen (Eds), *Proceedings Fourth Interdisciplinary Seminar: Piagetian Theory and Its Implications for the Helping Professions: February 15, 1974: University of Southern California*. Los Angeles, CA: U Southern California, 1975. 348 p. \$7.50.

12532. Ravnmark, Anker. (School Psychological Office, Jystrup, Denmark) [Which children are referred to special residential homes (funded by sale of Christmas seals)?] (Danish) *Skolepsykologi*, 1975, Vol 12(1), 22-28. —Collected data concerning 169 schoolchildren referred in 1972-1973. Individualized teaching is required as more than half of the children (Grades 1-8) need remedial education and behavior problems are frequent.

12533. Rogow, Sally M. (U British Columbia, Vancouver, Canada) **Speech development and the blind multi-impaired child.** *Education of the Visually Handicapped*, 1973(Dec), Vol 5(4), 105-109.—Discusses the role of sensory stimulation in promoting normal speech development among multi-impaired blind children. The effects of sensory deprivation and oral sensory stimulation are also considered. The transition from passive to active forms of stimulation is traced, and the development of the haptic modality. Simply hearing speech is not sufficient motivation for speech to develop in the blind multi-impaired child; he needs active encouragement and a variety of sensory stimulation. Careful and systematic stimulation can assist the transition from passive experience of sensation to active exploration and play activities. The communication of genuine enjoyment by others of the child's efforts to vocalize help to encourage and support the vocal/verbal sequence of development.—C. L. Nicholson.

12534. Röhr, Gunilla. [Teachers' opinions of special education and pupils' development.] (Swed) *Pedagogisk-Psykologiska Problem*, 1974(Nov), No 252, 33 p.—Investigated the opinions of teachers concerning 2 types of schools, traditionally built and open-plan. Questionnaires were administered to teachers of lower, intermediate, and upper levels of the comprehensive school, assessing different approaches to the organization of special education. 2 types of coordinated special education are discussed, and their value in meeting the needs of different groups of pupils is examined.—English summary.

12535. Thornburg, Hershel D. (U Arizona) **Attitudinal determinants in holding dropouts in school.** *Journal of Educational Research*, 1975(Jan), Vol 68(5), 181-185. —Entering high school freshmen ( $N = 421$ ) during the 1971-1972 academic year in a rural Arizona high school were evaluated as to their dropout potential on several criteria, including academic grades and 8th-grade teacher evaluations. Of the 154 identified as potential dropouts, 36 were randomly selected and received a special academic program, and 118 were placed in vocational educational classes. All Ss were from the lower socioeconomic class, and a predominate number were from ethnic minorities. A control group of 94 students was randomly selected from those assigned to the regular classroom. The special academic class was designed to hold potential dropouts in school, as well as to modify some of the negative attitudes toward school with which they entered as freshmen. Results show that the special academic group maintained their attitude



toward school with no drop in attitude occurring. In contrast, potential dropouts who were assigned to vocational classes showed a slight drop in attitude toward school, while the control group showed a significant decrease. A lower dropout rate also was found among the special academic students than the other 2 groups, a fact which attests to the effectiveness of the program.—*Journal abstract.*

12536. Varma, Satish C. & Varma, Chandra K. (State U New York, Downstate Medical Ctr, Brooklyn) **Integrating mentally retarded with normal children: An experiment.** *Indian Journal of Mental Retardation*, 1974(Jul), Vol 7(2), 81-85.—Describes the successful integration of 5 mentally retarded children into a regular class of a New Delhi, India, private school. The individual and community benefits of integration are specified.

12537. Winett, Richard A.; Calkins, Debra; Douglas, Carter & Prus, Joseph. (U Kentucky) **The role of resource linker in the public schools.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 85-87.—Describes a Kentucky public school project utilizing the model of a resource linker to alleviate behavioral and academic problems. This role involves defining specific problem areas or needs with teachers and administrators and then actually providing, developing, or "linking" the resource (available within or outside the system) to a school or school district to ameliorate the specific problems. Problems studied include disruptive classroom behavior and the large range of abilities present in the classrooms of an elementary school. Projects developed by the resource linker during the course of this study included high school aides, tutors, teacher consultations, and use of community resources. It is recommended, in light of the success of this program, that educational innovations be tied to clear measurable objectives.—R. S. Albin

### Counseling & Measurement

12538. Apter, Steven J. (Syracuse U) **The process of program development: Five years of the BRIDGE Program.** *Journal of Community Psychology*, 1975(Jan), Vol 3(1), 81-84.—Reports on the effectiveness of the BRIDGE program, a comprehensive year-round, psychoeducational program designed to aid troubled children, aged 7 to 12, to become effective participants in their regular school programs. The program includes the following facets: (a) a psycho-educational summer camp that lasts for 3-4 wks, (b) a variety of educational and recreational activities engaged in by each child and the counselor during the year, (c) a family program which provides individual and family counseling, and (d) a school program which maintains contact with every member of the staff of schools attended by participating children. Currently, the model is changing from a comprehensive direct service model to one that encompasses a more preventive educational orientation.—R. S. Albin

12539. Baker, Stanley B. & Slakter, Malcolm J. (Pennsylvania State U) **Validity and reliability of the School Counselor Attitude Inventory.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 239-242.—Presents data from 473 graduate counseling students

to demonstrate the construct and criterion validity and reliability of S. B. Baker's School Counselor Attitude Inventory, a 20-item measure of attitudes toward counselor strategies and characteristics.

12540. Bronzaft, Arline L. (Herbert H. Lehman Coll, City U New York) **College women want a career, marriage and children.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1031-1034.—Re-examined the career plans of 210 undergraduate females from G. Epstein and A. Bronzaft's 1972 study. Results show that 79% of the Ss expected to pursue a career, marry, and have children.—*Journal abstract.*

12541. Bruce, P. H. (Wellington Polytechnic, New Zealand) **An index of test difficulty, with applications.** *New Zealand Journal of Educational Studies*, 1974(May), Vol 9(1), 31-41.—Describes the construction and use of a coefficient of difficulty for classroom test scores among college and graduate students. Examples and applications as well as issues for use in particular types of schools are discussed.

12542. Bryson, Seymour; Bardo, Harold & Johnson, Constance. (Southern Illinois U, Rehabilitation Inst) **Black female counselor and the black male client.** *Journal of Non-White Concerns in Personnel & Guidance*, 1975(Jan), Vol 3(2), 53-58.—Reviews and summarizes the literature discussing the effect of sex on black counselor-client interaction. The psychological needs of black males and the historical role of the black female are considered. The importance of black female counselors not stereotyping the black male in the same manner as do whites is stressed. Sex is viewed to be as important a factor as race in intraracial interactions between black counselors and their clients.—R. Tomasko.

12543. Bunce, J. & Calvert, B. (U Otago, Dunedin, New Zealand) **Pupils' primary school record forms.** *New Zealand Journal of Educational Studies*, 1974(May), Vol 9(1), 42-51.—Describes research that used pupils' record forms in a New Zealand school to explore frequency of changes of school, relationships between grades in school subjects, personality ratings, father's occupational status, differences between grades and ratings for boys and girls, and characteristics of the distribution of grades and ratings by teachers.

12544. DeCato, Clifford M. (Hahnemann Medical Coll, Philadelphia, PA) **Manual for the Admissions rating scale.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 177.

12545. Flake, Muriel H.; Roach, Arthur J. & Stenning, Walter F. (Texas A&M U) **Effects of short-term counseling on career maturity of tenth-grade students.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 73-80.—To study the effectiveness of short-term counseling on career maturity, the Attitude scale of Crites's Career Maturity Inventory (CMI) and the Self-Appraisal portion of the CMI Competence test were administered to a random sample of 87 10th graders. 36 Ss whose scores fell below the mean were assigned randomly to experimental and control groups. The experimental group ( $n = 17$ ) received special counseling during a short term of 6 wks. Using repeated measures of analysis of variance, a statistically significant interaction was found with both the CMI Self-Appraisal subscale scores and the total scale scores. Results indicate that career

maturity as a developmental process can be measured and facilitated through counseling. (26 ref)—*Journal abstract*.

12546. Gade, Eldon M. & Soliah, David. (U North Dakota) **Vocational Preference Inventory high point codes versus expressed choices as predictors of college major and career entry.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 117-121.—For 151 male bachelor's degree university graduates, expressed choices measured by preferences made as high school seniors on the American College Test Student Profile Section were significantly more accurate predictors of graduating college major and of career entry occupation than were their Vocational Preference Inventory high point codes. There was no relationship between the Vocational Preference Inventory high point codes and the expressed choices.—*Journal abstract*.

12547. Garner, Howard G. (Virginia Commonwealth U) **Mental health benefits of small group experiences in the affective domain.** *Journal of School Health*, 1974(Jun), Vol 44(6), 314-318.—Assessed the effects of human relations training on the personal, social, and classroom adjustment of 3rd and 4th grade students ( $N = 24$ ) labelled as having behavior disorders. One group of 8 3rd graders (the experimental group) were exposed to materials and procedures from the National Training Laboratories, group interactions of the Human Development Program, stories created by the Preventive Psychiatry Program, and other human relations materials. A second group of 8 Ss (Control Group 1) was exposed merely to social interaction exercises, while another group of 8 Ss (Control Group 2) received no special attention. The experimental Ss had significantly ( $p < .05$ ) fewer changes toward maladaptive behavior than either control group, and Control Group 1 had significantly ( $p < .05$ ) fewer changes than Control Group 2. (22 ref)—*R. S. Albin*.

12548. Granowsky, Alvin & Botel, Morton. (Greensboro Schools, Diagnostic Reading Ctr, NC) **Background for a new syntactic complexity formula.** *Reading Teacher*, 1974(Oct), Vol 28(1), 31-35.—Discusses some shortcomings of conventional readability measures, and presents a newly-devised method of estimating readability based on factors in the area of grammatical syntax. The readability level is estimated on the basis of complexity score. The formula can be used by authors and editors in preparing children's materials and by teachers in evaluating and giving direction to the language experience segment of the reading program.—*P. D. Leedy*.

12549. Grant, Thomas E. & Renzulli, Joseph S. (Area Special Education Assn, Colchester, CT) **Identifying achievement potential in minority group students.** *Exceptional Children*, 1975(Jan), Vol 41(4), 255-259.—Developed an inventory to identify potentially successful college students who are from minority cultures and therefore might be missed by traditional screening procedures. An initial pool of 145 items was developed and tested with 258 high school seniors. The final instrument, entitled Relevant Aspects of Potential, consists of 30 items and is intended to supplement other methods for evaluating student performance.—*Journal abstract*.

12550. Groves, D. L.; Cauley, V. B. & Roberts, R. K. (Virginia Polytechnic Inst & State U) **Some underlying interest and occupational orientation factors of high school students interested in natural resource occupations.** *Journal of Instructional Psychology*, 1974(Fall), Vol 1(4), 28-39.—Explored the basic interest and occupational interest similarities of a high school group of 13 females and 41 males expressing preferences for natural resource occupations. The Strong Vocational Interest Blank was used to isolate interest orientations. These underlying orientations were then used to isolate what dimensions are associated with these factors. Results indicate that it is possible to isolate underlying basic interest and occupational interest dimensions and factors associated with these dimensions, so that these factors can be used as building blocks in a career education program to counsel individuals about occupational alternatives within the natural resource field. (18 ref)—*Journal abstract*.

12551. Harris, Sandra R. (U Oregon) **Sex typing in girls' career choices: A challenge to counselors.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 128-133.—Studied the efficacy of group counseling for increasing the number of tentative career choices and decreasing the percentage of sex-typed choices among middle-class 6th-grade girls. Each of 5 randomly selected Ss met with a counselor for 6 30-min sessions which included discussions, paper-and-pencil exercises, and role playing. The 13 control Ss experienced regular classwork. Pre-post testing examined future career choices and sex typing. Chi-square analyses showed that (a) there were no pretest differences between the groups for either number of tentative career choices or for sex typing; (b) at posttest, the experimental Ss had significantly ( $p < .05$ ) more tentative career choices and fewer, although not significantly, sex-typed choices. While counseling can broaden the career horizons of young girls using the methods above, other methods for reducing sex-typed thinking require investigation.—*C. A. Heikkinen*.

12552. Healy, Charles C. (U California, Graduate School of Education, Los Angeles) **Interrelationships among indexes of vocational maturity.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 146-151.—Studied intercorrelations among indices of vocational maturity including 4 scales of the Career Development Inventory (CDI), incorporation score (differences between self-rating and rating of chosen occupations on the same traits), range of incorporation (differentiation among occupations), and certainty about career plans. Ss included 60 West Coast junior college students who completed all or some of the measures before, during, and after 4 wks of career counseling. Interrelationships were determined by simple correlation. Results show that (a) degree of incorporation was unrelated to range of incorporation, pre- and postcounseling CDI measures, and certainty; (b) range of incorporation was unrelated to pre- and post-CDI measures; (c) CDI scores were generally related significantly ( $p < .05$ ) to certainty before and after counseling; (d) 2 CDI scales were more strongly related to certainty after counseling than before. Incorporation scores might become more meaningful if clients assigned weights to traits. It is considered



important to encourage clients to reflect more about different careers, and for this the CDI shows promise.—C. A. Heikkinen.

12553. Hill, John R.; Hayes, Edward J. & Young, Herman. (U Louisville) **The changing American social order: Implications for counselors.** *Journal of Non-White Concerns in Personnel & Guidance*, 1975(Jan), Vol 3(2), 59-65.—Reviews sociological data and trends having implications for the counseling of black youth. The 1970 US Census Report is cited to indicate that 60% of the black population lives in urban areas and that blacks are migrating to the city as others are leaving it. Shifting employment and educational patterns are cited to suggest that counselors place greater stress on career education and job information services. The importance of understanding black youth as individuals as a means of developing their self-esteem and motivation is stressed.—R. Tomasko.

12554. Holland, John L. & Nafziger, Dean H. (Johns Hopkins U, Ctr for Social Organization of Schools) **A note on the validity of the Self-Directed Search.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 259-262.—Reports that the scales of the Self-Directed Search (SDS) correlate with the scales of the Kuder Preference Record, the Thurstone Temperament Schedule, the Bennett Mechanical Comprehension Test, and the Minnesota Paper Form Board in predictable ways across 3 small samples of high school students ( $N = 158$ ). Results support the validity of the SDS as well as the hypothetical constructs in J. L. Holland's theory (1973) of vocational choice.

12555. Jepsen, David A. (U Iowa) **Vocational decision-making strategy-types: An exploratory study.** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 17-23.—Explored different decision-making strategies used by 118 non-college-aspiring high school juniors in Wisconsin in an effort to identify distinctive decision-making patterns. Ss twice (8 wks apart) completed a questionnaire designed to elicit socio-economic background and responses to 32 vocational decision-making variables which were reduced by means of cluster analysis to 4 clusters: Post-high school Plans, Planning Activity, Long-range Plans, and Senior Courses. Strategy types were defined, and analysis of variance procedures tested the relationships between strategy types and cluster scores. 12 groups including 63 Ss (in groups of at least 4 each) met the requirements for strategy type. The discussion describes the 12 strategies and illustrates these by focusing on 2: the active planners and the singular fatalists. Although exploratory, the study offers insight into vocational decision-making patterns and possible counseling interventions for clients with different strategy types.—C. A. Heikkinen.

12556. Kaimann, Richard A. (Marquette U) **The coincidence of student evaluation by professor and peer group using rank correlation.** *Journal of Educational Research*, 1974(Dec), Vol 68(4), 152-153.—Investigated the hypothesis that, given the same output, an evaluation of a student by his teacher and one by his peer group would not be significantly different. The experimental group was a graduate class in production management with 25 members at the conclusion of the semester. Findings indicate that (a) student group and faculty

coincided in discerning (and grading) the difference between conversation of inconsequence and contributions of consequence; (b) weaker students tended to rank themselves low while stronger students were not shy about ranking themselves high; (c) the very vocal students, who were often abrasive, received a spectrum of rankings by the class while quiet students also received a spectrum of rankings which was wide, but narrower than that of vocal students. It is concluded from the degree of agreement between the 2 ranks that students and teachers do mutually recognize performance and achievement.—P. O'Brien.

12557. Kohen, Andrew I. & Breinich, Susan C. (Ohio State U, Ctr for Human Resource Research) **Knowledge of the world of work: A test of occupational information for young men.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 133-144.—Evaluated a test of occupational information—the Knowledge of the World of Work—which was administered to a national sample of 5,000 men aged 14-24 yrs in 1966 as part of the National Longitudinal Surveys of employment behavior. The predictive validity of the test score was assessed by reference to multiple regression analyses which confirmed the significance of the score as an independent predictor of subsequent hourly earnings and occupational status. Correlation and factor analyses were used to examine the quality of the measurement instrument. Overall, the instrument was judged to exhibit desirable characteristics in terms of internal consistency reliability, discriminatory power, and level of difficulty. The test's reliability compared favorably with a commercially produced test designed to be used in counseling as a measure of occupational knowledge. With the possible modification of deleting a section relating to knowledge of earnings differentials, the test is commended to those involved in assessing and counseling the occupational choice process. (15 ref)—*Journal abstract*.

12558. Kren, Tilka & Prosnik, France. [Type and level of parents' motivations for visiting the Educational Counseling Center.] (Sloe) *Anthropos*, 1972, No 3-4, 67-70.—Studied the association level of parents' motivation for sending a child to the Educational Counseling Center and (a) reason for visit, (b) type of disturbance, and (c) parents' characteristics. 3 levels of parent motivation were: visit initiated by parents, visit recommended by the school, and visit directed by the school. Behavioral disturbances were the most important reasons for self-initiated visits, health for recommended visits, and low achievement for directed visits. The latter were most often the result of intellectual malfunctioning. Recommended visits were usually the result of neurotic symptoms. Self-initiated visits were more often associated with milder disturbances. Parents of higher educational and socioeconomic status living in urban areas were more willing to initiate the visit than low-status and rural parents. There was a correlation between success of the Center's treatment and parents' motivation. It is suggested that working with parents is essential for success of educational counseling.—S. Slak.

12559. Lauer, Rachel M. (Bureau of Child Guidance, New York, NY) **Some uses of processes in school settings.** In D. S. Milman & G. D. Goldman (Eds),

*Group process today: Evaluation and perspective.* Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12560. Lynch, Daniel O. & Smith, Billie C. (U Wisconsin, Oshkosh) **Item response changes: Effects on test scores.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 220-224.—Used data from a final exam administered to 178 undergraduates to determine (a) whether changing test item responses results in better scores, (b) the relationship between the pattern and number of changes and the final score, and (c) the correlation between item difficulty and the probability of changing a given item. The odds were .68 that the student would improve his test score and .32 that he would lower the score if an item was changed. The number of response changes was significantly negatively correlated ( $-.27$ ;  $p < .025$ ) with test scores. There was also a nonsignificant tendency for low scorers to do worse than high scorers when changing answers, and a low, but significant ( $.25$ ;  $p < .025$ ) correlation between item difficulty and the number of people who changed responses to that item. It is concluded that (a) when Ss do not go over the exam, the reliability and validity of the exam is lowered, and (b) directions to stick with the 1st response to an item are misleading, an error which may have serious academic and career implications.—*L. Gorsey*.

12561. Nafziger, Dean H.; Holland, John L. & Gottfredson, Gary D. (Johns Hopkins U, Ctr for Social Organization of Schools) **Student-college congruency as a predictor of satisfaction.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 132-139.—Tested hypotheses about person-environment congruency, consistency, and differentiation from J. L. Holland's (1973) theory of careers. Ss were 1,878 undergraduates from 1 college and 1 university who had been given the Self-Directed Search before their freshman year followed by a satisfaction questionnaire 1 or 3 yrs later. 2 analyses were conducted. The 1st was a 3-factor multiple analysis of variance with school, sex, and congruency level as the independent variables. The 2nd was a 4-factor multiple analysis of variance with school, sex, consistency, and differentiation as independent variables. 3 college satisfaction measures were the dependent variables. Statistically significant main effects ( $p < .05$ ) were found for school, sex, and congruency but not for consistency and differentiation. Results support Holland's congruency hypothesis but not the differentiation and consistency hypotheses. (16 ref)—*Journal abstract*.

12562. Nuthall, Graham. (U Canterbury, Christchurch, New Zealand) **Is classroom interaction research worth the effort involved?** *New Zealand Journal of Educational Studies*, 1974(May), Vol 9(1), 1-17.—Reviews the literature and describes the state of the art in research relating teacher behavior to student achievement and aptitude. Methodological issues are discussed, and suggestions are made to resolve them. Specific problems cited are (a) misleading correlations between the 2 variables, (b) difficulty in replication of results, and (c) interpretations of the data collected. It is demonstrated that the use of different statistical procedures on the data results in different findings. 2 possible interpretations of such data may be made: that pupils' achievement is simply a function of their attitudes to teacher

and school work at the beginning of the course or that the frequency of teacher criticism has a direct effect on pupil achievement.—*R. S. Albin*.

12563. Omvig, Clayton P. & Thomas, Edward G. (U Kentucky, Coll of Education) **Vocational interests of affluent suburban students.** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 10-16.—Examined relationships between expressed and tested interests for 101 affluent, white, 9th-grade students and compared the data with those from a similar study of inner-city disadvantaged students. Ss completed the Ohio Vocational Interest Survey and a Likert-type scale for expressed interests in early 1973; data were subjected to simple correlation analysis. Results suggest that expressed vocational interests are useful, with the following cautions: (a) Disadvantaged males showed more consistency between expressed and tested interests than disadvantaged females; the opposite obtained for affluent students. (b) Disadvantaged students showed consistently higher interests than affluent students for all work areas. (c) High interests for disadvantaged females were people-related; high interests for affluent females lay in people-related, musical, and artistic/entertainment areas. (d) Disadvantaged males showed high interests in musical, entertainment, management, and technical areas; affluent males were highest in data-oriented, scientific, and technical interests.—*C. A. Heikkinen*.

12564. Panackal, Abraham A. & Sockloff, Alan L. (Temple U) **Factor analyses of the College Student Questionnaire.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 225-233.—Studied the factor structures of the College Student Questionnaire for 3 large samples of freshmen, sophomores, and seniors ( $ns = 2,586, 1,963$ , and  $1,507$ , respectively). In addition to oblique 20-factor solutions for each sample, orthogonal 17-factor solutions for freshmen and sophomores and a 16-factor solution for seniors were obtained. Similar factors across the 3 analyses were obtained. Results demonstrate the variety of information contained in these instruments and questioned the choice of some items used in the suggested scales.—*Journal abstract*.

12565. Parker, Carol; Bunch, Steven & Hagberg, Richard. (Montana State U) **Group vocational guidance with college students.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 168-172.—Describes a 7-wk group vocational exploration sequence developed for sophomores who were prospective education majors at Washington State University, based on the rationale that the process would lead to better self-selection of teachers, examination of alternative plans, and preparation of individuals for involvement in career education programs. Using a behavioral system based on points for completed course segments, the classes met for 2 hrs once each week, with time divided among lectures, quizzes, small group activities, and discussions. The specific procedures for facilitating career exploration and self-assessment are outlined, and the process is recommended for use with other groups undecided about careers.—*C. A. Heikkinen*.

12566. Payne, David A. & Halpin, W. Gerald. (U Georgia) **Use of a factored biographical inventory to identify differentially gifted adolescents.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1195-1204.—Adminis-



tered a 118-item factored biographical questionnaire to 173 male and 209 female adolescents participating in a special 8-wk program for high school juniors and seniors gifted in art, drama, foreign language, English, mathematics, music, science, and social science. Results show that females in the gifted areas had significantly different mean scores on the life-history factors of social leadership, academic achievement, scientific-artistic interests, cultural-literary interests, and maladjustment. Males in the gifted areas had significantly different mean scores on the life-history factors of intellectualism, social introversion, positive academic attitude, and sibling friction. 10 of 13 factor scales for males differentiated the academically and/or artistically talented from an additional group of 113 students with average ability. A similar result for females was found on 12 of 15 scales.—*Journal abstract.*

12567. **Prell, Siegfried.** [The influence of examination anxiety on different achievement measures.] (Germ) *Psychologie in Erziehung und Unterricht*, 1973, Vol 20(1), 14-30.—Studied the influence of anxiety by administering an enlarged German version of the Achievement Anxiety Test of R. Alpert and R. N. Haber (1960) to 27 male and 17 female education majors who also had to write a team paper and a longer essay and take a multiple-choice test. The correlation between the "debilitating" anxiety score and total achievement was significant for the whole group and the females. Anxious students, especially females, had a significantly lower essay score. The multiple-choice test and teamwork were not significantly affected. Habitual and examination anxiety were especially detrimental to achievement in essay composition. The total score based on these 3 measures was most strongly correlated with achievement in the multiple-choice test, less strongly with essay achievement, and least strongly with team achievement. (English summary) (19 ref)—*W. O. Horn.*

12568. **Reid, N. A. & Hughes, D. C.** (New Zealand Council for Educational Research, Test Development Div, Wellington) **A factorial analysis of the PAT: Reading comprehension, reading vocabulary and listening comprehension.** *New Zealand Journal of Educational Studies*, 1974(May), Vol 9(1), 18-30.—Describes a study carried out in New Zealand with primary and intermediate school students to elucidate the organization of the abilities and traits tapped by the Progressive Achievement Tests (PAT): Listening Comprehension Tests. It is concluded that there is a very large general ability component underlying this test.

12569. **Richardson, Mary S.** (New York U) **Self-concepts and role concepts in the career orientation of college women.** *Journal of Counseling Psychology*, 1975(Mar), Vol 22(2), 122-126.—Examined the relationship of 97 college women's self-concepts and role concepts to 9 career orientation variables. Ss were senior class women representing a variety of majors. Data were collected by mailed questionnaires which included a self- and role concept instrument, Eyde's Desire to Work Scale, and other locally devised career orientation measures. It was expected that (a) women with similar self- and career concepts would be career oriented and (b) women with similar self- and homemaker concepts would not be career oriented. Results support the 2nd

expectation but not the 1st. The relationship between self- and career concepts and the 2 most valid career orientation variables was somewhat stronger for women with high levels of self-esteem and women with a high level of role differentiation. (17 ref)—*Journal abstract.*

12570. **Rootman, Irving.** (U Calgary, Medical School, Alberta, Canada) **Drug use and the school counselor: Study of cases in a Canadian city.** *Journal of Drug Education*, 1974(Fal), Vol 4(3), 337-346.—Presents the results of a study of drug-related cases seen by school counselors in 4 types of schools during a 4-mo period. The overall counselor-contact rate was 3.1/1,000 students, with the highest rates in separate schools (Roman Catholic). Most referrals were self-made, with junior high school referrals more likely than senior high to come from "professional" sources. More than 1 drug was involved in the majority of cases seen, cannabis being most frequently mentioned. Differences in drugs involved by type of school were found. Although there were differences between school types in treatment approaches, those most often used were individual rather than group-oriented.—*Journal abstract.*

12571. **Sano, Takehiko.** (Kyoto U, Japan) [Changes in intelligence test performance during eighteen years.] (Japn) *Japanese Journal of Educational Psychology*, 1974(Jun), Vol 22(2), 110-114.—Studied increasing average level of intelligence of Japanese elementary school children during an 18-yr period in terms of geographical and historical differences. Pattern fluctuations on 12 subtests of the NH Intelligence Test developed by Kyoto University (1956) are described.—*S. Choe.*

12572. **Sharf, Richard S.** (U Delaware) **The relationship between the SVIB and the OAIS: Implications for counseling.** *Measurement & Evaluation in Guidance*, 1975(Jan), Vol 7(4), 215-219.—Administered the Strong Vocational Interest Blank (SVIB) and the Opinion, Attitude, and Interest Survey (OAIS) to 1,018 male and 901 female entering college freshmen. Moderate Pearson product-moment correlations between the SVIB occupational categories and the OAIS temperament and learning styles scales were obtained. Findings suggest that by examining the relationships between these 2 inventories, counselors can become more sophisticated in the use of these tests with clients. Examples of using SVIB and OAIS data in counseling situations are presented.—*Journal abstract.*

12573. **Snow, David L. & Brooks, Robert B.** (Yale U, Medical School) **A school consultation program in behavior modification.** *Journal of School Health*, 1974(Mar), Vol 44(3), 130-135.—Discusses the role of the consultant and the consultant-teacher relationship in establishing an ongoing behavior modification program on a school-wide basis. A major goal of the consultation program is to develop effective means to communicate with teachers and other school personnel. Several approaches to achieve the goal are the introduction of weekly conferences with teachers, meetings with small groups of teachers, staff meetings, or workshops. In addition to training teachers to be competent in their use of behavior modification techniques these approaches are also useful in helping to insure the ongoing use of behavior modification principles. The need for effective

follow-up procedures is emphasized. (22 ref)—A. de la Haba.

12574. Solkoff, Norman. (State U New York, Buffalo) **Race of examiner and performance on the Wechsler Intelligence Scale for Children: A replication.** *Perceptual & Motor Skills*, 1974(Dec), Vol 39(3), 1063-1066.—2 black and 2 white examiners administered the Sarason Test Anxiety Scale and the WISC to 54 black and 54 white 9-10 yr old children. As in N. Solkoff's (see PA, Vol 48:8765) previous study, results show no evidence that white examiners depressed the WISC performance of black children. All Ss in both studies were of comparable socioeconomic status. While there were significant Race of Child  $\times$  Race of Examiner interactions, the black children achieved their highest scores with a white examiner.—*Journal abstract*.

12575. Stillwell, Larry & Collison, Brooke B. (South-east Kansas Area Vocational-Technical School, Columbus) **A career development program for a small school.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 174-177.—Describes an innovative career development program appropriate for small secondary schools, organized by a school counselor, and involving local businesses. The program began with a 7-wk course consisting of (a) 2 wks for visiting business firms, both businessmen and students having guidelines to facilitate learning; (b) 2 wks for individual projects on careers or consumerism, which included taped exercises, interviews, and role-playing; (c) 2 wks for group discussions regarding firm visitation experiences and a study of the role of the consumer; and (d) 1 wk for synthesis and evaluation. Evaluation of the initial project has led to modification and expansion of the program.—C. A. Heikkinen.

12576. Suggs, Robert C. (State University Coll New York, Brockport) **An identity group experience: Changing priorities.** *Journal of Non-White Concerns in Personnel & Guidance*, 1975(Jan), Vol 3(2), 75-81.—Discusses the development of black youths' individual identity and role and suggests a model for group counseling to be used with minority group members. Literature on the identity crisis of ethnic adolescents is reviewed and the bond between group and individual identity is stressed. A 10-session group counseling program is outlined in which group members are encouraged to discuss their concerns about identity, being a black in America, their feelings of control over their destiny, and their areas of personal conflict.—R. Tomasko.

12577. Vernon, Philip E. (U Calgary, Alberta, Canada) **A restandardization of the Burt-Vernon Graded Word Reading Test.** *Western Psychologist*, 1973, Vol 4(3), 72-78.—Restandardized the Burt-Vernon Graded Word Reading Test on a random sample of students in the Calgary school system. An average of 27 Ss in each elementary grade (1-6), 18 Ss in each junior high school grade (7-9), and 9 Ss in each high school grade (10-12) were tested by 15 psychologists between October 1972 and March 1973. New norms based on the data, and a recommended revised order based on observed word difficulty, are presented. The present norms were found to be considerably more lenient than the old ones, closely comparable to recent norms for English children.—D. R. Evans.

12578. Woal, S. Theodore. (School District of Philadelphia, Div of Pupil Personnel & Counseling, PA) **A career education program for visually handicapped students.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 172-173.—Describes the inclusion of visually handicapped Philadelphia elementary students in classes on career exploration. In addition to regular ROOM TO GROW career program procedures, these students receive Braille transcriptions of written materials, exposure to visually handicapped, productively employed role-models, and field trips to firms employing handicapped workers.—C. A. Heikkinen.

## APPLIED PSYCHOLOGY

12579. Alley, William E. (Lackland Air Force Base, Personnel Research Div, TX) **Development of a data base for AFROTC management analysis: 1973 update.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 154.

12580. Alper, S. William. (IBM Corp, White Plains, NY) **Racial differences in job and work environment priorities among newly hired college graduates.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 132-134.—Conducted a study of 70 black and 179 white newly hired college graduates to assess racial differences in Ss' rated importance of various work and company characteristics. Responses to survey items asking the Ss to rate the importance of several job and company characteristics were factor analyzed. 2 factors emerged, the 1st reflecting a higher order future and growth orientation and the 2nd, a more hygienic job context factor. Results show that both black and white Ss rated the higher order growth characteristics as more important. However, black Ss rated each hygienic extrinsic item significantly higher than did white Ss.—*Journal abstract*.

12581. Anderson, Charles H. & Corts, Daniel B. (US Civil Service Commission, Personnel Research & Development Ctr, Washington, DC) **Development of a framework for a factor-ranking benchmark system of job evaluation.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 147-148.

12582. Bakeman, Roger & Beck, Stephen. (Georgia State U) **The size of informal groups in public.** *Environment & Behavior*, 1974(Sep), Vol 6(3), 378-390.—Tallied group size distributions (a) in 5 public locations on and off campus in a university town and (b) as portrayed in 2 TV soap operas. 2 Os were used for all public settings; one O monitored TV. The modal group size was 2. A random-factors model predicted group size distributions when the population was closed (5-member teams of aquanauts, living-and working in an undersea habitat) but underestimated dyadic and mixed-sex group formation in open populations. It is concluded that distributions of group sizes and mean group size remain relatively stable in different public settings. (15 ref)—S. T. Margulis.

12583. Barker, M. L. (Simon Fraser U, Burnaby, British Columbia, Canada) **Information and complexity: The conceptualization of air pollution by specialist groups.** *Environment & Behavior*, 1974(Sep), Vol 6(3), 347-377.—Examines how specialists in 5 different



professions and disciplines select and organize information about air pollution, and describes the structure and content of their conceptualizations. (26 ref)—S. T. Margulis.

12584. Benton, Arthur L. (Bangor Community Coll, U Maine at Orono, Bangor) **Inventoried vocational interests of cartographers.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 150-153.—Studied the interests of 466 male cartographers to develop a cartographer scale for the Strong Vocational Interest Blank (SVIB). Results show that (a) cartographers liked science, mathematics, and religious activities; (b) they were masculine and diverse and tended to dislike activities involving other people; and (c) their interests were most similar to those of computer programmers, public administrators, Air Force officers, and physical therapists though none of those SVIB keys adequately portrayed the interests of the cartographers. The cartographer key developed was cross-validated on 2 cartographer samples drawn from other populations ( $n = 89$ ) and was found to discriminate adequately between cartographers and men in general.—*Journal abstract.*

12585. Beunse, William E. (US Air Force Human Resources Lab, Manpower Development Branch, Alexandria, VA) **The impact of military service on low aptitude men.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 208.

12586. Brower, Sidney N. & Williamson, Penelope. (Baltimore City Dept of Planning, MD) **Outdoor recreation as a function of the urban housing environment.** *Environment & Behavior*, 1974(Sep), Vol 6(3), 295-345.—Describes residents' use of outdoor spaces (e.g., sidewalks, steps, yards, and playgrounds) in 1 middle-income and 2 low-income inner-city neighborhoods in Baltimore, Maryland.

12587. Carpenter, James B. (Lackland Air Force Base, Occupational Research Div, TX) **Sensitivity of group job descriptions to possible inaccuracies in individual job descriptions.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 149.

12588. Cumming, R. W. (Monash U, Clayton, Vic, Australia) **An engineer looks at psychology.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 6-14.—Presents a presidential address to the Annual Convention of the Australian Psychological Society. A brief history of the development of psychology and the special field of engineering psychology is given. Since the 1970s there has been an increased demand for psychologists with training in engineering. Other areas in which psychologists can make a contribution are environmental psychology, government, industrial relations, law, and health care. Parallels between engineering and psychology are considered, and how similar problems in both fields are being approached. *J C Figurelli.*

12589. Cunningham, J. W.; Tuttle, Thomas C.; Floyd, John R. & Bates, Joe A. (North Carolina State U, Raleigh) **The development of the Occupation Analysis Inventory: An "ergometric" approach to an educational problem.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 144.

12590. David, Thomas G. (U Chicago) **Environmental literacy.** *School Review*, 1974(Aug), Vol 82(4), 687-705.—The physical school environment can enliven and

enrich the learning process within the school, but its potential remains largely unexamined. It is recommended that the school serve as a setting for the study of environment and as a laboratory for active environmental exploration. Environmental literacy seeks to develop an increased sensitivity to the environment on several levels of experience.—C. K. Miller.

12591. Distefano, M. K. & Pryer, Margaret W. (Central Louisiana State Hosp, Pineville) **Work behavior dimensions of psychiatric attendants and aides.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 140-142.—Conducted a study of 71 attendant and 65 psychiatric paraprofessional nursing personnel to determine the factor dimensions associated with Ss' work activities. A factor analysis of Ss' responses to an 80-item self-report job analysis questionnaire yielded 6 interpretable factors (Supervision, Physical Nursing Care, Maintaining the Ward Milieu, Medical Processing Activities, Recording Patient Behavior and Following Written Plans, and Special Therapy Activities) accounting for 50% of the variance. The factor dimensions provided a fairly clear conceptualization of Ss' work behavior as well as meaningful differentiation of the work activities associated with various types of treatment programs.—*Journal abstract.*

12592. Ferguson, D. (U Sydney, NSW, Australia) **A study of occupational stress and health.** In A. T. Welford (Ed), *Man under stress*. New York, NY: John Wiley & Sons, 1974. 140 p. \$10.95.

12593. Fisher, Allan H. & Disario, Martha R. (US Air Force Human Resources Lab, Manpower Development Div, Alexandria, VA) **Attitudes of youth toward military service in a zero-draft environment: Results of a national survey conducted in November, 1972.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 153.

12594. Getzels, J. W. (U Chicago) **Images of the classroom and visions of the learner.** *School Review*, 1974(Aug), Vol 82(4), 527-540.—Discusses various types of classrooms in relation to their effect on the learner. It is suggested that the physical construction of our buildings helps to shape our self-concepts. (15 ref)

12595. Goodale, James G. & Aagaard, A. K. (York U, Faculty of Administrative Studies, Downsview, Ontario, Canada) **Factors relating to varying reactions to the 4-day workweek.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 33-38.—Surveyed the reactions of 474 employees of an accounting division of a large multinational corporation to a 4-day, 38-hr workweek. 90% of the employees had been on the 4-day schedule from 6 mo to 1 yr, and nearly 70% were enthusiastic about the schedule. However, more specific questions, especially questions about work, produced negative responses. Fatigue and slowing down at the end of the day were reported, and servicing of customer needs and meeting with co-workers were more difficult. Supervisors perceived that work quality and output in their units were adversely affected by the 4-day workweek, although company productivity records showed no change. Significant age, sex, and salary differences were found in reactions to the 4-day schedule.—*Journal abstract.*

12596. Gump, Paul V. (U Kansas) **Operating environments in schools of open and traditional design.** *School*

*Review*, 1974(Aug), Vol 82(4), 575-593.—Presents concepts and methods of operating educational environments, and discusses open vs traditionally designed schools. Findings indicate that the open design can be used for programs providing more site and teacher variety. This mobility, however, can lead to increases in nonsubstance time.—C. K. Miller.

12597. Hill, A. B. (U Keele, England) **Work variety and individual differences in occupational boredom.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 128-131.—Examined the relationship between reported boredom and extraversion, neuroticism, intelligence, age, length of service, and work variety in 63 women engaged in press-operating jobs. Results show that boredom and fluctuations in feelings of boredom were negatively correlated with age and neuroticism (correlations significant at the 5% level). No significant correlations were found between boredom or fluctuations in boredom and length of service, intelligence, extraversion, or degree of work variety. However, day-to-day fluctuations in boredom were found to be less for older workers with little variety in their work. (17 ref)—*Journal abstract*.

12598. Holz, Robert F. & Gitter, A. George. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Assessing the quality of life in the U.S. Army.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 207.

12599. Kutash, Samuel B. **Group process in industry and professional education.** In D. S. Milman & G. D. Goldman (Eds), *Group process today: Evaluation and perspective*. Springfield, IL: Charles C Thomas, 1974. xxii, 313 p.

12600. Matteson, Michael T.; McMahon, J. Timothy & McMahon, Margaret. (U Houston) **Sex differences and job attitudes: Some unexpected findings.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1333-1334.—Discusses the traditional assumption that males and females hold different attitudes toward various aspects of their jobs and job environment. It is suggested that many of these differences may be more clearly associated with status as a household head than with sex per se.

12601. Miller, Gary G. **Some considerations in the design and utilization of simulators for technical training.** *US AFHRL Technical Report*, 1974(Aug), No 74-65, 26 p.—Reviews the literature related to simulators, training devices, and simulation in technical training. Rules and principles for the cost-effective application of simulation are included. A major finding is that fidelity can be quite low in certain procedural tasks without a decrement in performance. Other studies indicate that some complex electronic equipment can be simulated in simple, relatively inexpensive devices without having an adverse effect on training. It is concluded that, in general, few studies have been completed to validate the rules and principles of simulation that were developed over 20 yrs ago. (53 ref)—*Journal abstract*.

12602. Muchinsky, Paul M. (Iowa State U) **Consumer installment credit risks: A need for criterion refinement and validation.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 87-93.—Attempted to identify and validate empirically the dimensions of the criterion of consumer installment credit risk. 3 dimensions of the borrower's repayment behavior (missed payments, paperwork, and

delinquency) were hypothesized to be critical to the borrower's credit classification. Information on these 3 dimensions of the repayment process was recorded from 500 paid-out accounts drawn from 3 personal finance companies. 250 accounts had been classified as good credit risks; the other 250 accounts had been classified as bad credit risks. Of the 3 dimensions hypothesized to discriminate between the 2 types of accounts, 2 were validated—missed payment and delinquency. Results are discussed in the context of consumer installment financing and the prediction of credit risk. (20 ref)—*Journal abstract*.

12603. Neeb, Robert W.; Cunningham, J. W. & Pass, John J. (North Carolina State U, Raleigh) **Human attribute requirements of work elements: Further development of the Occupation Analysis Inventory.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 145.

12604. Olshavsky, Richard W.; MacKay, David B. & Sentell, Gerald. (Indiana U, Graduate School of Business) **Perceptual maps of supermarket locations.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 80-86.—Used multidimensional scaling algorithms to develop perceptual configurations of supermarket locations for 55 consumers. Individual and aggregate perceptual configurations were contrasted to an actual map of supermarket locations, and differences between configurations under 2 multidimensional scaling algorithms were described. Actual and perceived distances to each of the supermarkets were correlated with the frequency of shopping at the respective stores for each consumer. Results indicate that perceptual distances had a more significant relationship to shopping frequency than actual distances. (23 ref)—*Journal abstract*.

12605. Pinel, John P. (U British Columbia, Vancouver, Canada) **Potential of high-intensity ultrasonic sound in rat control: A reply.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1084.—Discusses B. Morley and R. Abelson's 1974 criticism of the proposal that an ultrasound source capable of generating complex oscillating frequencies between 135 and 170 db could be used as a rodent-control device.

12606. Proshansky, Erta & Wolfe, Maxine. (City Coll, City U New York) **The physical setting and open education.** *School Review*, 1974(Aug), Vol 82(4), 557-574.—Discusses the implications of the open-education philosophy for the design and use of physical space. The environment of the classroom can be viewed as a direct expression of any educational philosophy and as an active part in the education process.—C. K. Miller.

12607. Proshansky, Harold M. (City U New York) **Theoretical issues in environmental psychology.** *School Review*, 1974(Aug), Vol 82(4), 541-555.—Discusses the need for theoretical analysis in individually oriented environmental psychology. The extent to which understanding will be achieved depends on systematic research and analysis rooted in appropriate, meaningful theoretical concepts. (17 ref)—C. K. Miller.

12608. Riccobono, John A. & Cunningham, J. W. (North Carolina State U, Raleigh) **Work dimensions derived through systematic job analysis: A replicated study of the Occupation Analysis Inventory.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 146.



12609. Riccobono, John A. & Cunningham, J. W. (North Carolina State U, Raleigh) **Work dimensions derived through systematic job analysis: A study of the Occupation Analysis Inventory.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 145-146.

12610. Suchner, Robert W. & More, Douglas M. (Northern Illinois U) **Stereotypes of males and females in two occupations.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 1-8.—113 college-student male and female raters evaluated a male or a female civil engineer or custodian on 6 characteristics. Factor analysis identified 3 orthogonal dimensions in these ratings: Rationality, Emotionality, and Likability. Rationality correlated highly with occupational prestige, while Emotionality was uncorrelated with prestige. Likability ratings exposed an interaction between sex of rater and sex of ratee, female raters finding females in these occupations far less likable than males. It is concluded that the sex of an occupational incumbent may have important effects on stereotypical image associated with that individual. (21 ref)—*Journal abstract*.

12611. Talbert, Terry L. et al. (Atlanta Regional Commission, GA) **A study of the police officer height requirement.** *Public Personnel Management*, 1974(Mar-Apr), Vol 3(2), 103-110.—The height of police officers in Atlanta, Georgia, was not related to reports of police brutality or to the number of injuries incurred while on duty. However, assaults on police officers occurred more frequently among officers who are shorter. It is concluded that the height requirements of police officers should be reviewed.

12612. Triandis, Harry C.; Feldman, Jack M.; Weldon, David E. & Harvey, William M. (U Illinois) **Ecosystem distrust and the hard-to-employ.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 44-56.—Conducted a study of samples of blacks and whites, males and females, young and old, hardcore unemployed, and working- and middle-class individuals to investigate "ecosystem distrust." The term is defined as a distrust of people, things, and institutions in one's environment. The components include less trust in people, suspicion of the motives of others, rejection of authority figures and institutions of the establishment, and seeing the environment as malevolent. Consistency was obtained across a heterogeneous set of questions, suggesting the presence of ecosystem distrust among the black hard-core. The implications of these findings for training the hard-to-employ and their supervisors are discussed. (22 ref)—*Journal abstract*.

12613. Tuttle, Thomas C. & Cunningham, J. W. (North Carolina State U, Raleigh) **Affective correlates of systematically-derived work dimensions: Validation of the Occupation Analysis Inventory.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 147.

12614. Vitola, Bart M.; Mullins, Cecil J. & Brokaw, Leland D. (Lackland Air Force Base, Personnel Research Div, TX) **Quality of the all-volunteer Air Force: 1973.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 153-154.

12615. von Haller Gilmer, B. (Carnegie-Mellon U) **Applied psychology: Adjustments in living and work.** (2nd ed). New York, NY: McGraw-Hill, 1975. xii, 448 p. \$11.95.—Presents an introduction to the concepts,

research, and issues in applied psychology, emphasizing personal adjustments of the normal individual. Topics include bases for applying psychology to various aspects of life, individual development and change, career planning, and human aspects of work. (4½ p ref)

12616. Zafiran, S. James. (U Notre Dame) **A developmental model for the occupational socioeconomic status of American men.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 293-305.—Prior research suggests that psychological, sociological, and economic variables, measuring both differential and developmental dimensions, must be considered for an exhaustive analysis of adult vocational status. From the resulting estimated predictive model, the present study examined occupational socioeconomic status through 17 selected family, ecological, educational, ethnoreligious, and political predictor variables. The data were obtained from a national sample of 1,355 American men. Factor analysis supports the hypothesized existence of an educational-socioeconomic factor and a political identification factor, plus a less discrete religiosity factor. Path analysis confirmed that a respondent's education, adult social class, and father's occupational socioeconomic status were principal predictors of the respondent's occupational socioeconomic status. It is concluded that the main contribution of the present study is not the reconfirmation of findings but rather the merging of the findings into a factor analytic and developmentally sequenced path analysis model. (29 ref)—*Journal abstract*.

12617. Zellinger, David A.; Fromkin, Howard L.; Speller, Donald E. & Kohn, Carol A. (Purdue U, Krannert Graduate School of Industrial Administration) **A commodity theory analysis of the effects of age restrictions upon pornographic materials.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 94-99.—Examined the evaluation of pornographic material as a function of age restrictions and perceived degree of pornographic content. 64 male undergraduates received an experimental booklet containing statements allegedly taken from a book cover. Half of the Ss received an age restriction statement, while the other half did not, and half received a statement saying the book was definitely pornographic, while the other half did not. Results confirm the commodity theory prediction that the imposition of age restrictions upon pornographic materials increases their desirability. Data indicate that the restricted materials were not more valued because of the implication that they were more pornographic than unrestricted materials.—*Journal abstract*.

#### Occupational Guidance & Personnel Selection & Training

12618. Andrews, Hans A. (Kellogg Community Coll) **Beyond the high point code in testing Holland's theory.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 101-108.—Attempted to test and expand J. L. Holland's (1966) vocational development theory by utilizing more than a single high point code in classification of personality patterns of jobs. 89 male 21-55 yr olds with full-time jobs who were attending a community college were given the Vocational Preference Inventory. Significant positive results were obtained to support Holland's

premise that people search out environments and, hence, vocations that are compatible with their personalities. A more "refined" and/or "subtle" difference was shown in the personality-job relationships when 2 high point codes were used.—*Journal abstract.*

12619. Arvey, Richard D. & Mussio, Stephen J. (U Tennessee) **Determining the existence of unfair test discrimination for female clerical workers.** *Personnel Psychology*, 1973(Win), Vol 26(4), 559-568.—Studied test discrimination against the culturally disadvantaged, using multiple regression techniques. The total sample consisted of 266 predominantly white, female clerical workers. A regression equation using scores on 8 tests as predictors of ratings by supervisors of overall effectiveness yielded a coefficient of .36 for a sample of 168 Ss. 76 advantaged (A) and 74 disadvantaged (DA) Ss were chosen from the total sample on the basis of father's education and of scores on the Environmental Participation Index checklist. While the regression equation constructed from the larger sample predicted rated effectiveness better for A than for DA, it did not systematically under- or overpredict for either group. This finding is attributed to compensatory effects of tests with differential validity for A and DA groups included within the regression equation.—*J. McKillip.*

12620. Austin, David L. (Spin Physics, San Diego, CA) **Career path analysis can aid education and industry.** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 41-48.—Calls for cooperation between school counselors and industrial personnel workers to identify more clearly industrial career path characteristics, career entry requirements, and relationships to people-data-thing orientations. Recommendations focus on greater understanding of information-processing skills, commonality of requirements, and mutual inspection needs among counselors, students, and personnel workers.

12621. Baker, Larry D.; DiMarco, Nicholas & Scott, W. E. (U Missouri, St Louis) **Effects of supervisors' sex and level of authoritarianism on evaluation and reinforcement of blind and sighted workers.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 28-32.—Describes an experiment with 60 male and 60 female undergraduates selected on the basis of their scores on the Forced-Choice F scale (N. Berkowitz and G. Wolkon, 1964). Use of a factorial design, with authoritarianism and sex of Ss and vision of workers as the factors, revealed that blind workers were rewarded significantly more than sighted workers for identical performance and that no significant main effects occurred for level of authoritarianism and sex. No significant 2- or 3-way interactions were found. Although sex and level of authoritarianism affected attitudes toward the blind, they did not appear to affect reinforcement behavior. (18 ref)—*Journal abstract.*

12622. Baxter, Brent. (American Inst for Research, Pittsburgh, PA) **Review of selected federal and professional positions on the use of tests in employment.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 143.

12623. Birk, Janice M. (U Maryland) **Interest inventories: A mixed blessing.** *Vocational Guidance Quarterly*, 1974(Jun), Vol 22(4), 280-286.—Selectively reviews studies and position papers dealing with sex role

bias in using interest inventories with women. Bias against females has appeared not only in patterns of interest constructed for women into inventories as opposed to those constructed for men, especially in the Strong Vocational Interest Blank, but also in guidelines issued to counselors for interpreting patterns. In addition, stereotypes held by both counselors and clients have limited the occupations females are encouraged to consider. To correct these problems, inventories should offer the full range of occupations to both sexes, and females should be encouraged to choose from the whole range. (30 ref)—*C. A. Heikkinen.*

12624. Crites, John O. (U Maryland) **A reappraisal of vocational appraisal.** *Vocational Guidance Quarterly*, 1974(Jun), Vol 22(4), 272-279.—Reconceptualizes vocational appraisal, based on a synthesis of major approaches to career counseling, making it an organic, continuous part of career counseling and casting it into the context of theory and research. The appraisal becomes a collaboration between counselor and client which (a) yields person and problem appraisals, (b) distinguishes between the content and process of career decision making, (c) recognizes the efficacy of communicating test results in response to the client's thinking and talking about career choice, (d) furthers the client's present and future career development through active counselor intervention, and (e) applies principles of behavior modification as the *modus operandi*. (36 ref)—*C. A. Heikkinen.*

12625. Cunningham, J. W. (North Carolina State U, Raleigh) **"Ergometrics": A systematic approach to some educational problems.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 144-145.

12626. Dailey, K. Anne. (Lowry Air Force Base, Technical Training Div, Colorado) **Compressed speech: Potential application for Air Force technical training.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 139.

12627. Dansereau, D. R. et al. (Texas Christian U) **Factors related to developing instructional information sequences: Phase I.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 140.

12628. Dipboye, Robert L.; Fromkin, Howard L. & Wiback, Kent. (U Tennessee) **Relative importance of applicant sex, attractiveness, and scholastic standing in evaluation of job applicant résumés.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 39-43.—30 college students and 30 professional interviewers rated and ranked bogus résumés on suitability for a managerial position. Applicant sex, physical attractiveness, and scholastic standing were systematically varied in the résumés. A  $2 \times 2 \times 2 \times 3$  repeated measures analysis of variance on the ratings yielded 4 significant main effects ( $p < .05$ ), while the same analysis on the rankings yielded 3 significant main effects ( $p < .01$ ). Students rated applicants more favorably than professionals. Both groups preferred males to females, attractive applicants to unattractive applicants, and applicants of high scholastic standing. The latter variable accounted for the greatest proportion of variance. However, internal analyses of the rankings reveal that sex and physical attractiveness were more important than indi-



cated by the analysis of variance. (15 ref)—*Journal abstract*.

12629. Downey, Ronald G. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Associate evaluations: Nominations versus ratings.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 211.

12630. Dubin, Samuel S. (Pennsylvania State U) **Updating and midcareer development and change.** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 152-158.—Addresses the need for professionals at midcareer to keep up to date if their learning is to remain applicable. Due largely to rapid discovery of new knowledge and changes in personal and organizational objectives, knowledge becomes obsolete earlier than before, often by midcareer. Both psychological and organizational variables are critical to the updating process. These include (a) motivational factors related to perceived rewards, (b) organizational climate encouraging updating, (c) supervision fostering further development, (d) challenging problem-solving tasks, (e) colleague interactions, and (f) management philosophy requiring employee updating. (20 ref)—C. A. Heikkinen.

12631. Dunnette, Marvin D. (U Minnesota) **Personnel selection and job placement of disadvantaged and minority persons: Problems, issues, and suggestions.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12632. Edelstein, Robert M. & Rao, Vithala R. (Ben Gurion U of the Negev, Beersheva, Israel) **Subjective evaluations of employer attributes by administration students.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 109-120.—In an application of the conjoint measurement methodology, an exploratory study was conducted of the trade-off relationships among 4 organizational attributes—dynamism, societal concern, functional-administrative emphasis, and relative size—as they relate to the selection of an employer by students of administration. Preference ranks of 36 employer concepts obtained from 86 graduate students of business, public, and hospital administration were analyzed according to the additive conjoint measurement model, yielding implicit rank-ordering of the 4 organizational attributes as choice criteria. Irrespective of the program of study, dynamism and societal concern emerged as the most important determinants in employer selection, but differences existed among programs, year of study, and explicitly vs implicitly elicited weights.—*Journal abstract*.

12633. Edwards, Agnes M. & Whitcraft, Carol J. (U Texas, School of Social Work, Austin) **Vocational service agencies and the disadvantaged.** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 49-53.—Examined knowledge of, attitudes toward, and contacts with 4 vocational service programs—Manpower, vocational rehabilitation, Job Corps, and Youth Corps—among 512 households in a black, low-income urban community. Black interviewers collected data using a structured interview; several reliability checks were structured into the interviewing procedure. Results show that households possessed "good" information about only 1 agency, Manpower, and that households above the

Office of Economic Opportunity poverty level had significantly ( $p < .02$ ) greater knowledge of all agencies than those below. Most of the respondents expressed positive attitudes toward all agencies, vocational rehabilitation receiving the most positive ratings. Fewer than 10% of the households reported actual contact with any of the agencies. Findings suggest that none of the agencies is effective in reaching the people who need its services. Recommendations include improving communication with the disadvantaged community and involving it more in the work of the agencies.—C. A. Heikkinen.

12634. Fallentine, Bradley C.; Harris, Larry R.; Maginnis, Elene B. & Hanson, Arnold L. (System Development Corp, Santa Monica, CA) **Advanced development work resulting in inventory management (IM) individualized instruction materials.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 140-141.

12635. Fine, Sidney A. (W. E. Upjohn Inst for Employment Research, Washington, DC) **Counseling skills: A target for tomorrow.** *Vocational Guidance Quarterly*, 1974(Jun), Vol 22(4), 287-291.—Conceptualizes, in a maturation/development context, the 3 kinds of skills that make up human performance—functional skills, specific content skills, and adaptive skills—and relates them to the work of the vocational counselor. To provide more effective guidance, it is suggested that counselors and counselor educators must (a) re-examine their own functional skills and motivations for entering counseling, (b) re-evaluate what is essential for clients' making effective vocational choices, and (c) reorient their efforts in order more adequately to meet the needs of their clientele, which includes educational systems and organizations as well as individuals.—C. A. Heikkinen.

12636. Fivars, Grace. (American Inst for Research, Palo Alto, CA) **The critical incident technique: A bibliography.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 210.

12637. Fox, P. D. & Edmeades, M. R. (Darwin Community Coll, NT, Australia) **Selection and training of Papua New Guineans as 150 ton truck operators.** *Australian Psychologist*, 1974(Mar), Vol 9(1), 60-67.—Describes the training of indigenous personnel with limited experience. Job selection was based on 4 tests; (a) Figure Reasoning Test, a nonverbal intelligence test, (b) SRA Mechanical Aptitude Test, (c) Pacific Vocational Interest Analysis, and (d) Pacific Reading Comprehension Test, Form L. The use of a systematic analytic method and a Link Simulator saved training time and manpower.—J. C. Figurelli.

12638. Fromkin, Howard L. et al. (Purdue U) **An evaluation of human relations training for police.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 206-207.

12639. Fromkin, Howard L. & Ostrom, Thomas M. (Purdue U) **Laboratory research and the organization: Generalizing from lab to life.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12640. Ghiselli, Edwin E. (U California, Berkeley) **The validity of aptitude tests in personnel selection.** *Person-*

*nel Psychology*, 1973(Win), Vol 26(4), 461-477.—Summarizes information on criterion-related validities for 20 categories of personnel selection tests published 1920-1971 for 21 occupational categories. Mean validity coefficients, weighted by number of cases, were computed for prediction of training (predictive validity) and job proficiency (concurrent validity). For all tests combined, predictive validity (.39) was better than concurrent validity (.22). Predictive validity was greatest for tests of intellectual abilities (for managerial, clerical, protective, service, and industrial occupations, and for trades and crafts), and to a lesser extent for tests of spatial and mechanical abilities (managerial and industrial occupations, vehicle operators, and trades and crafts). Concurrent validity was greatest for tests of intellectual abilities (managerial, clerical, and service occupations, trades and crafts, and salesmen but not sales clerks), for personality tests (sales and industrial occupations, vehicle operators, and trades and crafts), and for tests of perceptual accuracy (managerial, clerical, and industrial occupations, and trades and crafts).—*J. McKillip*.

12641. **Gott, C. Deene.** (Lackland Air Force Base, Computational Sciences Div, TX) **Development of the Weighted Airman Screening System for the Air Reserve forces.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 154.

12642. **Hansen, D. N. et al.** (Florida State U) **Computer-based adaptive testing models for the Air Force Technical Training Environment Phase I: Development of a computerized measurement system for Air Force technical training.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 205.

12643. **Hansen, Duncan H. et al.** (Florida State U, Ctr for Computer Assisted Instruction) **The analysis and development of an adaptive instructional model(s) for individualized technical training: Phase I.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 139.

12644. **Hellervik, Lowell W.** **Behavior change: Strategies for human development among disadvantaged minorities.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12645. **Helme, William H.; Willemin, Louis P. & Grafton, Frances C.** (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Prediction of officer behavior in a simulated combat situation.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 212-213.

12646. **Henry, Peter H.; Turner, Roy A. & Matthie, Robert B.** (US Air Force School of Aerospace Medicine, Brooks Air Force Base, TX) **An automated system to assess pilot performance in a Link GAT-1 trainer.** *USAF School of Aerospace Medicine Technical Report*, 1974(Oct), No 74-41, 67 p.—Describes the design and circuitry of a prototype control and scoring system which automatically presents pilot-trainees with an hour-long series of maneuver requests providing a laboratory approximation of a cross-country flight on instruments in a single-engine light aircraft. Performance is scored electronically in terms of how closely Ss are able to stay within the tolerances prescribed for various flight instruments as they execute the series of maneuvers.

Major components of this non-computer-based system are (a) 2 Link GAT-1 trainers, (b) special display panels mounted in the cockpit of each trainer, (c) a central control station, (d) an assembly of special-purpose analog and digital logic for error detection and scoring, and (e) paper tape perforators for data logging. Results of performance tests using this system are reported elsewhere.—*Journal abstract*.

12647. **Hill, John W. & Eddowes, Edward E.** (Stanford Research Inst, Menlo Park, CA) **Further development of automated GAT-1 performance measures.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 222-223.

12648. **Hohenshil, Thomas H.** (Virginia Polytechnic Inst & State U) **Inventoried vocational interests of vocational counselors.** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 24-27.—Examined interests of 75 Ohio public school vocational counselors using the Kuder Occupational Interest Survey. As expected, results showed Ss' highest interests in helping relationships and people-contact areas, and lowest in data- and thing-oriented areas.

12649. **Johnson, Richard W. & Campbell, David P.** (U Wisconsin, Counseling Ctr, Madison) **Basic interests of men in 62 occupations.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 373-380.—Used the 22 basic interest categories on the Strong Vocational Interest Blank for Men to classify the interests of men in 62 occupations. The number of basic items which differentiated the interests of men in the occupation from men-in-general was divided by the total number of basic items for each category. These percentages were then ranked in descending order so that the relative importance of different types of interests for various occupations could be easily determined. Results show that at least 9 categories were required to describe adequately the interests of most occupational groups. It is concluded from this finding and other data that individuals need to consider a variety of interest factors in determining their educational and vocational plans.—*Journal abstract*.

12650. **Joyce, Reid P. & Chenzoff, Andrew P.** (Applied Science Assoc, Valencia, PA) **Improving job performance aids through condensation, dual-level presentation, promotion of learning, and entry by malfunction symptoms.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 159-160.

12651. **Katz, Arnold.** (U Pittsburgh) **Schooling, age, and length of unemployment.** *Industrial & Labor Relations Review*, 1974(Jul), Vol 27(4), 597-605.—Examined the role of schooling in the unemployment of older workers. Findings indicate that the loss of the initial advantages of schooling accounts for a considerable part of the lengthening of the unemployment period characteristic of the older segments of the labor force.

12652. **Lunneborg, Patricia W.** (U Washington) **Can college graduates in psychology find employment in their field?** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 159-166.—Studied 424 baccalaureate psychology graduates from the University of Washington, 1969-1972, whose program was vocationally rather than academically oriented, to determine success in finding employment in psychology. Data were available primarily from a postcard survey in spring 1973, which had a



74% response. Coded responses were subjected to chi-square analyses. 67% were working full- or part-time, mainly in education and business; 22% were in school; and 11% were unemployed (these percentages were better than those for psychology graduates nationwide); 25% were in jobs directly related to psychology. Supplementing psychology courses with courses in another area was significantly ( $p < .01$ ) related to employment status, while grade point averages and psychology grades were unrelated to employment. 16% of the respondents said that job finding difficulties were related to their degree program. Employed graduates were significantly ( $p < .001$ ) more satisfied with their degree work than the unemployed.—C. A. Heikkinen.

12653. Magee, Richard H. (Booz, Allen & Hamilton, Chicago, IL.) **How to sell a career opportunity.** *Personnel Journal*, 1974(Aug), Vol 53(8), 583-588.—Describes employment interviewing procedures helpful in persuading an applicant to accept a job offer. The psychology of persuasion and selling techniques are discussed.

12654. Maier, Milton H. & Fuchs, Edmund F. (US Army Research Inst for the Behavioral & Social Sciences, Arlington, VA) **Effectiveness of selection and classification testing.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 209.

12655. Mazzuchi, John F. & Gilbert, Arthur C. (Office of the Deputy Assistant Secretary of Defense for Drug & Alcohol Abuse, Pentagon, Washington, DC) **Granting occupational preference to Marine recruits: A solution or a problem?** *Vocational Guidance Quarterly*, 1974(Sep), Vol 23(1), 61-67.—Examined 738 Marine recruits for firmness of 1st occupational choice and relationship of choices to aptitude test scores. Findings indicate that low firmness of choice and choice-aptitude relationships are unusable for selection, continued Marine Corps stress on available occupational training may be better for attracting recruits than guaranteeing occupational choice.

12656. McCombs, Barbara L. et al. (McDonnell Douglas Corp, St Louis, MO) **Media adjunct programming: An individualized media-managed approach to academic pilot training.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 141.

12657. McCreary, David F. & Valentine, Lonnie D. (Lackland Air Force Base, Personnel Research Div, TX) **Validation of two aircrew psychomotor tests.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 158-159.

12658. Miller, Michael F. (Queensborough Community Coll, City of New York) **Relationship of vocational maturity to work values.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 367-371.—Examined the relationship of vocational maturity to work values, testing 2 hypotheses: (a) Vocational maturity is positively related to differentiation of work values within Ss. (b) Vocational maturity is positively associated with intrinsic work values and negatively associated with extrinsic work values. Ss were 24 males and 38 females (mean age = 22.10) enrolled in remedial reading at a community college. They were administered the Vocational Development Inventory-Attitude Scale and the Work Values Inventory. Data analyses support Hypothesis (a)

for females, but not for males, and partially support Hypothesis (b).—*Journal abstract.*

12659. Miller, Robert B. (American Inst for Research, Silver Spring, MD) **A method for determining task strategies.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 159.

12660. Miller, Robert E. (Lackland Air Force Base, Personnel Research Div, TX) **Optimal assignment of Air Force pilots.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 152.

12661. Morano, Richard A. (Xerox Corp, Rochester, NY) **A new concept in personnel development and employee relations.** *Personnel Journal*, 1974(Aug), Vol 53(8), 606-611.—Discusses traditional occupational psychology and argues that personnel development should embrace and unite selection, assessment, career guidance, training and continuing education, utilization of skill inventories, career ladders, transfers, and placement.

12662. Morano, Richard. (Xerox Corp, Rochester, NY) **Determining organizational training needs.** *Personnel Psychology*, 1973(Win), Vol 26(4), 479-487.—Discusses 3 methods of assessing needs for specific remedial training of current work force: (a) survey both of managers of functional groups and of candidates for training; (b) manpower analysis of technical obsolescence; and (c) organizational analysis focusing on product conception and development.

12663. Nafziger, Dean H.; Holland, John L.; Helms, Samuel T. & McPartland, James M. (Johns Hopkins U) **Applying an occupational classification to the work histories of young men and women.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 331-345.—Used J. L. Holland's occupational classification to analyze the work histories of a national representative sample of 5,000 men and 5,000 women aged 14-24 yrs. Hypotheses tested were concerned with the psychological orderliness of occupational changes, the relationship between occupational experiences and aspirations, and the relationship between consistent occupational codes and the stability of work histories. Analyses support the usefulness of the occupational classification for organizing the work histories of both young men and young women. For both sexes, the classification reflected regular patterns of job changes. The category of a person's earlier job was an efficient predictor of a person's subsequent jobs; likewise, the category of a person's current job forecasted the category of his vocational aspiration. The consistency of an occupational code was also related to job stability for whites but not for blacks. (27 ref)—*Journal abstract.*

12664. Nordberg, Robert B. (Marquette U, School of Education) **Meditation: Future vehicle for career exploration.** *Vocational Guidance Quarterly*, 1974(Jun), Vol 22(4), 267-271.—Recommends meditation and other forms of mysticism as a means of career exploration through heightened self-understanding, and as a balance to the findings of the objective scientific approach. The methods and circumstances of meditation for this purpose depend largely on the choice between naturalistic and supernaturalistic approaches to mystical knowledge.

12665. Odell, Charles E.; Pritchard, David H. & Sinick, Daniel. (Bureau of Employment Security, Harrisburg, PA) **Whose job is job placement?** *Vocational Guidance Quarterly*, 1974(Dec), Vol 23(2), 138-145. —Discusses who is responsible for job placement in the transition from secondary school to work. It is suggested that greater cooperation is needed among individual schools' placement services and outside resources such as the community, the employment service, and the US Office of Education. Program development should stress establishment of goals and objectives, follow-up and critical feedback, evaluation, and redesign. Ideally, the placement process both puts individuals into growth-fostering situations and follows through so that the individual has help available even after leaving school, including help in moving from work to school.—C. A. Heikkinen.

12666. Olmstead, Joseph A.; Cleary, Fred K.; Lackey, Larry & Salter, James A. (Human Resources Research Organization, Alexandria, VA) **Development of leadership assessment simulations.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 212.

12667. Parsons, George E. & Wigtil, James V. (U Cincinnati) **Occupational mobility as measured by Holland's theory of career selection.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 321-330.—Examined the occupational mobility of men aged 45-59 yrs as measured by J. L. Holland's (1966) theory of career selection and its relationship to men in the work force. Ss were a total of 5,030 black and white US men in 235 sample areas comprising 485 counties and independent cities, representing every state and the District of Columbia. Stability was discussed in 2 distinct ways, within a job and in the kind of work a man does over a career. In his research, Holland concluded that Realistic and Investigative personality types would change personality type less often and have more stable job choices in comparison to other personality types. Results of this study support these findings to some extent. However, it is concluded that stability in a personality type was strongly influenced by the number of jobs available in a particular personality type and the structure of the labor market demand. Results also show that psychological concepts seem to be more important in changing jobs than in selecting initial jobs.—*Journal abstract*.

12668. Pilato, Guy T. & Myers, Roger A. (Pennsylvania State U, Ritenour Health Ctr) **The effects of computer-mediated vocational guidance procedures on the appropriateness of vocational preference.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 61-72.—To assess the effectiveness of vocational guidance procedures proposed for inclusion in a computer-based vocational exploration system, 139 11th-grade males were randomly assigned to 3 experimental groups and a control group. Group 1 was given a computer-generated accuracy of self-knowledge feedback; Group 2 was taught an occupational classification scheme, and Group 3 experienced both. Utilizing a method of explicit comparison between Ss' measured characteristics and the measured characteristics of occupational norm groups, results show Ss in the groups receiving feedback increased in the appropriateness of the occupational level of their 1st occupational choice. In addition, Ss in

the combined treatment group increased in the appropriateness of the level of their total occupational preferences. A delayed posttest indicated that these increases persisted. (29 ref)—*Journal abstract*.

12669. Plata, Maximino. (U Texas, Special Education, El Paso) **Stability and change in the prestige rankings of occupations over 49 years.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 95-99.—Review indicates that the social status of occupations has remained stable over a 49-yr period beginning with G. S. Counts's 1925 study that found occupations in a well-defined, prestige order. This prestige hierarchy has obtained throughout several replicated studies, some of which controlled the variables of race, educational level, and sex. Results of the present replication study with 117 Anglo- and 129 Mexican-American young adults (mostly college students) also support this prestige hierarchy. It is concluded that the prestige level of occupations have withstood the test of time, including World War II and even sociological and educational changes.—*Journal abstract*.

12670. Porat, Avner M. & Ryterband, Edward C. **Career preference, choice, and attainment for members of minority groups.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12671. Pritchard, Robert D.; Leonard, Dale W.; von Bergen, Clarence W. & Kirk, Raymond J. (Inst for Organizational Behavior Research, Lafayette, IN) **The effects of varying schedules of incentive delivery on technical training.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 211.

12672. Ronan, W. W.; Jourdan, Louis F. & Messer, Lee. (Georgia Inst of Technology) **Job performance evaluation of nurses and nursing aides.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 212.

12673. Samers, Bernard N.; Dunham, Alan D. & Nordhauser, Fred. (Cooper & Co, Stamford, CT) **The development of a methodology for estimating cost of Air Force on-the-job training.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 150.

12674. Schweitzer, Stuart O. & Smith, Ralph E. (Georgetown U) **The persistence of the discouraged worker effect.** *Industrial & Labor Relations Review*, 1974(Jan), Vol 27(2), 249-260.—Discusses the hypothesis that the experience of an unsuccessful job search increases the propensity to withdraw from the labor force—the discouraged worker effect. Almost 3% of the labor force is estimated to withdraw during periods of high unemployment. The literature on labor force participation is reviewed, and a preliminary labor participation model is developed based on a 1966-1968 longitudinal survey of male youths. A worker's decision to remain in the labor force is considered influenced by his perceived chance of satisfaction from remaining and determined by his past experiences with unemployment. Evidence indicates the discouraged worker effect has a significant dynamic component, implying that the psychological impact of unemployment persists over time.—R. Tomasko.

12675. Siegel, Arthur L.; Federman, Philip J. & Sellman, Wayne S. (Applied Psychological Services, Wayne, PA) **A survey of student measurement and**



course evaluation procedures within the Air Training Command. *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 206.

12676. Sinalko, H. Wallace; Guthrie, George M. & Abbot, Preston S. (Inst for Defense Analyses, Arlington, VA) Training Vietnamese to operate and maintain complex military equipment. *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 160.

12677. Singer, Jack N. (Colorado State U) Sex differences-similarities in job preference factors. *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 357-365. —Investigated sex differences in preferences for various job factors which college students consider important in their job selection decisions. Ss were 55 female and 75 male undergraduates. Results show that while college students had strong differences in their preferences, these differences were not stereotypically male or female. Overall, both males and females were primarily looking for jobs in which they could learn, accomplish something worthwhile, and work with congenial people. Furthermore, the extent to which a company demonstrated broad social concern was not among the important criteria used by students when making their decisions. (24 ref)—*Journal abstract*.

12678. Torres, Felipe T. Vocational/technical education and the changing Philippine society: A value approach. *St. Louis University Research Journal*, 1973(Jun), Vol 4(2), 227-239. —Describes the Philippine educational system and its ensuing manpower needs. Suggestions and recommendations are made for developing an approach so that the educational system will produce the types of workers needed by the manpower system.

12679. Turner, Barbara F. & McCaffrey, Joanne H. (U Massachusetts, School of Education, Amherst) Socialization and career orientation among black and white college women. *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 307-319. —Compared (a) patterns of career preferences and career expectations among black and white college women and (b) developmental antecedents of career expectation among these women. Ss were 28 black and 45 white freshmen at a large state university. Support was found for hypotheses derived from postulates of J. B. Rotter's (1954) social learning theory. Compared to whites, blacks (a) were less likely to expect the level of work involvement preferred, (b) expected more employment, and (c) were more likely to prefer less employment than they realistically expected. Antecedents of career expectation were categorized as internal, external, or neutral. As hypothesized, variables expressive of external control predicted level of career expectation among blacks, whereas variables expressive of internal control predicted high career expectations among whites.—*Journal abstract*.

12680. Turner, Robert G. & Horn, Joseph M. (U Texas, Austin) Standard psychological test responses of a group of Mexican-Americans. *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 210.

12681. Waldron, L. A. (Public Service Board, Barton, ACT, Australia) The validity of an employment interview independent of psychometric variables. *Australian Psychologist*, 1974(Mar), Vol 9(1), 68-77. —Reports on interviews with 118 candidates for the Royal Australian

Navy conducted by 9 psychologists. Interviewers were required to make a prediction, rating, or decision about candidates' all-around success before the interview on the basis of available test and biographical information. After the interview they also assessed motivation to enlist and ability to adjust to the naval environment. The Ss' mean age was 18 yrs 5 mo and mean IQ was 103.05. The final global prediction of success in the Navy did not significantly increase the validity of predicting success based on 4 tests and a life history. Interviewers were successful to a significant degree ( $p < .05$ ) in predicting supervisors' ratings after 9 mo of service. Motivation and social adjustment appeared to offer most scope for valid interviews. Prediction of training results based on intelligence tests was stronger and more cost-effective than predictions based on interviews. (15 ref)—*J. C. Figurelli*.

12682. Webb, Sam C. (Georgia Inst of Technology) Transferability of a role-oriented interest inventory from men to women in church-related occupations. *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 347-356. —Examined the feasibility of using the Inventory of Religious Activities of Interests (IRAI) and the extensive data for men associated with the IRAI in the counseling of women who may be interested in entering occupations related to the Protestant Church. Ss were 670 women and 3,618 men (mean age = 43.3 yrs) employed in a variety of church-related occupations. Mean scores on the 10 scales of the IRAI for men and women in 9 categories of church-related occupations and for the total sex groups were compared with respect to similarity of shape of mean score profile and with respect to the level of mean scores. In addition, the ability of the IRAI to differentiate among groups (11 for women, 10 for men) for the sexes separately was considered. Results suggest that while men and women as total groups appear to differ in their interests as measured by the IRAI, the data for men and women in the respective specialties are sufficiently similar in respect to profile shape and mean score level to justify the use of the IRAI and the normative data for men in the counseling of women. Results suggest the IRAI differentiates among subgroups of men more effectively than it does among subgroups of women; but there are data to suggest that this difference may be more apparent than real.—*Journal abstract*.

12683. Wiley, Llewellyn N. (Lackland Air Force Base, Occupational Research Div, TX) Across-time prediction of the Performance of airman administrators and mechanics. *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 213-214.

### Job Performance & Satisfaction

12684. Alutto, Joseph A. & Belasco, James A. (State U New York, Buffalo) Determinants of attitudinal militancy among nurses and teachers. *Industrial & Labor Relations Review*, 1974(Jan), Vol 27(2), 216-227. —Tested the hypothesis that intra- and intergroup variations in militancy may be associated with the nature of both the profession and the employing institution. A questionnaire was administered to 414 teachers employed in 2 school districts and 482 registered nurses employed in 3 general hospitals. Results indicate that age is an

important discriminator of attitudinal militancy and confirm the 2 contributing factors suggested in the hypothesis. Job autonomy, participation in decision making, salary, and conditions of professional practice appear most likely to influence the level of attitudinal militancy. Results suggest the need for employing organizations to provide a differentiated professional hierarchy that permits several steps of advancement for practicing professionals. (22 ref)—*R. Tomasko.*

12685. **Beusse, William E.** (US Air Force Human Resources Lab, Manpower Development Branch, Alexandria, VA) **Documentation of the 1973 Department of Defense (DoD) Personnel Survey.** *Catalog of Selected Documents in Psychology*, 1975(Win), Vol 5, 208.

12686. **Broedling, Laurie A.** (US Navy Personnel Research & Development Ctr, San Diego, CA.) **Relationship of internal-external control to work motivation and performance in an expectancy model.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 65-70.—Conducted a study of 80 officer and 127 enlisted Naval personnel to investigate the hypotheses that internality (perception of much control) is positively related to (a) the concept of instrumentality from expectancy theory, (b) work motivation as measured by ratings and by expectancy theory measures, (c) job performance as measured by ratings, and (d) rank. These hypotheses were confirmed at or beyond the .05 significance level. A multitrait-multirater matrix showed convergent but no discriminant validity for ratings by supervisors, peers, and the Ss themselves on the Ss' job effort and performance.—*Journal abstract.*

12687. **Bulák, Jozef.** [Interpersonal relationships and work behavior in small work groups.] (Slovak) *Syntéza*, 1972(Nov), Vol 5(4), 132-139.—Conducted a correlational study of work motivation of 200 construction workers working in 32 teams. Team efficiency, acceptance of management objectives, average hourly earnings, satisfaction with rewards, and satisfaction with work were positively related to group solidarity, interpersonal confidence, and the social status of the group leader. Team efficiency and acceptance of management objectives correlated significantly with group leader's work status. The group's response to underproductive group members, in the form of frustration and resignation, correlated negatively with work variables, while punitive response correlated positively and more widely. Group solidarity was significantly related to initiating structure and to group centeredness. Defending group interests against management negated the group's confidence in the equity of compensation. Recommendations for small group leadership are presented. (English, Russian, French & German summaries)—*P. Babarik.*

12688. **Bulák, Jozef.** [Turnover and absenteeism as an expression of work motivation.] (Slovak) *Syntéza*, 1972(Feb), Vol 5(1), 1-9.—Studied the social and material reward factors affecting turnover and absenteeism among 173 Slovak building construction workers. A questionnaire was administered covering satisfaction with compensation, the interest of the job, future prospects, and interpersonal relationships. Responses were correlated with absenteeism, and with intention to leave the job or remain, for workers classified as efficient and inefficient. Significantly correlated with permanence

were good on-the-job reputation, recognition of one's work, fair treatment, confidence in team achievement, team spirit, satisfaction with net compensation, and satisfaction with work organization. In general these relations were strong, or held, only for the efficient workers. For absenteeism chi-square relationships were similar except that confidence in one's team characterized efficient workers and the reverse characterized absentees ( $p < .05$ ). In addition, absentees showed less motivation to group solidarity. (English, French, & Russian summaries)—*P. Babarik.*

12689. **Cummings, L. L.** (U Wisconsin, Graduate School of Business, Madison) **A field experimental study of the effects of two performance appraisal systems.** *Personnel Psychology*, 1973(Win), Vol 26(4), 489-502.—Studied employee evaluations of 2 appraisal systems, the "old" system which centralized power in 2nd-level supervisor, provided for no feedback on appraisal, and did not allow for employee input regarding technology of appraisal, and the "new" system which centralized power in 1st-level supervisor and provided for feedback on appraisal and input into technology of appraisal. A pre- and posttest, group comparison design was utilized in which 140 female operative employees from 8 work groups evaluated the old appraisal system and the linkage between the system and their pay on 3 semantic differential scales: evaluation, sensitivity, and clarity. After this evaluation the new appraisal system was introduced to 4 groups, who became more positive on all scales at posttest than the 4 groups remaining under the old appraisal system. (38 ref)—*J. McKillip.*

12690. **Darmon, René Y.** (U Laval, Québec, Québec, Canada) **Salesmen's response to financial incentives: An empirical study.** *Journal of Marketing Research*, 1974(Nov), Vol 11(4), 418-426.—Hypothesized that different behavioral patterns explain salesmen's responses, in terms of their sales and earnings, to financial incentives. The suggestion that salesmen work just enough to attain what they consider an acceptable level of income was supported. (22 ref)

12691. **Desai, K. G.** (Tata Inst of Social Sciences, Bombay, India) **Absenteeism: A problem solving approach.** *Indian Journal of Social Work*, 1974(Jul), Vol 35(2), 149-154.—In general, 3 factors contribute to absenteeism: the social-cultural background of the employees, job-related problems, and personal difficulties. A description of these factors and an outline for conducting a systematic study are given. It is concluded that absenteeism cannot be fully eradicated, and that its specific causes are unique from 1 organization to another.

12692. **Hackman, J. Richard & Oldham, Greg R.** (Yale U) **The Job Diagnostic Survey: An instrument for the diagnosis of jobs and the evaluation of job redesign projects.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 148-149.

12693. **Hall, Douglas T.** (Michigan State U) **Pressures from work, self, and home in the life stages of married women.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 121-132.—Following H. A. Lopata's (see PA, Vol 41:506) model of the life cycle of the married woman's role, it was predicted that a woman's life stage would be related to her role pressures (work, home, self, and time).



conflict, and satisfaction. Results of a mailed questionnaire returned by 229 women who graduated from college between 1948 and 1968 confirm the prediction. Age and number of roles were not as strongly related to these variables as was life stage. Work activities and pressures declined through the peak child-rearing stage and then increased for women with older children, while pressures from home generally rose throughout the life cycle. The differential impact of various sources of conflict in different life stages is reported, and forms of organizational career support oriented toward particular life stages are suggested. (19 ref)—*Journal abstract.*

12694. Horvat, Milan. [Theoretical and practical aspects of motivation in Slovenian industry.] (Slo) *Anthropos*, 1972, No 3-4, 37-50.—Evaluates the practical value of some contemporary theories of motivation for industrial applications in the context of the current workers' self-management system in Slovenia. The approaches suggested by A. H. Maslow, F. Herzberg, and V. H. Vroom are seen as having limited applicability to the socialist system. Several studies performed in Slovenian factories indicated that the most important motivational factors were personal income, work satisfaction, recognition for achievement, interesting work, possibilities of improvement, working conditions, and safety. The most demotivating factors were injustice in the distribution of income, underestimation of workers' abilities, dangerous work, and poor organization. Data on the opposition of a few workers to technological innovation are presented and reasons for such attitudes are discussed.—*S. Slak.*

12695. Johnson, Paul O. & Bledsoe, Joseph C. (Auburn U) *Morale as related to perceptions of leader behavior.* *Personnel Psychology*, 1973(Win), Vol 26(4), 581-592.—Studied the relationship of the morale of 197 Georgia Cooperative Extension agents to their perceptions of their immediate supervisors. Morale was assessed by a revised version of the Purdue Teacher Opinionnaire, and supervisor characteristics of consideration and initiating structure were assessed by the Leader Behavior Description Questionnaire. Agents' morale was correlated with both supervisor characteristics but consideration was almost as good a predictor of morale (.65) as a combination of both consideration and initiating structure (.66). White agents had significantly higher morale than did black agents, and agents with greater length of service had higher morale than those with less tenure. The greater importance of consideration than of initiating structure for agents' morale is discussed. (16 ref)—*J. McKillip.*

12696. Katz, Irwin. (Graduate School & University Ctr, City U New York) *Cultural and personality factors in minority group behavior: A critical review.* In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12697. Kenny, Martin T. *Public employee attitudes toward the four-day work week.* *Public Personnel Management*, 1974(Mar-Apr), Vol 3(2), 159-161.—Analyzed 1,744 replies to a questionnaire sent to employees of Oregon. If the extra day off is Monday or Friday, respondents favored the 4-day, 10 hrs/day plan by 68%. If the extra day was not Monday or Friday then only

24% favored the idea. A consistent minority was opposed to the plan.

12698. Kollárik, Teodor. [Workers' dissatisfaction as a reason for employee turnover.] (Slovak) *Syntéza*, 1973(Feb), Vol 6(1), 22-25.—Describes a correlational study relating worker dissatisfaction to turnover as the equivalent of the flight reaction to frustration. Data were obtained from 1,595 chemical factory employees concerning their satisfaction with their jobs, their proneness to quit, and their actual quitting rates. When the 215 most dissatisfied workers were compared with the 215 most satisfied workers on plans, thoughts, and desire to quit, there were significantly greater rates of intention to quit for the most dissatisfied. Worker dissatisfaction was significantly greater than satisfaction in workers less than 30 yrs old. After age 40, satisfaction exceeded dissatisfaction. The proportion of dissatisfied workers was closely correlated with turnover throughout the life cycle, being high below age 30 and low after age 40. (Russian, English, French, & German summaries)—*P. Babarik.*

12699. Latham, Gary P. & Baldes, J. James. (Weyerhaeuser Co, Human Resource Research, Tacoma, WA) *The "practical significance" of Locke's theory of goal setting.* *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 122-124.—Assessed the practical significance of E. Locke's theory (see PA, Vol 42:11263) of goal setting, using a time series design. Data were collected on the net weight of 36 logging trucks in 6 logging operations for 12 consecutive months. Results show that performance improved immediately upon the assignment of a specific hard goal. Company cost accounting procedures indicated that this same increase in performance without goal setting would have required an expenditure of a quarter of a million dollars on the purchase of additional trucks alone.—*Journal abstract.*

12700. Mangione, Thomas W. & Quinn, Robert P. (U Massachusetts, Boston) *Job satisfaction, counterproductive behavior, and drug use at work.* *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 114-116.—Conducted a study of 1,327 wage and salaried workers to determine whether the ecologically based inference that counterproductive behavior and drug use at work are symptoms of job dissatisfaction. There was a significant association between job satisfaction and self-reports of counterproductive behavior only among men 30 yrs old or older. Similar results were found for drug use at work.—*Journal abstract.*

12701. Morgan, Ben B.; Brown, Bill R. & Alluisi, Earl A. (U Louisville, Performance Research Lab) *Effects of 48 hours of continuous work and sleep loss on sustained performance.* *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 156.

12702. Reynolds, Michael. (Durham U, Business School, England) *Perceptual defence and Herzberg's methodology: A basis for understanding commitment to work.* *Interpersonal Development*, 1973-1974, Vol 4(3), 170-176.—Considers that one of the most influential explanations of motivation to work has been F. Herzberg's (1959, 1968) motivator-hygiene theory. Using a critical incident technique he demonstrated that satisfaction and dissatisfaction were associated with 2 distinct sets of job factors. The validity of this theory has been

questioned. As the method involves recall, the pattern of responses is as likely to be a manifestation of some defensive process, as a true indication of motivational disposition. Account is taken in the present article of earlier studies on the effect of ego-involvement on recall. It is proposed that the perceptual defense illustrated by Herzberg's studies can provide the basis for an alternative explanation of commitment to work. (24 ref)  
—*Journal abstract.*

12703. **Ronan, W. W. & Organt, G. J.** (Georgia Inst of Technology) **Determinants of pay and pay satisfaction.** *Personnel Psychology*, 1973(Win), Vol 26(4), 503-520. —Administered a questionnaire to 8,894 employees of a single company (34.2% usable returns). Sex, age, tenure, job level, and level of education were used as predictors of actual salary in multiple regression analysis. These factors plus actual salary were similarly used as predictors of satisfaction with pay. Analyses were computed separately for management and supervisory personnel, salaried nonsupervisory personnel, and hourly personnel. Coefficients of multiple determination for actual salary were .64, .41, and .20 for the 3 employee groups, respectively. Best predictors were education, job level, and age for management personnel; age, education, and job level for salaried workers; and tenure for hourly workers. Generally, the only predictor of satisfaction with pay was actual salary, although the correlation was low in all cases. Women hourly employees were paid significantly less than male hourly employees but were better satisfied with this pay. The lack of relationship between the predictors of actual salary and the predictors of satisfaction with pay is discussed with regard to rewarding and motivational aspects of pay. (51 ref)  
—*J. McKillip.*

12704. **Shapiro, H. Jack & Wahba, Mahmoud A.** (Iona Coll, Graduate Business School) **Frederick W. Taylor: 62 years later.** *Personnel Journal*, 1974(Aug), Vol 53(8), 574-578. —Studied job satisfaction, as measured by the Job Description Index, in 75 employees of a steel products manufacturer. Results indicate that Taylor's concept of money as a prime motivator of human efforts is still a viable hypothesis; it is concluded that these employees were not highly motivated by social, self-esteem, or self-actualization work-associated needs.—*P. L. Crawford.*

12705. **Shepard, Winifred O. & Hess, David T.** (State University Coll New York, Fredonia) **Attitudes in four age groups toward sex role division in adult occupations and activities.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 27-39. —Presented a list of 43 adult occupations to equal numbers of males and females in the following groups: 60 kindergartners, 68 8th graders, 86 college students, and 54 adults. Ss indicated whether each occupation should be performed by a male, female, or either. Liberality, defined in terms of the number of "either" responses, increased markedly from kindergarten to 8th grade through college and then showed a moderate decrease in the adult sample. In each age group except kindergarten there was a significant sex difference, with females being more liberal. Analysis of individual roles showed that both sexes were willing to let women into prestige occupations but females were more willing than males to have household and child-

caring tasks performed by both sexes. (18 ref)—*Journal abstract.*

12706. **Sheridan, John E.; Slocum, John W. & Min, Byung.** (Wayne State U, Coll of Business Administration) **Motivational determinants of job performance.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 119-121. —Studied V. Vroom's expectancy theory model in relation to work performance. 138 incentive workers employed in a steel fabricating plant participated in the study. The data indicate that the total expectancy model is a valid indicator of job performance, although the variances explained by the various parts of the theory were low. Several operational problems in defining the basic measures used in testing Vroom's theory are discussed.—*Journal abstract.*

12707. **Smith, Elsie J.** (State U New York, Buffalo) **Profile of the black individual in vocational literature.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 41-59. —Contends that, presently, research on the vocational development of black individuals—both adolescents and adults—constitutes a disparate body of knowledge. The present article examines the "state of the art" in this field, gathers together some of the diverse research strands symbolizing it, and presents, on the basis of the research reviewed, a profile of the black individual in vocational literature. It is suggested that the unification of reference group theory with vocational theories may potentially prove helpful in closing many of the gaps that currently exist concerning the psychology of the black's vocational development. (66 ref)—*Journal abstract.*

12708. **Stone, Eugene F. & Porter, Lyman W.** (Oakland U, School of Economics & Management) **Job characteristics and job attitudes: A multivariate study.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 57-64. —Obtained attitude data from 556 employees in a western telephone company. Respondents held 1 of 16 "craft" jobs in the department selected for study. Multiple discriminant function analysis was performed using 16 groups formed on the basis of Ss' job titles. Variables used in this primary analysis included job satisfaction, organizational commitment, motivational force, and sources of organizational attachment. Discriminatory power for the 16 group solution was .53. A secondary analysis was performed in which discriminant function means were related to means of jobs on several job characteristics variables. Viewed jointly these 2 analyses suggest that the relatively high discriminatory power achieved in the primary analysis may have been a function of job scope-job attitude relationship demonstrated in the secondary analysis.—*Journal abstract.*

12709. **Tracy, Lane.** (Ohio U) **The influence of noneconomic factors on negotiators.** *Industrial & Labor Relations Review*, 1974(Jan), Vol 27(2), 204-215. —Administered a questionnaire to 147 members of management and union negotiating teams engaged in 25 separate contract negotiations between July 1970 and February 1971. The effects of noneconomic factors on the attitudes of the Ss were measured using 72 scaled questions about Ss' attitudes toward satisfaction with the resulting contract, satisfaction with working relationship between the parties, and personal inclination to settle for the resulting contract. The specific factors measured



were drawn from the theoretical work of F. Herzberg, R. Walton, L. Festinger, and J. Adams. Results indicate that the settlement inclinations of the Ss were directly related to perceived equitability of the contract, perceived achievement, nature of the work itself, favorable recognition from teammates, and interpersonal relationships among the teammates. (15 ref)—*R. Tomasko.*

12710. Tuttle, Thomas C. & Hazel, Joe T. (Lackland Air Force Base, Occupational Research Div, TX) **Review and implications of job satisfaction and work motivation theories for Air Force research.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 149-150.

12711. Walls, Richard T. & Gulkus, Steven P. (West Virginia U, Coll of Human Resources & Education, Research & Training Ctr) **Reinforcers and vocational maturity in occupational aspiration, expectation, and goal deflection.** *Journal of Vocational Behavior*, 1974(Dec), Vol 5(3), 381-390.—Notes that when vocational aspirations and expectations are not the same, this difference is termed occupational goal deflection. The present study investigated the notion that such aspirations, expectations, and goal deflection are related to an individual's vocational maturity, education, and job reinforcers. Ss were 149 vocational rehabilitation clients (mean age = 25 yrs) and 51 graduate students (mean age = 29 yrs). Analyses of variance indicate that more vocationally mature Ss tended to display greater vocational aspiration, greater vocational expectation, and less goal deflection. Similarly, Ss who valued such job characteristics as "getting a feeling of accomplishment, fair company policies, trying out their own ideas, doing work without feeling it is morally wrong, making their own decisions, (and) planning work with little supervision" tended to have higher aspirations and expectations, but lower goal deflection.—*Journal abstract.*

12712. Weaver, Charles N. & Holmes, Sandra L. (St Mary's U San Antonio, School of Business & Administration) **A comparative study of the work satisfaction of females with full-time employment and full-time housekeeping.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 117-118.—Evidence from 2 recent national opinion surveys casts doubt on the hypothesis that sex role socialization results in lower reported work satisfaction among females who have full-time jobs compared to those who keep house full time. The only instance where the hypothesis appears to have applicability arises out of the reaction of female workers to low-salaried jobs which do not provide or contribute to a family income perceived as equal to or above that of the average American family.—*Journal abstract.*

12713. Weitzel, William; Pinto, Patrick R.; Dawis, René V. & Jury, Philip A. (U Minnesota, Industrial Relations Ctr) **The impact of the organization on the structure of job satisfaction: Some factor analytic findings.** *Personnel Psychology*, 1973(Win), Vol 26(4), 545-557.—Studied the factor structure of job satisfaction ratings as a function of organization. 1,099 salaried employees from 5 operating companies of a single corporation were surveyed concerning responses to 28 satisfaction scales. Responses by company were factor analyzed and individual company factors were further analyzed for subgeneral and general factors. 4 job satisfaction factors emerged for all companies: Satisfac-

tion with Personal Progress, with Compensation, with Organizational Context, and with Superior-Subordinate Relationships. The 1st 2 factors could be subsumed under the subgeneral factor, Satisfaction with Job, and the 2nd 2 factors under the subgeneral factor, Satisfaction with Organization. Both subgeneral factors could be subsumed under a general satisfaction factor. Although factor structures were generally similar in all companies, 2 groupings were found on the basis of coefficients of congruence for factors. (17 ref)—*J. McKillip.*

12714. Weller, Leonard & Nadler, Aryeh. (Bar-Ilan U, Ramat-Gan, Israel) **Authoritarianism and job preference.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 9-14.—Tested the hypothesis that authoritarian personalities prefer the natural sciences (specifically biology and chemistry) and nonauthoritarian personalities choose the social sciences and humanities (specifically, psychology and philosophy). Authoritarianism was measured in college freshmen Ss by means of a modified version of the California F Scale. Results strongly support the hypothesis. Since the study was conducted on freshmen in Israel who select their department at the time they apply for admission to the university, results are interpreted as indicating that authoritarians choose professions different from nonauthoritarians. (15 ref)—*Journal abstract.*

12715. Yom, B. Lee et al. (U Houston) **The factor structure of the Vocational Preference Inventory for black and white college students.** *Journal of Vocational Behavior*, 1975(Feb), Vol 6(1), 15-18.—Investigated whether the variables measured by the Vocational Preference Inventory (VPI) were the same for both black and white students. Kaiser et al (1969) have noted that the same measurements used with different populations may not measure the same variables and have presented a method of determining the degree of correspondence in the 2 populations. In the present study, the VPI scores for 115 black undergraduates and scores previously obtained from a group of white students were factor analyzed separately and the black structure was rotated to correspond to the white structure. The correspondence between the variables measured by the VPI for black and white students was found to be very similar, indicating that the VPI measures the same variables for both black and white college students.—*Journal abstract.*

### Management & Leadership

12716. Abrams, Alvin J.; Sheposh, John P. & Licht, Mark H. (US Navy Personnel Research & Development Ctr, San Diego, CA) **Description of an "ideal" change advocate in a technical Navy setting.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 152.

12717. Blumenfeld, Warren S. & Janus, Sidney Q. (Georgia State U) **Interrater reliability of a performance criterion for a very homogeneous group of managers.** *Psychological Reports*, 1974(Dec), Vol 35(3), 1076.—Using pair comparison, 4 raters rated 65 branch managers in 5 geographic regions. The 5 interrater reliability coefficients were satisfactory, showing extremely small individual differences between managers. Pair comparison is therefore recommended when a rating criterion is to be used and when group homogeneity might lead to the absence of systematic perception of differences.

12718. **Dolgoft, Thomas.** (Menninger Foundation, Topeka, KS) **Power, conflict, and structure in mental health organizations: A general systems analysis.** *Administration in Mental Health*, 1972(Win), 12-21.

—Proposes the use of general systems theory as a communication tool in mental health administration. A case study illustrates application of the theory. (19 ref)

12719. **Feldman, Saul (Ed.).** (NIMH, Div of Mental Health Service Programs, Rockville, MD) **Problems and prospects: Administration in mental health.** *Administration in Mental Health*, 1972(Win), 4-11.—Discusses the underlying conceptual issues, current problems, and the nature of mental health administration. The need for specialized training in this field is documented.

12720. **Gellerman, Saul W.** **Behavioral science in management.** Harmondsworth, England: Penguin, 1974. 133 p. \$2.25.—Provides specific examples of ways in which behavioral science has been used by companies to increase employee effectiveness. Concepts of personnel selection, management benevolence, and experimental intervention are examined.

12721. **Gruenfeld, Leopold & Kassum, Saleem.** (Cornell U, New York State School of Industrial & Labor Relations) **Supervisory style and organizational effectiveness in a pediatric hospital.** *Personnel Psychology*, 1973(Win), Vol 26(4), 531-544.—Examined the effect of supervisor style (i.e., employee consideration and initiation structure) on perceived organizational effectiveness to a hospital. 82 female nurses on the staff of a pediatric hospital were surveyed concerning supervisor's style and 3 effectiveness measures: satisfaction with supervisor, quality of patient care, and organizational coordination. Reported satisfaction with supervisor and quality of patient care were high only when rating of supervisor on employee consideration and initiation structure were both high. Reported organizational coordination was related only to rating of supervisor on initiation structure. It is concluded that both of the supervisor style dimensions are important for effective supervision. (19 ref)—*J. McKillip.*

12722. **Hunsaker, Philip L.; Mudgett, William C. & Wynne, Bayard E.** (U Wisconsin, Milwaukee) **The Leadership Assessment and Training Simulation: Training, assessment, and research implications.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 151.

12723. **Húska, Augustin M.** [The differential allocation of time to the creative phases of decision making in senior managers.] (Slovak) *Syntéza*, 1972(Feb), Vol 5(1), 10-13.—As part of a UNESCO research program, the International Academy of Management studied how best to develop and maintain the organizational creativity of top management. A panel of management scientists from the US, Western Europe, and Eastern Europe examined management decision making in enterprises from the US and 3 countries from both east and west blocs. Creative decision making had 5 phases: (a) data collection and verification; (b) weighing and analyzing the data; (c) applying creative, innovative imagination, and searching for new roads and ideas; (d) articulating the final decision and specifying alternatives and risks; and (e) implementing the decision and follow-up, especially overcoming obstacles. It was found that US executives devote most time to the 5th phase,

Western Europeans to the 4th phase, and Eastern Europeans to the 3rd phase. The differences between the US and Eastern European executives were in amount of risk and type of feedback. (English, French, German, & Russian summaries)—*P. Babarik.*

12724. **Jones, Allan P.; James, Lawrence R. & Bruni, John R.** (Texas Christian U, Inst for Behavioral Research) **Perceived leadership behavior and employee confidence in the leader as moderated by job involvement.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 146-149.—Examined the effect of job involvement upon the relationship between perceived leader behaviors and confidence and trust in the leader. 112 civil service and military engineering employees were subdivided into 2 groups on the basis of their job involvement scores. Results show that high-job-involvement Ss tended to have significantly lower correlations between confidence and trust and leadership variables.—*Journal abstract.*

12725. **King, Donald C. & Bass, Bernard M.** (Purdue U, Krannert Graduate School of Industrial Administration) **Leadership, power, and influence.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12726. **Kraut, Allen I.** (IBM Corp, Armonk, NY) **Prediction of managerial success by peer and training-staff ratings.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 14-19.—Examined the predictive validity of peer and training-staff ratings made under "real" conditions in an industrial situation. Ratings were obtained for 156 middle-level managers and 83 higher level executives attending a 4-wk training course. Analysis of 13 peer-related characteristics yielded 2 factors: Impact and Tactfulness. Follow-up showed that later success (promotion and performance appraisal) was predicted by most peer ratings mainly from the Impact factor. Training staff ratings were much weaker predictors and added little to the peer ratings. Broader use of peer ratings for executive selection is discussed. (15 ref)—*Journal abstract.*

12727. **Kuehl, Charles R.; DiMarco, Nicholas & Wims, Earl W.** (U Missouri, St Louis) **Leadership orientation as a function of interpersonal need structure.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 143-145.—Examined the relationship of interpersonal need structure as measured by the Fundamental Interpersonal Relations Orientation-Behavior Questionnaire (FIRO-B) to leadership orientation as measured by the Leadership Opinion Questionnaire (LOQ) and the Least Preferred Co-Worker Scale (LPC); Ss were 245 1st- and 2nd-level supervisors. The LPC score and the Consideration dimension of the LOQ were found to be positively related to all the FIRO-B scales except Expressed Control. Initiating Structure was positively related to Expressed Control. The LPC score was negatively related to Initiating Structure and positively related to Consideration.—*Journal abstract.*

12728. **Logan, Robert; O'Neil, Harold F.; Judd, Wilson A. & Harmon, E. Glynn.** (U Texas, Computer-Assisted Instruction Lab, Austin) **Technical literature review concerning management information systems.**



*Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 150-151.

12729. Moses, Joseph L. (American Telephone & Telegraph Co, New York, NY) **The development of an assessment center for the early identification of supervisory potential.** *Personnel Psychology*, 1973(Win), Vol 26(4), 569-580.—Compared results of the Early Identification Assessment program (EIA), a 1-day program for assessing and evaluating management potential in short-service employees, with those of the Personnel Assessment Program (PAP), which is currently used more widely but is more time-consuming. 85 white and black employees, men and women, who were evaluated by EIA staff as having high, moderate, or low management potential also took part in PAP. Overall management potential ratings correlated .73 for EIA and PAP, with similar correlations for all subgroups. Significant correlations were found for all variables common to both programs. The advantages of EIA over PAP for rapid assessment are discussed.—J. McKillip.

12730. O'Neil, Harold F.; Walker, Mary E. & Judd, Wilson A. (U Texas, Computer-Assisted Instruction Lab, Austin) **Feasibility and utility of an on-line information communication system in a research and development management and planning environment.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 151.

12731. Paine, Frank T. & Gannon, Martin J. (U Maryland, Behavioral Science Div) **Job attitudes of supervisors and managers.** *Personnel Psychology*, 1973(Win), Vol 26(4), 521-529.—Compared responses on job attitude survey of 404 supervisors and 317 managers employed in General Services Administration. Factor analysis of responses revealed 8 factors. Supervisors were significantly more negative on attitude items which loaded on factors labelled Equity of Rewards, Adequacy of Work Force, and Skill Utilization. Supervisors' negative orientation is discussed in relation to management practices within the organization.

12732. Recknagel, Kenneth H. (Leadership Development Assoc, Westwood, NJ) **Why management training fails and how to make it succeed.** *Personnel Journal*, 1974(Aug), Vol 53(8), 589-597. Points out that many efforts to improve managerial capability fall short of their goal and produce more talk and paperwork than substance. It is suggested that a new focus on the individual can make the difference between success and failure. 14 proposals, which range from personalizing the program to building an ethical system, show how the structure and process of any development effort can be improved.—P. L. Crawford.

12733. Rice, Robert W. & Chemers, Martin M. (U Utah) **Personality and situational determinants of leader behavior.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 20-27. —Tested hypotheses derived from F. Fiedler's (see PA, Vol 50:908) motivational hierarchy interpretation of least preferred co-worker (LPC) by observing the behavior of high- and low-LPC leaders of 32 3-man laboratory groups. High-LPC leaders showed greater variability in their behavior as a function of situational differences than did low-LPC leaders. Leader behavior differed as a function of leader attributes (LPC), situational factors (leader-member relations and task structure), and LPC  $\times$  Task Struc-

ture interactions. Results do not clearly support motivational hierarchy predictions. U. Foa, T. Mitchell, and F. Fiedler's (1971) cognitive analysis of the LPC, suggesting that the greater flexibility in behavior of high-LPC leaders is a consequent of a more complex cognitive structure, appeared more capable of accounting for these data. (18 ref)—*Journal abstract*.

### Organizational Structure & Climate

12734. Biles, George E. (Office of the Chief of Naval Operations, Shore Manpower Requirements Branch, Washington, DC) **Allegiances of unionized public employees toward employer and union.** *Public Personnel Management*, 1974(Mar-Apr), Vol 3(2), 165-169.—Surveyed by mail questionnaire 600 unionized public employees in Ohio and Kentucky, with 50% answering. These employees indicated less personal commitment either to employer or to the union than private sector employees have shown in other studies. It is suggested that the literature relative to union-employer relationships should be interpreted very carefully when applied to public employees.

12735. Bowen, Donald D. & Kilmann, Ralph H. (U Pittsburgh, Graduate School of Business) **Developing a comparative measure of the learning climate in professional schools.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 71-79.—Developed the Learning Climate Questionnaire (LCQ) to assess the learning climate of professional schools. 7 populations of students from 4 business schools and 1 nonbusiness professional school participated in this study ( $N = 455$ ). 5 factors were extracted from the LCQ (Grading Process, Physical Environment, Task Relationships with Faculty, Social Relationships with Faculty, and Course Material Presentation) which were fairly independent (average inter-correlations = .33) and had high internal consistency (average  $\alpha = .84$ ) across all samples. Comparisons of the objective properties of the schools and measures of overall student satisfaction with the LCQ factors suggest considerable validity of the instrument. Consequently, it seems appropriate to utilize the LCQ for substantive research investigations into the organizational dynamics of professional schools. (30 ref)—*Journal abstract*.

12736. Carlson, Gary B. (Central National Bank, Chicago, IL) **A human systems approach to coping with future shock.** *Personnel Journal*, 1974(Aug), Vol 53(8), 618-622.—Emphasizes that accelerating rates of change in the banking business must be met with modern approaches to human needs in the organization.

12737. Eisele, C. Frederick. (North Dakota State U) **Organization size, technology, and frequency of strikes.** *Industrial & Labor Relations Review*, 1974(Jul), Vol 27(4), 560-571.—Studied the relationship between the type and size of a manufacturing plant and the frequency of strikes at the plant. Medium-sized plants are indicated to have a greater frequency of strikes than very large or very small ones.

12738. Elliott, Ord & Penner, Donald D. (Purdue U) **The impact of social structure on organizational change.** In H. L. Fromkin & J. J. Sherwood (Eds), *Integrating the organization: A social psychological analysis*. New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12739. Fromkin, Howard L. & Sherwood, John J. (Eds.). (Purdue U) **Integrating the organization: A social psychological analysis.** New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.—Presents a series of separately authored chapters concerning the integration of minority groups into American organizations. The situation of blacks is stressed since more data are available.

12740. Fromkin, Howard L. (Purdue U) **A social psychological analysis of organizational integration.** In H. L. Fromkin & J. J. Sherwood (Eds.), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12741. Gavin, James F. (Colorado State U) **Organizational climate as a function of personal and organizational variables.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 135-139.—Conducted a study of 140 managerial level bank employees to determine the extent to which climate perceptions could be accounted for by measures of personal and organizational variables. Findings fail to support the expected interaction of personal and organizational measures but do indicate that personal and organizational variables alone accounted for significant amounts of variance in climate perceptions. (17 ref)—*Journal abstract.*

12742. Guion, Robert M. & Smith, Patricia C. (Bowling Green State U) **Motivation.** In H. L. Fromkin & J. J. Sherwood (Eds.), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12743. Lipták, Frantisek. [On structure and perspectives of contemporary organizational theory.] (Slok) *Syntéza*, 1972(Nov), Vol 5(4), 143-151.—Reviews world and Czechoslovak literature on organizational theory and systematically classifies various authors into a taxonomy with 5 objective foci, or criteria of theory, and 9 aspects, or levels of abstraction; i.e., with 45 cells in all. The criteria and abstraction levels are specified. A survey of 190 books (of approximately 900 in the field) showed management activity most studied, and universal or grand theory least. The social-psychological and mathematical approaches were found most utilized and the physiological, cybernetic, sociological, and system theory least utilized. No theory fitted any category perfectly and all theories combined elements from other categories. Different emphases were found in different countries. (33 ref)—*P. Babarik.*

12744. Mangham, I. L. (U Bath, School of Management, England) **Facilitating intraorganizational dialogue in a merger situation.** *Interpersonal Development*, 1973-1974, Vol 4(3), 133-147.—Discusses the behavioral characteristics of merger situations and presents a case study of an organization development intervention in such a circumstance. An attempt is made to illustrate the complexity of mergers and to focus upon facilitating dialog and cooperation between erstwhile "victor" and "vanquished."

12745. Matoušek, Oldřich & Hladký, Aleš. [Man and the stress aspect of work.] (Slok) *Syntéza*, 1971(Nov), Vol 4(5), 137-144.—Presents a review of the application of the concept of stress to modern work and work organization. Concepts and models of stress are elaborated with emphasis on value factors, and categories of stressor situations—content of task, work methods called

for, and social-psychological aspects. Human stress reactions are considered in terms of motor, cognitive, and physiological functioning. A multivariate systematic approach to evaluating stress is called for. (English, French, German, & Russian summaries) (15 ref)—*P. Babarik.*

12746. Perlak, Ivan. [Force, resistance and participation in the process of implementing a planned change.] (Slok) *Syntéza*, 1972(Nov), Vol 5(4), 127-132.—Discusses and analyzes the essential characteristics of planned change in field force terms, identifying force for change, resistance to change, and participation in change as the 3 most important factors in the implementation of change. These are represented as being on a complementary continuum ranging from the dominance of the changers—the originators—and submission of the objects of change—the subordinates—and the inverse. Participation is considered as the optimal balance, or fulcrum, between either-side control. Implementation from the top down may work under certain, usually emergency conditions, but often entails great resistance. The inverse extreme may be characterized by dissipation of energy and change in subjective rather than objective situations. Resistance is not necessarily to the change but to the process of change. The actual approach to change should always take into account organizational characteristics; thus approaches to change may cover the entire continuum. (English, Russian, French & German summaries)—*P. Babarik.*

12747. Porter, Lyman W. (U California, Graduate School of Administration, Irvine) **Communication: Structure and process.** In H. L. Fromkin & J. J. Sherwood (Eds.), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12748. Roberts, Karlene H.; O'Reilly, Charles A.; Bretton, Gene E. & Porter, Lyman W. (U California, School of Business Administration, Berkeley) **Organizational theory and organizational communication: A communication failure?** *Human Relations*, 1974(May), Vol 27(5), 501-524.—Reviews the literature on the role and importance of communication in analyzing organizational behavior and in designing organizational research. (69 ref)

12749. Taylor, Dalmás A. (U Maryland) **Should we integrate organizations?** In H. L. Fromkin & J. J. Sherwood (Eds.), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

12750. Triandis, Harry C. (U Illinois) **Person perception: A review of the literature and implications for training.** In H. L. Fromkin & J. J. Sherwood (Eds.), *Integrating the organization: A social psychological analysis.* New York, NY: Free Press, 1974. xxiv, 370 p. \$14.95.

#### Human Factors Engineering & Safety

12751. Alluisi, Earl A.; Chiles, W. Dean & Smith, Richard P. (U Louisville, Performance Research Lab) **Human performance in military systems: Some situational factors influencing individual performance.** *Catalog of Selected Documents in Psychology*, 1974(Fal), Vol 4, 156.



12752. Beregovoi, G. T.; Krylova, N. V.; Soloveva, I. B. & Shibanov, G. P. [Assessing the effectiveness of human performance in space flight.] (Russ) *Voprosy Psikhologii*, 1974(Jul-Aug), No 4, 3-9.—Discusses the psychological assessment of the performance of astronauts under conditions of weightlessness, stimulus overload, isolation, and other unusual conditions encountered in space flight. The astronaut-spaceship system is more autonomous than any earthbound man-machine system, and the astronaut must function as observer, operator, troubleshooter, and controller of flight parameters. The assessment of the performance of astronauts under conditions of space flight should include the accepted general performance criteria, the psychophysiological characteristics of the astronaut himself, and his specific ability to perform in complex (e.g., emergency) situations. (English summary)—*L. Zusne*.

12753. Blomberg, Richard D. & Preusser, David F. (Dunlap & Assoc, Darien, CT) **Narcotic use and driving behavior. Accident Analysis & Prevention**, 1974(Sep), Vol 6(1), 23-32.—Data from interviews with methadone maintenance patients (experimental Ss) and nonaddicted controls indicate that experimental Ss were no worse drivers than controls either as methadone patients or as heroin addicts. Narcotic users may be able to compensate for drug effects while driving.

12754. Cross, Kenneth D. & de Mille, Richard. (Anapaca Sciences, Santa Barbara, CA) **Human factors in bicycle-motor vehicle accidents. Catalog of Selected Documents in Psychology**, 1974(Fal), Vol 4, 158.

12755. Dirken, J. M. & Klinkhamer, H. A. (Delft U of Technology, Netherlands) **Education and training in ergonomics in the Netherlands. Ergonomics**, 1974(Nov), Vol 17(6), 709-715.—Results of a survey suggest that much expansion is needed in the curricula of technological universities and higher vocational schools and that new courses shift the stress from physiological and psychological theory to technical, designing, and organizational applications and from diagnosis to prevention. (French & German summaries)

12756. Foley, William L. **High-speed rotating mirror system for wide-angle image projection. US AFHRL Technical Report**, 1974(Jun), No 74-42, 49 p.—Investigated the utilization of a continuous wave laser as a power source for projecting video display information. This was to be combined with modulation and deflection methods that would permit development of a wide field-of-view projective system using a single display channel. 2 designs for a magnetic support system were explored, the 1st based on the "Q" coil principle, and the 2nd utilizing all solid state design with a differential pickup. Results indicate that in the 1st design drift was severe, but in the 2nd, stable support and rotation could be maintained over an indefinite period. It is concluded that the 2nd device, with further work, can be adapted to a wide-angle scan system.—*Journal abstract*.

12757. Fraser, T. M. (U Waterloo, Ontario, Canada) **Recreation, technology, and system safety. Human Factors**, 1974(Oct), Vol 16(5), 447-453.—Presents a model of a man-machine-environment complex in which each man-machine system defines for itself an operational environment from within the ecosphere. This

model has application to all design for human use and to operation of man-machine systems. Its specific application to recreation is shown in relation to 3 areas: (a) considerations of system safety in recreation; (b) responsibilities and liabilities of manufacturers of recreational equipment; and (c) responsibilities of researchers, human factors engineers, and those who supply manufacturers with operational design data. It is argued that safety management requires an epidemiological rather than a therapeutic or piecemeal approach, and that until safety is considered systematically as an objective in the design and operation of a man-machine-environment complex, the optimal cannot be attained.—*Journal abstract*.

12758. Hayes, Don. (U Waterloo, Ontario, Canada) **Risk factors in sport. Human Factors**, 1974(Oct), Vol 16(5), 454-458.—Identifies and classifies sports injuries, differentiates reasonable and unreasonable risk taking, and stresses factors—aspects of the roles of participant, entrepreneur, and the sport itself—important to the prevention of sports-related injuries.

12759. Healy, Charles C. (U California, Graduate School of Education, Los Angeles) **Evaluation of a replicable group career counseling procedure. Vocational Guidance Quarterly**, 1974(Sep), Vol 23(1), 34-40.—Reports 2 field evaluations of a replicable, 5-stage career counseling procedure based on D. E. Super's career development theory. Ss in the 1st study included 28 randomly selected junior college freshmen, meeting weekly in 6 groups for 5 wks. Half the groups began late and served as quasi-control Ss. The counselors were 8 inexperienced MA students. In the 2nd study, Ss were 24 volunteer junior college students, meeting weekly in 4 groups for 5 wks. Counselors included 6 inexperienced MA students and the author. Ss completed pre- and postmeasures including certainty of educational and career plans and 4 Career Development Inventory scales. Both studies indicated significant ( $p < .05$ ) change toward higher certainty in Ss undergoing the procedure, greater specificity of deliberation, and more occupational information. Findings suggest that a theoretically derived, replicable career counseling procedure can be used effectively by novice counselors. Discussion includes strengths, limitations and modifications of the procedure.—*C. A. Heikkinen*.

12760. Hendry, L. B. (U Aberdeen, Scotland) **Human factors in sports systems: Suggested models for analyzing athlete-coach interaction. Human Factors**, 1974(Oct), Vol 16(5), 528-544.—Reviews research on the personalities of particular groups of athletes, considers social interaction within sports, and offers a number of theoretical constructs which might be utilized in the analysis of the athlete-coach relationship. These constructs are to some extent interdisciplinary and range from a social-systems framework to a social-action perspective. (72 ref)—*Journal abstract*.

12761. **Human Factors Lab.** (US Naval Training Equipment Ctr, Orlando, FL) **Annotated bibliography of Human Factors Laboratory Reports (1945-1968) Supplement No 1, 1968-1972. Catalog of Selected Documents in Psychology**, 1975(Win), Vol 5, 223.

12762. Kallina, Herbert & Zimmer, Adolf. (Westfalen Wilhelms-U, Psychologischen Inst, Münster, W Ger-

many) [Comparison of the effectiveness of different regulations for reflectors on street markers.] (Germ) *Zeitschrift für Experimentelle und Angewandte Psychologie*, 1974, Vol 21(4), 564-574.—Tested the effectiveness of differently colored reflectors for the right and left sides of the street compared with those used under current regulations, which prescribe reflectors of the same color on both sides. Reflectors showing a weak, level, left S-curve and a slightly climbing right curve on a public highway were judged by 63 highway patrolmen at night from a stationary car. Significantly more errors were made under existing conditions (the same reflectors on both sides), while the number of correct judgments of the course of the road increased significantly with red reflectors on the right and white reflectors on the left. The time needed to make the decision decreased significantly under the red-white reflector condition. (English & French summaries)—*W. J. Koppitz*.

12763. **Levy, Joseph.** (U Waterloo, Ontario, Canada) **An applied intersystem congruence model of play, recreation, and leisure.** *Human Factors*, 1974(Oct), Vol 16(5), 545-557.—Argues that scholarly writings on the causes and effects of play, recreation, and leisure from Aristotle's *Ethics* to the most contemporary study have been of a predominantly philosophical, speculative, and logical nature. Little effort has been devoted to empirically validating or systematically researching what motivates people to become involved in certain forms of leisure and what are the effects of participation in these activities. The present paper (a) proposes an applied intersystem congruence model of play, (b) discusses empirical evidence which offers preliminary evidence for the intersystem congruence model of play, and (c) suggests some problems for further consideration. (52 ref)—*Journal abstract*.

12764. **McKnight, A. James; Hundt, Alan G. & Cunningham, June S.** (Human Resources Research Organization, Div 1, Alexandria, VA) **The development of guides for teacher preparation in driver education.** *HumRRO Professional Paper*, 1974(Jun), No 12-74, 28 p.—Describes the development of 2 separate driver education teacher preparation guides, one for secondary school driver education teachers and the other for commercial driving school instructors. The development of both guides involved a 4-step process: (a) an analysis of both the highway transportation system and the instructional system, public and private, to identify instructional requirements imposed upon the driver education teacher; (b) identification of the performance, skill, and knowledge required of the driver educator in meeting his instructional requirements; (c) the preparation and assembly of materials needed to fulfill the instructional objectives; and (d) a large-scale review of the guides by representatives of the secondary school and commercial driving school communities.—*Journal abstract*.

12765. **Moeller, George & Chattin, Craig P.** (US Naval Submarine Medical Research Lab, Groton, CT) **Situation-specific experience and nitrogen narcosis in the diving experiment.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 154-158.—Conducted a study of 8 Navy hyperbaric chamber technicians to examine the effects of 3 factors—individual's diving history, interval

between dives, and similarity of dive profiles—on susceptibility to narcosis. Ss performed adaptive tracking and mental arithmetic tasks during 4 weekly 45-min exposures, 2 each at pressure equivalents of 33- and 198-foot depths. Order of exposure was counterbalanced over Ss. Performance in the adaptive tracking task provided evidence for induction of narcosis by a 1st exposure to compressed air at 7 ATA (atmospheres absolute), and reduction of susceptibility to narcosis in the 2nd 7 ATA exposure relative to the 1st exposure. Carry-over effects on narcosis of 1 hyperbaric exposure to another depended upon similarity of those exposures. Results indicate that the effects of situation-specific experience on "nitrogen narcosis," as opposed to those of general experience in hyperbaric contexts, have been seriously underestimated. (16 ref)—*Journal abstract*.

12766. **Orlick, T. D.** (U Ottawa, Ontario, Canada) **Sport participation: A process of shaping behavior.** *Human Factors*, 1974(Oct), Vol 16(5), 558-561.—Explores human environmental factors which appear to be directly related to a person's decision to participate or not to participate in sport and physical recreation. More specifically, certain factors within the child's sports environment are focused on which have been shown to influence his attraction to or avoidance of sports participation. 3 major behavioral determinants (role models, expectancies, and reinforcements) are examined and discussed. A recent study is briefly mentioned which attempted to obtain some information on the question of why, when given an equal opportunity, some children will participate in sport, while others will not.—*Journal abstract*.

12767. **Pelz, Donald C. & Krupat, Edward.** (U Michigan, Inst for Social Research) **Caution profile and driving record for undergraduate males.** *Accident Analysis & Prevention*, 1974(Sep), Vol 6(1), 45-58.—Evaluated a device called an Apprehension Meter on which 60 undergraduate males watched a 5-min film of highway driving as seen from the driver's seat and recorded a moment-by-moment judgment of degree of danger, or caution level. From responses to 6 discrete hazards and to intervening uneventful periods, several summary scores were derived of which 5 differentiated significantly by driving record. (16 ref)

12768. **Pesch, Alan J.; Hammell, Thomas J. & Ewalt, Frederick M.** (Eclectech Assoc, North Stonington, CT) **Tactical decision-making training system design.** *NAV. TRAEQUIPCEN*, 1974(Nov), No 73-C-0158-1, 71 p.—Describes the design characteristics for a prototype generalized tactical decision-making training system which can serve as an empirical test bed for applied research. The 4-level training structure is outlined, along with a training strategy that defines software and hardware characteristics and the need for, and characteristics of, a computer language especially designed for training simulations. (5 p ref)

12769. **Quandt, Richard E.** (Princeton U) **Some statistical characterizations of aircraft hijacking.** *Accident Analysis & Prevention*, 1974(Oct), Vol 6(2), 115-123.—Tested the hypothesis that hijackings of US registered aircraft since 1968 represent a homogeneous Poisson process. It is concluded that hijackings are not independent of one another and security precautions may need to



be intensified in periods following a hijacking. (French & German summaries)

12770. Rabideau, Gerald F. (U Waterloo, Ontario, Canada) **Human, machine, and environment aspects of snowmobile design and utilization.** *Human Factors*, 1974(Oct), Vol 16(5), 481-494.—Describes and analyzes the major problems—damage and injury-producing accidents, noise pollution, damage to private property, and detrimental effects on natural ecology—associated with the sport of snowmobiling. Examples are given that typify the current state-of-the-art investigations of the problem areas.

12771. Shealy, Jasper E.; Geyer, Lewis H. & Hayden, Robert. (State U New York, Buffalo) **Epidemiology of ski injuries: Effect of method of skill acquisition and release binding accident rates.** *Human Factors*, 1974(Oct), Vol 16(5), 459-473.—Observed a closed population of 2,071 skiers for an entire skiing season. 221 accidents were generated by the population. Distributions of age, sex, skill level, years of experience, marital status, and type of binding used were obtained prior to the start of the season. Exposure to risk was obtained at the end of the season. Injury data included measures of severity, location of injury (upper vs lower extremity), ski patrol involvement, binding release or not, and overall and lower-extremity injury rates. It is concluded that (a) lessons as presently structured are not contributing to ski safety and, in fact, are associated with high accident rates; (b) bindings that have more than 2 release modes have lower accident rates than those with only 2; (c) cable bindings are categorically dangerous by every accident variable available; and (d) a significant Sex  $\times$  Binding-Type interaction exists that has important implications for both female skiers and binding designers. (18 ref)—*Journal abstract*.

12772. Sowa, Vincent M. & Fraser, T. M. (U Waterloo, Ontario, Canada) **Systems safety in recreational and powered garden vehicles.** *Human Factors*, 1974(Oct), Vol 16(5), 474-480.—Urges the development of a standardized dynamic evaluation process which will be applicable to specialized power consumer vehicles on which the operator rides. A method of analysis is suggested for assuring adequate safety in which such a vehicle is considered not only as a dynamic man-machine system, but also as a dynamic man-machine system operating within a variety of dynamic environments.

12773. Wiener, Earl L. (U Miami) **On simultaneous monitoring and tracking.** *Journal of Applied Psychology*, 1975(Feb), Vol 60(1), 100-105.—Conducted a study of 72 undergraduates to examine the effects of time-sharing between a tracking and monitoring task presented on the same visual display and to evaluate the possibility that

knowledge of results on the monitoring task might offset any harmful effects due to time-sharing demands. Ss first performed a visual monitoring task with no knowledge of results; 2 days later they were assigned to 1 of 6 groups and performed the same task with or without knowledge of results under 1 of 3 levels of secondary task loads: high-frequency input compensatory tracking, low-frequency tracking, and no tracking. In addition, a 7th group ( $n = 12$ ) performed the tracking task only. Results show that time-sharing between monitoring and tracking degraded performance on both tasks, but tracking input frequency did not affect monitoring performance. Groups which received knowledge of results neither improved nor declined in monitoring performance when the time-sharing load was imposed. —*Journal abstract*.

12774. Wilkinson, R. T. (MRC Applied Psychology Unit (Annexe), Cambridge, England) **Individual differences in response to the environment.** *Ergonomics*, 1974(Nov), Vol 17(6), 745-756.—Assesses the effects of environmental stress, noting that comfort and working efficiency cannot necessarily be equated. The optimal experimental design for assessing individual differences differs fundamentally from that required for establishing population means. Reliable individual differences will only be revealed by repeated measures of a given effect upon the same people and under the same conditions. 2 difficulties are cited concerning individuals' acceptance levels of temperature and noise: (a) Individuals may differ in what they mean when they check one of a number of terms indicating varying degrees of discomfort or annoyance. (b) Where an O experiences a range of conditions, he will tend to place the center point of the rating scale at the center of the range of conditions sampled. Over a group of Os, this may bias the average comfort or acceptability vote away from its true point. On the other hand, differences between groups of Os may be minimized if the same range of conditions is presented to all. It is suggested that the presentation of a standard followed by a single test condition will avoid difficulties due to range effects but may encounter others due to suggestion or contrast effects. (French & German summaries) (21 ref)—*Journal abstract*.

12775. Williams, Allan R.; Siegel, Arthur I. & Burkett, James R. (Applied Psychological Services, Wayne, PA) **Readability of textual material: A survey of the literature.** Lowry Air Force Base, CO: Technical Training Div, 1974. 64 p.—Reviews and analyzes methods of measuring the readability-comprehensibility of textual materials. Formulas for calculating readability are presented and placed in historical perspective, and the general status of research into the development of readability indices is discussed. (97 ref)

## BRIEF SUBJECT INDEX

Entries in the Brief Subject Index are derived from a 4,000-term *Thesaurus of Psychological Terms*. Only those terms representing subject matter content covered in this monthly issue are listed. A thesaurus term missing from the listing indicates that no material of major relevance to the concept is included in the issue. Records are indexed at the level of specificity contained in each document. Each index entry also refers the reader to broader generic concepts as well as to more specific concepts related to each term. Thus, a reader interested in articles concerning childhood psychosis may find additional relevant information under "psychosis" or "early infantile autism."

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Charges for processing PASAR requests are based on the amount of computer time required to perform a search. Typically these charges range from \$40 to \$60 and will not exceed \$100 unless the requester is contacted first. The total charge for a search is based on its complexity and is in most cases unrelated to the number of references retrieved. For example, a complex search strategy involving many variables or limiting factors may require more computer time and may result in fewer references retrieved than a broad search with few limiting factors.



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**ITEM 1. Narrative statement of search topic.** Provide a detailed description of the subject matter you wish to be retrieved. Please avoid submitting multiple, discrete requests on a single PASAR Request Form, since such cannot be processed for a single fee. However, multiple aspects of a primary subject may be requested. The distinction is illustrated in the following examples:

*Acceptable:* "the effects of socioeconomic status, education level, or birth order on career motivation in women."

"Career motivation" is the primary element of this request, while the other elements serve merely to qualify or narrow the scope of this rather broad subject area.

*Unacceptable:* "the measurement of employee attitudes concerning wages and benefits. Also desire references dealing with the factors that influence management decision-making with respect to personnel policies and procedures."

Although these two topics are closely related to the design and administration of personnel policies and procedures, two separate search strategies would have to be executed to retrieve the specific information requested, and a separate charge for each would have to be made.

**ITEM 2. Descriptor(s) relevant to dependent variable(s).** Provide a list of words or phrases that indicate the subject matter of prime interest. Descriptors for the "acceptable" example (see Item #1) might include: career motivation, career preference, and career aspirations.

**ITEM 3. Descriptor(s) relevant to independent variable(s).** Provide a list of words or phrases that will qualify or narrow the scope of the dependent variable. Descriptors for the "acceptable" example (see Item #1) might include: socioeconomic status, social class, educational level, birth order, and women.

**ITEM 4. Search qualifications.** Once the subject matter of the search has been defined, you may wish to refine it with specific requirements such as population or time frame. These qualifications are often essential to the actual information need; however, they can unnecessarily limit the search, causing retrieval of few of the relevant records. Therefore, consider your requirements carefully.

**ITEM 5. Sorting requirements.** Please indicate whether you would prefer to have references sorted alphabetically by author or chronologically by year.

**ITEM 6. Intended use of search results.** Provide a description of how the references resulting from your search will be used (e.g., definition of a research project, preparation of an article, proposal preparation, dissertation, etc.).

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Search Time \_\_\_\_\_  
Date Received \_\_\_\_\_  
Date Sent \_\_\_\_\_  
APA Invoice No. \_\_\_\_\_

Address to which response should be mailed:

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ORGANIZATION \_\_\_\_\_

STREET \_\_\_\_\_

CITY \_\_\_\_\_

STATE \_\_\_\_\_

ZIP CODE \_\_\_\_\_

AREA CODE AND TELEPHONE NO. \_\_\_\_\_

☐ Attached is my institutional  
purchase order # \_\_\_\_\_

☐ Please bill me personally at the address indicated. I agree to assume responsibility for charges resulting from this PASAR search request.

AUTHORIZED SIGNATURE \_\_\_\_\_

DATE \_\_\_\_\_

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PLEASE TYPE OR PRINT

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2. Descriptor(s) relevant to dependent  
variable(s):

3. Descriptor(s) relevant to independent  
variable(s):

4. Search qualifications: (Caution should be exercised in order not to limit unnecessarily the range of references to be retrieved. We may not always be able to meet your precise needs, but will attempt to avoid types of literature that are of no interest to you.)

- a. Population: \_\_\_\_\_ human \_\_\_\_\_ animal specific animal \_\_\_\_\_  
b. Age group (approximate): \_\_\_\_\_ infants \_\_\_\_\_ children \_\_\_\_\_ adolescents \_\_\_\_\_ college  
\_\_\_\_\_ adults \_\_\_\_\_ aged  
c. Publication date: (Current data base contains PA entries 1967 to present only.) From \_\_\_\_\_ To \_\_\_\_\_

5. Sorting requirements: ☐ Author sort ☐ Year sort

6. Intended use of search results:

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